APPENDICES

Appendix AQ:
Air Quality modeling results

Wildflower Station

Contra Costa County, Annual

1.0 Project Characteristics

1.1 Land Usage

Land Uses	Size	Metric	Lot Acreage	Floor Surface Area	Population
Other Asphalt Surfaces	37.26	1000sqft	0.86	37,260.00	0
Other Asphalt Surfaces	113.69	1000sqft	2.61	113,690.00	0
Condo/Townhouse High Rise	98.00	Dwelling Unit	7.00	100,094.00	316
Single Family Housing	22.00	Dwelling Unit	1.82	4,930.00	71
Strip Mall	89.42	1000sqft	2.05	89,425.00	0

1.2 Other Project Characteristics

Urbanization	Urban	**Wind Speed (m/s)**	2.2	**Precipitation Freq (Days)**	58
Climate Zone	4			**Operational Year**	2020
Utility Company	Pacific Gas & Electric Company				
CO2 Intensity (lb/MWhr)	641.35	**CH4 Intensity (lb/MWhr)**	0.029	**N2O Intensity (lb/MWhr)**	0.006

1.3 User Entered Comments & Non-Default Data

Project Characteristics -

Land Use - Land uses, quantity, and size from Wildflower Preliminary Developement Plan 2017.
Population calculation by a density of 3.22 persons/du from the City of Antioch Housing Element 2015.

Construction Phase - Demolition phase deleted. The property contains no structures and vegetation consists mostly of grass and ruderal vegetation.
Architectural Coating phase overlapped with Building Construction phase to reflect actual construction practices.

Grading - The preliminary grading plan indicates no material imported or exported.

Architectural Coating -

Vehicle Trips - Non-resident C-C Trip Length from City of Antioch Neighborhood Commecial District zone definition.
Non-resident C-W and C-C Trip % adjusted to reflect estimated 179 employees.

Construction Off-road Equipment Mitigation - Fugative dust mitigation per BAAQMD best construction management practices.
Tier 3 Engines required on all grading and excavation equipment to limit daily NOx emissions.

Mobile Land Use Mitigation - Mitigation for mixed use development (LUT-3), transit access (LUT-5), and improved project site walkability (SDT-1) applied.

Area Mitigation - No wood hearths in new construction per BAAQMD regulation 6, rule 3.

Table Name	Column Name	Default Value	New Value
tblConstDustMitigation	WaterUnpavedRoadVehicleSpeed	40	15
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	2.00
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	1.00
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	4.00
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	2.00
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	9.00
tblConstEquipMitigation	Tier	No Change	Tier 3
tblConstEquipMitigation	Tier	No Change	Tier 3
tblConstEquipMitigation	Tier	No Change	Tier 3
tblConstEquipMitigation	Tier	No Change	Tier 3
tblConstEquipMitigation	Tier	No Change	Tier 3
tblConstructionPhase	NumDays	20.00	50.00
tblConstructionPhase	PhaseEndDate	11/25/2019	10/14/2019
tblConstructionPhase	PhaseEndDate	8/19/2019	9/16/2019
tblConstructionPhase	PhaseEndDate	9/16/2019	7/23/2018

tblConstructionPhase	PhaseStartDate	9/17/2019	8/6/2019
tblConstructionPhase	PhaseStartDate	6/26/2018	7/24/2018
tblConstructionPhase	PhaseStartDate	8/20/2019	6/26/2018
tblLandUse	BuildingSpaceSquareFeet	98,000.00	100,094.00
tblLandUse	BuildingSpaceSquareFeet	39,600.00	4,930.00
tblLandUse	BuildingSpaceSquareFeet	89,420.00	89,425.00
tblLandUse	LandUseSquareFeet	98,000.00	100,094.00
tblLandUse	LandUseSquareFeet	39,600.00	4,930.00
tblLandUse	LandUseSquareFeet	89,420.00	89,425.00
tblLandUse	LotAcreage	1.53	7.00
tblLandUse	LotAcreage	7.14	1.82
tblLandUse	Population	280.00	316.00
tblLandUse	Population	63.00	71.00
tblProjectCharacteristics	OperationalYear	2018	2020
tblVehicleTrips	CC_TL	7.30	2.00
tblVehicleTrips	CC_TTP	64.40	71.10
tblVehicleTrips	CW_TTP	16.60	9.90

2.0 Emissions Summary

2.1 Overall Construction

Unmitigated Construction

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Year	tons/yr										MT/yr					
2018	0.3332	3.0906	2.2355	4.5700e-003	0.3224	0.1521	0.4745	0.1312	0.1418	0.2729	0.0000	415.6741	415.6741	0.0785	0.0000	417.6374
2019	1.5474	2.6533	2.2616	5.2100e-003	0.1638	0.1279	0.2918	0.0443	0.1205	0.1648	0.0000	469.8301	469.8301	0.0635	0.0000	471.4178
Maximum	**1.5474**	**3.0906**	**2.2616**	**5.2100e-003**	**0.3224**	**0.1521**	**0.4745**	**0.1312**	**0.1418**	**0.2729**	**0.0000**	**469.8301**	**469.8301**	**0.0785**	**0.0000**	**471.4178**

Mitigated Construction

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Year	tons/yr										MT/yr					
2018	0.2328	2.3666	2.2632	4.5700e-003	0.2011	0.1141	0.3153	0.0742	0.1103	0.1845	0.0000	415.6738	415.6738	0.0785	0.0000	417.6371
2019	1.5093	2.5069	2.2712	5.2100e-003	0.1638	0.1196	0.2834	0.0443	0.1152	0.1595	0.0000	469.8298	469.8298	0.0635	0.0000	471.4176
Maximum	**1.5093**	**2.5069**	**2.2712**	**5.2100e-003**	**0.2011**	**0.1196**	**0.3153**	**0.0742**	**0.1152**	**0.1845**	**0.0000**	**469.8298**	**469.8298**	**0.0785**	**0.0000**	**471.4176**

	ROG	**NOx**	**CO**	**SO2**	**Fugitive PM10**	**Exhaust PM10**	**PM10 Total**	**Fugitive PM2.5**	**Exhaust PM2.5**	**PM2.5 Total**	**Bio- CO2**	**NBio-CO2**	**Total CO2**	**CH4**	**N20**	**CO2e**
Percent Reduction	**7.36**	**15.15**	**-0.83**	**0.00**	**24.94**	**16.54**	**21.87**	**32.47**	**14.05**	**21.43**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**

Quarter	Start Date	End Date	Maximum Unmitigated ROG + NOX (tons/quarter)	Maximum Mitigated ROG + NOX (tons/quarter)
1	5-1-2018	7-31-2018	1.5317	0.8631
2	8-1-2018	10-31-2018	1.1367	1.0431
3	11-1-2018	1-31-2019	1.1063	1.0221
4	2-1-2019	4-30-2019	1.0000	0.9366
5	5-1-2019	7-31-2019	1.0291	0.9636
6	8-1-2019	9-30-2019	1.5618	1.5283
		Highest	1.5618	1.5283

2.2 Overall Operational

Unmitigated Operational

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Area	1.2761	0.0184	1.3961	1.0600e-003		0.0766	0.0766		0.0766	0.0766	7.2642	3.9815	11.2457	0.0139	4.5000e-004	11.7281
Energy	0.0113	0.0969	0.0455	6.1000e-004		7.7800e-003	7.7800e-003		7.7800e-003	7.7800e-003	0.0000	584.8842	584.8842	0.0235	6.4700e-003	587.4016
Mobile	0.9940	3.7260	8.2184	0.0205	1.5500	0.0214	1.5714	0.4160	0.0201	0.4360	0.0000	1,874.1199	1,874.1199	0.0958	0.0000	1,876.5144
Waste						0.0000	0.0000		0.0000	0.0000	34.2628	0.0000	34.2628	2.0249	0.0000	84.8848
Water						0.0000	0.0000		0.0000	0.0000	4.5818	31.8857	36.4675	0.4720	0.0114	51.6686
Total	**2.2814**	**3.8413**	**9.6601**	**0.0222**	**1.5500**	**0.1058**	**1.6558**	**0.4160**	**0.1045**	**0.5205**	**46.1089**	**2,494.8713**	**2,540.9802**	**2.6301**	**0.0183**	**2,612.1973**

2.2 Overall Operational

Mitigated Operational

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Area	0.9209	0.0154	0.8983	8.0000e-005		5.3300e-003	5.3300e-003		5.3300e-003	5.3300e-003	0.0000	7.2423	7.2423	1.5400e-003	1.1000e-004	7.3124
Energy	0.0113	0.0969	0.0455	6.1000e-004		7.7800e-003	7.7800e-003		7.7800e-003	7.7800e-003	0.0000	584.8842	584.8842	0.0235	6.4700e-003	587.4016
Mobile	0.9747	3.5800	7.7503	0.0186	1.3810	0.0196	1.4007	0.3706	0.0184	0.3890	0.0000	1,700.9526	1,700.9526	0.0910	0.0000	1,703.2264
Waste						0.0000	0.0000		0.0000	0.0000	34.2628	0.0000	34.2628	2.0249	0.0000	84.8848
Water						0.0000	0.0000		0.0000	0.0000	4.5818	31.8857	36.4675	0.4720	0.0114	51.6686
Total	**1.9069**	**3.6922**	**8.6942**	**0.0193**	**1.3810**	**0.0328**	**1.4138**	**0.3706**	**0.0315**	**0.4021**	**38.8446**	**2,324.9648**	**2,363.8095**	**2.6130**	**0.0180**	**2,434.4937**

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio-CO2	Total CO2	CH4	N20	CO2e
Percent Reduction	**16.42**	**3.88**	**10.00**	**12.96**	**10.90**	**69.06**	**14.62**	**10.90**	**69.84**	**22.73**	**15.75**	**6.81**	**6.97**	**0.65**	**1.85**	**6.80**

3.0 Construction Detail

Construction Phase

Phase Number	Phase Name	Phase Type	Start Date	End Date	Num Days Week	Num Days	Phase Description
1	Site Preparation	Site Preparation	5/1/2018	5/14/2018	5	10	
2	Grading	Grading	5/15/2018	6/25/2018	5	30	
3	Building Construction	Building Construction	7/24/2018	9/16/2019	5	300	
4	Paving	Paving	6/26/2018	7/23/2018	5	20	
5	Architectural Coating	Architectural Coating	8/6/2019	10/14/2019	5	50	

Acres of Grading (Site Preparation Phase): 0

Acres of Grading (Grading Phase): 75

Acres of Paving: 3.47

Residential Indoor: 212,674; Residential Outdoor: 70,891; Non-Residential Indoor: 134,138; Non-Residential Outdoor: 44,713; Striped Parking Area: 9,057 (Architectural Coating – sqft)

OffRoad Equipment

Phase Name	Offroad Equipment Type	Amount	Usage Hours	Horse Power	Load Factor
Site Preparation	Rubber Tired Dozers	3	8.00	247	0.40
Site Preparation	Tractors/Loaders/Backhoes	4	8.00	97	0.37
Grading	Excavators	2	8.00	158	0.38
Grading	Graders	1	8.00	187	0.41
Grading	Rubber Tired Dozers	1	8.00	247	0.40
Grading	Scrapers	2	8.00	367	0.48
Grading	Tractors/Loaders/Backhoes	2	8.00	97	0.37
Building Construction	Cranes	1	7.00	231	0.29
Building Construction	Forklifts	3	8.00	89	0.20
Building Construction	Generator Sets	1	8.00	84	0.74
Building Construction	Tractors/Loaders/Backhoes	3	7.00	97	0.37
Building Construction	Welders	1	8.00	46	0.45
Paving	Pavers	2	8.00	130	0.42
Paving	Paving Equipment	2	8.00	132	0.36
Paving	Rollers	2	8.00	80	0.38
Architectural Coating	Air Compressors	1	6.00	78	0.48

Trips and VMT

Phase Name	Offroad Equipment Count	Worker Trip Number	Vendor Trip Number	Hauling Trip Number	Worker Trip Length	Vendor Trip Length	Hauling Trip Length	Worker Vehicle Class	Vendor Vehicle Class	Hauling Vehicle Class
Site Preparation	7	18.00	0.00	0.00	10.80	7.30	20.00	LD_Mix	HDT_Mix	HHDT
Grading	8	20.00	0.00	0.00	10.80	7.30	20.00	LD_Mix	HDT_Mix	HHDT
Building Construction	9	171.00	52.00	0.00	10.80	7.30	20.00	LD_Mix	HDT_Mix	HHDT
Paving	6	15.00	0.00	0.00	10.80	7.30	20.00	LD_Mix	HDT_Mix	HHDT
Architectural Coating	1	34.00	0.00	0.00	10.80	7.30	20.00	LD_Mix	HDT_Mix	HHDT

3.1 Mitigation Measures Construction

Use Cleaner Engines for Construction Equipment

Water Exposed Area

Reduce Vehicle Speed on Unpaved Roads

3.2 Site Preparation - 2018

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Fugitive Dust					0.0903	0.0000	0.0903	0.0497	0.0000	0.0497	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Off-Road	0.0228	0.2410	0.1124	1.9000e-004		0.0129	0.0129		0.0119	0.0119	0.0000	17.3800	17.3800	5.4100e-003	0.0000	17.5152
Total	**0.0228**	**0.2410**	**0.1124**	**1.9000e-004**	**0.0903**	**0.0129**	**0.1032**	**0.0497**	**0.0119**	**0.0615**	**0.0000**	**17.3800**	**17.3800**	**5.4100e-003**	**0.0000**	**17.5152**

3.2 Site Preparation - 2018

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	3.7000e-004	2.8000e-004	2.8600e-003	1.0000e-005	7.1000e-004	0.0000	7.2000e-004	1.9000e-004	0.0000	1.9000e-004	0.0000	0.6669	0.6669	2.0000e-005	0.0000	0.6674
Total	**3.7000e-004**	**2.8000e-004**	**2.8600e-003**	**1.0000e-005**	**7.1000e-004**	**0.0000**	**7.2000e-004**	**1.9000e-004**	**0.0000**	**1.9000e-004**	**0.0000**	**0.6669**	**0.6669**	**2.0000e-005**	**0.0000**	**0.6674**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Fugitive Dust					0.0407	0.0000	0.0407	0.0223	0.0000	0.0223	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Off-Road	4.6600e-003	0.0953	0.1148	1.9000e-004		4.7300e-003	4.7300e-003		4.7300e-003	4.7300e-003	0.0000	17.3799	17.3799	5.4100e-003	0.0000	17.5152
Total	**4.6600e-003**	**0.0953**	**0.1148**	**1.9000e-004**	**0.0407**	**4.7300e-003**	**0.0454**	**0.0223**	**4.7300e-003**	**0.0271**	**0.0000**	**17.3799**	**17.3799**	**5.4100e-003**	**0.0000**	**17.5152**

3.2 Site Preparation - 2018

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	3.7000e-004	2.8000e-004	2.8600e-003	1.0000e-005	7.1000e-004	0.0000	7.2000e-004	1.9000e-004	0.0000	1.9000e-004	0.0000	0.6669	0.6669	2.0000e-005	0.0000	0.6674
Total	**3.7000e-004**	**2.8000e-004**	**2.8600e-003**	**1.0000e-005**	**7.1000e-004**	**0.0000**	**7.2000e-004**	**1.9000e-004**	**0.0000**	**1.9000e-004**	**0.0000**	**0.6669**	**0.6669**	**2.0000e-005**	**0.0000**	**0.6674**

3.3 Grading - 2018

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Fugitive Dust					0.1301	0.0000	0.1301	0.0540	0.0000	0.0540	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Off-Road	0.0764	0.8928	0.5263	9.3000e-004		0.0395	0.0395		0.0364	0.0364	0.0000	84.9728	84.9728	0.0265	0.0000	85.6341
Total	**0.0764**	**0.8928**	**0.5263**	**9.3000e-004**	**0.1301**	**0.0395**	**0.1696**	**0.0540**	**0.0364**	**0.0903**	**0.0000**	**84.9728**	**84.9728**	**0.0265**	**0.0000**	**85.6341**

3.3 Grading - 2018

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	1.2300e-003	9.4000e-004	9.5400e-003	2.0000e-005	2.3800e-003	2.0000e-005	2.4000e-003	6.3000e-004	2.0000e-005	6.5000e-004	0.0000	2.2230	2.2230	7.0000e-005	0.0000	2.2247
Total	**1.2300e-003**	**9.4000e-004**	**9.5400e-003**	**2.0000e-005**	**2.3800e-003**	**2.0000e-005**	**2.4000e-003**	**6.3000e-004**	**2.0000e-005**	**6.5000e-004**	**0.0000**	**2.2230**	**2.2230**	**7.0000e-005**	**0.0000**	**2.2247**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Fugitive Dust					0.0586	0.0000	0.0586	0.0243	0.0000	0.0243	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Off-Road	0.0229	0.4497	0.5508	9.3000e-004		0.0195	0.0195		0.0195	0.0195	0.0000	84.9727	84.9727	0.0265	0.0000	85.6340
Total	**0.0229**	**0.4497**	**0.5508**	**9.3000e-004**	**0.0586**	**0.0195**	**0.0780**	**0.0243**	**0.0195**	**0.0438**	**0.0000**	**84.9727**	**84.9727**	**0.0265**	**0.0000**	**85.6340**

3.3 Grading - 2018

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	1.2300e-003	9.4000e-004	9.5400e-003	2.0000e-005	2.3800e-003	2.0000e-005	2.4000e-003	6.3000e-004	2.0000e-005	6.5000e-004	0.0000	2.2230	2.2230	7.0000e-005	0.0000	2.2247
Total	**1.2300e-003**	**9.4000e-004**	**9.5400e-003**	**2.0000e-005**	**2.3800e-003**	**2.0000e-005**	**2.4000e-003**	**6.3000e-004**	**2.0000e-005**	**6.5000e-004**	**0.0000**	**2.2230**	**2.2230**	**7.0000e-005**	**0.0000**	**2.2247**

3.4 Building Construction - 2018

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Off-Road	0.1541	1.3449	1.0109	1.5500e-003		0.0862	0.0862		0.0811	0.0811	0.0000	136.7162	136.7162	0.0335	0.0000	137.5535
Total	**0.1541**	**1.3449**	**1.0109**	**1.5500e-003**		**0.0862**	**0.0862**		**0.0811**	**0.0811**	**0.0000**	**136.7162**	**136.7162**	**0.0335**	**0.0000**	**137.5535**

3.4 Building Construction - 2018

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0165	0.4040	0.1082	8.3000e-004	0.0197	3.3200e-003	0.0230	5.6800e-003	3.1700e-003	8.8600e-003	0.0000	78.9335	78.9335	4.3800e-003	0.0000	79.0430
Worker	0.0402	0.0309	0.3126	8.1000e-004	0.0780	5.4000e-004	0.0785	0.0207	5.0000e-004	0.0212	0.0000	72.8588	72.8588	2.1900e-003	0.0000	72.9136
Total	**0.0568**	**0.4349**	**0.4208**	**1.6400e-003**	**0.0976**	**3.8600e-003**	**0.1015**	**0.0264**	**3.6700e-003**	**0.0301**	**0.0000**	**151.7923**	**151.7923**	**6.5700e-003**	**0.0000**	**151.9566**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Off-Road	0.1254	1.2098	1.0117	1.5500e-003		0.0765	0.0765		0.0735	0.0735	0.0000	136.7160	136.7160	0.0335	0.0000	137.5534
Total	**0.1254**	**1.2098**	**1.0117**	**1.5500e-003**		**0.0765**	**0.0765**		**0.0735**	**0.0735**	**0.0000**	**136.7160**	**136.7160**	**0.0335**	**0.0000**	**137.5534**

3.4 Building Construction - 2018

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0165	0.4040	0.1082	8.3000e-004	0.0197	3.3200e-003	0.0230	5.6800e-003	3.1700e-003	8.8600e-003	0.0000	78.9335	78.9335	4.3800e-003	0.0000	79.0430
Worker	0.0402	0.0309	0.3126	8.1000e-004	0.0780	5.4000e-004	0.0785	0.0207	5.0000e-004	0.0212	0.0000	72.8588	72.8588	2.1900e-003	0.0000	72.9136
Total	**0.0568**	**0.4349**	**0.4208**	**1.6400e-003**	**0.0976**	**3.8600e-003**	**0.1015**	**0.0264**	**3.6700e-003**	**0.0301**	**0.0000**	**151.7923**	**151.7923**	**6.5700e-003**	**0.0000**	**151.9566**

3.4 Building Construction - 2019

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Off-Road	0.2184	1.9498	1.5877	2.4900e-003		0.1193	0.1193		0.1122	0.1122	0.0000	217.4714	217.4714	0.0530	0.0000	218.7958
Total	**0.2184**	**1.9498**	**1.5877**	**2.4900e-003**		**0.1193**	**0.1193**		**0.1122**	**0.1122**	**0.0000**	**217.4714**	**217.4714**	**0.0530**	**0.0000**	**218.7958**

3.4 Building Construction - 2019

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0239	0.6118	0.1595	1.3200e-003	0.0316	4.5100e-003	0.0361	9.1400e-003	4.3100e-003	0.0135	0.0000	126.1954	126.1954	6.7200e-003	0.0000	126.3635
Worker	0.0582	0.0435	0.4445	1.2600e-003	0.1255	8.6000e-004	0.1263	0.0334	7.9000e-004	0.0342	0.0000	113.6717	113.6717	3.1000e-003	0.0000	113.7493
Total	**0.0821**	**0.6553**	**0.6041**	**2.5800e-003**	**0.1571**	**5.3700e-003**	**0.1625**	**0.0425**	**5.1000e-003**	**0.0476**	**0.0000**	**239.8671**	**239.8671**	**9.8200e-003**	**0.0000**	**240.1127**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Off-Road	0.1803	1.8034	1.5972	2.4900e-003		0.1109	0.1109		0.1068	0.1068	0.0000	217.4711	217.4711	0.0530	0.0000	218.7956
Total	**0.1803**	**1.8034**	**1.5972**	**2.4900e-003**		**0.1109**	**0.1109**		**0.1068**	**0.1068**	**0.0000**	**217.4711**	**217.4711**	**0.0530**	**0.0000**	**218.7956**

3.4 Building Construction - 2019

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0239	0.6118	0.1595	1.3200e-003	0.0316	4.5100e-003	0.0361	9.1400e-003	4.3100e-003	0.0135	0.0000	126.1954	126.1954	6.7200e-003	0.0000	126.3635
Worker	0.0582	0.0435	0.4445	1.2600e-003	0.1255	8.6000e-004	0.1263	0.0334	7.9000e-004	0.0342	0.0000	113.6717	113.6717	3.1000e-003	0.0000	113.7493
Total	**0.0821**	**0.6553**	**0.6041**	**2.5800e-003**	**0.1571**	**5.3700e-003**	**0.1625**	**0.0425**	**5.1000e-003**	**0.0476**	**0.0000**	**239.8671**	**239.8671**	**9.8200e-003**	**0.0000**	**240.1127**

3.5 Paving - 2018

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Off-Road	0.0164	0.1752	0.1480	2.3000e-004		9.5600e-003	9.5600e-003		8.8000e-003	8.8000e-003	0.0000	20.8116	20.8116	6.4800e-003	0.0000	20.9736
Paving	4.5500e-003					0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Total	**0.0210**	**0.1752**	**0.1480**	**2.3000e-004**		**9.5600e-003**	**9.5600e-003**		**8.8000e-003**	**8.8000e-003**	**0.0000**	**20.8116**	**20.8116**	**6.4800e-003**	**0.0000**	**20.9736**

3.5 Paving - 2018

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	6.1000e-004	4.7000e-004	4.7700e-003	1.0000e-005	1.1900e-003	1.0000e-005	1.2000e-003	3.2000e-004	1.0000e-005	3.2000e-004	0.0000	1.1115	1.1115	3.0000e-005	0.0000	1.1123
Total	**6.1000e-004**	**4.7000e-004**	**4.7700e-003**	**1.0000e-005**	**1.1900e-003**	**1.0000e-005**	**1.2000e-003**	**3.2000e-004**	**1.0000e-005**	**3.2000e-004**	**0.0000**	**1.1115**	**1.1115**	**3.0000e-005**	**0.0000**	**1.1123**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Off-Road	0.0164	0.1752	0.1480	2.3000e-004		9.5600e-003	9.5600e-003		8.8000e-003	8.8000e-003	0.0000	20.8116	20.8116	6.4800e-003	0.0000	20.9736
Paving	4.5500e-003					0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Total	**0.0210**	**0.1752**	**0.1480**	**2.3000e-004**		**9.5600e-003**	**9.5600e-003**		**8.8000e-003**	**8.8000e-003**	**0.0000**	**20.8116**	**20.8116**	**6.4800e-003**	**0.0000**	**20.9736**

3.5 Paving - 2018

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	6.1000e-004	4.7000e-004	4.7700e-003	1.0000e-005	1.1900e-003	1.0000e-005	1.2000e-003	3.2000e-004	1.0000e-005	3.2000e-004	0.0000	1.1115	1.1115	3.0000e-005	0.0000	1.1123
Total	**6.1000e-004**	**4.7000e-004**	**4.7700e-003**	**1.0000e-005**	**1.1900e-003**	**1.0000e-005**	**1.2000e-003**	**3.2000e-004**	**1.0000e-005**	**3.2000e-004**	**0.0000**	**1.1115**	**1.1115**	**3.0000e-005**	**0.0000**	**1.1123**

3.6 Architectural Coating - 2019

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Archit. Coating	1.2371					0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Off-Road	6.6600e-003	0.0459	0.0460	7.0000e-005		3.2200e-003	3.2200e-003		3.2200e-003	3.2200e-003	0.0000	6.3831	6.3831	5.4000e-004	0.0000	6.3966
Total	**1.2438**	**0.0459**	**0.0460**	**7.0000e-005**		**3.2200e-003**	**3.2200e-003**		**3.2200e-003**	**3.2200e-003**	**0.0000**	**6.3831**	**6.3831**	**5.4000e-004**	**0.0000**	**6.3966**

3.6 Architectural Coating - 2019

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	3.1300e-003	2.3400e-003	0.0239	7.0000e-005	6.7400e-003	5.0000e-005	6.7900e-003	1.7900e-003	4.0000e-005	1.8400e-003	0.0000	6.1085	6.1085	1.7000e-004	0.0000	6.1127
Total	**3.1300e-003**	**2.3400e-003**	**0.0239**	**7.0000e-005**	**6.7400e-003**	**5.0000e-005**	**6.7900e-003**	**1.7900e-003**	**4.0000e-005**	**1.8400e-003**	**0.0000**	**6.1085**	**6.1085**	**1.7000e-004**	**0.0000**	**6.1127**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Archit. Coating	1.2371					0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Off-Road	6.6600e-003	0.0459	0.0460	7.0000e-005		3.2200e-003	3.2200e-003		3.2200e-003	3.2200e-003	0.0000	6.3831	6.3831	5.4000e-004	0.0000	6.3966
Total	**1.2438**	**0.0459**	**0.0460**	**7.0000e-005**		**3.2200e-003**	**3.2200e-003**		**3.2200e-003**	**3.2200e-003**	**0.0000**	**6.3831**	**6.3831**	**5.4000e-004**	**0.0000**	**6.3966**

3.6 Architectural Coating - 2019

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	3.1300e-003	2.3400e-003	0.0239	7.0000e-005	6.7400e-003	5.0000e-005	6.7900e-003	1.7900e-003	4.0000e-005	1.8400e-003	0.0000	6.1085	6.1085	1.7000e-004	0.0000	6.1127
Total	**3.1300e-003**	**2.3400e-003**	**0.0239**	**7.0000e-005**	**6.7400e-003**	**5.0000e-005**	**6.7900e-003**	**1.7900e-003**	**4.0000e-005**	**1.8400e-003**	**0.0000**	**6.1085**	**6.1085**	**1.7000e-004**	**0.0000**	**6.1127**

4.0 Operational Detail - Mobile

4.1 Mitigation Measures Mobile

Increase Diversity

Increase Transit Accessibility

Improve Pedestrian Network

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Mitigated	0.9747	3.5800	7.7503	0.0186	1.3810	0.0196	1.4007	0.3706	0.0184	0.3890	0.0000	1,700.9526	1,700.9526	0.0910	0.0000	1,703.2264
Unmitigated	0.9940	3.7260	8.2184	0.0205	1.5500	0.0214	1.5714	0.4160	0.0201	0.4360	0.0000	1,874.1199	1,874.1199	0.0958	0.0000	1,876.5144

4.2 Trip Summary Information

	Average Daily Trip Rate			Unmitigated	Mitigated
Land Use	Weekday	Saturday	Sunday	Annual VMT	Annual VMT
Condo/Townhouse High Rise	409.64	422.38	336.14	926,060	825,120
Other Asphalt Surfaces	0.00	0.00	0.00		
Other Asphalt Surfaces	0.00	0.00	0.00		
Single Family Housing	209.44	218.02	189.64	480,022	427,700
Strip Mall	3,963.09	3,759.22	1826.85	2,743,765	2,444,695
Total	4,582.17	4,399.62	2,352.63	4,149,847	3,697,514

4.3 Trip Type Information

	Miles			Trip %			Trip Purpose %		
Land Use	H-W or C-W	H-S or C-C	H-O or C-NW	H-W or C-W	H-S or C-C	H-O or C-NW	Primary	Diverted	Pass-by
Condo/Townhouse High Rise	10.80	4.80	5.70	31.00	15.00	54.00	86	11	3
Other Asphalt Surfaces	9.50	7.30	7.30	0.00	0.00	0.00	0	0	0
Other Asphalt Surfaces	9.50	7.30	7.30	0.00	0.00	0.00	0	0	0
Single Family Housing	10.80	4.80	5.70	31.00	15.00	54.00	86	11	3
Strip Mall	9.50	2.00	7.30	9.90	71.10	19.00	45	40	15

4.4 Fleet Mix

Land Use	LDA	LDT1	LDT2	MDV	LHD1	LHD2	MHD	HHD	OBUS	UBUS	MCY	SBUS	MH
Other Asphalt Surfaces	0.577244	0.040114	0.186710	0.126359	0.018084	0.005120	0.010527	0.023222	0.001588	0.001850	0.005513	0.002759	0.000910
Other Asphalt Surfaces	0.577244	0.040114	0.186710	0.126359	0.018084	0.005120	0.010527	0.023222	0.001588	0.001850	0.005513	0.002759	0.000910
Condo/Townhouse High Rise	0.577244	0.040114	0.186710	0.126359	0.018084	0.005120	0.010527	0.023222	0.001588	0.001850	0.005513	0.002759	0.000910
Single Family Housing	0.577244	0.040114	0.186710	0.126359	0.018084	0.005120	0.010527	0.023222	0.001588	0.001850	0.005513	0.002759	0.000910
Strip Mall	0.577244	0.040114	0.186710	0.126359	0.018084	0.005120	0.010527	0.023222	0.001588	0.001850	0.005513	0.002759	0.000910

5.0 Energy Detail

Historical Energy Use: N

5.1 Mitigation Measures Energy

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Electricity Mitigated						0.0000	0.0000		0.0000	0.0000	0.0000	473.4308	473.4308	0.0214	4.4300e-003	475.2859
Electricity Unmitigated						0.0000	0.0000		0.0000	0.0000	0.0000	473.4308	473.4308	0.0214	4.4300e-003	475.2859
NaturalGas Mitigated	0.0113	0.0969	0.0455	6.1000e-004		7.7800e-003	7.7800e-003		7.7800e-003	7.7800e-003	0.0000	111.4534	111.4534	2.1400e-003	2.0400e-003	112.1157
NaturalGas Unmitigated	0.0113	0.0969	0.0455	6.1000e-004		7.7800e-003	7.7800e-003		7.7800e-003	7.7800e-003	0.0000	111.4534	111.4534	2.1400e-003	2.0400e-003	112.1157

5.2 Energy by Land Use - NaturalGas

Unmitigated

	NaturalGas Use	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Land Use	kBTU/yr	tons/yr										MT/yr					
Condo/Townhouse High Rise	1.08477e+006	5.8500e-003	0.0500	0.0213	3.2000e-004		4.0400e-003	4.0400e-003		4.0400e-003	4.0400e-003	0.0000	57.8874	57.8874	1.1100e-003	1.0600e-003	58.2314
Other Asphalt Surfaces	0	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Single Family Housing	790957	4.2600e-003	0.0365	0.0155	2.3000e-004		2.9500e-003	2.9500e-003		2.9500e-003	2.9500e-003	0.0000	42.2085	42.2085	8.1000e-004	7.7000e-004	42.4593
Strip Mall	212832	1.1500e-003	0.0104	8.7600e-003	6.0000e-005		7.9000e-004	7.9000e-004		7.9000e-004	7.9000e-004	0.0000	11.3575	11.3575	2.2000e-004	2.1000e-004	11.4250
Total		**0.0113**	**0.0969**	**0.0455**	**6.1000e-004**		**7.7800e-003**	**7.7800e-003**		**7.7800e-003**	**7.7800e-003**	**0.0000**	**111.4534**	**111.4534**	**2.1400e-003**	**2.0400e-003**	**112.1157**

5.2 Energy by Land Use - NaturalGas

Mitigated

	NaturalGas Use	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Land Use	kBTU/yr	tons/yr										MT/yr					
Condo/Townhouse High Rise	1.08477e+006	5.8500e-003	0.0500	0.0213	3.2000e-004		4.0400e-003	4.0400e-003		4.0400e-003	4.0400e-003	0.0000	57.8874	57.8874	1.1100e-003	1.0600e-003	58.2314
Other Asphalt Surfaces	0	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Single Family Housing	790957	4.2600e-003	0.0365	0.0155	2.3000e-004		2.9500e-003	2.9500e-003		2.9500e-003	2.9500e-003	0.0000	42.2085	42.2085	8.1000e-004	7.7000e-004	42.4593
Strip Mall	212832	1.1500e-003	0.0104	8.7600e-003	6.0000e-005		7.9000e-004	7.9000e-004		7.9000e-004	7.9000e-004	0.0000	11.3575	11.3575	2.2000e-004	2.1000e-004	11.4250
Total		**0.0113**	**0.0969**	**0.0455**	**6.1000e-004**		**7.7800e-003**	**7.7800e-003**		**7.7800e-003**	**7.7800e-003**	**0.0000**	**111.4534**	**111.4534**	**2.1400e-003**	**2.0400e-003**	**112.1157**

5.3 Energy by Land Use - Electricity

Unmitigated

	Electricity Use	Total CO2	CH4	N2O	CO2e
Land Use	kWh/yr	MT/yr			
Condo/Townhouse High Rise	457722	133.1565	6.0200e-003	1.2500e-003	133.6783
Other Asphalt Surfaces	0	0.0000	0.0000	0.0000	0.0000
Single Family Housing	190480	55.4127	2.5100e-003	5.2000e-004	55.6299
Strip Mall	979204	284.8616	0.0129	2.6600e-003	285.9778
Total		**473.4308**	**0.0214**	**4.4300e-003**	**475.2859**

5.3 Energy by Land Use - Electricity

Mitigated

	Electricity Use	Total CO2	CH4	N2O	CO2e
Land Use	kWh/yr	MT/yr			
Condo/Townhouse High Rise	457722	133.1565	6.0200e-003	1.2500e-003	133.6783
Other Asphalt Surfaces	0	0.0000	0.0000	0.0000	0.0000
Single Family Housing	190480	55.4127	2.5100e-003	5.2000e-004	55.6299
Strip Mall	979204	284.8616	0.0129	2.6600e-003	285.9778
Total		**473.4308**	**0.0214**	**4.4300e-003**	**475.2859**

6.0 Area Detail

6.1 Mitigation Measures Area

Use only Natural Gas Hearths

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Mitigated	0.9209	0.0154	0.8983	8.0000e-005		5.3300e-003	5.3300e-003		5.3300e-003	5.3300e-003	0.0000	7.2423	7.2423	1.5400e-003	1.1000e-004	7.3124
Unmitigated	1.2761	0.0184	1.3961	1.0600e-003		0.0766	0.0766		0.0766	0.0766	7.2642	3.9815	11.2457	0.0139	4.5000e-004	11.7281

6.2 Area by SubCategory

Unmitigated

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
SubCategory	tons/yr										MT/yr					
Architectural Coating	0.1237					0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Consumer Products	0.7692					0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Hearth	0.3558	8.0500e-003	0.4999	1.0100e-003		0.0717	0.0717		0.0717	0.0717	7.2642	2.5218	9.7860	0.0125	4.5000e-004	10.2325
Landscaping	0.0274	0.0104	0.8962	5.0000e-005		4.9200e-003	4.9200e-003		4.9200e-003	4.9200e-003	0.0000	1.4598	1.4598	1.4300e-003	0.0000	1.4955
Total	**1.2761**	**0.0184**	**1.3961**	**1.0600e-003**		**0.0766**	**0.0766**		**0.0766**	**0.0766**	**7.2642**	**3.9815**	**11.2457**	**0.0139**	**4.5000e-004**	**11.7281**

6.2 Area by SubCategory

Mitigated

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
SubCategory	tons/yr										MT/yr					
Architectural Coating	0.1237					0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Consumer Products	0.7692					0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Hearth	5.8000e-004	4.9900e-003	2.1200e-003	3.0000e-005		4.0000e-004	4.0000e-004		4.0000e-004	4.0000e-004	0.0000	5.7826	5.7826	1.1000e-004	1.1000e-004	5.8169
Landscaping	0.0274	0.0104	0.8962	5.0000e-005		4.9200e-003	4.9200e-003		4.9200e-003	4.9200e-003	0.0000	1.4598	1.4598	1.4300e-003	0.0000	1.4955
Total	**0.9209**	**0.0154**	**0.8983**	**8.0000e-005**		**5.3200e-003**	**5.3200e-003**		**5.3200e-003**	**5.3200e-003**	**0.0000**	**7.2423**	**7.2423**	**1.5400e-003**	**1.1000e-004**	**7.3124**

7.0 Water Detail

7.1 Mitigation Measures Water

	Total CO2	CH4	N2O	CO2e
Category	MT/yr			
Mitigated	36.4675	0.4720	0.0114	51.6686
Unmitigated	36.4675	0.4720	0.0114	51.6686

7.2 Water by Land Use

Unmitigated

	Indoor/Outdoor Use	Total CO2	CH4	N2O	CO2e
Land Use	Mgal	MT/yr			
Condo/Townhouse High Rise	6.38509 / 4.02539	16.1752	0.2087	5.0500e-003	22.8961
Other Asphalt Surfaces	0 / 0	0.0000	0.0000	0.0000	0.0000
Single Family Housing	1.43339 / 0.903658	3.6312	0.0469	1.1300e-003	5.1399
Strip Mall	6.62356 / 4.0596	16.6611	0.2165	5.2300e-003	23.6325
Total		**36.4675**	**0.4720**	**0.0114**	**51.6686**

7.2 Water by Land Use

Mitigated

	Indoor/Outdoor Use	Total CO2	CH4	N2O	CO2e
Land Use	Mgal	MT/yr			
Condo/Townhouse High Rise	6.38509 / 4.02539	16.1752	0.2087	5.0500e-003	22.8961
Other Asphalt Surfaces	0 / 0	0.0000	0.0000	0.0000	0.0000
Single Family Housing	1.43339 / 0.903658	3.6312	0.0469	1.1300e-003	5.1399
Strip Mall	6.62356 / 4.0596	16.6611	0.2165	5.2300e-003	23.6325
Total		**36.4675**	**0.4720**	**0.0114**	**51.6686**

8.0 Waste Detail

8.1 Mitigation Measures Waste

Category/Year

	Total CO2	CH4	N2O	CO2e
	MT/yr			
Mitigated	34.2628	2.0249	0.0000	84.8848
Unmitigated	34.2628	2.0249	0.0000	84.8848

8.2 Waste by Land Use

Unmitigated

	Waste Disposed	Total CO2	CH4	N2O	CO2e
Land Use	tons	MT/yr			
Condo/Townhouse High Rise	45.08	9.1508	0.5408	0.0000	22.6708
Other Asphalt Surfaces	0	0.0000	0.0000	0.0000	0.0000
Single Family Housing	29.82	6.0532	0.3577	0.0000	14.9965
Strip Mall	93.89	19.0588	1.1263	0.0000	47.2174
Total		**34.2628**	**2.0249**	**0.0000**	**84.8847**

8.2 Waste by Land Use

Mitigated

	Waste Disposed	Total CO2	CH4	N2O	CO2e
Land Use	tons	MT/yr			
Condo/Townhouse High Rise	45.08	9.1508	0.5408	0.0000	22.6708
Other Asphalt Surfaces	0	0.0000	0.0000	0.0000	0.0000
Single Family Housing	29.82	6.0532	0.3577	0.0000	14.9965
Strip Mall	93.89	19.0588	1.1263	0.0000	47.2174
Total		**34.2628**	**2.0249**	**0.0000**	**84.8847**

9.0 Operational Offroad

Equipment Type	Number	Hours/Day	Days/Year	Horse Power	Load Factor	Fuel Type

10.0 Stationary Equipment

Fire Pumps and Emergency Generators

Equipment Type	Number	Hours/Day	Hours/Year	Horse Power	Load Factor	Fuel Type

Boilers

Equipment Type	Number	Heat Input/Day	Heat Input/Year	Boiler Rating	Fuel Type

User Defined Equipment

Equipment Type	Number

11.0 Vegetation

Wildflower Station

Contra Costa County, Summer

1.0 Project Characteristics

1.1 Land Usage

Land Uses	Size	Metric	Lot Acreage	Floor Surface Area	Population
Other Asphalt Surfaces	37.26	1000sqft	0.86	37,260.00	0
Other Asphalt Surfaces	113.69	1000sqft	2.61	113,690.00	0
Condo/Townhouse High Rise	98.00	Dwelling Unit	7.00	100,094.00	316
Single Family Housing	22.00	Dwelling Unit	1.82	4,930.00	71
Strip Mall	89.42	1000sqft	2.05	89,425.00	0

1.2 Other Project Characteristics

Urbanization	Urban	**Wind Speed (m/s)**	2.2	**Precipitation Freq (Days)**	58
Climate Zone	4			**Operational Year**	2020
Utility Company	Pacific Gas & Electric Company				
CO2 Intensity (lb/MWhr)	641.35	**CH4 Intensity (lb/MWhr)**	0.029	**N2O Intensity (lb/MWhr)**	0.006

1.3 User Entered Comments & Non-Default Data

Wildflower Station - Contra Costa County, Summer

Project Characteristics -

Land Use - Land uses, quantity, and size from Wildflower Preliminary Developement Plan 2017.
Population calculation by a density of 3.22 persons/du from the City of Antioch Housing Element 2015.

Construction Phase - Demolition phase deleted. The property contains no structures and vegetation consists mostly of grass and ruderal vegetation.
Architectural Coating phase overlapped with Building Construction phase to reflect actual construction practices.

Grading - The preliminary grading plan indicates no material imported or exported.

Architectural Coating -

Vehicle Trips - Non-resident C-C Trip Length from City of Antioch Neighborhood Commecial District zone definition.
Non-resident C-W and C-C Trip % adjusted to reflect estimated 179 employees.

Construction Off-road Equipment Mitigation - Fugative dust mitigation per BAAQMD best construction management practices.
Tier 3 Engines required on all grading and excavation equipment to limit daily NOx emissions.

Mobile Land Use Mitigation - Mitigation for mixed use development (LUT-3), transit access (LUT-5), and improved project site walkability (SDT-1) applied.

Area Mitigation - No wood hearths in new construction per BAAQMD regulation 6, rule 3.

Table Name	Column Name	Default Value	New Value
tblConstDustMitigation	WaterUnpavedRoadVehicleSpeed	40	15
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	2.00
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	1.00
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	4.00
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	2.00
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	9.00
tblConstEquipMitigation	Tier	No Change	Tier 3
tblConstEquipMitigation	Tier	No Change	Tier 3
tblConstEquipMitigation	Tier	No Change	Tier 3
tblConstEquipMitigation	Tier	No Change	Tier 3
tblConstEquipMitigation	Tier	No Change	Tier 3
tblConstructionPhase	NumDays	20.00	50.00
tblConstructionPhase	PhaseEndDate	11/25/2019	10/14/2019
tblConstructionPhase	PhaseEndDate	8/19/2019	9/16/2019
tblConstructionPhase	PhaseEndDate	9/16/2019	7/23/2018

tblConstructionPhase	PhaseStartDate	9/17/2019	8/6/2019
tblConstructionPhase	PhaseStartDate	6/26/2018	7/24/2018
tblConstructionPhase	PhaseStartDate	8/20/2019	6/26/2018
tblLandUse	BuildingSpaceSquareFeet	98,000.00	100,094.00
tblLandUse	BuildingSpaceSquareFeet	39,600.00	4,930.00
tblLandUse	BuildingSpaceSquareFeet	89,420.00	89,425.00
tblLandUse	LandUseSquareFeet	98,000.00	100,094.00
tblLandUse	LandUseSquareFeet	39,600.00	4,930.00
tblLandUse	LandUseSquareFeet	89,420.00	89,425.00
tblLandUse	LotAcreage	1.53	7.00
tblLandUse	LotAcreage	7.14	1.82
tblLandUse	Population	280.00	316.00
tblLandUse	Population	63.00	71.00
tblProjectCharacteristics	OperationalYear	2018	2020
tblVehicleTrips	CC_TL	7.30	2.00
tblVehicleTrips	CC_TTP	64.40	71.10
tblVehicleTrips	CW_TTP	16.60	9.90

2.0 Emissions Summary

2.1 Overall Construction (Maximum Daily Emission)

Unmitigated Construction

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Year	lb/day										lb/day					
2018	5.1787	59.5781	35.7950	0.0638	18.2141	2.6349	20.7920	9.9699	2.4241	12.3416	0.0000	6,422.4832	6,422.4832	1.9493	0.0000	6,471.2152
2019	53.1828	29.9420	27.0449	0.0621	2.0360	1.4782	3.5141	0.5480	1.3980	1.9460	0.0000	6,163.0929	6,163.0929	0.7801	0.0000	6,182.5960
Maximum	**53.1828**	**59.5781**	**35.7950**	**0.0638**	**18.2141**	**2.6349**	**20.7920**	**9.9699**	**2.4241**	**12.3416**	**0.0000**	**6,422.4832**	**6,422.4832**	**1.9493**	**0.0000**	**6,471.2152**

Mitigated Construction

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Year	lb/day										lb/day					
2018	3.2205	30.0345	37.4282	0.0638	8.2777	1.3967	9.2249	4.5080	1.3426	5.4551	0.0000	6,422.4832	6,422.4832	1.9493	0.0000	6,471.2152
2019	52.7711	28.3592	27.1483	0.0621	2.0360	1.3876	3.4235	0.5480	1.3402	1.8882	0.0000	6,163.0929	6,163.0929	0.7801	0.0000	6,182.5960
Maximum	**52.7711**	**30.0345**	**37.4282**	**0.0638**	**8.2777**	**1.3967**	**9.2249**	**4.5080**	**1.3426**	**5.4551**	**0.0000**	**6,422.4832**	**6,422.4832**	**1.9493**	**0.0000**	**6,471.2152**

	ROG	**NOx**	**CO**	**SO2**	**Fugitive PM10**	**Exhaust PM10**	**PM10 Total**	**Fugitive PM2.5**	**Exhaust PM2.5**	**PM2.5 Total**	**Bio- CO2**	**NBio-CO2**	**Total CO2**	**CH4**	**N20**	**CO2e**
Percent Reduction	**4.06**	**34.77**	**-2.76**	**0.00**	**49.07**	**32.31**	**47.96**	**51.93**	**29.81**	**48.60**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**

2.2 Overall Operational

Unmitigated Operational

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Area	68.2998	1.4451	92.6930	0.1586		11.7837	11.7837		11.7837	11.7837	1,268.6664	516.9377	1,785.6041	1.6945	0.0896	1,854.6720
Energy	0.0617	0.5308	0.2496	3.3700e-003		0.0426	0.0426		0.0426	0.0426		673.1852	673.1852	0.0129	0.0123	677.1856
Mobile	7.2480	21.7226	47.9304	0.1299	9.5079	0.1265	9.6344	2.5442	0.1185	2.6627		13,097.2919	13,097.2919	0.6148		13,112.6627
Total	**75.6095**	**23.6985**	**140.8730**	**0.2919**	**9.5079**	**11.9528**	**21.4607**	**2.5442**	**11.9448**	**14.4890**	**1,268.6664**	**14,287.4149**	**15,556.0812**	**2.3222**	**0.1020**	**15,644.5203**

Mitigated Operational

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Area	5.3022	1.0115	10.3392	6.2500e-003		0.1272	0.1272		0.1272	0.1272	0.0000	1,162.2554	1,162.2554	0.0395	0.0210	1,169.4939
Energy	0.0617	0.5308	0.2496	3.3700e-003		0.0426	0.0426		0.0426	0.0426		673.1852	673.1852	0.0129	0.0123	677.1856
Mobile	7.1297	20.9071	44.7084	0.1178	8.4715	0.1159	8.5874	2.2668	0.1086	2.3754		11,882.0500	11,882.0500	0.5811		11,896.5768
Total	**12.4936**	**22.4494**	**55.2972**	**0.1274**	**8.4715**	**0.2857**	**8.7572**	**2.2668**	**0.2784**	**2.5452**	**0.0000**	**13,717.4905**	**13,717.4905**	**0.6334**	**0.0333**	**13,743.2563**

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio-CO2	Total CO2	CH4	N20	CO2e
Percent Reduction	**83.48**	**5.27**	**60.75**	**56.35**	**10.90**	**97.61**	**59.19**	**10.90**	**97.67**	**82.43**	**100.00**	**3.99**	**11.82**	**72.72**	**67.32**	**12.15**

3.0 Construction Detail

Construction Phase

Phase Number	Phase Name	Phase Type	Start Date	End Date	Num Days Week	Num Days	Phase Description
1	Site Preparation	Site Preparation	5/1/2018	5/14/2018	5	10	
2	Grading	Grading	5/15/2018	6/25/2018	5	30	
3	Building Construction	Building Construction	7/24/2018	9/16/2019	5	300	
4	Paving	Paving	6/26/2018	7/23/2018	5	20	
5	Architectural Coating	Architectural Coating	8/6/2019	10/14/2019	5	50	

Acres of Grading (Site Preparation Phase): 0

Acres of Grading (Grading Phase): 75

Acres of Paving: 3.47

Residential Indoor: 212,674; Residential Outdoor: 70,891; Non-Residential Indoor: 134,138; Non-Residential Outdoor: 44,713; Striped Parking Area: 9,057 (Architectural Coating – sqft)

OffRoad Equipment

Phase Name	Offroad Equipment Type	Amount	Usage Hours	Horse Power	Load Factor
Site Preparation	Rubber Tired Dozers	3	8.00	247	0.40
Site Preparation	Tractors/Loaders/Backhoes	4	8.00	97	0.37
Grading	Excavators	2	8.00	158	0.38
Grading	Graders	1	8.00	187	0.41
Grading	Rubber Tired Dozers	1	8.00	247	0.40
Grading	Scrapers	2	8.00	367	0.48
Grading	Tractors/Loaders/Backhoes	2	8.00	97	0.37
Building Construction	Cranes	1	7.00	231	0.29
Building Construction	Forklifts	3	8.00	89	0.20
Building Construction	Generator Sets	1	8.00	84	0.74
Building Construction	Tractors/Loaders/Backhoes	3	7.00	97	0.37
Building Construction	Welders	1	8.00	46	0.45
Paving	Pavers	2	8.00	130	0.42
Paving	Paving Equipment	2	8.00	132	0.36
Paving	Rollers	2	8.00	80	0.38
Architectural Coating	Air Compressors	1	6.00	78	0.48

Trips and VMT

Phase Name	Offroad Equipment Count	Worker Trip Number	Vendor Trip Number	Hauling Trip Number	Worker Trip Length	Vendor Trip Length	Hauling Trip Length	Worker Vehicle Class	Vendor Vehicle Class	Hauling Vehicle Class
Site Preparation	7	18.00	0.00	0.00	10.80	7.30	20.00	LD_Mix	HDT_Mix	HHDT
Grading	8	20.00	0.00	0.00	10.80	7.30	20.00	LD_Mix	HDT_Mix	HHDT
Building Construction	9	171.00	52.00	0.00	10.80	7.30	20.00	LD_Mix	HDT_Mix	HHDT
Paving	6	15.00	0.00	0.00	10.80	7.30	20.00	LD_Mix	HDT_Mix	HHDT
Architectural Coating	1	34.00	0.00	0.00	10.80	7.30	20.00	LD_Mix	HDT_Mix	HHDT

3.1 Mitigation Measures Construction

Use Cleaner Engines for Construction Equipment

Water Exposed Area

Reduce Vehicle Speed on Unpaved Roads

3.2 Site Preparation - 2018

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Fugitive Dust					18.0663	0.0000	18.0663	9.9307	0.0000	9.9307			0.0000			0.0000
Off-Road	4.5627	48.1988	22.4763	0.0380		2.5769	2.5769		2.3708	2.3708		3,831.6239	3,831.6239	1.1928		3,861.4448
Total	**4.5627**	**48.1988**	**22.4763**	**0.0380**	**18.0663**	**2.5769**	**20.6432**	**9.9307**	**2.3708**	**12.3014**		**3,831.6239**	**3,831.6239**	**1.1928**		**3,861.4448**

3.2 Site Preparation - 2018

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.0798	0.0506	0.6350	1.6100e-003	0.1479	9.9000e-004	0.1489	0.0392	9.2000e-004	0.0401		160.2493	160.2493	4.7700e-003		160.3687
Total	**0.0798**	**0.0506**	**0.6350**	**1.6100e-003**	**0.1479**	**9.9000e-004**	**0.1489**	**0.0392**	**9.2000e-004**	**0.0401**		**160.2493**	**160.2493**	**4.7700e-003**		**160.3687**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Fugitive Dust					8.1298	0.0000	8.1298	4.4688	0.0000	4.4688			0.0000			0.0000
Off-Road	0.9312	19.0656	22.9600	0.0380		0.9462	0.9462		0.9462	0.9462	0.0000	3,831.6239	3,831.6239	1.1928		3,861.4448
Total	**0.9312**	**19.0656**	**22.9600**	**0.0380**	**8.1298**	**0.9462**	**9.0760**	**4.4688**	**0.9462**	**5.4150**	**0.0000**	**3,831.6239**	**3,831.6239**	**1.1928**		**3,861.4448**

3.2 Site Preparation - 2018

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.0798	0.0506	0.6350	1.6100e-003	0.1479	9.9000e-004	0.1489	0.0392	9.2000e-004	0.0401		160.2493	160.2493	4.7700e-003		160.3687
Total	**0.0798**	**0.0506**	**0.6350**	**1.6100e-003**	**0.1479**	**9.9000e-004**	**0.1489**	**0.0392**	**9.2000e-004**	**0.0401**		**160.2493**	**160.2493**	**4.7700e-003**		**160.3687**

3.3 Grading - 2018

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Fugitive Dust					8.6733	0.0000	8.6733	3.5965	0.0000	3.5965			0.0000			0.0000
Off-Road	5.0901	59.5218	35.0894	0.0620		2.6337	2.6337		2.4230	2.4230		6,244.4284	6,244.4284	1.9440		6,293.0278
Total	**5.0901**	**59.5218**	**35.0894**	**0.0620**	**8.6733**	**2.6337**	**11.3071**	**3.5965**	**2.4230**	**6.0195**		**6,244.4284**	**6,244.4284**	**1.9440**		**6,293.0278**

3.3 Grading - 2018

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.0886	0.0563	0.7056	1.7900e-003	0.1643	1.1100e-003	0.1654	0.0436	1.0200e-003	0.0446		178.0548	178.0548	5.3000e-003		178.1874
Total	**0.0886**	**0.0563**	**0.7056**	**1.7900e-003**	**0.1643**	**1.1100e-003**	**0.1654**	**0.0436**	**1.0200e-003**	**0.0446**		**178.0548**	**178.0548**	**5.3000e-003**		**178.1874**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Fugitive Dust					3.9030	0.0000	3.9030	1.6184	0.0000	1.6184			0.0000			0.0000
Off-Road	1.5231	29.9782	36.7226	0.0620		1.2994	1.2994		1.2994	1.2994	0.0000	6,244.4284	6,244.4284	1.9440		6,293.0278
Total	**1.5231**	**29.9782**	**36.7226**	**0.0620**	**3.9030**	**1.2994**	**5.2024**	**1.6184**	**1.2994**	**2.9179**	**0.0000**	**6,244.4284**	**6,244.4284**	**1.9440**		**6,293.0278**

3.3 Grading - 2018

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.0886	0.0563	0.7056	1.7900e-003	0.1643	1.1100e-003	0.1654	0.0436	1.0200e-003	0.0446		178.0548	178.0548	5.3000e-003		178.1874
Total	**0.0886**	**0.0563**	**0.7056**	**1.7900e-003**	**0.1643**	**1.1100e-003**	**0.1654**	**0.0436**	**1.0200e-003**	**0.0446**		**178.0548**	**178.0548**	**5.3000e-003**		**178.1874**

3.4 Building Construction - 2018

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Off-Road	2.6795	23.3900	17.5804	0.0269		1.4999	1.4999		1.4099	1.4099		2,620.9351	2,620.9351	0.6421		2,636.9883
Total	**2.6795**	**23.3900**	**17.5804**	**0.0269**		**1.4999**	**1.4999**		**1.4099**	**1.4099**		**2,620.9351**	**2,620.9351**	**0.6421**		**2,636.9883**

3.4 Building Construction - 2018

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.2826	6.9239	1.7695	0.0145	0.3519	0.0574	0.4093	0.1013	0.0549	0.1562		1,529.1198	1,529.1198	0.0808		1,531.1388
Worker	0.7576	0.4811	6.0328	0.0153	1.4047	9.4500e-003	1.4142	0.3726	8.7100e-003	0.3813		1,522.3687	1,522.3687	0.0453		1,523.5021
Total	**1.0401**	**7.4050**	**7.8023**	**0.0298**	**1.7567**	**0.0668**	**1.8235**	**0.4739**	**0.0636**	**0.5375**		**3,051.4885**	**3,051.4885**	**0.1261**		**3,054.6409**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Off-Road	2.1804	21.0398	17.5945	0.0269		1.3299	1.3299		1.2790	1.2790	0.0000	2,620.9351	2,620.9351	0.6421		2,636.9883
Total	**2.1804**	**21.0398**	**17.5945**	**0.0269**		**1.3299**	**1.3299**		**1.2790**	**1.2790**	**0.0000**	**2,620.9351**	**2,620.9351**	**0.6421**		**2,636.9883**

3.4 Building Construction - 2018

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.2826	6.9239	1.7695	0.0145	0.3519	0.0574	0.4093	0.1013	0.0549	0.1562		1,529.1198	1,529.1198	0.0808		1,531.1388
Worker	0.7576	0.4811	6.0328	0.0153	1.4047	9.4500e-003	1.4142	0.3726	8.7100e-003	0.3813		1,522.3687	1,522.3687	0.0453		1,523.5021
Total	**1.0401**	**7.4050**	**7.8023**	**0.0298**	**1.7567**	**0.0668**	**1.8235**	**0.4739**	**0.0636**	**0.5375**		**3,051.4885**	**3,051.4885**	**0.1261**		**3,054.6409**

3.4 Building Construction - 2019

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Off-Road	2.3612	21.0788	17.1638	0.0269		1.2899	1.2899		1.2127	1.2127		2,591.5802	2,591.5802	0.6313		2,607.3635
Total	**2.3612**	**21.0788**	**17.1638**	**0.0269**		**1.2899**	**1.2899**		**1.2127**	**1.2127**		**2,591.5802**	**2,591.5802**	**0.6313**		**2,607.3635**

3.4 Building Construction - 2019

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.2536	6.5232	1.6183	0.0144	0.3519	0.0484	0.4004	0.1013	0.0463	0.1476		1,519.8741	1,519.8741	0.0770		1,521.8002
Worker	0.6824	0.4209	5.3565	0.0148	1.4047	9.2600e-003	1.4140	0.3726	8.5300e-003	0.3811		1,476.5980	1,476.5980	0.0400		1,477.5984
Total	**0.9359**	**6.9441**	**6.9747**	**0.0293**	**1.7567**	**0.0577**	**1.8143**	**0.4739**	**0.0548**	**0.5288**		**2,996.4721**	**2,996.4721**	**0.1171**		**2,999.3986**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Off-Road	1.9494	19.4960	17.2672	0.0269		1.1993	1.1993		1.1549	1.1549	0.0000	2,591.5802	2,591.5802	0.6313		2,607.3635
Total	**1.9494**	**19.4960**	**17.2672**	**0.0269**		**1.1993**	**1.1993**		**1.1549**	**1.1549**	**0.0000**	**2,591.5802**	**2,591.5802**	**0.6313**		**2,607.3635**

3.4 Building Construction - 2019

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.2536	6.5232	1.6183	0.0144	0.3519	0.0484	0.4004	0.1013	0.0463	0.1476		1,519.8741	1,519.8741	0.0770		1,521.8002
Worker	0.6824	0.4209	5.3565	0.0148	1.4047	9.2600e-003	1.4140	0.3726	8.5300e-003	0.3811		1,476.5980	1,476.5980	0.0400		1,477.5984
Total	**0.9359**	**6.9441**	**6.9747**	**0.0293**	**1.7567**	**0.0577**	**1.8143**	**0.4739**	**0.0548**	**0.5288**		**2,996.4721**	**2,996.4721**	**0.1171**		**2,999.3986**

3.5 Paving - 2018

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Off-Road	1.6437	17.5209	14.7964	0.0228		0.9561	0.9561		0.8797	0.8797		2,294.0887	2,294.0887	0.7142		2,311.9432
Paving	0.4546					0.0000	0.0000		0.0000	0.0000			0.0000			0.0000
Total	**2.0983**	**17.5209**	**14.7964**	**0.0228**		**0.9561**	**0.9561**		**0.8797**	**0.8797**		**2,294.0887**	**2,294.0887**	**0.7142**		**2,311.9432**

3.5 Paving - 2018

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.0665	0.0422	0.5292	1.3400e-003	0.1232	8.3000e-004	0.1241	0.0327	7.6000e-004	0.0335		133.5411	133.5411	3.9800e-003		133.6405
Total	**0.0665**	**0.0422**	**0.5292**	**1.3400e-003**	**0.1232**	**8.3000e-004**	**0.1241**	**0.0327**	**7.6000e-004**	**0.0335**		**133.5411**	**133.5411**	**3.9800e-003**		**133.6405**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Off-Road	1.6437	17.5209	14.7964	0.0228		0.9561	0.9561		0.8797	0.8797	0.0000	2,294.0887	2,294.0887	0.7142		2,311.9432
Paving	0.4546					0.0000	0.0000		0.0000	0.0000			0.0000			0.0000
Total	**2.0983**	**17.5209**	**14.7964**	**0.0228**		**0.9561**	**0.9561**		**0.8797**	**0.8797**	**0.0000**	**2,294.0887**	**2,294.0887**	**0.7142**		**2,311.9432**

3.5 Paving - 2018

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.0665	0.0422	0.5292	1.3400e-003	0.1232	8.3000e-004	0.1241	0.0327	7.6000e-004	0.0335		133.5411	133.5411	3.9800e-003		133.6405
Total	**0.0665**	**0.0422**	**0.5292**	**1.3400e-003**	**0.1232**	**8.3000e-004**	**0.1241**	**0.0327**	**7.6000e-004**	**0.0335**		**133.5411**	**133.5411**	**3.9800e-003**		**133.6405**

3.6 Architectural Coating - 2019

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Archit. Coating	49.4836					0.0000	0.0000		0.0000	0.0000			0.0000			0.0000
Off-Road	0.2664	1.8354	1.8413	2.9700e-003		0.1288	0.1288		0.1288	0.1288		281.4481	281.4481	0.0238		282.0423
Total	**49.7500**	**1.8354**	**1.8413**	**2.9700e-003**		**0.1288**	**0.1288**		**0.1288**	**0.1288**		**281.4481**	**281.4481**	**0.0238**		**282.0423**

3.6 Architectural Coating - 2019

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.1357	0.0837	1.0650	2.9500e-003	0.2793	1.8400e-003	0.2811	0.0741	1.7000e-003	0.0758		293.5926	293.5926	7.9600e-003		293.7915
Total	**0.1357**	**0.0837**	**1.0650**	**2.9500e-003**	**0.2793**	**1.8400e-003**	**0.2811**	**0.0741**	**1.7000e-003**	**0.0758**		**293.5926**	**293.5926**	**7.9600e-003**		**293.7915**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Archit. Coating	49.4836					0.0000	0.0000		0.0000	0.0000			0.0000			0.0000
Off-Road	0.2664	1.8354	1.8413	2.9700e-003		0.1288	0.1288		0.1288	0.1288	0.0000	281.4481	281.4481	0.0238		282.0423
Total	**49.7500**	**1.8354**	**1.8413**	**2.9700e-003**		**0.1288**	**0.1288**		**0.1288**	**0.1288**	**0.0000**	**281.4481**	**281.4481**	**0.0238**		**282.0423**

3.6 Architectural Coating - 2019

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.1357	0.0837	1.0650	2.9500e-003	0.2793	1.8400e-003	0.2811	0.0741	1.7000e-003	0.0758		293.5926	293.5926	7.9600e-003		293.7915
Total	**0.1357**	**0.0837**	**1.0650**	**2.9500e-003**	**0.2793**	**1.8400e-003**	**0.2811**	**0.0741**	**1.7000e-003**	**0.0758**		**293.5926**	**293.5926**	**7.9600e-003**		**293.7915**

4.0 Operational Detail - Mobile

4.1 Mitigation Measures Mobile

Increase Diversity

Increase Transit Accessibility

Improve Pedestrian Network

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Mitigated	7.1297	20.9071	44.7084	0.1178	8.4715	0.1159	8.5874	2.2668	0.1086	2.3754		11,882.0500	11,882.0500	0.5811		11,896.5768
Unmitigated	7.2480	21.7226	47.9304	0.1299	9.5079	0.1265	9.6344	2.5442	0.1185	2.6627		13,097.2919	13,097.2919	0.6148		13,112.6627

4.2 Trip Summary Information

	Average Daily Trip Rate			Unmitigated	Mitigated
Land Use	Weekday	Saturday	Sunday	Annual VMT	Annual VMT
Condo/Townhouse High Rise	409.64	422.38	336.14	926,060	825,120
Other Asphalt Surfaces	0.00	0.00	0.00		
Other Asphalt Surfaces	0.00	0.00	0.00		
Single Family Housing	209.44	218.02	189.64	480,022	427,700
Strip Mall	3,963.09	3,759.22	1826.85	2,743,765	2,444,695
Total	4,582.17	4,399.62	2,352.63	4,149,847	3,697,514

4.3 Trip Type Information

	Miles			Trip %			Trip Purpose %		
Land Use	H-W or C-W	H-S or C-C	H-O or C-NW	H-W or C-W	H-S or C-C	H-O or C-NW	Primary	Diverted	Pass-by
Condo/Townhouse High Rise	10.80	4.80	5.70	31.00	15.00	54.00	86	11	3
Other Asphalt Surfaces	9.50	7.30	7.30	0.00	0.00	0.00	0	0	0
Other Asphalt Surfaces	9.50	7.30	7.30	0.00	0.00	0.00	0	0	0
Single Family Housing	10.80	4.80	5.70	31.00	15.00	54.00	86	11	3
Strip Mall	9.50	2.00	7.30	9.90	71.10	19.00	45	40	15

4.4 Fleet Mix

Land Use	LDA	LDT1	LDT2	MDV	LHD1	LHD2	MHD	HHD	OBUS	UBUS	MCY	SBUS	MH
Other Asphalt Surfaces	0.577244	0.040114	0.186710	0.126359	0.018084	0.005120	0.010527	0.023222	0.001588	0.001850	0.005513	0.002759	0.000910
Other Asphalt Surfaces	0.577244	0.040114	0.186710	0.126359	0.018084	0.005120	0.010527	0.023222	0.001588	0.001850	0.005513	0.002759	0.000910
Condo/Townhouse High Rise	0.577244	0.040114	0.186710	0.126359	0.018084	0.005120	0.010527	0.023222	0.001588	0.001850	0.005513	0.002759	0.000910
Single Family Housing	0.577244	0.040114	0.186710	0.126359	0.018084	0.005120	0.010527	0.023222	0.001588	0.001850	0.005513	0.002759	0.000910
Strip Mall	0.577244	0.040114	0.186710	0.126359	0.018084	0.005120	0.010527	0.023222	0.001588	0.001850	0.005513	0.002759	0.000910

5.0 Energy Detail

Historical Energy Use: N

5.1 Mitigation Measures Energy

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
NaturalGas Mitigated	0.0617	0.5308	0.2496	3.3700e-003		0.0426	0.0426		0.0426	0.0426		673.1852	673.1852	0.0129	0.0123	677.1856
NaturalGas Unmitigated	0.0617	0.5308	0.2496	3.3700e-003		0.0426	0.0426		0.0426	0.0426		673.1852	673.1852	0.0129	0.0123	677.1856

5.2 Energy by Land Use - NaturalGas

Unmitigated

	NaturalGas Use	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Land Use	kBTU/yr	lb/day										lb/day					
Condo/Townhouse High Rise	2971.97	0.0321	0.2739	0.1166	1.7500e-003		0.0221	0.0221		0.0221	0.0221		349.6435	349.6435	6.7000e-003	6.4100e-003	351.7212
Other Asphalt Surfaces	0	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000
Single Family Housing	2167	0.0234	0.1997	0.0850	1.2700e-003		0.0162	0.0162		0.0162	0.0162		254.9417	254.9417	4.8900e-003	4.6700e-003	256.4567
Strip Mall	583.1	6.2900e-003	0.0572	0.0480	3.4000e-004		4.3400e-003	4.3400e-003		4.3400e-003	4.3400e-003		68.6000	68.6000	1.3100e-003	1.2600e-003	69.0077
Total		**0.0617**	**0.5308**	**0.2496**	**3.3600e-003**		**0.0426**	**0.0426**		**0.0426**	**0.0426**		**673.1852**	**673.1852**	**0.0129**	**0.0123**	**677.1856**

5.2 Energy by Land Use - NaturalGas

Mitigated

	NaturalGas Use	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Land Use	kBTU/yr	lb/day										lb/day					
Condo/Townhouse High Rise	2.97197	0.0321	0.2739	0.1166	1.7500e-003		0.0221	0.0221		0.0221	0.0221		349.6435	349.6435	6.7000e-003	6.4100e-003	351.7212
Other Asphalt Surfaces	0	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000
Single Family Housing	2.167	0.0234	0.1997	0.0850	1.2700e-003		0.0162	0.0162		0.0162	0.0162		254.9417	254.9417	4.8900e-003	4.6700e-003	256.4567
Strip Mall	0.5831	6.2900e-003	0.0572	0.0480	3.4000e-004		4.3400e-003	4.3400e-003		4.3400e-003	4.3400e-003		68.6000	68.6000	1.3100e-003	1.2600e-003	69.0077
Total		**0.0617**	**0.5308**	**0.2496**	**3.3600e-003**		**0.0426**	**0.0426**		**0.0426**	**0.0426**		**673.1852**	**673.1852**	**0.0129**	**0.0123**	**677.1856**

6.0 Area Detail

6.1 Mitigation Measures Area

Use only Natural Gas Hearths

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Mitigated	5.3022	1.0115	10.3392	6.2500e-003		0.1272	0.1272		0.1272	0.1272	0.0000	1,162.2554	1,162.2554	0.0395	0.0210	1,169.4939
Unmitigated	68.2998	1.4451	92.6930	0.1586		11.7837	11.7837		11.7837	11.7837	1,268.6664	516.9377	1,785.6041	1.6945	0.0896	1,854.6720

6.2 Area by SubCategory

Unmitigated

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
SubCategory	lb/day										lb/day					
Architectural Coating	0.6779					0.0000	0.0000		0.0000	0.0000			0.0000			0.0000
Consumer Products	4.2147					0.0000	0.0000		0.0000	0.0000			0.0000			0.0000
Hearth	63.1025	1.3300	82.7352	0.1581		11.7290	11.7290		11.7290	11.7290	1,268.6664	499.0588	1,767.7252	1.6769	0.0896	1,836.3550
Landscaping	0.3048	0.1151	9.9578	5.2000e-004		0.0547	0.0547		0.0547	0.0547		17.8789	17.8789	0.0175		18.3170
Total	**68.2998**	**1.4451**	**92.6930**	**0.1586**		**11.7837**	**11.7837**		**11.7837**	**11.7837**	**1,268.6664**	**516.9377**	**1,785.6041**	**1.6945**	**0.0896**	**1,854.6720**

6.2 Area by SubCategory

Mitigated

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
SubCategory	lb/day										lb/day					
Architectural Coating	0.6779					0.0000	0.0000		0.0000	0.0000			0.0000			0.0000
Consumer Products	4.2147					0.0000	0.0000		0.0000	0.0000			0.0000			0.0000
Hearth	0.1049	0.8964	0.3815	5.7200e-003		0.0725	0.0725		0.0725	0.0725	0.0000	1,144.3765	1,144.3765	0.0219	0.0210	1,151.1769
Landscaping	0.3048	0.1151	9.9578	5.2000e-004		0.0547	0.0547		0.0547	0.0547		17.8789	17.8789	0.0175		18.3170
Total	**5.3022**	**1.0115**	**10.3392**	**6.2400e-003**		**0.1272**	**0.1272**		**0.1272**	**0.1272**	**0.0000**	**1,162.2554**	**1,162.2554**	**0.0395**	**0.0210**	**1,169.4939**

7.0 Water Detail

7.1 Mitigation Measures Water

8.0 Waste Detail

8.1 Mitigation Measures Waste

9.0 Operational Offroad

Equipment Type	Number	Hours/Day	Days/Year	Horse Power	Load Factor	Fuel Type

10.0 Stationary Equipment

Fire Pumps and Emergency Generators

Equipment Type	Number	Hours/Day	Hours/Year	Horse Power	Load Factor	Fuel Type

Boilers

Equipment Type	Number	Heat Input/Day	Heat Input/Year	Boiler Rating	Fuel Type

User Defined Equipment

Equipment Type	Number

11.0 Vegetation

Wildflower Station

Contra Costa County, Winter

1.0 Project Characteristics

1.1 Land Usage

Land Uses	Size	Metric	Lot Acreage	Floor Surface Area	Population
Other Asphalt Surfaces	37.26	1000sqft	0.86	37,260.00	0
Other Asphalt Surfaces	113.69	1000sqft	2.61	113,690.00	0
Condo/Townhouse High Rise	98.00	Dwelling Unit	7.00	100,094.00	316
Single Family Housing	22.00	Dwelling Unit	1.82	4,930.00	71
Strip Mall	89.42	1000sqft	2.05	89,425.00	0

1.2 Other Project Characteristics

Urbanization	Urban	**Wind Speed (m/s)**	2.2	**Precipitation Freq (Days)**	58
Climate Zone	4			**Operational Year**	2020
Utility Company	Pacific Gas & Electric Company				
CO2 Intensity (lb/MWhr)	641.35	**CH4 Intensity (lb/MWhr)**	0.029	**N2O Intensity (lb/MWhr)**	0.006

1.3 User Entered Comments & Non-Default Data

Wildflower Station - Contra Costa County, Winter

Project Characteristics -

Land Use - Land uses, quantity, and size from Wildflower Preliminary Developement Plan 2017.
Population calculation by a density of 3.22 persons/du from the City of Antioch Housing Element 2015.

Construction Phase - Demolition phase deleted. The property contains no structures and vegetation consists mostly of grass and ruderal vegetation.
Architectural Coating phase overlapped with Building Construction phase to reflect actual construction practices.

Grading - The preliminary grading plan indicates no material imported or exported.

Architectural Coating -

Vehicle Trips - Non-resident C-C Trip Length from City of Antioch Neighborhood Commecial District zone definition.
Non-resident C-W and C-C Trip % adjusted to reflect estimated 179 employees.

Construction Off-road Equipment Mitigation - Fugative dust mitigation per BAAQMD best construction management practices.
Tier 3 Engines required on all grading and excavation equipment to limit daily NOx emissions.

Mobile Land Use Mitigation - Mitigation for mixed use development (LUT-3), transit access (LUT-5), and improved project site walkability (SDT-1) applied.

Area Mitigation - No wood hearths in new construction per BAAQMD regulation 6, rule 3.

Table Name	Column Name	Default Value	New Value
tblConstDustMitigation	WaterUnpavedRoadVehicleSpeed	40	15
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	2.00
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	1.00
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	4.00
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	2.00
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	9.00
tblConstEquipMitigation	Tier	No Change	Tier 3
tblConstEquipMitigation	Tier	No Change	Tier 3
tblConstEquipMitigation	Tier	No Change	Tier 3
tblConstEquipMitigation	Tier	No Change	Tier 3
tblConstEquipMitigation	Tier	No Change	Tier 3
tblConstructionPhase	NumDays	20.00	50.00
tblConstructionPhase	PhaseEndDate	11/25/2019	10/14/2019
tblConstructionPhase	PhaseEndDate	8/19/2019	9/16/2019
tblConstructionPhase	PhaseEndDate	9/16/2019	7/23/2018

tblConstructionPhase	PhaseStartDate	9/17/2019	8/6/2019
tblConstructionPhase	PhaseStartDate	6/26/2018	7/24/2018
tblConstructionPhase	PhaseStartDate	8/20/2019	6/26/2018
tblLandUse	BuildingSpaceSquareFeet	98,000.00	100,094.00
tblLandUse	BuildingSpaceSquareFeet	39,600.00	4,930.00
tblLandUse	BuildingSpaceSquareFeet	89,420.00	89,425.00
tblLandUse	LandUseSquareFeet	98,000.00	100,094.00
tblLandUse	LandUseSquareFeet	39,600.00	4,930.00
tblLandUse	LandUseSquareFeet	89,420.00	89,425.00
tblLandUse	LotAcreage	1.53	7.00
tblLandUse	LotAcreage	7.14	1.82
tblLandUse	Population	280.00	316.00
tblLandUse	Population	63.00	71.00
tblProjectCharacteristics	OperationalYear	2018	2020
tblVehicleTrips	CC_TL	7.30	2.00
tblVehicleTrips	CC_TTP	64.40	71.10
tblVehicleTrips	CW_TTP	16.60	9.90

2.0 Emissions Summary

2.1 Overall Construction (Maximum Daily Emission)

Unmitigated Construction

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Year	lb/day										lb/day					
2018	5.1802	59.5912	35.7447	0.0637	18.2141	2.6349	20.7920	9.9699	2.4241	12.3416	0.0000	6,405.7778	6,405.7778	1.9489	0.0000	6,454.5006
2019	53.2062	30.1500	26.7788	0.0601	2.0360	1.4789	3.5149	0.5480	1.3987	1.9467	0.0000	5,958.6955	5,958.6955	0.7836	0.0000	5,978.2855
Maximum	**53.2062**	**59.5912**	**35.7447**	**0.0637**	**18.2141**	**2.6349**	**20.7920**	**9.9699**	**2.4241**	**12.3416**	**0.0000**	**6,405.7778**	**6,405.7778**	**1.9489**	**0.0000**	**6,454.5006**

Mitigated Construction

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Year	lb/day										lb/day					
2018	3.2458	30.0476	37.3779	0.0637	8.2777	1.3975	9.2249	4.5080	1.3434	5.4551	0.0000	6,405.7778	6,405.7778	1.9489	0.0000	6,454.5006
2019	52.7945	28.5672	26.8822	0.0601	2.0360	1.3883	3.4243	0.5480	1.3409	1.8889	0.0000	5,958.6955	5,958.6955	0.7836	0.0000	5,978.2855
Maximum	**52.7945**	**30.0476**	**37.3779**	**0.0637**	**8.2777**	**1.3975**	**9.2249**	**4.5080**	**1.3434**	**5.4551**	**0.0000**	**6,405.7778**	**6,405.7778**	**1.9489**	**0.0000**	**6,454.5006**

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio-CO2	Total CO2	CH4	N20	CO2e
Percent Reduction	**4.02**	**34.68**	**-2.78**	**0.00**	**49.07**	**32.28**	**47.96**	**51.93**	**29.78**	**48.60**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**

2.2 Overall Operational

Unmitigated Operational

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Area	68.2998	1.4451	92.6930	0.1586		11.7837	11.7837		11.7837	11.7837	1,268.6664	516.9377	1,785.6041	1.6945	0.0896	1,854.6720
Energy	0.0617	0.5308	0.2496	3.3700e-003		0.0426	0.0426		0.0426	0.0426		673.1852	673.1852	0.0129	0.0123	677.1856
Mobile	5.7829	22.4675	53.2383	0.1198	9.5079	0.1286	9.6364	2.5442	0.1205	2.6646		12,072.1804	12,072.1804	0.6591		12,088.6586
Total	**74.1444**	**24.4433**	**146.1809**	**0.2818**	**9.5079**	**11.9549**	**21.4628**	**2.5442**	**11.9468**	**14.4910**	**1,268.6664**	**13,262.3033**	**14,530.9697**	**2.3665**	**0.1020**	**14,620.5163**

Mitigated Operational

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Area	5.3022	1.0115	10.3392	6.2500e-003		0.1272	0.1272		0.1272	0.1272	0.0000	1,162.2554	1,162.2554	0.0395	0.0210	1,169.4939
Energy	0.0617	0.5308	0.2496	3.3700e-003		0.0426	0.0426		0.0426	0.0426		673.1852	673.1852	0.0129	0.0123	677.1856
Mobile	5.6676	21.5646	50.4579	0.1087	8.4715	0.1180	8.5895	2.2668	0.1105	2.3773		10,951.0252	10,951.0252	0.6277		10,966.7185
Total	**11.0315**	**23.1069**	**61.0467**	**0.1183**	**8.4715**	**0.2878**	**8.7593**	**2.2668**	**0.2803**	**2.5472**	**0.0000**	**12,786.4657**	**12,786.4657**	**0.6801**	**0.0333**	**12,813.3980**

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio-CO2	Total CO2	CH4	N20	CO2e
Percent Reduction	**85.12**	**5.47**	**58.24**	**58.02**	**10.90**	**97.59**	**59.19**	**10.90**	**97.65**	**82.42**	**100.00**	**3.59**	**12.01**	**71.26**	**67.32**	**12.36**

3.0 Construction Detail

Construction Phase

Phase Number	Phase Name	Phase Type	Start Date	End Date	Num Days Week	Num Days	Phase Description
1	Site Preparation	Site Preparation	5/1/2018	5/14/2018	5	10	
2	Grading	Grading	5/15/2018	6/25/2018	5	30	
3	Building Construction	Building Construction	7/24/2018	9/16/2019	5	300	
4	Paving	Paving	6/26/2018	7/23/2018	5	20	
5	Architectural Coating	Architectural Coating	8/6/2019	10/14/2019	5	50	

Acres of Grading (Site Preparation Phase): 0

Acres of Grading (Grading Phase): 75

Acres of Paving: 3.47

Residential Indoor: 212,674; Residential Outdoor: 70,891; Non-Residential Indoor: 134,138; Non-Residential Outdoor: 44,713; Striped Parking Area: 9,057 (Architectural Coating – sqft)

OffRoad Equipment

Phase Name	Offroad Equipment Type	Amount	Usage Hours	Horse Power	Load Factor
Site Preparation	Rubber Tired Dozers	3	8.00	247	0.40
Site Preparation	Tractors/Loaders/Backhoes	4	8.00	97	0.37
Grading	Excavators	2	8.00	158	0.38
Grading	Graders	1	8.00	187	0.41
Grading	Rubber Tired Dozers	1	8.00	247	0.40
Grading	Scrapers	2	8.00	367	0.48
Grading	Tractors/Loaders/Backhoes	2	8.00	97	0.37
Building Construction	Cranes	1	7.00	231	0.29
Building Construction	Forklifts	3	8.00	89	0.20
Building Construction	Generator Sets	1	8.00	84	0.74
Building Construction	Tractors/Loaders/Backhoes	3	7.00	97	0.37
Building Construction	Welders	1	8.00	46	0.45
Paving	Pavers	2	8.00	130	0.42
Paving	Paving Equipment	2	8.00	132	0.36
Paving	Rollers	2	8.00	80	0.38
Architectural Coating	Air Compressors	1	6.00	78	0.48

Trips and VMT

Phase Name	Offroad Equipment Count	Worker Trip Number	Vendor Trip Number	Hauling Trip Number	Worker Trip Length	Vendor Trip Length	Hauling Trip Length	Worker Vehicle Class	Vendor Vehicle Class	Hauling Vehicle Class
Site Preparation	7	18.00	0.00	0.00	10.80	7.30	20.00	LD_Mix	HDT_Mix	HHDT
Grading	8	20.00	0.00	0.00	10.80	7.30	20.00	LD_Mix	HDT_Mix	HHDT
Building Construction	9	171.00	52.00	0.00	10.80	7.30	20.00	LD_Mix	HDT_Mix	HHDT
Paving	6	15.00	0.00	0.00	10.80	7.30	20.00	LD_Mix	HDT_Mix	HHDT
Architectural Coating	1	34.00	0.00	0.00	10.80	7.30	20.00	LD_Mix	HDT_Mix	HHDT

3.1 Mitigation Measures Construction

Use Cleaner Engines for Construction Equipment

Water Exposed Area

Reduce Vehicle Speed on Unpaved Roads

3.2 Site Preparation - 2018

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Fugitive Dust					18.0663	0.0000	18.0663	9.9307	0.0000	9.9307			0.0000			0.0000
Off-Road	4.5627	48.1988	22.4763	0.0380		2.5769	2.5769		2.3708	2.3708		3,831.6239	3,831.6239	1.1928		3,861.4448
Total	**4.5627**	**48.1988**	**22.4763**	**0.0380**	**18.0663**	**2.5769**	**20.6432**	**9.9307**	**2.3708**	**12.3014**		**3,831.6239**	**3,831.6239**	**1.1928**		**3,861.4448**

3.2 Site Preparation - 2018

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.0810	0.0625	0.5898	1.4600e-003	0.1479	9.9000e-004	0.1489	0.0392	9.2000e-004	0.0401		145.2144	145.2144	4.4400e-003		145.3256
Total	**0.0810**	**0.0625**	**0.5898**	**1.4600e-003**	**0.1479**	**9.9000e-004**	**0.1489**	**0.0392**	**9.2000e-004**	**0.0401**		**145.2144**	**145.2144**	**4.4400e-003**		**145.3256**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Fugitive Dust					8.1298	0.0000	8.1298	4.4688	0.0000	4.4688			0.0000			0.0000
Off-Road	0.9312	19.0656	22.9600	0.0380		0.9462	0.9462		0.9462	0.9462	0.0000	3,831.6239	3,831.6239	1.1928		3,861.4448
Total	**0.9312**	**19.0656**	**22.9600**	**0.0380**	**8.1298**	**0.9462**	**9.0760**	**4.4688**	**0.9462**	**5.4150**	**0.0000**	**3,831.6239**	**3,831.6239**	**1.1928**		**3,861.4448**

3.2 Site Preparation - 2018

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.0810	0.0625	0.5898	1.4600e-003	0.1479	9.9000e-004	0.1489	0.0392	9.2000e-004	0.0401		145.2144	145.2144	4.4400e-003		145.3256
Total	**0.0810**	**0.0625**	**0.5898**	**1.4600e-003**	**0.1479**	**9.9000e-004**	**0.1489**	**0.0392**	**9.2000e-004**	**0.0401**		**145.2144**	**145.2144**	**4.4400e-003**		**145.3256**

3.3 Grading - 2018

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Fugitive Dust					8.6733	0.0000	8.6733	3.5965	0.0000	3.5965			0.0000			0.0000
Off-Road	5.0901	59.5218	35.0894	0.0620		2.6337	2.6337		2.4230	2.4230		6,244.4284	6,244.4284	1.9440		6,293.0278
Total	**5.0901**	**59.5218**	**35.0894**	**0.0620**	**8.6733**	**2.6337**	**11.3071**	**3.5965**	**2.4230**	**6.0195**		**6,244.4284**	**6,244.4284**	**1.9440**		**6,293.0278**

3.3 Grading - 2018

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.0900	0.0694	0.6553	1.6200e-003	0.1643	1.1100e-003	0.1654	0.0436	1.0200e-003	0.0446		161.3494	161.3494	4.9400e-003		161.4728
Total	**0.0900**	**0.0694**	**0.6553**	**1.6200e-003**	**0.1643**	**1.1100e-003**	**0.1654**	**0.0436**	**1.0200e-003**	**0.0446**		**161.3494**	**161.3494**	**4.9400e-003**		**161.4728**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Fugitive Dust					3.9030	0.0000	3.9030	1.6184	0.0000	1.6184			0.0000			0.0000
Off-Road	1.5231	29.9782	36.7226	0.0620		1.2994	1.2994		1.2994	1.2994	0.0000	6,244.4284	6,244.4284	1.9440		6,293.0278
Total	**1.5231**	**29.9782**	**36.7226**	**0.0620**	**3.9030**	**1.2994**	**5.2024**	**1.6184**	**1.2994**	**2.9179**	**0.0000**	**6,244.4284**	**6,244.4284**	**1.9440**		**6,293.0278**

3.3 Grading - 2018

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.0900	0.0694	0.6553	1.6200e-003	0.1643	1.1100e-003	0.1654	0.0436	1.0200e-003	0.0446		161.3494	161.3494	4.9400e-003		161.4728
Total	**0.0900**	**0.0694**	**0.6553**	**1.6200e-003**	**0.1643**	**1.1100e-003**	**0.1654**	**0.0436**	**1.0200e-003**	**0.0446**		**161.3494**	**161.3494**	**4.9400e-003**		**161.4728**

3.4 Building Construction - 2018

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Off-Road	2.6795	23.3900	17.5804	0.0269		1.4999	1.4999		1.4099	1.4099		2,620.9351	2,620.9351	0.6421		2,636.9883
Total	**2.6795**	**23.3900**	**17.5804**	**0.0269**		**1.4999**	**1.4999**		**1.4099**	**1.4099**		**2,620.9351**	**2,620.9351**	**0.6421**		**2,636.9883**

3.4 Building Construction - 2018

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.2957	7.0287	2.0209	0.0142	0.3519	0.0582	0.4101	0.1013	0.0557	0.1570		1,491.2470	1,491.2470	0.0881		1,493.4497
Worker	0.7697	0.5937	5.6031	0.0139	1.4047	9.4500e-003	1.4142	0.3726	8.7100e-003	0.3813		1,379.5371	1,379.5371	0.0422		1,380.5927
Total	**1.0655**	**7.6224**	**7.6240**	**0.0280**	**1.7567**	**0.0677**	**1.8243**	**0.4739**	**0.0644**	**0.5383**		**2,870.7840**	**2,870.7840**	**0.1303**		**2,874.0424**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Off-Road	2.1804	21.0398	17.5945	0.0269		1.3299	1.3299		1.2790	1.2790	0.0000	2,620.9351	2,620.9351	0.6421		2,636.9883
Total	**2.1804**	**21.0398**	**17.5945**	**0.0269**		**1.3299**	**1.3299**		**1.2790**	**1.2790**	**0.0000**	**2,620.9351**	**2,620.9351**	**0.6421**		**2,636.9883**

3.4 Building Construction - 2018

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.2957	7.0287	2.0209	0.0142	0.3519	0.0582	0.4101	0.1013	0.0557	0.1570		1,491.2470	1,491.2470	0.0881		1,493.4497
Worker	0.7697	0.5937	5.6031	0.0139	1.4047	9.4500e-003	1.4142	0.3726	8.7100e-003	0.3813		1,379.5371	1,379.5371	0.0422		1,380.5927
Total	**1.0655**	**7.6224**	**7.6240**	**0.0280**	**1.7567**	**0.0677**	**1.8243**	**0.4739**	**0.0644**	**0.5383**		**2,870.7840**	**2,870.7840**	**0.1303**		**2,874.0424**

3.4 Building Construction - 2019

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Off-Road	2.3612	21.0788	17.1638	0.0269		1.2899	1.2899		1.2127	1.2127		2,591.5802	2,591.5802	0.6313		2,607.3635
Total	**2.3612**	**21.0788**	**17.1638**	**0.0269**		**1.2899**	**1.2899**		**1.2127**	**1.2127**		**2,591.5802**	**2,591.5802**	**0.6313**		**2,607.3635**

3.4 Building Construction - 2019

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.2656	6.6130	1.8528	0.0141	0.3519	0.0492	0.4011	0.1013	0.0470	0.1483		1,481.7539	1,481.7539	0.0841		1,483.8556
Worker	0.6918	0.5195	4.9389	0.0134	1.4047	9.2600e-003	1.4140	0.3726	8.5300e-003	0.3811		1,337.8984	1,337.8984	0.0371		1,338.8250
Total	**0.9574**	**7.1325**	**6.7917**	**0.0275**	**1.7567**	**0.0584**	**1.8151**	**0.4739**	**0.0556**	**0.5295**		**2,819.6524**	**2,819.6524**	**0.1211**		**2,822.6806**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Off-Road	1.9494	19.4960	17.2672	0.0269		1.1993	1.1993		1.1549	1.1549	0.0000	2,591.5802	2,591.5802	0.6313		2,607.3635
Total	**1.9494**	**19.4960**	**17.2672**	**0.0269**		**1.1993**	**1.1993**		**1.1549**	**1.1549**	**0.0000**	**2,591.5802**	**2,591.5802**	**0.6313**		**2,607.3635**

3.4 Building Construction - 2019

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.2656	6.6130	1.8528	0.0141	0.3519	0.0492	0.4011	0.1013	0.0470	0.1483		1,481.7539	1,481.7539	0.0841		1,483.8556
Worker	0.6918	0.5195	4.9389	0.0134	1.4047	9.2600e-003	1.4140	0.3726	8.5300e-003	0.3811		1,337.8984	1,337.8984	0.0371		1,338.8250
Total	**0.9574**	**7.1325**	**6.7917**	**0.0275**	**1.7567**	**0.0584**	**1.8151**	**0.4739**	**0.0556**	**0.5295**		**2,819.6524**	**2,819.6524**	**0.1211**		**2,822.6806**

3.5 Paving - 2018

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Off-Road	1.6437	17.5209	14.7964	0.0228		0.9561	0.9561		0.8797	0.8797		2,294.0887	2,294.0887	0.7142		2,311.9432
Paving	0.4546					0.0000	0.0000		0.0000	0.0000			0.0000			0.0000
Total	**2.0983**	**17.5209**	**14.7964**	**0.0228**		**0.9561**	**0.9561**		**0.8797**	**0.8797**		**2,294.0887**	**2,294.0887**	**0.7142**		**2,311.9432**

3.5 Paving - 2018

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.0675	0.0521	0.4915	1.2200e-003	0.1232	8.3000e-004	0.1241	0.0327	7.6000e-004	0.0335		121.0120	121.0120	3.7000e-003		121.1046
Total	**0.0675**	**0.0521**	**0.4915**	**1.2200e-003**	**0.1232**	**8.3000e-004**	**0.1241**	**0.0327**	**7.6000e-004**	**0.0335**		**121.0120**	**121.0120**	**3.7000e-003**		**121.1046**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Off-Road	1.6437	17.5209	14.7964	0.0228		0.9561	0.9561		0.8797	0.8797	0.0000	2,294.0887	2,294.0887	0.7142		2,311.9432
Paving	0.4546					0.0000	0.0000		0.0000	0.0000			0.0000			0.0000
Total	**2.0983**	**17.5209**	**14.7964**	**0.0228**		**0.9561**	**0.9561**		**0.8797**	**0.8797**	**0.0000**	**2,294.0887**	**2,294.0887**	**0.7142**		**2,311.9432**

3.5 Paving - 2018

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.0675	0.0521	0.4915	1.2200e-003	0.1232	8.3000e-004	0.1241	0.0327	7.6000e-004	0.0335		121.0120	121.0120	3.7000e-003		121.1046
Total	**0.0675**	**0.0521**	**0.4915**	**1.2200e-003**	**0.1232**	**8.3000e-004**	**0.1241**	**0.0327**	**7.6000e-004**	**0.0335**		**121.0120**	**121.0120**	**3.7000e-003**		**121.1046**

3.6 Architectural Coating - 2019

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Archit. Coating	49.4836					0.0000	0.0000		0.0000	0.0000			0.0000			0.0000
Off-Road	0.2664	1.8354	1.8413	2.9700e-003		0.1288	0.1288		0.1288	0.1288		281.4481	281.4481	0.0238		282.0423
Total	**49.7500**	**1.8354**	**1.8413**	**2.9700e-003**		**0.1288**	**0.1288**		**0.1288**	**0.1288**		**281.4481**	**281.4481**	**0.0238**		**282.0423**

3.6 Architectural Coating - 2019

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.1376	0.1033	0.9820	2.6700e-003	0.2793	1.8400e-003	0.2811	0.0741	1.7000e-003	0.0758		266.0149	266.0149	7.3700e-003		266.1991
Total	**0.1376**	**0.1033**	**0.9820**	**2.6700e-003**	**0.2793**	**1.8400e-003**	**0.2811**	**0.0741**	**1.7000e-003**	**0.0758**		**266.0149**	**266.0149**	**7.3700e-003**		**266.1991**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Archit. Coating	49.4836					0.0000	0.0000		0.0000	0.0000			0.0000			0.0000
Off-Road	0.2664	1.8354	1.8413	2.9700e-003		0.1288	0.1288		0.1288	0.1288	0.0000	281.4481	281.4481	0.0238		282.0423
Total	**49.7500**	**1.8354**	**1.8413**	**2.9700e-003**		**0.1288**	**0.1288**		**0.1288**	**0.1288**	**0.0000**	**281.4481**	**281.4481**	**0.0238**		**282.0423**

3.6 Architectural Coating - 2019

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.1376	0.1033	0.9820	2.6700e-003	0.2793	1.8400e-003	0.2811	0.0741	1.7000e-003	0.0758		266.0149	266.0149	7.3700e-003		266.1991
Total	**0.1376**	**0.1033**	**0.9820**	**2.6700e-003**	**0.2793**	**1.8400e-003**	**0.2811**	**0.0741**	**1.7000e-003**	**0.0758**		**266.0149**	**266.0149**	**7.3700e-003**		**266.1991**

4.0 Operational Detail - Mobile

4.1 Mitigation Measures Mobile

Increase Diversity

Increase Transit Accessibility

Improve Pedestrian Network

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Mitigated	5.6676	21.5646	50.4579	0.1087	8.4715	0.1180	8.5895	2.2668	0.1105	2.3773		10,951.0252	10,951.0252	0.6277		10,966.7185
Unmitigated	5.7829	22.4675	53.2383	0.1198	9.5079	0.1286	9.6364	2.5442	0.1205	2.6646		12,072.1804	12,072.1804	0.6591		12,088.6586

4.2 Trip Summary Information

	Average Daily Trip Rate			Unmitigated	Mitigated
Land Use	Weekday	Saturday	Sunday	Annual VMT	Annual VMT
Condo/Townhouse High Rise	409.64	422.38	336.14	926,060	825,120
Other Asphalt Surfaces	0.00	0.00	0.00		
Other Asphalt Surfaces	0.00	0.00	0.00		
Single Family Housing	209.44	218.02	189.64	480,022	427,700
Strip Mall	3,963.09	3,759.22	1826.85	2,743,765	2,444,695
Total	4,582.17	4,399.62	2,352.63	4,149,847	3,697,514

4.3 Trip Type Information

	Miles			Trip %			Trip Purpose %		
Land Use	H-W or C-W	H-S or C-C	H-O or C-NW	H-W or C-W	H-S or C-C	H-O or C-NW	Primary	Diverted	Pass-by
Condo/Townhouse High Rise	10.80	4.80	5.70	31.00	15.00	54.00	86	11	3
Other Asphalt Surfaces	9.50	7.30	7.30	0.00	0.00	0.00	0	0	0
Other Asphalt Surfaces	9.50	7.30	7.30	0.00	0.00	0.00	0	0	0
Single Family Housing	10.80	4.80	5.70	31.00	15.00	54.00	86	11	3
Strip Mall	9.50	2.00	7.30	9.90	71.10	19.00	45	40	15

4.4 Fleet Mix

Land Use	LDA	LDT1	LDT2	MDV	LHD1	LHD2	MHD	HHD	OBUS	UBUS	MCY	SBUS	MH
Other Asphalt Surfaces	0.577244	0.040114	0.186710	0.126359	0.018084	0.005120	0.010527	0.023222	0.001588	0.001850	0.005513	0.002759	0.000910
Other Asphalt Surfaces	0.577244	0.040114	0.186710	0.126359	0.018084	0.005120	0.010527	0.023222	0.001588	0.001850	0.005513	0.002759	0.000910
Condo/Townhouse High Rise	0.577244	0.040114	0.186710	0.126359	0.018084	0.005120	0.010527	0.023222	0.001588	0.001850	0.005513	0.002759	0.000910
Single Family Housing	0.577244	0.040114	0.186710	0.126359	0.018084	0.005120	0.010527	0.023222	0.001588	0.001850	0.005513	0.002759	0.000910
Strip Mall	0.577244	0.040114	0.186710	0.126359	0.018084	0.005120	0.010527	0.023222	0.001588	0.001850	0.005513	0.002759	0.000910

5.0 Energy Detail

Historical Energy Use: N

5.1 Mitigation Measures Energy

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
NaturalGas Mitigated	0.0617	0.5308	0.2496	3.3700e-003		0.0426	0.0426		0.0426	0.0426		673.1852	673.1852	0.0129	0.0123	677.1856
NaturalGas Unmitigated	0.0617	0.5308	0.2496	3.3700e-003		0.0426	0.0426		0.0426	0.0426		673.1852	673.1852	0.0129	0.0123	677.1856

5.2 Energy by Land Use - NaturalGas

Unmitigated

	NaturalGas Use	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Land Use	kBTU/yr	lb/day										lb/day					
Condo/Townhouse High Rise	2971.97	0.0321	0.2739	0.1166	1.7500e-003		0.0221	0.0221		0.0221	0.0221		349.6435	349.6435	6.7000e-003	6.4100e-003	351.7212
Other Asphalt Surfaces	0	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000
Single Family Housing	2167	0.0234	0.1997	0.0850	1.2700e-003		0.0162	0.0162		0.0162	0.0162		254.9417	254.9417	4.8900e-003	4.6700e-003	256.4567
Strip Mall	583.1	6.2900e-003	0.0572	0.0480	3.4000e-004		4.3400e-003	4.3400e-003		4.3400e-003	4.3400e-003		68.6000	68.6000	1.3100e-003	1.2600e-003	69.0077
Total		**0.0617**	**0.5308**	**0.2496**	**3.3600e-003**		**0.0426**	**0.0426**		**0.0426**	**0.0426**		**673.1852**	**673.1852**	**0.0129**	**0.0123**	**677.1856**

5.2 Energy by Land Use - NaturalGas

Mitigated

	NaturalGas Use	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Land Use	kBTU/yr	lb/day										lb/day					
Condo/Townhouse High Rise	2.97197	0.0321	0.2739	0.1166	1.7500e-003		0.0221	0.0221		0.0221	0.0221		349.6435	349.6435	6.7000e-003	6.4100e-003	351.7212
Other Asphalt Surfaces	0	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000
Single Family Housing	2.167	0.0234	0.1997	0.0850	1.2700e-003		0.0162	0.0162		0.0162	0.0162		254.9417	254.9417	4.8900e-003	4.6700e-003	256.4567
Strip Mall	0.5831	6.2900e-003	0.0572	0.0480	3.4000e-004		4.3400e-003	4.3400e-003		4.3400e-003	4.3400e-003		68.6000	68.6000	1.3100e-003	1.2600e-003	69.0077
Total		**0.0617**	**0.5308**	**0.2496**	**3.3600e-003**		**0.0426**	**0.0426**		**0.0426**	**0.0426**		**673.1852**	**673.1852**	**0.0129**	**0.0123**	**677.1856**

6.0 Area Detail

6.1 Mitigation Measures Area

Use only Natural Gas Hearths

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Mitigated	5.3022	1.0115	10.3392	6.2500e-003		0.1272	0.1272		0.1272	0.1272	0.0000	1,162.2554	1,162.2554	0.0395	0.0210	1,169.4939
Unmitigated	68.2998	1.4451	92.6930	0.1586		11.7837	11.7837		11.7837	11.7837	1,268.6664	516.9377	1,785.6041	1.6945	0.0896	1,854.6720

6.2 Area by SubCategory

Unmitigated

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
SubCategory	lb/day										lb/day					
Architectural Coating	0.6779					0.0000	0.0000		0.0000	0.0000			0.0000			0.0000
Consumer Products	4.2147					0.0000	0.0000		0.0000	0.0000			0.0000			0.0000
Hearth	63.1025	1.3300	82.7352	0.1581		11.7290	11.7290		11.7290	11.7290	1,268.6664	499.0588	1,767.7252	1.6769	0.0896	1,836.3550
Landscaping	0.3048	0.1151	9.9578	5.2000e-004		0.0547	0.0547		0.0547	0.0547		17.8789	17.8789	0.0175		18.3170
Total	**68.2998**	**1.4451**	**92.6930**	**0.1586**		**11.7837**	**11.7837**		**11.7837**	**11.7837**	**1,268.6664**	**516.9377**	**1,785.6041**	**1.6945**	**0.0896**	**1,854.6720**

6.2 Area by SubCategory

Mitigated

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
SubCategory	lb/day										lb/day					
Architectural Coating	0.6779					0.0000	0.0000		0.0000	0.0000			0.0000			0.0000
Consumer Products	4.2147					0.0000	0.0000		0.0000	0.0000			0.0000			0.0000
Hearth	0.1049	0.8964	0.3815	5.7200e-003		0.0725	0.0725		0.0725	0.0725	0.0000	1,144.3765	1,144.3765	0.0219	0.0210	1,151.1769
Landscaping	0.3048	0.1151	9.9578	5.2000e-004		0.0547	0.0547		0.0547	0.0547		17.8789	17.8789	0.0175		18.3170
Total	**5.3022**	**1.0115**	**10.3392**	**6.2400e-003**		**0.1272**	**0.1272**		**0.1272**	**0.1272**	**0.0000**	**1,162.2554**	**1,162.2554**	**0.0395**	**0.0210**	**1,169.4939**

7.0 Water Detail

7.1 Mitigation Measures Water

8.0 Waste Detail

8.1 Mitigation Measures Waste

9.0 Operational Offroad

Equipment Type	Number	Hours/Day	Days/Year	Horse Power	Load Factor	Fuel Type

10.0 Stationary Equipment

Fire Pumps and Emergency Generators

Equipment Type	Number	Hours/Day	Hours/Year	Horse Power	Load Factor	Fuel Type

Boilers

Equipment Type	Number	Heat Input/Day	Heat Input/Year	Boiler Rating	Fuel Type

User Defined Equipment

Equipment Type	Number

11.0 Vegetation

Appendix BIO:
Biological Resources

Staff Report on Burrowing Owl Mitigation

State of California

Natural Resources Agency

Department of Fish and Game

March 7, 2012[1]

[1] This document replaces the Department of Fish and Game 1995 Staff Report On Burrowing Owl Mitigation.

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INTRODUCTION AND PURPOSE

Maintaining California's rich biological diversity is dependent on the conservation of species and their habitats. The California Department of Fish and Game (Department) has designated certain species as "species of special concern" when their population viability and survival is adversely affected by risk factors such as precipitous declines or other vulnerability factors (Shuford and Gardali 2008). Preliminary analyses of regional patterns for breeding populations of burrowing owls (*Athene cunicularia*) have detected declines both locally in their central and southern coastal breeding areas, and statewide where the species has experienced modest breeding range retraction (Gervais et al. 2008). In California, threat factors affecting burrowing owl populations include habitat loss, degradation and modification, and eradication of ground squirrels resulting in a loss of suitable burrows required by burrowing owls for nesting, protection from predators, and shelter (See Appendix A).

The Department recognized the need for a comprehensive conservation and mitigation strategy for burrowing owls, and in 1995 directed staff to prepare a report describing mitigation and survey recommendations. This report, "1995 Staff Report on Burrowing Owl Mitigation," (Staff Report) (CDFG 1995), contained Department-recommended burrowing owl and burrow survey techniques and mitigation measures intended to offset the loss of habitat and slow or reverse further decline of this species. Notwithstanding these measures, over the past 15+ years, burrowing owls have continued to decline in portions of their range (DeSante et al. 2007, Wilkerson and Siegel, 2010). The Department has determined that reversing declining population and range trends for burrowing owls will require implementation of more effective conservation actions, and evaluating the efficacy of the Department's existing recommended avoidance, minimization and mitigation approaches for burrowing owls.

The Department has identified three main actions that together will facilitate a more viable, coordinated, and concerted approach to conservation and mitigation for burrowing owls in California. These include:

1. Incorporating burrowing owl comprehensive conservation strategies into landscape-based planning efforts such as Natural Community Conservation Plans (NCCPs) and multi-species Habitat Conservation Plans (HCPs) that specifically address burrowing owls.
2. Developing and implementing a statewide conservation strategy (Burkett and Johnson, 2007) and local or regional conservation strategies for burrowing owls, including the development and implementation of a statewide burrowing owl survey and monitoring plan.
3. Developing more rigorous burrowing owl survey methods, working to improve the adequacy of impacts assessments; developing clear and effective avoidance and minimization measures; and developing mitigation measures to ensure impacts to the species are effectively addressed at the project, local, and/or regional level (the focus of this document).

This Report sets forth the Department's recommendations for implementing the third approach identified above by revising the 1995 Staff Report, drawing from the most relevant and current knowledge and expertise, and incorporating the best scientific information

available pertaining to the species. It is designed to provide a compilation of the best available science for Department staff, biologists, planners, land managers, California Environmental Quality Act (CEQA) lead agencies, and the public to consider when assessing impacts of projects or other activities on burrowing owls.

This revised Staff Report takes into account the California Burrowing Owl Consortium's Survey Protocol and Mitigation Guidelines (CBOC 1993, 1997) and supersedes the survey, avoidance, minimization and mitigation recommendations in the 1995 Staff Report. Based on experiences gained from implementing the 1995 Staff Report, the Department believes revising that report is warranted. This document also includes general conservation goals and principles for developing mitigation measures for burrowing owls.

DEPARTMENT ROLE AND LEGAL AUTHORITIES

The mission of the Department is to manage California's diverse fish, wildlife and plant resources, and the habitats upon which they depend, for their ecological values and for their use and enjoyment by the public. The Department has jurisdiction over the conservation, protection, and management of fish, wildlife, native plants, and habitats necessary to maintain biologically sustainable populations of those species (Fish and Game Code (FGC) §1802). The Department, as trustee agency pursuant to CEQA (See CEQA Guidelines, §15386), has jurisdiction by law over natural resources, including fish and wildlife, affected by a project, as that term is defined in Section 21065 of the Public Resources Code. The Department exercises this authority by reviewing and commenting on environmental documents and making recommendations to avoid, minimize, and mitigate potential negative impacts to those resources held in trust for the people of California.

Field surveys designed to detect the presence of a particular species, habitat element, or natural community are one of the tools that can assist biologists in determining whether a species or habitat may be significantly impacted by land use changes or disturbance. The Department reviews field survey data as well as site-specific and regional information to evaluate whether a project's impacts may be significant. This document compiles the best available science for conducting habitat assessments and surveys, and includes considerations for developing measures to avoid impacts or mitigate unavoidable impacts.

CEQA

CEQA requires public agencies in California to analyze and disclose potential environmental impacts associated with a project that the agency will carry out, fund, or approve. Any potentially significant impact must be mitigated to the extent feasible. Project-specific CEQA mitigation is important for burrowing owls because most populations exist on privately owned parcels that, when proposed for development or other types of modification, may be subject to the environmental review requirements of CEQA.

Take

Take of individual burrowing owls and their nests is defined by FGC section 86, and prohibited by sections 3503, 3503.5 and 3513. Take is defined in FGC Section 86 as "hunt, pursue, catch, capture or kill, or attempt to hunt, pursue, catch, capture or kill."

Migratory Bird Treaty Act

The Migratory Bird Treaty Act (MBTA) implements various treaties and conventions between the United States and Canada, Japan, Mexico, and Russia for the protection of migratory birds, including the burrowing owl (50 C.F.R. § 10). The MBTA protects migratory bird nests from possession, sale, purchase, barter, transport, import and export, and collection. The other prohibitions of the MBTA - capture, pursue, hunt, and kill - are inapplicable to nests. The regulatory definition of take, as defined in Title 50 C.F.R. part 10.12, means to pursue, hunt, shoot, wound, kill, trap, capture, or collect, or attempt to hunt, shoot, wound, kill, trap, capture, or collect. Only the verb "collect" applies to nests. It is illegal to collect, possess, and by any means transfer possession of any migratory bird nest. The MBTA prohibits the destruction of a nest when it contains birds or eggs, and no possession shall occur during the destruction (see Fish and Wildlife Service, Migratory Bird Permit Memorandum, April 15, 2003). Certain exceptions to this prohibition are included in 50 C.F.R. section 21. Pursuant to Fish & Game Code section 3513, the Department enforces the Migratory Bird Treaty Act consistent with rules and regulations adopted by the Secretary of the Interior under provisions of the Migratory Treaty Act.

Regional Conservation Plans

Regional multiple species conservation plans offer long-term assurances for conservation of covered species at a landscape scale, in exchange for biologically appropriate levels of incidental take and/or habitat loss as defined in the approved plan. California's NCCP Act (FGC §2800 et seq.) governs such plans at the state level, and was designed to conserve species, natural communities, ecosystems, and ecological processes across a jurisdiction or a collection of jurisdictions. Complementary federal HCPs are governed by the Endangered Species Act (7 U.S.C. § 136, 16 U.S.C.§ 1531 et seq.) (ESA). Regional conservation plans (and certain other landscape-level conservation and management plans), may provide conservation for unlisted as well as listed species. Because the geographic scope of NCCPs and HCPs may span many hundreds of thousands of acres, these planning tools have the potential to play a significant role in conservation of burrowing owls, and grasslands and other habitats.

Fish and Game Commission Policies

There are a number of Fish and Game Commission policies (see FGC §2008) that can be applied to burrowing owl conservation. These include policies on: Raptors, Cooperation, Endangered and Threatened Species, Land Use Planning, Management and Utilization of Fish and Wildlife on Federal Lands, Management and Utilization of Fish and Wildlife on Private Lands, and Research.

GUIDING PRINCIPLES FOR CONSERVATION

Unless otherwise provided in a statewide, local, or regional conservation strategy, surveying and evaluating impacts to burrowing owls, as well as developing and implementing avoidance, minimization, and mitigation and conservation measures incorporate the following principles. These principles are a summary of Department staff expert opinion and were used to guide the preparation of this document.

1. Use the Precautionary Principle (Noss et al.1997), by which the alternative of increased conservation is deliberately chosen in order to buffer against incomplete knowledge of burrowing owl ecology and uncertainty about the consequences to burrowing owls of potential impacts, including those that are cumulative.
2. Employ basic conservation biology tenets and population-level approaches when determining what constitutes appropriate avoidance, minimization, and mitigation for impacts. Include mitigation effectiveness monitoring and reporting, and use an adaptive management loop to modify measures based on results.
3. Protect and conserve owls in wild, semi-natural, and agricultural habitats (conserve is defined at FGC §1802).
4. Protect and conserve natural nest burrows (or burrow surrogates) previously used by burrowing owls and sufficient foraging habitat and protect auxiliary "satellite" burrows that contribute to burrowing owl survivorship and natural behavior of owls.

CONSERVATION GOALS FOR THE BURROWING OWL IN CALIFORNIA

It is Department staff expert opinion that the following goals guide and contribute to the short and long-term conservation of burrowing owls in California:

1. Maintain size and distribution of extant burrowing owl populations (allowing for natural population fluctuations).
2. Increase geographic distribution of burrowing owls into formerly occupied historical range where burrowing owl habitat still exists, or where it can be created or enhanced, and where the reason for its local disappearance is no longer of concern.
3. Increase size of existing populations where possible and appropriate (for example, considering basic ecological principles such as carrying capacity, predator-prey relationships, and inter-specific relationships with other species at risk).
4. Protect and restore self-sustaining ecosystems or natural communities which can support burrowing owls at a landscape scale, and which will require minimal long-term management.
5. Minimize or prevent unnatural causes of burrowing owl population declines (e.g., nest burrow destruction, chemical control of rodent hosts and prey).
6. Augment/restore natural dynamics of burrowing owl populations including movement and genetic exchange among populations, such that the species does not require future listing and protection under the California Endangered Species Act (CESA) and/or the federal Endangered Species Act (ESA).
7. Engage stakeholders, including ranchers; farmers; military; tribes; local, state, and federal agencies; non-governmental organizations; and scientific research and education communities involved in burrowing owl protection and habitat management.

ACTIVITIES WITH THE POTENTIAL TO TAKE OR IMPACT BURROWING OWLS

The following activities are examples of activities that have the potential to take burrowing owls, their nests or eggs, or destroy or degrade burrowing owl habitat: grading, disking, cultivation, earthmoving, burrow blockage, heavy equipment compacting and crushing burrow tunnels, levee maintenance, flooding, burning and mowing (if burrows are impacted), and operating wind turbine collisions (collectively hereafter referred to as "projects" or "activities"

whether carried out pursuant to CEQA or not). In addition, the following activities may have impacts to burrowing owl populations: eradication of host burrowers; changes in vegetation management (i.e. grazing); use of pesticides and rodenticides; destruction, conversion or degradation of nesting, foraging, over-wintering or other habitats; destruction of natural burrows and burrow surrogates; and disturbance which may result in harassment of owls at occupied burrows.

PROJECT IMPACT EVALUATIONS

The following three progressive steps are effective in evaluating whether projects will result in impacts to burrowing owls. The information gained from these steps will inform any subsequent avoidance, minimization and mitigation measures. The steps for project impact evaluations are: 1) habitat assessment, 2) surveys, and 3) impact assessment. Habitat assessments are conducted to evaluate the likelihood that a site supports burrowing owl. Burrowing owl surveys provide information needed to determine the potential effects of proposed projects and activities on burrowing owls, and to avoid take in accordance with FGC sections 86, 3503, and 3503.5. Impact assessments evaluate the extent to which burrowing owls and their habitat may be impacted, directly or indirectly, on and within a reasonable distance of a proposed CEQA project activity or non-CEQA project. These three site evaluation steps are discussed in detail below.

Biologist Qualifications

The current scientific literature indicates that only individuals meeting the following minimum qualifications should perform burrowing owl habitat assessments, surveys, and impact assessments:

1. Familiarity with the species and its local ecology;
2. Experience conducting habitat assessments and non-breeding and breeding season surveys, or experience with these surveys conducted under the direction of an experienced surveyor;
3. Familiarity with the appropriate state and federal statutes related to burrowing owls, scientific research, and conservation;
4. Experience with analyzing impacts of development on burrowing owls and their habitat.

Habitat Assessment Data Collection and Reporting

A habitat assessment is the first step in the evaluation process and will assist investigators in determining whether or not occupancy surveys are needed. Refer to Appendix B for a definition of burrowing owl habitat. Compile the detailed information described in Appendix C when conducting project scoping, conducting a habitat assessment site visit and preparing a habitat assessment report.

Surveys

Burrowing owl surveys are the second step of the evaluation process and the best available scientific literature recommends that they be conducted whenever burrowing owl habitat or sign (see Appendix B) is encountered on or adjacent to (within 150 meters) a project site

(Thomsen 1971, Martin 1973). Occupancy of burrowing owl habitat is confirmed at a site when at least one burrowing owl, or its sign at or near a burrow entrance, is observed within the last three years (Rich 1984). Burrowing owls are more detectable during the breeding season with detection probabilities being highest during the nestling stage (Conway et al. 2008). In California, the burrowing owl breeding season extends from 1 February to 31 August (Haug et al. 1993, Thompsen 1971) with some variances by geographic location and climatic conditions. Several researchers suggest three or more survey visits during daylight hours (Haug and Diduik 1993, CBOC 1997, Conway and Simon 2003) and recommend each visit occur at least three weeks apart during the peak of the breeding season, commonly accepted in California as between 15 April and 15 July (CBOC 1997). Conway and Simon (2003) and Conway et al. (2008) recommended conducting surveys during the day when most burrowing owls in a local area are in the laying and incubation period (so as not to miss early breeding attempts), during the nesting period, and in the late nestling period when most owls are spending time above ground.

Non-breeding season (1 September to 31 January) surveys may provide information on burrowing owl occupancy, but do not substitute for breeding season surveys because results are typically inconclusive. Burrowing owls are more difficult to detect during the non-breeding season and their seasonal residency status is difficult to ascertain. Burrowing owls detected during non-breeding season surveys may be year-round residents, young from the previous breeding season, pre-breeding territorial adults, winter residents, dispersing juveniles, migrants, transients or new colonizers. In addition, the numbers of owls and their pattern of distribution may differ during winter and breeding seasons. However, on rare occasions, non-breeding season surveys may be warranted (i.e., if the site is believed to be a wintering site only based on negative breeding season results). Refer to Appendix D for information on breeding season and non-breeding season survey methodologies.

Survey Reports

Adequate information about burrowing owls present in and adjacent to an area that will be disturbed by a project or activity will enable the Department, reviewing agencies and the public to effectively assess potential impacts and will guide the development of avoidance, minimization, and mitigation measures. The survey report includes but is not limited to a description of the proposed project or proposed activity, including the proposed project start and end dates, as well as a description of disturbances or other activities occurring on-site or nearby. Refer to Appendix D for details included in a survey report.

Impact Assessment

The third step in the evaluation process is the impact assessment. When surveys confirm occupied burrowing owl habitat in or adjoining the project area, there are a number of ways to assess a project's potential significant impacts to burrowing owls and their habitat. Richardson and Miller (1997) recommended monitoring raptor behavior prior to developing management recommendations and buffers to determine the extent to which individuals have been sensitized to human disturbance. Monitoring results will also provide detail necessary for developing site-specific measures. Postovit and Postovit (1987) recommended an analytical approach to mitigation planning: define the problem (impact), set goals (to guide mitigation development), evaluate and select mitigation methods, and monitor the results.

Define the problem. The impact assessment evaluates all factors that could affect burrowing owls. Postovit and Postovit (1987) recommend evaluating the following in assessing impacts to raptors and planning mitigation: type and extent of disturbance, duration and timing of disturbance, visibility of disturbance, sensitivity and ability to habituate, and influence of environmental factors. They suggest identifying and addressing all potential direct and indirect impacts to burrowing owls, regardless of whether or not the impacts will occur during the breeding season. Several examples are given for each impact category below; however, examples are not intended to be used exclusively.

Type and extent of the disturbance. The impact assessment describes the nature (source) and extent (scale) of potential project impacts on occupied, satellite and unoccupied burrows including acreage to be lost (temporary or permanent), fragmentation/edge being created, increased distance to other nesting and foraging habitat, and habitat degradation. Discuss any project activities that impact either breeding and/or non-breeding habitat which could affect owl home range size and spatial configuration, negatively affect onsite and offsite burrowing owl presence, increase energetic costs, lower reproductive success, increase vulnerability to predation, and/or decrease the chance of procuring a mate.

Duration and timing of the impact. The impact assessment describes the amount of time the burrowing owl habitat will be unavailable to burrowing owls (temporary or permanent) on the site and the effect of that loss on essential behaviors or life history requirements of burrowing owls, the overlap of project activities with breeding and/or non-breeding seasons (timing of nesting and/or non-breeding activities may vary with latitude and climatic conditions, which should be considered with the timeline of the project or activity), and any variance of the project activities in intensity, scale and proximity relative to burrowing owl occurrences.

Visibility and sensitivity. Some individual burrowing owls or pairs are more sensitive than others to specific stimuli and may habituate to ongoing visual or audible disturbance. Site-specific monitoring may provide clues to the burrowing owl's sensitivities. This type of assessment addresses the sensitivity of burrowing owls within their nesting area to humans on foot, and vehicular traffic. Other variables are whether the site is primarily in a rural versus urban setting, and whether any prior disturbance (e.g., human development or recreation) is known at the site.

Environmental factors. The impact assessment discusses any environmental factors that could be influenced or changed by the proposed activities including nest site availability, predators, prey availability, burrowing mammal presence and abundance, and threats from other extrinsic factors such as human disturbance, urban interface, feral animals, invasive species, disease or pesticides.

Significance of impacts. The impact assessment evaluates the potential loss of nesting burrows, satellite burrows, foraging habitat, dispersal and migration habitat, wintering habitat, and habitat linkages, including habitat supporting prey and host burrowers and other essential habitat attributes. This assessment determines if impacts to the species will result in significant impacts to the species locally, regionally and range-wide per CEQA Guidelines §15382 and Appendix G. The significance of the impact to habitat depends on the extent of habitat disturbed and length of time the habitat is unavailable (for example: minor – several days, medium – several weeks to months, high - breeding season affecting juvenile survival,

or over winter affecting adult survival).

Cumulative effects. The cumulative effects assessment evaluates two consequences: 1) the project's proportional share of reasonably foreseeable impacts on burrowing owls and habitat caused by the project or in combination with other projects and local influences having impacts on burrowing owls and habitat, and 2) the effects on the regional owl population resulting from the project's impacts to burrowing owls and habitat.

Mitigation goals. Establishing goals will assist in planning mitigation and selecting measures that function at a desired level. Goals also provide a standard by which to measure mitigation success. Unless specifically provided for through other FGC Sections or through specific regulations, take, possession or destruction of individual burrowing owls, their nests and eggs is prohibited under FGC sections 3503, 3503.5 and 3513. Therefore, a required goal for all project activities is to avoid take of burrowing owls. Under CEQA, goals would consist of measures that would avoid, minimize and mitigate impacts to a less than significant level. For individual projects, mitigation must be roughly proportional to the level of impacts, including cumulative impacts, in accordance with the provisions of CEQA (CEQA Guidelines, §§ 15126.4(a)(4)(B), 15064, 15065, and 16355). In order for mitigation measures to be effective, they must be specific, enforceable, and feasible actions that will improve environmental conditions. As set forth in more detail in Appendix A, the current scientific literature supports the conclusion that mitigation for permanent habitat loss necessitates replacement with an equivalent or greater habitat area for breeding, foraging, wintering, dispersal, presence of burrows, burrow surrogates, presence of fossorial mammal dens, well drained soils, and abundant and available prey within close proximity to the burrow.

MITIGATION METHODS

The current scientific literature indicates that any site-specific avoidance or mitigation measures developed should incorporate the best practices presented below or other practices confirmed by experts and the Department. The Department is available to assist in the development of site-specific avoidance and mitigation measures.

Avoiding. A primary goal is to design and implement projects to seasonally and spatially avoid negative impacts and disturbances that could result in take of burrowing owls, nests, or eggs. Other avoidance measures may include but not be limited to:

- Avoid disturbing occupied burrows during the nesting period, from 1 February through 31 August.
- Avoid impacting burrows occupied during the non-breeding season by migratory or non-migratory resident burrowing owls.
- Avoid direct destruction of burrows through chaining (dragging a heavy chain over an area to remove shrubs), disking, cultivation, and urban, industrial, or agricultural development.
- Develop and implement a worker awareness program to increase the on-site worker's recognition of and commitment to burrowing owl protection.
- Place visible markers near burrows to ensure that farm equipment and other machinery does not collapse burrows.
- Do not fumigate, use treated bait or other means of poisoning nuisance animals in areas where burrowing owls are known or suspected to occur (e.g., sites observed with nesting

owls, designated use areas).

- Restrict the use of treated grain to poison mammals to the months of January and February.

Take avoidance (pre-construction) surveys. Take avoidance surveys are intended to detect the presence of burrowing owls on a project site at a fixed period in time and inform necessary take avoidance actions. Take avoidance surveys may detect changes in owl presence such as colonizing owls that have recently moved onto the site, migrating owls, resident burrowing owls changing burrow use, or young of the year that are still present and have not dispersed. Refer to Appendix D for take avoidance survey methodology.

Site surveillance. Burrowing owls may attempt to colonize or re-colonize an area that will be impacted; thus, the current scientific literature indicates a need for ongoing surveillance at the project site during project activities is recommended. The surveillance frequency/effort should be sufficient to detect burrowing owls if they return. Subsequent to their new occupancy or return to the site, take avoidance measures should assure with a high degree of certainty that take of owls will not occur.

Minimizing. If burrowing owls and their habitat can be protected in place on or adjacent to a project site, the use of buffer zones, visual screens or other measures while project activities are occurring can minimize disturbance impacts. Conduct site-specific monitoring to inform development of buffers (see Visibility and sensitivity above). The following general guidelines for implementing buffers should be adjusted to address site-specific conditions using the impact assessment approach described above. The CEQA lead agency and/or project proponent is encouraged to consult with the Department and other burrowing owl experts for assistance in developing site-specific buffer zones and visual screens.

Buffers. Holroyd et al. (2001) identified a need to standardize management and disturbance mitigation guidelines. For instance, guidelines for mitigating impacts by petroleum industries on burrowing owls and other prairie species (Scobie and Faminow, 2000) may be used as a template for future mitigation guidelines (Holroyd et al. 2001). Scobie and Faminow (2000) developed guidelines for activities around occupied burrowing owl nests recommending buffers around low, medium, and high disturbance activities, respectively (see below).

Recommended restricted activity dates and setback distances by level of disturbance for burrowing owls (Scobie and Faminow 2000).

Location	Time of Year	Level of Disturbance		
		Low	Med	High
Nesting sites	April 1-Aug 15	200 m*	500 m	500 m
Nesting sites	Aug 16-Oct 15	200 m	200 m	500 m
Nesting sites	Oct 16-Mar 31	50 m	100 m	500 m

* meters (m)

Based on existing vegetation, human development, and land uses in an area, resource managers may decide to allow human development or resource extraction closer to these area/sites than recommended above. However, if it is decided to allow activities closer than

the setback distances recommended, a broad-scale, long-term, scientifically-rigorous monitoring program ensures that burrowing owls are not detrimentally affected by alternative approaches.

Other minimization measures include eliminating actions that reduce burrowing owl forage and burrowing surrogates (e.g. ground squirrel), or introduce/facilitate burrowing owl predators. Actions that could influence these factors include reducing livestock grazing rates and/or changing the timing or duration of grazing or vegetation management that could result in less suitable habitat.

Burrow exclusion and closure. Burrow exclusion is a technique of installing one-way doors in burrow openings during the non-breeding season to temporarily exclude burrowing owls, or permanently exclude burrowing owls and close burrows after verifying burrows are empty by site monitoring and scoping. Exclusion in and of itself is not a take avoidance, minimization or mitigation method. Eviction of burrowing owls is a potentially significant impact under CEQA.

The long-term demographic consequences of these techniques have not been thoroughly evaluated, and the fate of evicted or excluded burrowing owls has not been systematically studied. Because burrowing owls are dependent on burrows at all times of the year for survival and/or reproduction, evicting them from nesting, roosting, and satellite burrows may lead to indirect impacts or take. Temporary or permanent closure of burrows may result in significant loss of burrows and habitat for reproduction and other life history requirements. Depending on the proximity and availability of alternate habitat, loss of access to burrows will likely result in varying levels of increased stress on burrowing owls and could depress reproduction, increase predation, increase energetic costs, and introduce risks posed by having to find and compete for available burrows. Therefore, exclusion and burrow closure are not recommended where they can be avoided. The current scientific literature indicates consideration of all possible avoidance and minimization measures before temporary or permanent exclusion and closure of burrows is implemented, in order to avoid take.

The results of a study by Trulio (1995) in California showed that burrowing owls passively displaced from their burrows were quickly attracted to adjacent artificial burrows at five of six passive relocation sites. The successful sites were all within 75 meters (m) of the destroyed burrow, a distance generally within a pair's territory. This researcher discouraged using passive relocation to artificial burrows as a mitigation measure for lost burrows without protection of adjacent foraging habitat. The study results indicated artificial burrows were used by evicted burrowing owls when they were approximately 50-100 m from the natural burrow (Thomsen 1971, Haug and Oliphant 1990). Locating artificial or natural burrows more than 100 m from the eviction burrow may greatly reduce the chances that new burrows will be used. Ideally, exclusion and burrow closure is employed only where there are adjacent natural burrows and non-impacted, sufficient habitat for burrowing owls to occupy with permanent protection mechanisms in place. Any new burrowing owl colonizing the project site after the CEQA document has been adopted may constitute changed circumstances that should be addressed in a re-circulated CEQA document.

The current scientific literature indicates that burrow exclusion should only be conducted by qualified biologists (meeting the Biologist's Qualifications above) during the non-breeding

season, before breeding behavior is exhibited and after the burrow is confirmed empty by site surveillance and/or scoping. The literature also indicates that when temporary or permanent burrow exclusion and/or burrow closure is implemented, burrowing owls should not be excluded from burrows unless or until:

- A Burrowing Owl Exclusion Plan (see Appendix E) is developed and approved by the applicable local DFG office;
- Permanent loss of occupied burrow(s) and habitat is mitigated in accordance with the Mitigating Impacts sections below. Temporary exclusion is mitigated in accordance with the item #1 under Mitigating Impacts below.
- Site monitoring is conducted prior to, during, and after exclusion of burrowing owls from their burrows sufficient to ensure take is avoided. Conduct daily monitoring for one week to confirm young of the year have fledged if the exclusion will occur immediately after the end of the breeding season.
- Excluded burrowing owls are documented using artificial or natural burrows on an adjoining mitigation site (if able to confirm by band re-sight).

Translocation (Active relocation offsite >100 meters). At this time, there is little published information regarding the efficacy of translocating burrowing owls, and additional research is needed to determine subsequent survival and breeding success (Klute et al. 2003, Holroyd et al. 2001). Study results for translocation in Florida implied that hatching success may be decreased for populations of burrowing owls that undergo translocation (Nixon 2006). At this time, the Department is unable to authorize the capture and relocation of burrowing owls except within the context of scientific research (FGC §1002) or a NCCP conservation strategy.

Mitigating impacts. Habitat loss and degradation from rapid urbanization of farmland in the core areas of the Central and Imperial valleys is the greatest of many threats to burrowing owls in California (Shuford and Gardali, 2008). At a minimum, if burrowing owls have been documented to occupy burrows (see Definitions, Appendix B) at the project site in recent years, the current scientific literature supports the conclusion that the site should be considered occupied and mitigation should be required by the CEQA lead agency to address project-specific significant and cumulative impacts. Other site-specific and regionally significant and cumulative impacts may warrant mitigation. The current scientific literature indicates the following to be best practices. If these best practices cannot be implemented, the lead agency or lead investigator may consult with the Department to develop effective mitigation alternatives. The Department is also available to assist in the identification of suitable mitigation lands.

1. Where habitat will be temporarily disturbed, restore the disturbed area to pre-project condition including decompacting soil and revegetating. Permanent habitat protection may be warranted if there is the potential that the temporary impacts may render a nesting site (nesting burrow and satellite burrows) unsustainable or unavailable depending on the time frame, resulting in reduced survival or abandonment. For the latter potential impact, see the permanent impact measures below.
2. Mitigate for permanent impacts to nesting, occupied and satellite burrows and/or burrowing owl habitat such that the habitat acreage, number of burrows and burrowing owls impacted are replaced based on the information provided in Appendix A. Note: A

minimum habitat replacement recommendation is not provided here as it has been shown to serve as a default, replacing any site-specific analysis and discounting the wide variation in natal area, home range, foraging area, and other factors influencing burrowing owls and burrowing owl population persistence in a particular area.

3. Mitigate for permanent impacts to nesting, occupied and satellite burrows and burrowing owl habitat with (a) permanent conservation of similar vegetation communities (grassland, scrublands, desert, urban, and agriculture) to provide for burrowing owl nesting, foraging, wintering, and dispersal (i.e., during breeding and non-breeding seasons) comparable to or better than that of the impact area, and (b) sufficiently large acreage, and presence of fossorial mammals. The mitigation lands may require habitat enhancements including enhancement or expansion of burrows for breeding, shelter and dispersal opportunity, and removal or control of population stressors. If the mitigation lands are located adjacent to the impacted burrow site, ensure the nearest neighbor artificial or natural burrow clusters are at least within 210 meters (Fisher et al. 2007).
4. Permanently protect mitigation land through a conservation easement deeded to a non-profit conservation organization or public agency with a conservation mission, for the purpose of conserving burrowing owl habitat and prohibiting activities incompatible with burrowing owl use. If the project is located within the service area of a Department-approved burrowing owl conservation bank, the project proponent may purchase available burrowing owl conservation bank credits.
5. Develop and implement a mitigation land management plan to address long-term ecological sustainability and maintenance of the site for burrowing owls (see Management Plan and Artificial Burrow sections below, if applicable).
6. Fund the maintenance and management of mitigation land through the establishment of a long-term funding mechanism such as an endowment.
7. Habitat should not be altered or destroyed, and burrowing owls should not be excluded from burrows, until mitigation lands have been legally secured, are managed for the benefit of burrowing owls according to Department-approved management, monitoring and reporting plans, and the endowment or other long-term funding mechanism is in place or security is provided until these measures are completed.
8. Mitigation lands should be on, adjacent or proximate to the impact site where possible and where habitat is sufficient to support burrowing owls present.
9. Where there is insufficient habitat on, adjacent to, or near project sites where burrowing owls will be excluded, acquire mitigation lands with burrowing owl habitat away from the project site. The selection of mitigation lands should then focus on consolidating and enlarging conservation areas located outside of urban and planned growth areas, within foraging distance of other conserved lands. If mitigation lands are not available adjacent to other conserved lands, increase the mitigation land acreage requirement to ensure a selected site is of sufficient size. Offsite mitigation may not adequately offset the biological and habitat values impacted on a one to one basis. Consult with the Department when determining offsite mitigation acreages.
10. Evaluate and select suitable mitigation lands based on a comparison of the habitat attributes of the impacted and conserved lands, including but not limited to: type and structure of habitat being impacted or conserved; density of burrowing owls in impacted and conserved habitat; and significance of impacted or conserved habitat to the species range-wide. Mitigate for the highest quality burrowing owl habitat impacted first and foremost when identifying mitigation lands, even if a mitigation site is located outside of

a lead agency's jurisdictional boundary, particularly if the lead agency is a city or special district.

11. Select mitigation lands taking into account the potential human and wildlife conflicts or incompatibility, including but not limited to, human foot and vehicle traffic, and predation by cats, loose dogs and urban-adapted wildlife, and incompatible species management (i.e., snowy plover).
12. Where a burrowing owl population appears to be highly adapted to heavily altered habitats such as golf courses, airports, athletic fields, and business complexes, permanently protecting the land, augmenting the site with artificial burrows, and enhancing and maintaining those areas may enhance sustainability of the burrowing owl population onsite. Maintenance includes keeping lands grazed or mowed with weed-eaters or push mowers, free from trees and shrubs, and preventing excessive human and human-related disturbance (e.g., walking, jogging, off-road activity, dog-walking) and loose and feral pets (chasing and, presumably, preying upon owls) that make the environment uninhabitable for burrowing owls (Wesemann and Rowe 1985, Millsap and Bear 2000, Lincer and Bloom 2007). Items 4, 5 and 6 also still apply to this mitigation approach.
13. If there are no other feasible mitigation options available and a lead agency is willing to establish and oversee a Burrowing Owl Mitigation and Conservation Fund that funds on a competitive basis acquisition and permanent habitat conservation, the project proponent may participate in the lead agency's program.

Artificial burrows. Artificial burrows have been used to replace natural burrows either temporarily or long-term and their long-term success is unclear. Artificial burrows may be an effective addition to in-perpetuity habitat mitigation if they are augmenting natural burrows, the burrows are regularly maintained (i.e., no less than annual, with biennial maintenance recommended), and surrounding habitat patches are carefully maintained. There may be some circumstances, for example at airports, where squirrels will not be allowed to persist and create a dynamic burrow system, where artificial burrows may provide some support to an owl population.

Many variables may contribute to the successful use of artificial burrows by burrowing owls, including pre-existence of burrowing owls in the area, availability of food, predators, surrounding vegetation and proximity, number of natural burrows in proximity, type of materials used to build the burrow, size of the burrow and entrance, direction in which the burrow entrance is facing, slope of the entrance, number of burrow entrances per burrow, depth of the burrow, type and height of perches, and annual maintenance needs (Belthoff and King 2002, Smith et al. 2005, Barclay et al. 2011). Refer to Barclay (2008) and (2011) and to Johnson et al. 2010 (unpublished report) for guidance on installing artificial burrows including recommendations for placement, installation and maintenance.

Any long-term reliance on artificial burrows as natural burrow replacements must include semi-annual to annual cleaning and maintenance and/or replacement (Barclay et al. 2011, Smith and Conway 2005, Alexander et al. 2005) as an ongoing management practice. Alexander et al. (2005), in a study of the use of artificial burrows found that all of 20 artificial burrows needed some annual cleaning and maintenance. Burrows were either excavated by predators, blocked by soil or vegetation, or experienced substrate erosion forming a space beneath the tubing that prevented nestlings from re-entering the burrow.

Mitigation lands management plan. Develop a Mitigation Lands Management Plan for projects that require off-site or on-site mitigation habitat protection to ensure compliance with and effectiveness of identified management actions for the mitigation lands. A suggested outline and related vegetation management goals and monitoring success criteria can be found in Appendix E.

Mitigation Monitoring and Reporting

Verify the compliance with required mitigation measures, the accuracy of predictions, and ensure the effectiveness of all mitigation measures for burrowing owls by conducting follow-up monitoring, and implementing midcourse corrections, if necessary, to protect burrowing owls. Refer to CEQA Guidelines Section 15097 and the CEQA Guidelines for additional guidance on mitigation, monitoring and reporting. Monitoring is qualitatively different from site surveillance; monitoring normally has a specific purpose and its outputs and outcomes will usually allow a comparison with some baseline condition of the site before the mitigation (including avoidance and minimization) was undertaken. Ideally, monitoring should be based on the Before-After Control-Impact (BACI) principle (McDonald et al. 2000) that requires knowledge of the pre-mitigation state to provide a reference point for the state and change in state after the project and mitigation have been implemented.

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Appendix A. Burrowing Owl Natural History and Threats

Diet

Burrowing owl diet includes arthropods, small rodents, birds, amphibians, reptiles, and carrion (Haug et al. 1993).

Breeding

In California, the breeding season for the burrowing owl typically occurs between 1 February and 31 August although breeding in December has been documented (Thompson 1971, Gervais et al. 2008); breeding behavior includes nest site selection by the male, pair formation, copulation, egg laying, hatching, fledging, and post-fledging care of young by the parents. The peak of the breeding season occurs between 15 April and 15 July and is the period when most burrowing owls have active nests (eggs or young). The incubation period lasts 29 days (Coulombe 1971) and young fledge after 44 days (Haug et al. 1993). Note that the timing of nesting activities may vary with latitude and climatic conditions. Burrowing owls may change burrows several times during the breeding season, starting when nestlings are about three weeks old (Haug et al. 1993).

Dispersal

The following discussion is an excerpt from Gervais et al (2008):

> "The burrowing owl is often considered a sedentary species (e.g., Thomsen 1971). A large proportion of adults show strong fidelity to their nest site from year to year, especially where resident, as in Florida (74% for females, 83% for males; Millsap and Bear 1997). In California, nest-site fidelity rates were 32%–50% in a large grassland and 57% in an agricultural environment (Ronan 2002, Catlin 2004, Catlin et al. 2005). Differences in these rates among sites may reflect differences in nest predation rates (Catlin 2004, Catlin et al. 2005). Despite the high nest fidelity rates, dispersal distances may be considerable for both juveniles (natal dispersal) and adults (postbreeding dispersal), but this also varied with location (Catlin 2004, Rosier et al. 2006). Distances of 53 km to roughly 150 km have been observed in California for adult and natal dispersal, respectively (D. K. Rosenberg and J. A. Gervais, unpublished data), despite the difficulty in detecting movements beyond the immediate study area (Koenig et al. 1996)."

Habitat

The burrowing owl is a small, long-legged, ground-dwelling bird species, well-adapted to open, relatively flat expanses. In California, preferred habitat is generally typified by short, sparse vegetation with few shrubs, level to gentle topography and well-drained soils (Haug et al. 1993). Grassland, shrub steppe, and desert are naturally occurring habitat types used by the species. In addition, burrowing owls may occur in some agricultural areas, ruderal grassy fields, vacant lots and pastures if the vegetation structure is suitable and there are useable burrows and foraging habitat in proximity (Gervais et al 2008). Unique amongst North

American raptors, the burrowing owl requires underground burrows or other cavities for nesting during the breeding season and for roosting and cover, year round. Burrows used by the owls are usually dug by other species termed host burrowers. In California, California ground squirrel (*Spermophilus beecheyi*) and round-tailed ground squirrel (*Citellus tereticaudus*) burrows are frequently used by burrowing owls but they may use dens or holes dug by other fossorial species including badger (*Taxidea taxus*), coyote (*Canis latrans*), and fox (e.g., San Joaquin kit fox, *Vulpes macrotis mutica*; Ronan 2002). In some instances, owls have been known to excavate their own burrows (Thompson 1971, Barclay 2007). Natural rock cavities, debris piles, culverts, and pipes also are used for nesting and roosting (Rosenberg et al. 1998). Burrowing owls have been documented using artificial burrows for nesting and cover (Smith and Belthoff, 2003).

Foraging habitat. Foraging habitat is essential to burrowing owls. The following discussion is an excerpt from Gervais et al. (2008):

> "Useful as a rough guide to evaluating project impacts and appropriate mitigation for burrowing owls, adult male burrowing owls home ranges have been documented (calculated by minimum convex polygon) to comprise anywhere from 280 acres in intensively irrigated agroecosystems in Imperial Valley (Rosenberg and Haley 2004) to 450 acres in mixed agricultural lands at Lemoore Naval Air Station, CA (Gervais et al. 2003), to 600 acres in pasture in Saskatchewan, Canada (Haug and Oliphant 1990). But owl home ranges may be much larger, perhaps by an order of magnitude, in non-irrigated grasslands such as at Carrizo Plain, California (Gervais et al. 2008), based on telemetry studies and distribution of nests. Foraging occurs primarily within 600 m of their nests (within approximately 300 acres, based on a circle with a 600 m radius) during the breeding season."

Importance of burrows and adjacent habitat. Burrows and the associated surrounding habitat are essential ecological requisites for burrowing owls throughout the year and especially during the breeding season. During the non-breeding season, burrowing owls remain closely associated with burrows, as they continue to use them as refuge from predators, shelter from weather and roost sites. Resident populations will remain near the previous season's nest burrow at least some of the time (Coulombe 1971, Thomsen 1971, Botelho 1996, LaFever et al. 2008).

In a study by Lutz and Plumpton (1999) adult males and females nested in formerly used sites at similar rates (75% and 63%, respectively) (Lutz and Plumpton 1999). Burrow fidelity has been reported in some areas; however, more frequently, burrowing owls reuse traditional nesting areas without necessarily using the same burrow (Haug et al. 1993, Dechant et al. 1999). Burrow and nest sites are re-used at a higher rate if the burrowing owl has reproduced successfully during the previous year (Haug et al. 1993) and if the number of burrows isn't limiting nesting opportunity.

Burrowing owls may use "satellite" or non-nesting burrows, moving young at 10-14 days, presumably to reduce risk of predation (Desmond and Savidge 1998) and possibly to avoid nest parasites (Dechant et al. 1999). Successful nests in Nebraska had more active satellite burrows within 75 m of the nest burrow than unsuccessful nests (Desmond and Savidge

1999). Several studies have documented the number of satellite burrows used by young and adult burrowing owls during the breeding season as between one and 11 burrows with an average use of approximately five burrows (Thompsen 1984, Haug 1985, Haug and Oliphant 1990). Supporting the notion of selecting for nest sites near potential satellite burrows, Ronan (2002) found burrowing owl families would move away from a nest site if their satellite burrows were experimentally removed through blocking their entrance.

Habitat adjacent to burrows has been documented to be important to burrowing owls. Gervais et al. (2003) found that home range sizes of male burrowing owls during the nesting season were highly variable within but not between years. Their results also suggested that owls concentrate foraging efforts within 600 meters of the nest burrow, as was observed in Canada (Haug and Oliphant 1990) and southern California (Rosenberg and Haley 2004). James et al. (1997), reported habitat modification factors causing local burrowing owl declines included habitat fragmentation and loss of connectivity.

In conclusion, the best available science indicates that essential habitat for the burrowing owl in California must include suitable year-round habitat, primarily for breeding, foraging, wintering and dispersal habitat consisting of short or sparse vegetation (at least at some time of year), presence of burrows, burrow surrogates or presence of fossorial mammal dens, well-drained soils, and abundant and available prey within close proximity to the burrow.

Threats to Burrowing Owls in California

Habitat loss. Habitat loss, degradation, and fragmentation are the greatest threats to burrowing owls in California. According to DeSante et al. (2007), “the vast majority of burrowing owls [now] occur in the wide, flat lowland valleys and basins of the Imperial Valley and Great Central Valley [where] for the most part,...the highest rates of residential and commercial development in California are occurring.” Habitat loss from the State’s long history of urbanization in coastal counties has already resulted in either extirpation or drastic reduction of burrowing owl populations there (Gervais et al. 2008). Further, loss of agricultural and other open lands (such as grazed landscapes) also negatively affect owl populations. Because of their need for open habitat with low vegetation, burrowing owls are unlikely to persist in agricultural lands dominated by vineyards and orchards (Gervais et al. 2008).

Control of burrowing rodents. According to Klute et al. (2003), the elimination of burrowing rodents through control programs is a primary factor in the recent and historical decline of burrowing owl populations nationwide. In California, ground squirrel burrows are most often used by burrowing owls for nesting and cover; thus, ground squirrel control programs may affect owl numbers in local areas by eliminating a necessary resource.

Direct mortality. Burrowing owls suffer direct losses from a number of sources. Vehicle collisions are a significant source of mortality especially in the urban interface and where owls nest alongside roads (Haug et al. 1993, Gervais et al. 2008). Road and ditch maintenance, modification of water conveyance structures (Imperial Valley) and discing to control weeds in fallow fields may destroy burrows (Rosenberg and Haley 2004, Catlin and Rosenberg 2006) which may trap or crush owls. Wind turbines at Altamont Pass Wind Resource Area are known to cause direct burrowing owl mortality (Thelander et al. 2003). Exposure to

pesticides may pose a threat to the species but is poorly understood (Klute et al. 2003, Gervais et al. 2008).

Appendix B. Definitions

Some key terms that appear in this document are defined below.

Adjacent habitat means burrowing owl habitat that abuts the area where habitat and burrows will be impacted and rendered non-suitable for occupancy.

Breeding (nesting) season begins as early as 1 February and continues through 31 August (Thomsen 1971, Zarn 1974). The timing of breeding activities may vary with latitude and climatic conditions. The breeding season includes pairing, egg-laying and incubation, and nestling and fledging stages.

Burrow exclusion is a technique of installing one-way doors in burrow openings during the non-breeding season to temporarily exclude burrowing owls or permanently exclude burrowing owls and excavate and close burrows after confirming burrows are empty.

Burrowing owl habitat generally includes, but is not limited to, short or sparse vegetation (at least at some time of year), presence of burrows, burrow surrogates or presence of fossorial mammal dens, well-drained soils, and abundant and available prey.

Burrow surrogates include culverts, piles of concrete rubble, piles of soil, burrows created along soft banks of ditches and canals, pipes, and similar structures.

Civil twilight - Morning civil twilight begins when the geometric center of the sun is 6 degrees below the horizon (civil dawn) and ends at sunrise. Evening civil twilight begins at sunset and ends when the geometric center of the sun reaches 6 degrees below the horizon (civil dusk). During this period there is enough light from the sun that artificial sources of light may not be needed to carry on outdoor activities. This concept is sometimes enshrined in laws, for example, when drivers of automobiles must turn on their headlights (called lighting-up time in the UK); when pilots may exercise the rights to fly aircraft. Civil twilight can also be described as the limit at which twilight illumination is sufficient, under clear weather conditions, for terrestrial objects to be clearly distinguished; at the beginning of morning civil twilight, or end of evening civil twilight, the horizon is clearly defined and the brightest stars are visible under clear atmospheric conditions.

Conservation for burrowing owls may include but may not be limited to protecting remaining breeding pairs or providing for population expansion, protecting and enhancing breeding and essential habitat, and amending or augmenting land use plans to stabilize populations and other specific actions to avoid the need to list the species pursuant to California or federal Endangered Species Acts.

Contiguous means connected together so as to form an uninterrupted expanse in space.

Essential habitat includes nesting, foraging, wintering, and dispersal habitat.

Foraging habitat is habitat within the estimated home range of an occupied burrow, supports suitable prey base, and allows for effective hunting.

Host burrowers include ground squirrels, badgers, foxes, coyotes, gophers etc.

Locally significant species is a species that is not rare from a statewide perspective but is rare or uncommon in a local context such as within a county or region (CEQA §15125 (c)) or is so designated in local or regional plans, policies, or ordinances (CEQA Guidelines, Appendix G). Examples include a species at the outer limits of its known range or occurring in a unique habitat type.

Non-breeding season is the period of time when nesting activity is not occurring, generally September 1 through January 31, but may vary with latitude and climatic conditions.

Occupied site or occupancy means a site that is assumed occupied if at least one burrowing owl has been observed occupying a burrow within the last three years (Rich 1984). Occupancy of suitable burrowing owl habitat may also be indicated by owl sign including its molted feathers, cast pellets, prey remains, eggshell fragments, or excrement at or near a burrow entrance or perch site.

Other impacting activities may include but may not be limited to agricultural practices, vegetation management and fire control, pest management, conversion of habitat from rangeland or natural lands to more intensive agricultural uses that could result in “take”. These impacting activities may not meet the definition of a project under CEQA.

Passive relocation is a technique of installing one-way doors in burrow openings to temporarily or permanently evict burrowing owls and prevent burrow re-occupation.

Peak of the breeding season is between 15 April and 15 July.

Sign includes its tracks, molted feathers, cast pellets (defined as 1-2” long brown to black regurgitated pellets consisting of non-digestible portions of the owls’ diet, such as fur, bones, claws, beetle elytra, or feathers), prey remains, egg shell fragments, owl white wash, nest burrow decoration materials (e.g., paper, foil, plastic items, livestock or other animal manure, etc.), possible owl perches, or other items.

Appendix C. Habitat Assessment and Reporting Details

Habitat Assessment Data Collection and Reporting

Current scientific literature indicates that it would be most effective to gather the data in the manner described below when conducting project scoping, conducting a habitat assessment site visit and preparing a habitat assessment report:

1. Conduct at least one visit covering the entire potential project/activity area including areas that will be directly or indirectly impacted by the project. Survey adjoining areas within 150 m (Thomsen 1971, Martin 1973), or more where direct or indirect effects could potentially extend offsite. If lawful access cannot be achieved to adjacent areas, surveys can be performed with a spotting scope or other methods.
2. Prior to the site visit, compile relevant biological information for the site and surrounding area to provide a local and regional context.
3. Check all available sources for burrowing owl occurrence information regionally prior to a field inspection. The CNDDB and BIOS (see References cited) may be consulted for known occurrences of burrowing owls. Other sources of information include, but are not limited to, the Proceedings of the California Burrowing Owl Symposium (Barclay et al. 2007), county bird atlas projects, Breeding Bird Survey records, eBIRD (http://ebird.org), Gervais et al. (2008), local reports or experts, museum records, and other site-specific relevant information.
4. Identify vegetation and habitat types potentially supporting burrowing owls in the project area and vicinity.
5. Record and report on the following information:
   a. A full description of the proposed project, including but not limited to, expected work periods, daily work schedules, equipment used, activities performed (such as drilling, construction, excavation, etc.) and whether the expected activities will vary in location or intensity over the project's timeline;
   b. A regional setting map, showing the general project location relative to major roads and other recognizable features;
   c. A detailed map (preferably a USGS topo 7.5' quad base map) of the site and proposed project, including the footprint of proposed land and/or vegetation-altering activities, base map source, identifying topography, landscape features, a north arrow, bar scale, and legend;
   d. A written description of the biological setting, including location (Section, Township, Range, baseline and meridian), acreage, topography, soils, geographic and hydrologic characteristics, land use and management history on and adjoining the site (i.e., whether it is urban, semi-urban or rural; whether there is any evidence of past or current livestock grazing, mowing, disking, or other vegetation management activities);
   e. An analysis of any relevant, historical information concerning burrowing owl use or occupancy (breeding, foraging, over-wintering) on site or in the assessment area;
   f. Vegetation type and structure (using Sawyer et al. 2009), vegetation height, habitat types and features in the surrounding area plus a reasonably sized (as supported with logical justification) assessment area; (Note: use caution in discounting habitat based on grass height as it can be a temporary condition variable by season and conditions (such as current grazing regime) or may be distributed as a mosaic).

g. The presence of burrowing owl individuals or pairs or sign (see Appendix B);
h. The presence of suitable burrows and/or burrow surrogates (>11 cm in diameter (height and width) and >150 cm in depth) (Johnson et al. 2010), regardless of a lack of any burrowing owl sign and/or burrow surrogates; and burrowing owls and/or their sign that have recently or historically (within the last 3 years) been identified on or adjacent to the site.

Appendix D. Breeding and Non-breeding Season Surveys and Reports

Current scientific literature indicates that it is most effective to conduct breeding and non-breeding season surveys and report in the manner that follows:

Breeding Season Surveys

Number of visits and timing. Conduct 4 survey visits: 1) at least one site visit between 15 February and 15 April, and 2) a minimum of three survey visits, at least three weeks apart, between 15 April and 15 July, with at least one visit after 15 June. Note: many burrowing owl migrants are still present in southwestern California during mid-March, therefore, exercise caution in assuming breeding occupancy early in the breeding season.

Survey method. Rosenberg et al. (2007) confirmed walking line transects were most effective in smaller habitat patches. Conduct surveys in all portions of the project site that were identified in the Habitat Assessment and fit the description of habitat in Appendix A. Conduct surveys by walking straight-line transects spaced 7 m to 20 m apart, adjusting for vegetation height and density (Rosenberg et al. 2007). At the start of each transect and, at least, every 100 m, scan the entire visible project area for burrowing owls using binoculars. During walking surveys, record all potential burrows used by burrowing owls as determined by the presence of one or more burrowing owls, pellets, prey remains, whitewash, or decoration. Some burrowing owls may be detected by their calls, so observers should also listen for burrowing owls while conducting the survey.

Care should be taken to minimize disturbance near occupied burrows during all seasons and not to “flush” burrowing owls especially if predators are present to reduce any potential for needless energy expenditure or burrowing owl mortality. Burrowing owls may flush if approached by pedestrians within 50 m (Conway et al. 2003). If raptors or other predators are present that may suppress burrowing owl activity, return at another time or later date for a follow-up survey.

Check all burrowing owls detected for bands and/or color bands and report band combinations to the Bird Banding Laboratory (BBL). Some site-specific variations to survey methods discussed below may be developed in coordination with species experts and Department staff.

Weather conditions. Poor weather may affect the surveyor’s ability to detect burrowing owls, therefore, avoid conducting surveys when wind speed is >20 km/hr, and there is precipitation or dense fog. Surveys have greater detection probability if conducted when ambient temperatures are >20º C, <12 km/hr winds, and cloud cover is <75% (Conway et al. 2008).

Time of day. Daily timing of surveys varies according to the literature, latitude, and survey method. However, surveys between morning civil twilight and 10:00 AM and two hours before sunset until evening civil twilight provide the highest detection probabilities (Barclay pers. comm. 2012, Conway et al. 2008).

Alternate methods. If the project site is large enough to warrant an alternate method, consult current literature for generally accepted survey methods and consult with the Department on the proposed survey approach.

Additional breeding season site visits. Additional breeding season site visits may be necessary, especially if non-breeding season exclusion methods are contemplated. Detailed information, such as approximate home ranges of each individual or of family units, as well as foraging areas as related to the proposed project, will be important to document for evaluating impacts, planning avoidance measure implementation and for mitigation measure performance monitoring.

Adverse conditions may prevent investigators from determining presence or occupancy. Disease, predation, drought, high rainfall or site disturbance may preclude presence of burrowing owls in any given year. Any such conditions should be identified and discussed in the survey report. Visits to the site in more than one year may increase the likelihood of detection. Also, visits to adjacent known occupied habitat may help determine appropriate survey timing.

Given the high site fidelity shown by burrowing owls (see Appendix A, Importance of burrows), conducting surveys over several years may be necessary when project activities are ongoing, occur annually, or start and stop seasonally. (See Negative surveys).

Non-breeding Season Surveys

If conducting non-breeding season surveys, follow the methods described above for breeding season surveys, but conduct at least four (4) visits, spread evenly, throughout the non-breeding season. Burrowing owl experts and local Department staff are available to assist with interpreting results.

Negative Surveys

Adverse conditions may prevent investigators from documenting presence or occupancy. Disease, predation, drought, high rainfall or site disturbance may preclude presence of burrowing owl in any given year. Discuss such conditions in the Survey Report. Visits to the site in more than one year increase the likelihood of detection and failure to locate burrowing owls during one field season does not constitute evidence that the site is no longer occupied, particularly if adverse conditions influenced the survey results. Visits to other nearby known occupied sites can affirm whether the survey timing is appropriate.

Take Avoidance Surveys

Field experience from 1995 to present supports the conclusion that it would be effective to complete an initial take avoidance survey no less than 14 days prior to initiating ground disturbance activities using the recommended methods described in the Detection Surveys section above. Implementation of avoidance and minimization measures would be triggered by positive owl presence on the site where project activities will occur. The development of avoidance and minimization approaches would be informed by monitoring the burrowing owls.

Burrowing owls may re-colonize a site after only a few days. Time lapses between project activities trigger subsequent take avoidance surveys including but not limited to a final survey conducted within 24 hours prior to ground disturbance.

Survey Reports

Report on the survey methods used and results including the information described in the Summary Report and include the reports within the CEQA documentation:

1. Date, start and end time of surveys including weather conditions (ambient temperature, wind speed, percent cloud cover, precipitation and visibility);
2. Name(s) of surveyor(s) and qualifications;
3. A discussion of how the timing of the survey affected the comprehensiveness and detection probability;
4. A description of survey methods used including transect spacing, point count dispersal and duration, and any calls used;
5. A description and justification of the area surveyed relative to the project area;
6. A description that includes: number of owls or nesting pairs at each location (by nestlings, juveniles, adults, and those of an unknown age), number of burrows being used by owls, and burrowing owl sign at burrows. Include a description of individual markers, such as bands (numbers and colors), transmitters, or unique natural identifying features. If any owls are banded, request documentation from the BBL and bander to report on the details regarding the known history of the banded burrowing owl(s) (age, sex, origins, whether it was previously relocated) and provide with the report if available;
7. A description of the behavior of burrowing owls during the surveys, including feeding, resting, courtship, alarm, territorial defense, and those indicative of parents or juveniles;
8. A list of possible burrowing owl predators present and documentation of any evidence of predation of owls;
9. A detailed map (1:24,000 or closer to show details) showing locations of all burrowing owls, potential burrows, occupied burrows, areas of concentrated burrows, and burrowing owl sign. Locations documented by use of global positioning system (GPS) coordinates must include the datum in which they were collected. The map should include a title, north arrow, bar scale and legend;
10. Signed field forms, photos, etc., as appendices to the field survey report;
11. Recent color photographs of the proposed project or activity site; and
12. Original CNDDB Field Survey Forms should be sent directly to the Department's CNDDB office, and copies should be included in the environmental document as an appendix. (http://www.dfg.ca.gov/bdb/html/cnddb.html).

Appendix E. Example Components for Burrowing Owl Artificial Burrow and Exclusion Plans

Whereas the Department does not recommend exclusion and burrow closure, current scientific literature and experience from 1995 to present, indicate that the following example components for burrowing owl artificial burrow and exclusion plans, combined with consultation with the Department to further develop these plans, would be effective.

Artificial Burrow Location

If a burrow is confirmed occupied on-site, artificial burrow locations should be appropriately located and their use should be documented taking into consideration:

1. A brief description of the project and project site pre-construction;
2. The mitigation measures that will be implemented;
3. Potential conflicting site uses or encumbrances;
4. A comparison of the occupied burrow site(s) and the artificial burrow site(s) (e.g., vegetation, habitat types, fossorial species use in the area, and other features);
5. Artificial burrow(s) proximity to the project activities, roads and drainages;
6. Artificial burrow(s) proximity to other burrows and entrance exposure;
7. Photographs of the site of the occupied burrow(s) and the artificial burrows;
8. Map of the project area that identifies the burrow(s) to be excluded as well as the proposed sites for the artificial burrows;
9. A brief description of the artificial burrow design;
10. Description of the monitoring that will take place during and after project implementation including information that will be provided in a monitoring report.
11. A description of the frequency and type of burrow maintenance.

Exclusion Plan

An Exclusion Plan addresses the following including but not limited to:

1. Confirm by site surveillance that the burrow(s) is empty of burrowing owls and other species preceding burrow scoping;
2. Type of scope and appropriate timing of scoping to avoid impacts;
3. Occupancy factors to look for and what will guide determination of vacancy and excavation timing (one-way doors should be left in place 48 hours to ensure burrowing owls have left the burrow before excavation, visited twice daily and monitored for evidence that owls are inside and can't escape i.e., look for sign immediately inside the door).
4. How the burrow(s) will be excavated. Excavation using hand tools with refilling to prevent reoccupation is preferable whenever possible (may include using piping to stabilize the burrow to prevent collapsing until the entire burrow has been excavated and it can be determined that no owls reside inside the burrow);
5. Removal of other potential owl burrow surrogates or refugia on site;
6. Photographing the excavation and closure of the burrow to demonstrate success and sufficiency;

7. Monitoring of the site to evaluate success and, if needed, to implement remedial measures to prevent subsequent owl use to avoid take;
8. How the impacted site will continually be made inhospitable to burrowing owls and fossorial mammals (e.g., by allowing vegetation to grow tall, heavy disking, or immediate and continuous grading) until development is complete.

Appendix F. Mitigation Management Plan and Vegetation Management Goals

Mitigation Management Plan

A mitigation site management plan will help ensure the appropriate implementation and maintenance for the mitigation site and persistence of the burrowing owls on the site. For an example to review, refer to Rosenberg et al. (2009). The current scientific literature and field experience from 1995 to present indicate that an effective management plan includes the following:

1. Mitigation objectives;
2. Site selection factors (including a comparison of the attributes of the impacted and conserved lands) and baseline assessment;
3. Enhancement of the conserved lands (enhancement of reproductive capacity, enhancement of breeding areas and dispersal opportunities, and removal or control of population stressors);
4. Site protection method and prohibited uses;
5. Site manager roles and responsibilities;
6. Habitat management goals and objectives:
    a. Vegetation management goals,
        i. Vegetation management tools:
            1. Grazing
            2. Mowing
            3. Burning
            4. Other
    b. Management of ground squirrels and other fossorial mammals,
    c. Semi-annual and annual artificial burrow cleaning and maintenance,
    d. Non-natives control – weeds and wildlife,
    e. Trash removal;
7. Financial assurances:
    a. Property analysis record or other financial analysis to determine long-term management funding,
    b. Funding schedule;
8. Performance standards and success criteria;
9. Monitoring, surveys and adaptive management;
10. Maps;
11. Annual reports.

Vegetation Management Goals

- Manage vegetation height and density (especially in immediate proximity to burrows). Suitable vegetation structure varies across sites and vegetation types, but should generally be at the average effective vegetation height of 4.7 cm (Green and Anthony 1989) and <13 cm average effective vegetation height (MacCracken et al. 1985*a)*.
- Employ experimental prescribed fires (controlled, at a small scale) to manage vegetation structure;

- Vegetation reduction or ground disturbance timing, extent, and configuration should avoid take. While local ordinances may require fire prevention through vegetation management, activities like disking, mowing, and grading during the breeding season can result in take of burrowing owls and collapse of burrows, causing nest destruction. Consult the take avoidance surveys section above for pre-management avoidance survey recommendations;
- Promote natural prey distribution and abundance, especially in proximity to occupied burrows; and
- Promote self-sustaining populations of host burrowers by limiting or prohibiting lethal rodent control measures and by ensuring food availability for host burrowers through vegetation management.

Refer to Rosenberg et al. (2009) for a good discussion of managing grasslands for burrowing owls.

Mitigation Site Success Criteria

In order to evaluate the success of mitigation and management strategies for burrowing owls, monitoring is required that is specific to the burrowing owl management plan. Given limited resources, Barclay et al. (2011) suggests managers focus on accurately estimating annual adult owl populations rather than devoting time to estimating reproduction, which shows high annual variation and is difficult to accurately estimate. Therefore, the key objective will be to determine accurately the number of adult burrowing owls and pairs, and if the numbers are maintained. A frequency of 5-10 years for surveys to estimate population size may suffice if there are no changes in the management of the nesting and foraging habitat of the owls.

Effective monitoring and evaluation of off-site and on-site mitigation management success for burrowing owls includes (Barclay, pers. comm.):

- Site tenacity;
- Number of adult owls present and reproducing;
- Colonization by burrowing owls from elsewhere (by band re-sight);
- Evidence and causes of mortality;
- Changes in distribution; and
- Trends in stressors.

Appendix CUL:
Results from cultural literature review, Native American consultation, historical society consultation, and field survey of the project area

Wildflower Station AB52 Consultation Log			
Tribe Name and Contact Information	**Date Sent**	**Date Tribe Receives**	**Consultation**
Randy Yonemura, Cultural Committee Chair Ione Band of Miwok Indians P.O. Box 699 9252 Bush St., Suite 2 Plymouth, CA, 95669	11/16/2016	11/21/2016	11-16-16 - The City sent a consultation request letter with project description, figures, and cultural report to the tribe. 11-21-2016 - The tribe received the consultation request letter. Response to the consultation request was not received by 12-21-2016.
Michael Mirelez, Cultural Resource Coordinator Torres Martinez Desert Cahuilla Indians P.O. Box 1160 Thermal, CA 92274	11/16/2016	11/21/2016	11-16-16 - The City sent a consultation request letter with project description, figures, and cultural report. 11-21-2016 - The tribe received the consultation request letter. 12-15-2016 - The City sent a request for concurrence that the tribe does not want to receive AB 52 notifications for projects in the City. 12-15-2016 - Mr. Miralez concurred via email.
Irenne Zwierlein, Chairperson Amah Mutsun Tribal Band of Mission San Juan Bautista 789 Canada Road Woodside, CA 94062	11/16/2016	N/A	11-16-16 - The City sent a consultation request letter with project description, figures, and cultural report. The tribe had not requested AB52 notification for projects within the City. 12-19-16 - The original consultation letter was unclaimed and returned indicating the letter could not be forwarded. 12-21-16 - Margo Nayyar, Michael Baker International cultural resources manager, emailed the original consultation letter to Ms. Zwierlein asking if she would like to initiate consultation. Response to the consultation request was not received by 1-21-2016.

Ann Marie Sayers, Chairperson Indian Canyon Mutsun Band of Costanoan P.O. Box 28 Hollister, CA 95024	11/16/2016	11/28/2016	11-16-16 - The City sent a consultation request letter with project description, figures, and cultural report. The tribe had not requested AB52 notification for projects in the City. 11-28-16 - The tribe received the letter. Response to the consultation request was not received by 12-28-2016.
Rosemary Cambra, Chairperson Muwekma Ohlone Indian Tribe Of The SF Bay Area P.O. Box 360791 Milpitas, CA 95036	11/16/2016	11/28/2016	11-16-16 - The City sent a consultation request letter with project description, figures, and cultural report. 11-28-16 – The tribe received the letter. Response to the consultation request was not received by 12-28-2016.
Andrew Galvan The Ohlone Indian Tribe P.O. Box 3152 Freemont, CA 94539	11/16/2016	11/23/2016	11-16-16 - City sent consultation request with project description, figures, and cultural report. 11-21-2016 - Tribe received consultation request letter. Response to the consultation request was not received by 12-23-2016.

Raymond Hitchcock, Chairperson Wilton Rancheria 9728 Kent Street Elk Grove, CA 94539	11/16/2016	11/21/2016	11-16-16 - The City sent a consultation request letter with project description, figures, and cultural report. 11-21-2016 - The tribe received consultation request letter. 11-22-16 - The tribe responded requesting consultation on topics including project alternatives, the applicants, project funding, recommended mitigation measures, significant effects, and construction monitoring; as well as, environment review necessary, significance of tribal cultural resources, project impacts to tribal cultural resources. The tribe also requested copies of cultural resource studies, cultural resource records, records search, archaeological sensitivity, results of the NAHC SLF search, ethnographic studies, and geotechnical report's. The tribe requested a meeting. 12-20-2016 - The City responded to the consultation request and requested a field meeting. Wilton received the letter on 12-27-2016. Response to the consultation letter was not received by 1-27-2017.

November 16, 2016

Ann Marie Sayers, Chairperson
INDIAN CANYON MUTSUN BAND OF COSTANOAN
P.O. Box 28
Hollister, CA 95024

Re: Invitation to Begin Assembly Bill 52 (Gatto 2014) Consultation for the Wildflower Station Project, City of Antioch, California

Dear Ms. Sayers:

The Indian Canyon Mutsun Band of Costanoan has not requested Assembly Bill 52 (Gatto 2014) Public Resources Code: 21073, 21074, 21080.3.1, 21080.3.2, 21082.3, 21083.09, 21084.2, and 5097.94 (AB 52) notification of projects in the City of Antioch (City); however, the City is notifying you of this project and is inquiring as to whether you would like to initiate AB 52 consultation on the Wildflower Station (project).

The project proposes to subdivide and develop a 22.7 acre site for retail and single- and multi-family residential uses. The site will be subdivided into three parcels to accommodate retail development along Hillcrest Avenue, high-density multi-family residential adjacent to and shared access with the retail development, and detached single-family homes at the upper portion of the site. The proposed development will include six bio-retention basins extending north and south along the slope. The large-scale mixed-use development would consist of 10.45 acres of commercial use, 7.0 acres of condominiums, 4.05 acres of single family housing, and 1.08 acres dedicated to right-of-way (ROW) on Hillcrest Avenue.

The project is subject to CEQA and requires an Initial Study. A cultural resources technical study was completed for the project area in 2014 (Attachment 2). No cultural resources were identified within the project area.

We are requesting any information that you may have regarding tribal cultural resources (as defined by Public Resources Code 21074) within the project area so that this information can be incorporated into project planning. The City, as the lead agency, pursuant to AB 52, is requesting input from you within 30 days of the date of this letter.

Your comments and concerns are important to us and we look forward to hearing from you. If you have any questions or comments regarding the project, I can be contacted via email at pjunker@mbakerintl.com or by phone at (916) 838-8384.

Sincerely,

Paul Junker, Project Planner
Community Development Department

Attachments:

Attachment 1 - Figures
- Figure 1 - Project Location and Vicinity
- Figure 2 - Project Area

Attachment 2 – Cultural Resources Study

November 16, 2016

Randy Yonemura, Cultural Committee Chair
IONE BAND OF MIWOK INDIANS
P.O. Box 699
9252 Bush St., Suite 2
Plymouth, CA, 95669

Re: Invitation to Begin Assembly Bill 52 (Gatto 2014) Consultation for the Wildflower Station Project, City of Antioch, California

Dear Mr. Yonemura:

In response to your request for Assembly Bill 52 (Gatto 2014) Public Resources Code: 21073, 21074, 21080.3.1, 21080.3.2, 21082.3, 21083.09, 21084.2, and 5097.94 (AB 52) notification of projects, the City of Antioch (City) is requesting AB 52 consultation initiation for the Wildflower Station (project).

The project proposes to subdivide and develop a 22.7 acre site for retail and single- and multi-family residential uses. The site will be subdivided into three parcels to accommodate retail development along Hillcrest Avenue, high-density multi-family residential adjacent to and shared access with the retail development, and detached single-family homes at the upper portion of the site. The proposed development will include six bio-retention basins extending north and south along the slope. The large-scale mixed-use development would consist of 10.45 acres of commercial use, 7.0 acres of condominiums, 4.05 acres of single family housing, and 1.08 acres dedicated to right-of-way (ROW) on Hillcrest Avenue.

The project is subject to CEQA and requires an Initial Study. A cultural resources technical study was completed for the project area in 2014 (Attachment 2). No cultural resources were identified within the project area.

You are a traditionally and culturally affiliated California Native American tribal representative that has requested notice of projects where AB 52 applies within the City. We are requesting any information that you may have regarding tribal cultural resources (as defined by Public Resources Code 21074) within the project area so that this information can be incorporated into project planning. The City, as the lead agency, pursuant to AB 52, is requesting input from you within 30 days of the date of this letter.

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Community Development Department

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November 16, 2016

Michael Mirelez, Cultural Resource Coordinator
TORRES MARTINEZ DESERT CAHUILLA INDIANS
P.O. Box 1160
Thermal, CA 92274

Re: Invitation to Begin Assembly Bill 52 (Gatto 2014) Consultation for the Wildflower Station Project, City of Antioch, California

Dear Mr. Mirelez:

In response to your request for Assembly Bill 52 (Gatto 2014) Public Resources Code: 21073, 21074, 21080.3.1, 21080.3.2, 21082.3, 21083.09, 21084.2, and 5097.94 (AB 52) notification of projects, the City of Antioch (City) is requesting AB 52 consultation initiation for the Wildflower Station (project).

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Sincerely,

Paul Junker, Project Planner
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November 16, 2016

Rosemary Cambra, Chairperson
MUWEKMA OHLONE INDIAN TRIBE OF THE SF BAY AREA
P.O. Box 360791
Milpitas, CA 95036

Re: Invitation to Begin Assembly Bill 52 (Gatto 2014) Consultation for the Wildflower Station Project, City of Antioch, California

Dear Ms. Cambra:

The Muwekma Ohlone Indian Tribe of the SF Bay Area has not requested Assembly Bill 52 (Gatto 2014) Public Resources Code: 21073, 21074, 21080.3.1, 21080.3.2, 21082.3, 21083.09, 21084.2, and 5097.94 (AB 52) notification of projects in the City of Antioch (City); however, the City is notifying you of this project and is inquiring as to whether you would like to initiate AB 52 consultation on the Wildflower Station (project).

The project proposes to subdivide and develop a 22.7 acre site for retail and single- and multi-family residential uses. The site will be subdivided into three parcels to accommodate retail development along Hillcrest Avenue, high-density multi-family residential adjacent to and shared access with the retail development, and detached single-family homes at the upper portion of the site. The proposed development will include six bio-retention basins extending north and south along the slope. The large-scale mixed-use development would consist of 10.45 acres of commercial use, 7.0 acres of condominiums, 4.05 acres of single family housing, and 1.08 acres dedicated to right-of-way (ROW) on Hillcrest Avenue.

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Paul Junker, Project Planner
Community Development Department

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November 16, 2016

Andrew Galvan
THE OHLONE INDIAN TRIBE
P.O. Box 3152
Freemont, CA 94539

Re: Invitation to Begin Assembly Bill 52 (Gatto 2014) Consultation for the Wildflower Station Project, City of Antioch, California

Dear Mr. Galvan:

The Ohlone Indian Tribe has not requested Assembly Bill 52 (Gatto 2014) Public Resources Code: 21073, 21074, 21080.3.1, 21080.3.2, 21082.3, 21083.09, 21084.2, and 5097.94 (AB 52) notification of projects in the City of Antioch (City); however, the City is notifying you of this project and is inquiring as to whether you would like to initiate AB 52 consultation on the Wildflower Station (project).

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November 16, 2016

Raymond Hitchcock, Chairperson
WILTON RANCHERIA
9728 Kent Street
Elk Grove, CA 94539

Re: Invitation to Begin Assembly Bill 52 (Gatto 2014) Consultation for the Wildflower Station Project, City of Antioch, California

Dear Mr. Hitchcock:

Wilton Rancheria has not requested Assembly Bill 52 (Gatto 2014) Public Resources Code: 21073, 21074, 21080.3.1, 21080.3.2, 21082.3, 21083.09, 21084.2, and 5097.94 (AB 52) notification of projects in the City of Antioch (City); however, the City is notifying you of this project and is inquiring as to whether you would like to initiate AB 52 consultation on the Wildflower Station (project).

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Sincerely,

Paul Junker, Project Planner
Community Development Department

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November 16, 2016

Irenne Zwierlein, Chairperson
AMAH MUTSUN TRIBAL BAND OF MISSION SAN JUAN BAUTISTA
789 Canada Road
Woodside, CA 94062

Re: Invitation to Begin Assembly Bill 52 (Gatto 2014) Consultation for the Wildflower Station Project, City of Antioch, California

Dear Ms. Zwierlein:

The Amah Mutsun Tribal Band of Mission San Juan Bautista has not requested Assembly Bill 52 (Gatto 2014) Public Resources Code: 21073, 21074, 21080.3.1, 21080.3.2, 21082.3, 21083.09, 21084.2, and 5097.94 (AB 52) notification of projects in the City of Antioch (City); however, the City is notifying you of this project and is inquiring as to whether you would like to initiate AB 52 consultation on the Wildflower Station (project).

The project proposes to subdivide and develop a 22.7 acre site for retail and single- and multi-family residential uses. The site will be subdivided into three parcels to accommodate retail development along Hillcrest Avenue, high-density multi-family residential adjacent to and shared access with the retail development, and detached single-family homes at the upper portion of the site. The proposed development will include six bio-retention basins extending north and south along the slope. The large-scale mixed-use development would consist of 10.45 acres of commercial use, 7.0 acres of condominiums, 4.05 acres of single family housing, and 1.08 acres dedicated to right-of-way (ROW) on Hillcrest Avenue.

The project is subject to CEQA and requires an Initial Study. A cultural resources technical study was completed for the project area in 2014 (Attachment 2). No cultural resources were identified within the project area.

We are requesting any information that you may have regarding tribal cultural resources (as defined by Public Resources Code 21074) within the project area so that this information can be incorporated into project planning. The City, as the lead agency, pursuant to AB 52, is requesting input from you within 30 days of the date of this letter.

Your comments and concerns are important to us and we look forward to hearing from you. If you have any questions or comments regarding the project, I can be contacted via email at pjunker@mbakerintl.com or by phone at (916) 838-8384.

Sincerely,

Paul Junker, Project Planner
Community Development Department

Attachments:

Attachment 1 - Figures
Figure 1 - Project Location and Vicinity
Figure 2 - Project Area

Attachment 2 – Cultural Resources Study

Attachment 1
Figures

T:_GIS\Contra_Costa_County\MXDs\antioch\Hillcrest-Wildflower\Cultural\Project Location and Vicinity.mxd (11/16/2016)

FIGURE 1

Regional Vicinity

Michael Baker INTERNATIONAL

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FEET

FIGURE 2
Project Area

Michael Baker
INTERNATIONAL

Attachment 2
Cultural Resources Study

A Cultural Resources Survey of the Property at Hillcrest Avenue and Wildflower Drive Antioch, Contra Costa County, California

Janine M. Origer, M.A./R.P.A.

August 2014

A Cultural Resources Survey of the property at Hillcrest Avenue and Wildflower Drive Antioch, Contra Costa County, California

Janine M. Origer, M.A./R.P.A.

Tom Origer & Associates
Post Office Box 1531
Rohnert Park, California 94927
(707) 584-8200

Prepared for:

Trent Sanson
Director of Land Acquisitions
DeNova Homes, Inc.
1500 Willow Pass Ct.
Concord, California 94520

August 2014

ABSTRACT

Tom Origer & Associates conducted a cultural resources survey for the proposed parcel at Hillcrest Avenue and Wildflower Drive in Antioch. The study was designed to satisfy requirements of Section 106 of the National Historic Preservation Act.

This study included archival research at the Northwest Information Center, Sonoma State University (NWIC File No.14-0188), contact with Native American representatives, examination of the library and files of Tom Origer & Associates, and field inspection of the proposed development location.

No prehistoric or historical cultural resources were found during the survey. Documentation pertaining to this study is on file at the offices of Tom Origer & Associates (File No. 2014-098).

Synopsis

Project:	Hillcrest at Wildflower
Location:	Antioch, Contra Costa County, California
Quadrangle:	Antioch South, California 7.5' series
Study Type:	Intensive survey
Scope:	~22 acres
Finds:	None

Project Personnel

Janine M. Origer acted as project manager for this work. Ms. Origer has 30 years experience working in Northern California cultural resources management. She has been with Tom Origer & Associates since 1991. She has worked on both prehistoric and historical archaeological sites, and has completed research and documentation of historical buildings. Ms. Origer has a Bachelor of Arts in Anthropology from Sonoma State University. She holds a Master of Arts in Archaeology and Heritage from the University of Leicester. She has completed extensive continuing education in regulatory compliance, planning local surveys, and identifying historical resources. She is affiliated with the California Historical Society, International Association for Obsidian Studies, Society for American Archaeology, Society of Architectural Historians, Society for California Archaeology (Secretary of the Executive Board 2004-2006), Society for Historical Archaeology, Vernacular Architecture Forum, and the Register of Professional Archaeologists (#1066030).

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INTRODUCTION

Tom Origer & Associates conducted a cultural resources survey for the Hillcrest at Wildflower Project in Antioch, Contra Costa County, California (Figure 1). The study was completed at the request of Trent Sanson, of DeNova Homes, Inc, and was designed to satisfy requirements of Section 106 of the National Historic Preservation Act. The study area consists of approximately 22 acres, where DeNova Homes plans to develop approximately 100 housing units with associated parking. Documentation pertaining to this study is on file at Tom Origer & Associates (File No. 2014-098).

REGULATORY CONTEXT

When a project might affect a cultural resource, the project proponent is required to conduct an assessment to determine whether the effect may be one that is significant. Consequently, it is necessary to determine the importance of resources that could be affected. Because this project will have potential permitting from both state and federal agencies, Section 106 of the National Historic Preservation Act and the California Environmental Quality Act will apply to the work.

Under Section 106, when a federal agency is involved in an undertaking, it must take into account the effects of the undertaking on historic properties (36CFR Part 800). Compliance with Section 106 requires that agencies make an effort to identify historic properties that might be affected by a project, and gather information to evaluate their eligibility for inclusion on the National Register of Historic Places (National Register). Pursuant to Section 106, the goals of this study were to: 1) identify all historic resources within the project area; 2) offer a preliminary evaluation of the significance of the indentified resources; 3) determine resource vulnerability to adverse impacts that could arise from project activities; and 4) offer recommendations designed to protect historic resource values, as warranted.

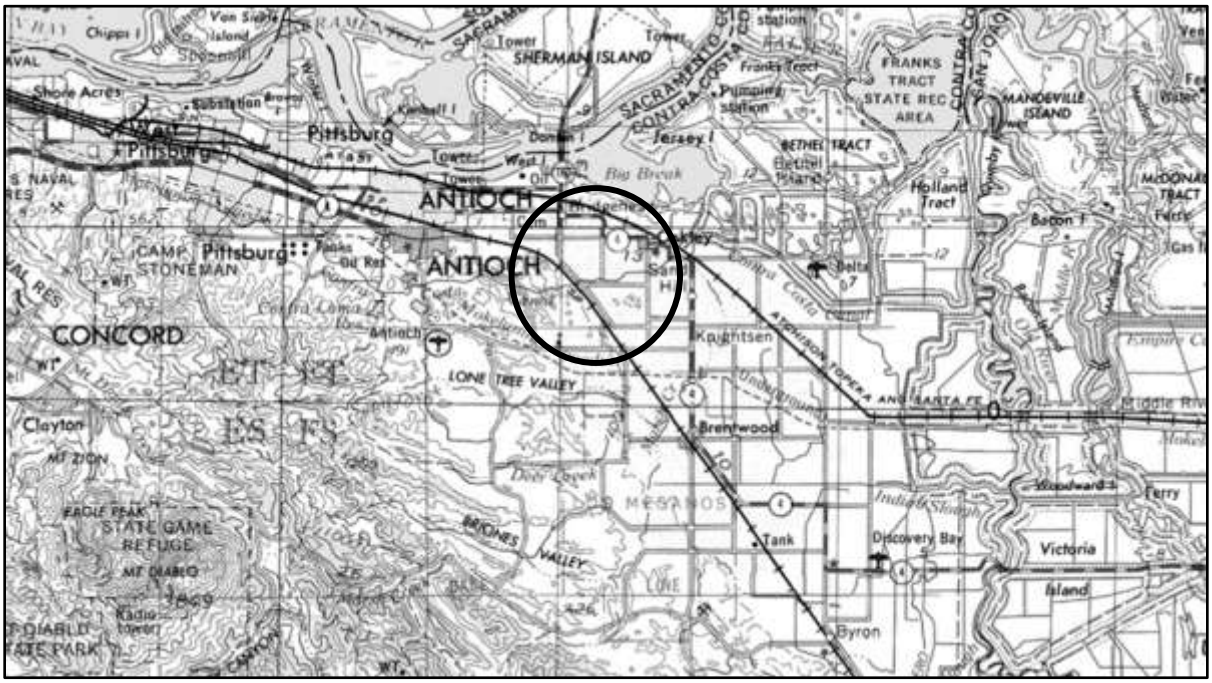

Figure 1. Project vicinity (adapted from the Sacramento and San Jose 1:250,000-scale USGS maps).

The California Environmental Quality Act (CEQA) requires that cultural resources be considered during the environmental review process. This is achieved by an inventory of resources within a study area and by assessing the potential that cultural resources could be affected by development. This cultural resources survey was designed to satisfy environmental issues specified in the CEQA and its guidelines (Title 14 CCR §15064.5) by: (1) identifying all cultural resources within the project area; (2) offering a preliminary significance evaluation of the identified cultural resources; (3) assessing resource vulnerability to effects that could arise from project activities; and (4) offering suggestions designed to protect resource integrity, as warranted.

Resource Definitions

Cultural resources are classified by the State Office of Historic Preservation (OHP) as sites, buildings, structures, objects and districts, and each is described by OHP (1995) as follows.

> **Site.** A site is the location of a significant event, a prehistoric or historic occupation or activity, or a building or structure, whether standing, ruined, or vanished, where the location itself possesses historic, cultural, or archaeological value regardless of the value of any existing structure.
>
> **Building.** A building, such as a house, barn, church, hotel, or similar construc-tion, is created principally to shelter any form of human activity. "Building" may also be used to refer to a historically and functionally related unit, such as a courthouse and jail, or a house and barn.
>
> **Structure.** The term "structure" is used to distinguish from buildings those functional constructions made usually for purposes other than creating human shelter.
>
> **Object.** The term "object" is used to distinguish from buildings and structures those constructions that are primarily artistic in nature or are relatively small in scale and simply constructed. Although it may be, by nature or design, movable, an object is associated with a specific setting or environment.
>
> **District.** A district possesses a significant concentration, linkage, or continuity of sites, buildings, structures, or objects united historically or aesthetically by plan or physical development.

Significance Criteria

Under Section 106, the importance of a historic resource is evaluated in terms of National Register criteria put forth in 36CFR60, as follows:

> The quality of significance is present in properties that possess integrity of location, design, setting, materials, workmanship, feeling, and association, and:
>
> A. That are associated with events that have made a significant contribution to the broad patterns of our history; or
>
> B. That are associated with the lives of persons significant in our past; or

C. That embody the distinct characteristics of a type, period, or method of construction, or that represent the work of a master, or that possess high artistic values, or that represent a significant and distinguishable entity whose components may lack individual distinction; or

D. That have yielded or may be likely to yield, information important in prehistory or history.

Under CEQA, the importance of a resource is measured in terms of criteria for inclusion on the California Register of Historical Resources (Title 14 CCR, §4852(a)) as listed below. A resource may be important if it meets any one of the criteria below, or if it is already listed on the California Register of Historical Resources or a local register of historical resources.

An important historical resource is one which:

1. Is associated with events that have made a significant contribution to the broad patterns of local or regional history, or the cultural heritage of California or the United States.
2. Is associated with the lives of persons important to local, California, or national history.
3. It embodies the distinctive characteristics of a type, period, region or method of construction, or represents the work of a master or possesses high artistic values.
4. It has yielded, or may be likely to yield, information important to the pre-history or history of the local area, California, or the nation.

In addition to meeting one or more of the above criteria, eligibility for the California Register requires that a resource retains sufficient integrity to convey a sense of its significance or importance. Seven elements are considered key in considering a property's integrity: location, design, setting, materials, workmanship, feeling, and association.

As part of the determination made pursuant to Section 21080.1 of the CEQA, the lead agency shall determine whether the project may have a significant effect on unique archaeological resources. If the lead agency determines that the project may have a significant effect on unique archaeological resources, the environmental impact report shall address the issue of those resources.

A "unique archaeological resource" consists of an archaeological artifact, object, or site about which it can be clearly demonstrated that, without merely adding to the current body of knowledge, there is a high probability that it meets any of the following criteria:

1. Contains information needed to answer important scientific research questions and that there is a demonstrable public interest in that information.

2. Has a special and particular quality such as being the oldest of its type or the best available example of its type.

3. Is directly associated with a scientifically recognized important prehistoric or historic event or person.

The California Office of Historic Preservation (OHP) suggests that all resources over 45 years old be recorded for inclusion in the OHP filing system (OHP 1995:2), although professional judgment is urged in determining whether a resource warrants documentation.

PROJECT SETTING

Study Area Location and Description

The study area is located in northern Contra Costa County, about one and a half miles east of central Antioch, as shown on the Antioch South, 7.5' USGS topographic map (Figure 2). The study area consists of approximately 22 acres. A seasonal stream that is currently channelized flows through the parcel.

The eastern portion of the study area comprises Pliocene deposits of the Tulare formation, which date to from 2.6 to 5.3 million years ago (Graymer *et al.* 1994). the western portion of the study area contains oils within the study area consist of Capay clay and Los Osos clay loam. (Welch 1977: Sheet 20). Capay clays are nearly level soils found in basins and on low benches, are moderate to well drained, and formed in alluvium from sedimentary rock (Welch 1977:15). Los Osos clay loam is well drained and underlain by shale and soft, fine-grained sand stone (Welch 1977: 32-33). Vegetation present on these soils consists of annual grasses, forbs, and scattered oaks (Welch 1977:15, 32-33). Historically, these soils were used for range, and occasionally for home sites.

The presence of moderately well drained soils and seasonal water suggests that the area would have been suitable for hunting or other seasonal, short duration activities.

Cultural Setting

Archaeological evidence indicates that human occupation of California began at least 10,000 years ago (Moratto 1984:71). Early occupants appear to have had an economy based largely on hunting, with limited exchange, and social structures based on the extended family unit. Later, milling technology and an inferred acorn economy were introduced. This diversification of economy appears along with the development of sedentism, and population growth and expansion. Sociopolitical complexity and status distinctions based on wealth are also observable in the archaeological record, as evidenced by an increased range and distribution of trade goods (e.g., shell beads, obsidian tool stone), which are possible indicators of both status and increasingly complex exchange systems.

At the time of European settlement, the study area was situated in an area controlled by the Bay Miwok (Kroeber 1925; Levy 1978). The Miwok were hunter-gatherers who lived in rich environments that allowed for dense populations with complex social structures (Kroeber 1925; Levy 1978). They settled in large, permanent villages about which were distributed seasonal camps and task-specific sites. Primary village sites were occupied throughout the year, and other sites were visited in order to procure particular resources that were abundant or available only during certain seasons. Sites often were situated near fresh water sources and in ecotones where plant and animal life were diverse and abundant.

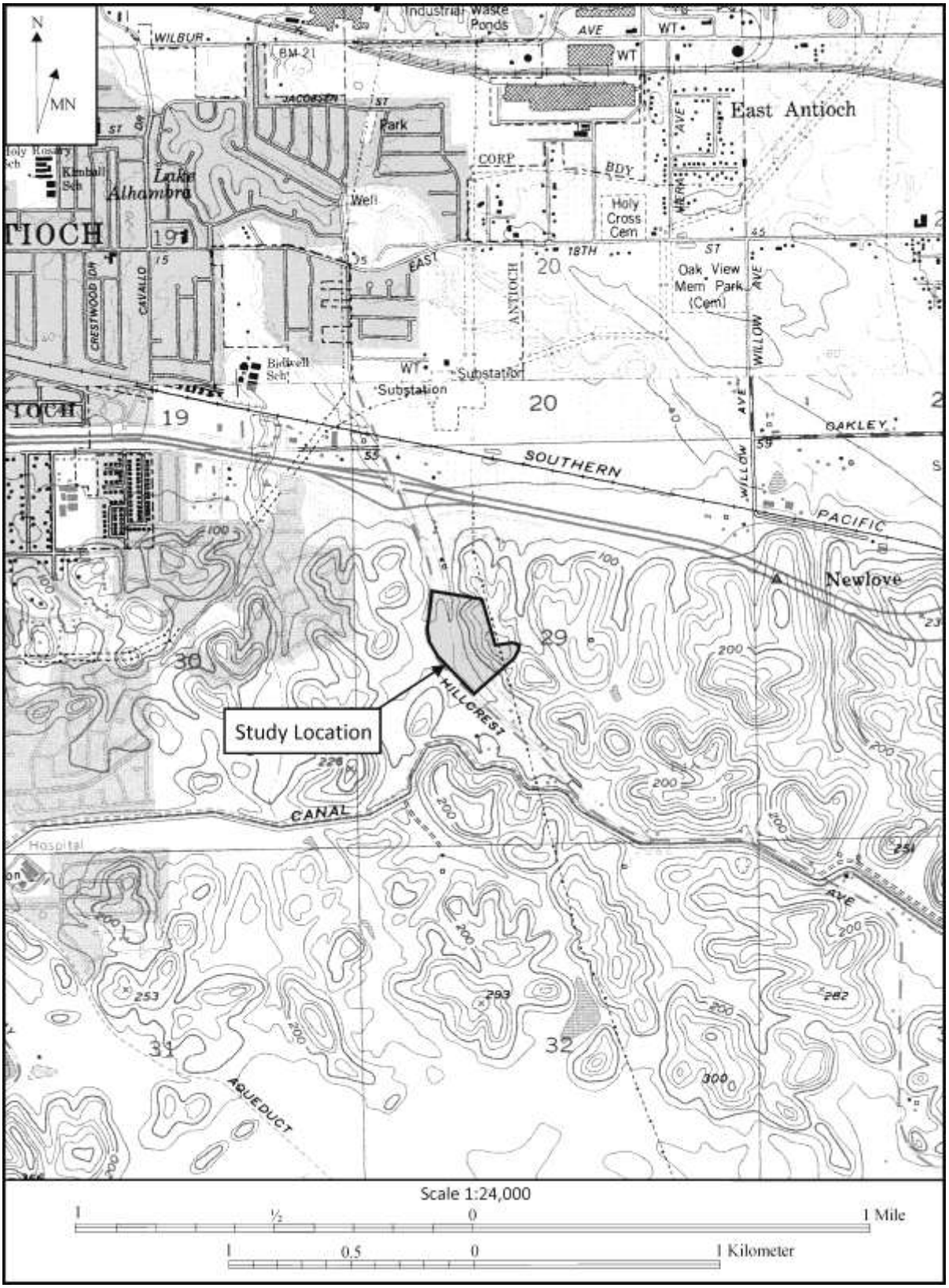

Figure 2. Study location (adapted from the USGS Anitoch South 7.5' topographic map).

STUDY PROCEDURES AND FINDINGS

Native American Contact

The State of California's Native American Heritage Commission, Katherine Erolinda Perez, the Ohlone Indian tribe, and the Trina Marine Ruano Family were contacted in writing. Andrew Galvan of the Ohlone Indian Tribe replied via email requesting a copy of the report.

A log of contact efforts and a copies of all correspondence are provided at the end of this report (Appendix A).

Archival Study Procedures

Archival research included examination of the library and project files at Tom Origer & Associates. A review (NWIC File No. 13-0699) was completed of the archaeological site base maps and records, survey reports, and other materials on file at the Northwest Information Center (NWIC), Sonoma State University, Rohnert Park. Sources of information included but were not limited to the current listings of properties on the National Register of Historic Places (National Register), California Historical Landmarks, California Register of Historical Resources (California Register), and California Points of Historical Interest as listed in the Office of Historic Preservation's *Historic Property Directory* (OHP 2012).

The Office of Historic Preservation has determined that structures older than 45 years should be considered potentially important historical resources, and former building and structure locations could be potentially important historic archaeological sites. Archival research included an examination of historical maps to gain insight into the nature and extent of historical development in the general vicinity, and especially within the study area. Maps ranged from hand-drawn maps of the 1800s (e.g., GLO plats) to topographic maps issued by the United States Geological Survey (USGS) and the Army Corps of Engineers (USACE) from the early to the middle 20th century.

In addition, ethnographic literature that describes appropriate Native American groups, county histories, and other primary and secondary sources were reviewed. Sources reviewed are listed in the "Materials Consulted" section of this report.

Archival Study Findings

Archival research found that the project area a small portion of the current study area had been previously surveyed for cultural resources(Losee 2006) . Seven historical period resources have been recorded within one-half mile of the study area. A high-voltage utility line (P-07-002951), passes over a portion of the study area. A remnant orchard to the southeast (P-07-3002), which extends onto the southern portion of the current study area was recorded by DeBaker and Cox (2009). The Contra Costa Canal (P-07-002882) is located approximately 1,000 feet south of the study area. A portion of the Southern Pacific Railroad (P-07-000813) is approximately 2,000 feet to the north. A PG&E substation (P-07-002950) is located just within the half-mile radius.

Nineteenth century and early 20th century maps show no buildings or structures within the study area. A house is depicted to the north of the current study area as early as 1922 (GLO 1885; USACE 1922; USGS 1898, 1953).

Field Survey Procedures

A field survey was completed by Janine Origer, and Julia Franco on August 20, 2013. The roughly 22-acre study area was examined intensively by walking transects spaced no more than 15 meters apart. Visibility was good in most of the study area. The eastern portion of the study area comprises a moderately steep slope. No outcrops of rock suggesting potential for petroglyphs or rock shelters are present. Hoes were used to clear small patches of vegetation, as needed, so that the ground could be inspected. The southern portion of the study area had remnants of an orchard, which is an extension of the orchard recorded by DeBaker and Cox (2009). Other subsurface soils were inspected where ground squirrels had deposited burrow spoils. Ground squirrel burrows and spoils were most common in the western and southern portions of the study area.

Based on the distribution of known cultural resources and their environmental settings, it was anticipated that historic archaeological sites could be found within the study area. Historic period site indicators generally include: fragments of glass, ceramic, and metal objects; milled and split lumber; and structure and feature remains such as building foundations and discrete trash deposits (e.g., wells, privy pits, dumps). Prehistoric archaeological site indicators expected to be found in the region include but are not limited to: obsidian and chert flakes and chipped stone tools; grinding and mashing implements such as slabs and handstones, and mortars and pestles; bedrock outcrops and boulders with mortar cups; and locally darkened midden soils containing some of the previously listed items plus fragments of bone, shellfish, and fire affected stones.

Field Survey Findings

No prehistoric or historical materials were found within the study area. Given the good ground visibility within the majority of the study area and the lack of cultural resource indicators found, it is unlikely that archaeological resources are present.

The remnant orchard does not appear likely to meet criteria for inclusion in the National Register of Historic Places, as it is no longer associated with any farm. The majority of the remaining trees are dead, though a handful still have leaves.

RECOMMENDATIONS

Known Resources

No historic properties were identified within the study area, and no resource specific recommendations are warranted.

Accidental Discovery

While there are Holocene soils in the western portion of the study area, which could contain buried deposits, the channel cutting through the property provided excellent view of buried soils to approximately three feet below the surface. Therefore it is considered unlikely that buried archaeological deposits will be discovered.

However, all soil disturbing work should be halted at the location of any discovery until a qualified archaeologist completes a significance evaluation of any find(s) pursuant to Section 106 of the National Historic Preservation Act (36CFR60.4). We recommend that a qualified archaeologist be consulted in the event that possible archaeological site indicators are found. Prehistoric archaeological site indicators expected within the general area include: chipped chert and obsidian tools and tool manufacture waste flakes; grinding and hammering implements; and for some sites, locally darkened soil that generally contains abundant archaeological specimens. Historic remains expected in the general area commonly include items of ceramic, glass, and metal. Features that might be present include structure remains (e.g., cabins or their foundations) and pits containing historic artifacts.

The following actions are promulgated in Public Resources Code 5097.98 and Health and Human Safety Code 7050.5, and pertain to the discovery of human remains. If human remains are encountered, excavation or disturbance of the location must be halted in the vicinity of the find, and the county coroner contacted. If the coroner determines the remains are Native American, the coroner will contact the Native American Heritage Commission. The Native American Heritage Commission will identify the person or persons believed to be most likely descended from the deceased Native American. The most likely descendent makes recommendations regarding the treatment of the remains with appropriate dignity.

SUMMARY

Tom Origer & Associates conducted a cultural resources survey for the proposed development at Hillcrest Avenue and Wildflower Drive in Antioch. The study was designed to satisfy requirements of Section 106 of the National Historic Preservation Act and of the California Environmental Quality Act. No prehistoric or historical resources were found within the study area and no resource-specific recommendations were warranted.

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2011 *Letter Report Regarding the Contra-Costa Substation Expansion*. Document S-38872 on file at the Northwest Information Center, Sonoma State University, Rohnert Park.

Wohlgemuth, E.
2005 *Archaeological Reconnaissance of the Pacific Gas and Electric Company 230 kV Delta Transmission Line Reconductoring Project, Solano, Sacramento, and Contra Costa counties, California.* Document S-34412 on file at the Northwest Information Center, Sonoma State University, Rohnert Park.

APPENDIX A: Native American Contact

Contact Log
Correspondence and Maps

Native American Contact Efforts
Hillcrest at Wildflower Development Project
Antioch, Contra Costa County, California

Organization/Contact Person	Letters	Results
Native American Heritage Commission	08/11/14	A letter was received from the NAHC on August 19th indicating that they had no record of sacred lands within the APE. The NAHC also provided a list of individuals that it would be appropriate to contact.
Ohlone Indian Tribe Andrew Galvan	08/11/14	No response has been received as of the date of this report.
Katherine Erolinda Perez	08/11/14	No response has been received as of the date of this report.
Trina Marine Ruano Family Ramona Garibay	08/11/14	No response has been received as of the date of this report.

Sacred Lands File & Native American Contacts List Request

NATIVE AMERICAN HERITAGE COMMISSION
915 Capitol Mall, RM 364
Sacramento, CA 95814
(916) 373-3710
(916) 373-5471 – Fax
nahc@pacbell.net

Information Below is Required for a Sacred Lands File Search

Project: Hillcrest and Wildflower in Antioch
County: Contra Costa

USGS Quadrangle

Name: Antioch South
Township T2N Range R2E Section(s) 29 MDBM

Date: August 11, 2014
Company/Firm/Agency: Tom Origer & Associates
Contact Person: Dawna Meeks

Street Address: PO Box 1531
City: Rohnert Park Zip: 94927
Phone: (707) 584-8200 Fax: (707) 584-8300
Email: origer@origer.com

Project Description:
The project proponent is proposing to subdivide a 22 acre parcel at the intersection of Hillcrest and Wildflower in Antioch, California.

STATE OF CALIFORNIA Edmund G. Brown, Jr., Governor

NATIVE AMERICAN HERITAGE COMMISSION
1550 Harbor Blvd.
West Sacramento, CA 95691
(916) 373-3710
Fax (916) 373-5471

August 18, 2014

Dawna Meeks
Tom Origer & Associates
PO Box 1531
Rohnert Park, CA 94927

By Fax: 707-584-8300
2 Pages

RE: Hillcrest and Wildflower project, Contra Costa County
Ms. Meeks,

A record search of the sacred land file has failed to indicate the presence of Native American cultural resources in the immediate project area. The absence of specific site information in the sacred lands file does not indicate the absence of cultural resources in any project area. Other sources of cultural resources should also be contacted for information regarding known and recorded sites.

Enclosed is a list of Native Americans individuals/organizations who may have knowledge of cultural resources in the project area. The Commission makes no recommendation or preference of a single individual, or group over another. This list should provide a starting place in locating areas of potential adverse impact within the proposed project area. I suggest you contact all of those indicated, if they cannot supply information, they might recommend others with specific knowledge. By contacting all those listed, your organization will be better able to respond to claims of failure to consult with the appropriate tribe or group. If a response has not been received within two weeks of notification, the Commission requests that you follow-up with a telephone call to ensure that the project information has been received.

If you receive notification of change of addresses and phone numbers from any of these individuals or groups, please notify me. With your assistance we are able to assure that our lists contain current information. If you have any questions or need additional information, please contact me at (916) 373-3713.

Sincerely,

Debbie Pilas-Treadway
Environmental Specialist III

Native American Contacts
Contra Costa County
August 15, 2014

Katherine Erolinda Perez
P.O. Box 717
Linden , CA 95236
canutes@verizon.net
(209) 887-3415

Ohlone/Costanoan
Northern Valley Yokuts
Bay Miwok

The Ohlone Indian Tribe
Andrew Galvan
P.O. Box 3152
Fremont , CA 94539
chochenyo@AOL.com
(510) 882-0527 Cell
(510) 687-9393 Fax

Ohlone/Costanoan
Bay Miwok
Plains Miwok
Patwin

Trina Marine Ruano Family
Ramona Garibay, Representative
30940 Watkins Street
Union City , CA 94587
soaprootmo@comcast.net
(510) 972-0645

Ohlone/Costanoan
Bay Miwok
Plains Miwok
Patwin

This list is current only as of the date of this document.

Distribution of this list does not relieve any person of statutory responsibility as defined in Section 7050.5 of the Health and Safety Code, Section 5097.94 of the Public Resource Section 5097.98 of the Public Resources Code

This list is only applicable for contacting local Native Americans with regard to cultural resources for the proposed Hillcrest and Wildflower project, Contra Costa County

Tom Origer & Associates
Archaeology / Historical Research

August 11, 2014

Andrew Galvan
The Ohlone Indian Tribe
PO Box 3152
Fremont, CA 94539

RE: Hillcrest and Wildflower development project, Antioch, Contra Costa County

Dear Mr. Galvan:

I write to notify you of a proposed project within Contra Costa County, for which our firm is conducting a cultural resources study. The Hillcrest and Wildflower Project proponent is proposing to subdivide and develop a 22 acre parcel at the intersection of Hillcrest and Wildflower in Antioch, California. The Army Corp of Engineers will be reviewing the project for Section 106 compliance.

Enclosed is a portion of the Antioch North and Antioch South, Calif. 7.5' USGS topographic quadrangles showing the project location.

Sincerely,

Dawna Meeks

Dawna Meeks,
Associate

P.O. Box 1531, Rohnert Park, California 94927 ♦ www.origer.com Phone (707) 584-8200

Tom Origer & Associates
Archaeology / Historical Research

August 11, 2014

Ramona Garibay
Trina Marine Ruano Family
30940 Watkins St
Union City, CA 94587

RE: Hillcrest and Wildflower development project, Antioch, Contra Costa County

Dear Ms. Garibay:

I write to notify you of a proposed project within Contra Costa County, for which our firm is conducting a cultural resources study. The Hillcrest and Wildflower Project proponent is proposing to subdivide and develop a 22 acre parcel at the intersection of Hillcrest and Wildflower in Antioch, California. The Army Corp of Engineers will be reviewing the project for Section 106 compliance.

Enclosed is a portion of the Antioch North and Antioch South, Calif. 7.5' USGS topographic quadrangles showing the project location.

Sincerely,

Dawna Meeks

Dawna Meeks,
Associate

P.O. Box 1531, Rohnert Park, California 94927 ♦ www.origer.com Phone (707) 584-8200

Tom Origer & Associates
Archaeology / Historical Research

August 11, 2014

Katherine Erolinda Perez
PO Box 717
Linden, CA 95236

RE: Hillcrest and Wildflower development project, Antioch, Contra Costa County

Dear Ms. Erolinda Perez:

I write to notify you of a proposed project within Contra Costa County, for which our firm is conducting a cultural resources study. The Hillcrest and Wildflower Project proponent is proposing to subdivide and develop a 22 acre parcel at the intersection of Hillcrest and Wildflower in Antioch, California. The Army Corp of Engineers will be reviewing the project for Section 106 compliance.

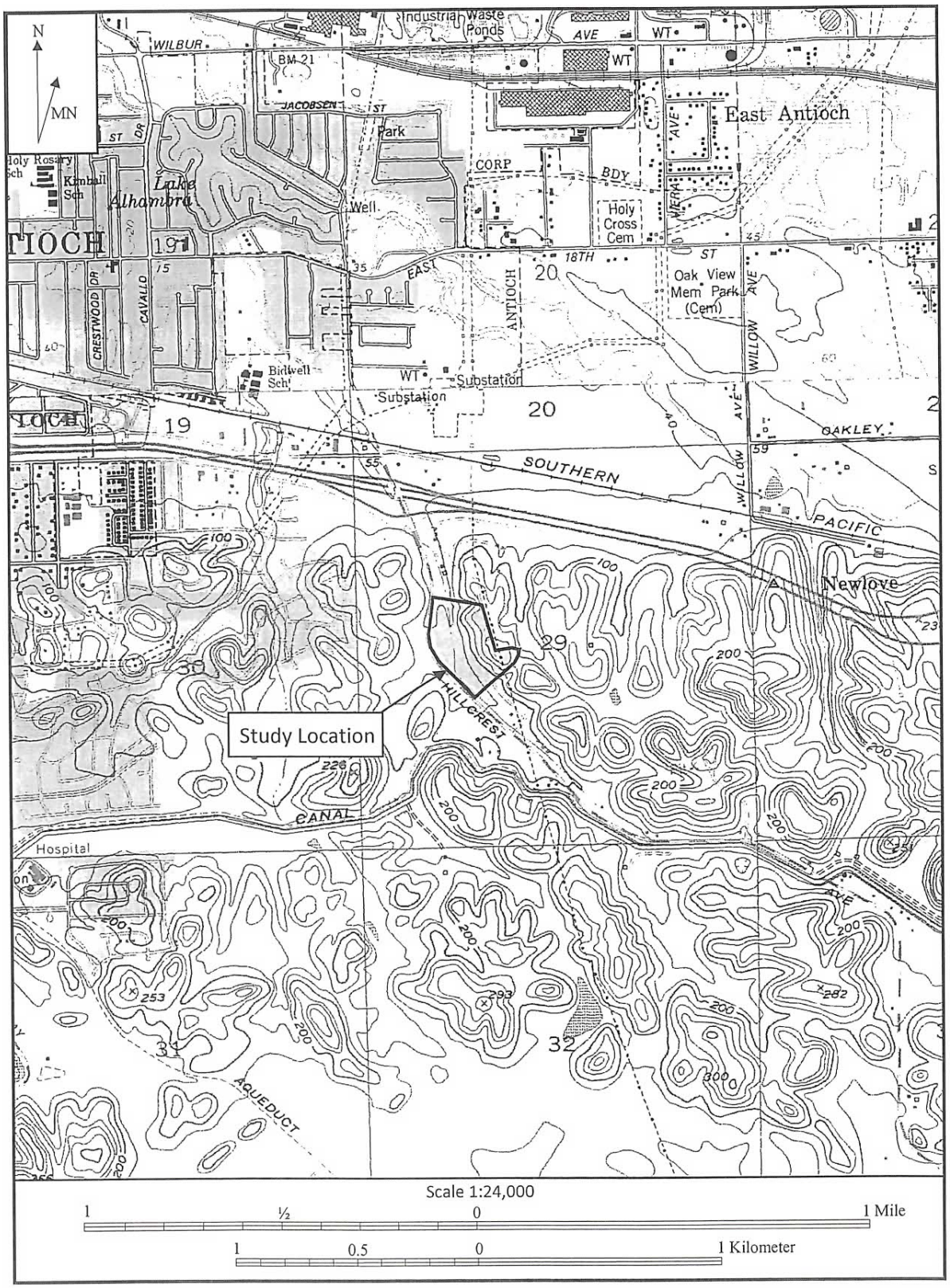
Enclosed is a portion of the Antioch North and Antioch South, Calif. 7.5' USGS topographic quadrangles showing the project location.

Sincerely,

Dawna Meeks

Dawna Meeks,
Associate

P.O. Box 1531, Rohnert Park, California 94927 ♦ www.origer.com Phone (707) 584-8200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Lake Alhambra
CORP
BDY
Well
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Oak View Mem Park (Cem)
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Sent To
Amah Mutsun Tribal Band of Mission San Jaun Bautista
Attn: Irenne Zwierlein
789 Canada Road
Woodside, CA 94062

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A 95670-9998

Sent To
Ione Band of Miwok Indians
Attn: Randy Yonemura
P.O. Box 699
9252 Bush Street, Suite 2
Plymouth, CA 95669

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Sent To
The Ohlone Indian Tribe
Attn: Andrew Galvan
P.O. Box 3152
Freemont, CA 94539

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CA 95670-9998

Sent To
Indain Canyon Mutsun Band of Costanoan
Attn: Ann Marie Sayers
P.O. Box 28
Hollister, CA 95024

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Sent To
Wilton Rancheria
Attn: Raymond Hitchcock
9728 Kent Street
Elk Grove, CA 94539

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Sent To Torres Martinez Desert Cahuilla Indians
Attn: Michael Mirelez
Street, Apt. or PO Box P.O. Box 1160
City, State Thermal, CA 92274

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Sent Muwekma Ohlone Indian Tribe of the SF Bay Area
Attn: Rosemary Cambra
Street, Apt. or PO Box P.O. Box 360791
City, State Milpitas, CA 95036

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Rancho Cordova, CA 95670

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Ione Band of Miwok Indians
Attn: Randy Yonemura
P.O. Box 699
9252 Bush Street, Suite 2
Plymouth, CA 95669

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X Heather Baugh

☒ Agent
☐ Addressee

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1. Article Addressed to:

Wilton Rancheria
Attn: Raymond Hitchcock
9728 Kent Street
Elk Grove, CA 94539

9590 9401 0157 5234 2343 57

2. Article Number *(Transfer from service label)*

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A. Signature

X Bob Terry

☐ Agent
☐ Addressee

B. Received by *(Printed Name)*

C. Date of Delivery

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1. Article Addressed to:

Muwekma Ohlone Indian Tribe of the SF Bay Area
Attn: Rosemary Cambra
P.O. Box 360791
Milpitas, CA 95036

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2. Article Number *(Transfer from service label)*

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A. Signature

X Noemi Sanchez ☐ Agent ☐ Addressee

B. Received by *(Printed Name)* Noemi Sanchez

C. Date of Delivery 4/28/16

D. Is delivery address different from item 1? ☐ Yes
If YES, enter delivery address below: ☐ No

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BY: _____

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1. Article Addressed to:

Indain Canyon Mutsun Band of Costanoan
Attn: Ann Marie Sayers
P.O. Box 28
Hollister, CA 95024

9590 9402 1681 6053 1524 79

2. Article Number *(Transfer from service label)*

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☐ Addressee

B. Received by *(Printed Name)* Kanyon Sayers Roods

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NOV 30 2016

BY:_____

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1. Article Addressed to:

The Ohlone Indian Tribe
Attn: Andrew Galvan
P.O. Box 3152
Freemont, CA 94539

9590 9401 0157 5234 2343 64

2. Article Number *(Transfer from service label)*

7008 1140 0004 5832 9741

COMPLETE THIS SECTION ON DELIVERY

A. Signature

X

☐ Agent
☒ Addressee

B. Received by *(Printed Name)*

GALVAN

C. Date of Delivery

23 XI 2016

D. Is delivery address different from item 1? ☐ Yes
If YES, enter delivery address below: ☐ No

3. Service Type

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☐ Certified Mail Restricted Delivery
☐ Collect on Delivery
☐ Collect on Delivery Restricted Delivery
☐ Insured Mail
☐ Insured Mail Restricted Delivery
(over $500)
☐ Priority Mail Express®
☐ Registered Mail™
☐ Registered Mail Restricted Delivery
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Michael Baker
INTERNATIONAL

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Rancho Cordova, CA 95670

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BY:_____

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1. Article Addressed to:

Torres Martinez Desert Cahuilla Indians
Attn: Michael Mirelez
P.O. Box 1160
Thermal, CA 92274

9590 9401 0157 5234 2343 88

2. Article Number *(Transfer from service label)*

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A. Signature

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☐ Agent
☐ Addressee

B. Received by *(Printed Name)* T Sowa

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Postal Service

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Michael Baker
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2729 Prospect Park Drive, Suite 220
Rancho Cordova, CA 95670

RECEIVED
NOV 23 2016
BY:

Wilton Rancheria

9728 Kent Street, Elk Grove, CA 95624

November 22, 2016

To: City of Antioch

RE: Tribal Cultural Resources under the California Environmental Quality Act, AB52 (Gatto, 2014). Tribal Consultation for Consultation for the Wildflower Station Project, City of Antioch, California

Dear: Paul Junker,

This letter constitutes a formal request for tribal consultation under the provisions of the California Environmental Quality Act (CEQA) (Public Resources Code section 21080.3.1 subdivisions (b), (d) and (e)) for the mitigation of potential project impacts to tribal cultural resource for the above referenced project. Wilton Rancheria (Tribe) requested formal notice and information for all projects within your agency's geographical jurisdiction on July, 1, 2015 and received notification on November 16, 2016 regarding the above referenced project.

The Tribe requests consultation on the following topics checked below, which shall be included in consultation if requested (Public Resources Code section 21080.3.2, subd. (a):

✓ Alternatives to the project
✓ Define the Applicant (Lead Agency)
✓ Project funding
✓ Recommended mitigation measures
✓ Significant effects of the project
✓ Native American Inspector present during ground disturbance

The Tribe also requests consultation on the following discretionary topics checked below (Public Resources Code section 21080.3.2, subd. (a):

✓ Type of environmental review necessary
✓ Significance of tribal cultural resources, including any regulations, policies or standards used by your agency to determine significance of tribal cultural resources
✓ Significance of the project's impacts on tribal cultural resources
✓ Project alternatives and/or appropriate measures for preservation or mitigation that we may recommend, including, but not limited to:

(1) Avoidance and preservation of the resources in place, pursuant to Public Resources Code section 21084.3, including, but not limited to, planning and construction to avoid the resources and protect the cultural and natural context, or planning greenspace, parks or other open space, to incorporate the resources with culturally appropriate protection and management criteria;

(2) Treating the resources with culturally appropriate dignity taking into account the tribal cultural values and meaning of the resources, including but not limited to the following:

a. Protecting the cultural character and integrity of the resource;
b. Protection the traditional use of the resource; and
c. Protecting the confidentiality of the resource.

(3) Permanent conservation easements or other interests in real property, with culturally appropriate management criteria for the purposes of preserving or utilizing the resources or places.

(4) Protecting the resource.

Additionally, the Tribe would like to receive any cultural resources assessments or other assessments that have been completed on all or part of the project's area of potential effect (APE), and area surrounding the APE including, but not limited to:

1. The results of any record search that may have been conducted at an Information Center of the California Historical Resources Information System (CHRIS), including, but not limited to:
   - A listing of any and all known cultural resources have already been recorded on or adjacent to the APE;
   - Copies of any and all cultural resource records and study reports that may have been provided by the Information Center as part of the records search response;
   - If the probability is low, moderate, or high that cultural resources are located in the APE or surrounding the APE.
   - Whether the records search indicates a low, moderate or high probability that unrecorded cultural resources are located in the potential APE or surrounding the APE; and
   - If a survey is recommended by the Information Center to determine whether previously unrecorded cultural resources are present.
     - The Tribe requests to be present at any survey conducted on the Applicants behalf.
2. The results of any archaeological inventory survey that was conducted, including:
   - Any reports that may contain site forms, site significance, and suggested mitigation measures.
   - Any reports or inventories found under the Native American Graves Protection and Repatriation Act.
     - All information regarding site locations, Native American human remains, and associated funerary objects should be in a separate confidential addendum, and not be made available for public disclosure in accordance with Government Code Section 6254.10. All Wilton Rancheria correspondences shall be kept under this confidential section and only shared between the Tribe and lead agency.
3. The results of any Sacred Lands File (SFL) check conducted through Native American Heritage Commission. The request form can be found at http://www.nahc.ca.gov/slf_request.html. USGS 7.5-minute quadrangle name, township, range, and section required for the search.

4. Any ethnographic studies conducted for any area including all or part of the potential APE or areas surrounding the APE; and
5. Any geotechnical reports regarding all or part of the potential APE or areas surrounding the APE.
    - The Tribe shall be notified before any geotechnical testing is planned. Geotechnical testing has potential to impact Tribal Cultural Resources and should be part of this consultation.

The information gathered will provide us with a better understanding of the project and will allow the Tribe to compare your records with our database.

We would like to remind your agency that CEQA Guidelines section 15126.4, subdivision (b)(3) states that preservation in place is the preferred manner of mitigating impacts to archaeological sites. Section 15126.4, subd. (b)(3) of the CEQA Guidelines has been interpreted by the California Court of Appeal to mean that "feasible preservation in place must be adopted to mitigate impacts to historical resources of an archaeological nature unless the lead agency determines that another form of mitigation is available and provides superior mitigation of impacts." *Madera Oversight Coalition v. County of Madera* (2011) 199 Cal.App.4th 48, disapproved on other grounds, *Neighbors for Smart Rail v. Exposition Metro Line Construction Authority* (2013) 57 Cal.4th 439.

Please contact Ed Silva, Tribal Resources Coordinator via email at esilva@wiltonrancheria-nsn.gov to set up a meeting.

Sincerely,

Antonio Ruiz, Jr.
Cultural Resources Officer
Wilton Rancheria

Nayyar, Margo

From: Michael Mirelez <mmirelez@tmdci.org>
Sent: Thursday, December 15, 2016 10:49 AM
To: JordanDavis, Nichole
Cc: Junker, Paul; Jason Costner; James Cisneros
Subject: RE: AB 52 request for notification, City of Antioch

Mr. Davis –

The Torres – Martinez Desert Cahuilla appreciates your response to our AB52 notification request. And in light of said information concerning your agencies location, the Tribe wishes to defer all future project notifications to Tribes that are closer to your area.

Respectfully,
Michael Mirelez
Cultural Resource Coordinator
Torres-Martinez DCI
Office: 760-397-0300 Ext:1213
Cell: 760-399-0022
Email:mmirelez@tmdci.org

From: JordanDavis, Nichole [mailto:Nichole.JordanDavis@mbakerintl.com]
Sent: Thursday, December 15, 2016 9:46 AM
To: Michael Mirelez
Cc: Junker, Paul
Subject: AB 52 request for notification, City of Antioch

Good Morning Mr. Mirelez,

Per our conversation, the Torres Martinez Desert Cahuilla Indians does not wish to be notified for AB 52 consultation on any projects with the City of Antioch.

Please reply to this email, confirming that you concur. Thank you for your time.

Nichole Jordan Davis | Senior Cultural Resources Manager | Michael Baker International
2729 Prospect Park Drive, Suite 220 | Rancho Cordova, CA 95670 | 916-231-2254
nichole.jordandavis@mbakerintl.com | www.mbakerintl.com

The information transmitted is intended only for the person or entity to which it is addressed and may contain confidential and/or privileged material. If the reader of

this message is not the intended recipient, you are hereby notified that you have received this message in error and that any review, dissemination, distribution or copying of this message including any attachments is strictly prohibited. If you received this in error, please contact the sender and delete the material.

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December 20, 2016

Antonio Ruiz, Jr.
Wilton Rancheria
Department of Environmental Resources
9728 Kent Street Elk Grove, CA 95624
Tel: 916.683.6000 Ext. 2005
Fax: 916.683.6015

Re: RE: TRIBAL CULTURAL RESOURCES UNDER THE CALIFORNIA ENVIRONMENTAL QUALITY ACT, AB52 (GATTO, 2014). TRIBAL CONSULTATION FOR CONSULTATION FOR THE WILDFLOWER STATION PROJECT, CITY OF ANTIOCH, CALIFORNIA.

Dear Mr. Ruiz:

Thank you for your request for AB 52 consultation dated November 22, 2016. In your letter, you list several questions and request a Native American Inspector be present for construction related ground disturbance within the Project Area and a site visit.

See below where we address the questions you presented in your November 22, 2016, letter.

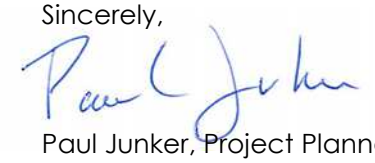
- Alternatives to the project – project design/alternatives are in progress.
- Define the Applicant (Lead Agency) – Applicant is DeNova Homes and the Lead Agency is the City of Antioch.
- Project funding – Private.
- Recommended mitigation measures – in progress.
- Significant effects of the project – in progress. Will be presented in the environmental document for the project which is expected to circulate in January 2017.
- Native American Inspector present during ground disturbance – what warrants a Native American Inspector during ground disturbance?
- Type of environmental review necessary – At present, an Initial Study/Mitigated Negative Declaration is being prepared for the project.

We would like to meet with you in the field to discuss the project's potential to impact Tribal Cultural Resources (TCR) and are requesting Wilton Rancheria identify any TCRs within the Project Area at the earliest convenience.

We are requesting any information that you may have regarding tribal cultural resources (as defined by Public Resources Code 21074) within the project area so that this information can be incorporated into project planning. The City, as the lead agency, pursuant to AB 52, is requesting input from you within 30 days of the date of this letter.

Your comments and concerns are important to us and we look forward to hearing from you. If you have any questions or comments regarding the project, I can be contacted via email at pjunker@mbakerintl.com or by phone at (916) 838-8384.

Sincerely,



Paul Junker, Project Planner
Community Development Department

7008 1140 0004 5832 9581

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DEC 20 2016

Sent To
Antonio Ruiz, Jr.
Wilton Rancheria
Department of Environmental Resources
9728 Kent Street
Elk Grove, CA 95624

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- Print your name and address on the reverse so that we can return the card to you.
- Attach this card to the back of the mailpiece, or on the front if space permits.

1. Article Addressed to:

Antonio Ruiz, Jr.
Wilton Rancheria
Department of Environmental Resources
9728 Kent Street
Elk Grove, CA 95624

9590 9402 1681 6053 1523 49

2. Article Number *(Transfer from service label)*

7008 1140 0004 5832 958

PS Form 3811, July 2015 PSN 7530-02-000-9053

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C. Date of Delivery

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Michael Baker International, Inc.
2729 Prospect Park Drive, Suite 220
Rancho Cordova, CA 95670

Nichole Jordan Davis
156776, 1.1.1 Tech Studies

Nayyar, Margo

From: Nayyar, Margo
Sent: Wednesday, December 21, 2016 8:48 AM
To: amahmutsuntribal@gmail.com
Subject: Assembly Bill 52 consultation for the Wildflower Station Project
Attachments: 11-16-16_Amah Mutsun AB52_Wildflower.pdf

Hello Ms. Zwierlein,

Attached is an invitation to begin Assembly Bill 52 (AB52) consultation for the Wildflower Station project in the City of Antioch. The Amah Mutsun Tribal Band of Mission San Juan Bautista has not requested Assembly Bill 52 (Gatto 2014) Public Resources Code: 21073, 21074, 21080.3.1, 21080.3.2, 21082.3, 21083.09, 21084.2, and 5097.94 notification of projects in the City of Antioch (City); however, the City is notifying you of this project and is inquiring as to whether you would like to initiate AB 52 consultation for the project.

The original consultation request was sent via certified mail on November 16, 2016 and was returned as unclaimed. Attached is the original consultation request letter with attachments. Please let us know if you'd like to initiate AB52 consultation for this project.

Thank you,

Margo Nayyar | Michael Baker International
2729 Prospect Park Drive, Suite 200 | Rancho Cordova, CA 95670 | [O] 916-231-2236
margo.nayyar@mbakerintl.com | www.mbakerintl.com

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Wildflower Station SB18 Consultation Log					
Date NAHC Request Sent	**NAHC Response Date**	**Tribe Name and Contact Information**	**Date Sent**	**Date Tribe Receives**	**Tribe response (within 90 days)**
11/16/2016	11/21/2016	Amah Mutsun Tribal Band of Mission San Juan Bautista Irenne Zwierlein, Chairperson 789 Canada Road Woodside , CA 94062 amahmutsuntribal@gmail.com (650) 400-4806 Cell	11/23/2016	N/A	11-23-2016 - The City sent a consultation request letter via certified mail. 12-20-2016 - The original consultation letter was unclaimed and returned indicating the letter could not be forwarded. 1-3-2017 - Margo Nayyar, Michael Baker International cultural resources manager, emailed the original consultation letter to Ms. Zwierlein asking if she would like to initiate consultation. No response to the consultation request was recieved by 2-23-2017.
		Indian Canyon Mutsun Band of Costanoan Ann Marie Sayers, Chairperson P.O. Box 28 Hollister , CA 95024 ams@indiancanyon.org (831) 637-4238	11/23/2016	11/28/2016	11-23-2016 - The City sent a consultation request letter via certified mail. 11-28-2016 - The tribe recieved the letter. No response to the consultation request was recieved by 2-28-2017.
		Wilton Rancheria Raymond Hitchcock, Chairperson 9728 Kent Street Elk Grove , CA 95624 rhitchcock@wiltonrancheria-nsn.gov (916) 683-6000 Office	11/23/2016	11/25/2016	11-23-2016 - The City sent a consultation request letter via certified mail. 11-25-2016 - The tribe recieved the letter. No response to the consultation request was recieved by 2-25-2017.
		Muwekma Ohlone Indian Tribe of the SF Bay Area Rosemary Cambra, Chairperson P.O. Box 360791 Milpitas , CA 95036 muwekma@muwekma.org (408) 314-1898 (510) 581-5194	11/23/2016	11/28/2016	11-23-2016 - The City sent a consultation request letter via certified mail. 11-28-2016 - The tribe recieved the letter. No response to the consultation request was recieved by 2-28-2017.
		North Valley Yokuts Tribe Katherine Erolinda Perez, Chairperson P.O. Box 717 Linden , CA 95236 canutes@verizon.net (209) 887-3415	11/23/2016	11/26/2016	11-23-2016 - The City sent a consultation request letter via certified mail. 11-26-2016 - The tribe recieved the letter. No response to the consultation request was recieved by 2-26-2017.
		The Ohlone Indian Tribe Andrew Galvan P.O. Box 3152 Fremont , CA 94539 chochenyo@AOL.com {510) 882-0527 Cell	11/23/2016	Unknown.	11-23-2016 - The City sent a consultation request letter via certified mail. No response to the consultation request was recieved by 2-23-2017.

STATE OF CALIFORNIA Edmund G. Brown, Jr., Governor

NATIVE AMERICAN HERITAGE COMMISSION
1550 Harbor Blvd., Suite 100
West Sacramento, CA 95691
(916) 373-3710
(916) 373-5471 - Fax

November 16, 2016

Margo Nayyar
On behalf of City of Antioch

Sent by Email: margo.nayyar@mbakerintl.com
Number of Pages: 2

RE: Wildflower Station, Antioch, Contra Costa County

Dear Ms. Nayyar:

Government Code §65352.3 requires local governments to consult with California Native American tribes identified by the Native American Heritage Commission (NAHC) for the purpose of protecting, and/or mitigating impacts to cultural places in creating or amending general plans, including specific plans. Attached is a consultation list of tribes traditionally and culturally affiliated with the location referenced above.

As a part of consultation, the NAHC recommends that local governments conduct record searches through the NAHC and the appropriate archaeological Information Center of the California Historic Resources Information System (CHRIS) (http://ohp.parks.ca.gov/?page_id=1068) to determine if any tribal cultural resources are located within the area(s) affected by the proposed action. A record search of the NAHC Sacred Lands File was completed for the area of potential project effect (APE) referenced above with negative results. **Please note that the absence of specific site information in the Sacred Lands File does not indicate the absence of tribal cultural resources in any APE.** Records maintained by the NAHC and CHRIS is not exhaustive, and a negative response to these searches does not preclude the existence of tribal cultural resources. A tribe may be the only source of information regarding the existence of tribal cultural resources within any APE.

The list should provide a starting place to locate areas of potential adverse impact within the APE. I suggest you contact all of those listed, if they cannot supply information, they might recommend others with specific knowledge. By contacting all those on the list, your organization will be better able to respond to claims of failure to consult. If a response has not been received within two weeks of notification, the NAHC requests that you follow-up with a telephone call to ensure that the project information has been received.

If you receive notification of change of addresses and phone numbers from tribes on the attached list, please notify me. With your assistance we are able to assure that our consultation list contains current information.

If you have any questions, please contact me at my email address: sharay.souza@nahc.ca.gov.

Sincerely,

Sharaya Souza
Staff Services Analyst

Native American Heritage Commission
Tribal Consultation List
November 21, 2016

Amah MutsunTribal Band of Mission San Juan Bautista
Irenne Zwierlein, Chairperson
789 Canada Road
Woodside , CA 94062
amahmutsuntribal@gmail.com
(650) 400-4806 Cell

Ohlone/Costanoan

Indian Canyon Mutsun Band of Costanoan
Ann Marie Sayers, Chairperson
P.O. Box 28
Hollister , CA 95024
ams@indiancanyon.org
(831) 637-4238

Ohlone/Costanoan

Muwekma Ohlone Indian Tribe of the SF Bay Area
Rosemary Cambra, Chairperson
P.O. Box 360791
Milpitas , CA 95036
muwekma@muwekma.org
(408) 314-1898
(510) 581-5194

Ohlone / Costanoan

North Valley Yokuts Tribe
Katherine Erolinda Perez, Chairperson
P.O. Box 717
Linden , CA 95236
canutes@verizon.net
(209) 887-3415

Ohlone/Costanoan
Northern Valley Yokuts
Bay Miwok

The Ohlone Indian Tribe
Andrew Galvan
P.O. Box 3152
Fremont , CA 94539
chochenyo@AOL.com
(510) 882-0527 Cell

Ohlone/Costanoan
Bay Miwok
Plains Miwok
Patwin

Wilton Rancheria
Raymond Hitchcock, Chairperson
9728 Kent Street
Elk Grove , CA 95624
rhitchcock@wiltonrancheria-nsn.gov
(916) 683-6000 Office

Miwok

This list is current only as of the date of this document and is based on the information available to the Commission on the date it was produced.

Distribution of this list does not relieve any person of statutory responsibility as defined in Section 7050.5 of the Health and safety Code, Section 5097.94 of the Public Resources Code and Section 5097.98 of the Public Resources Code.

This list is applicable only for consultation with Native American tribes under Government Code Sections 65352.3 and 65362.4 et seq for the proposed **Wildflower Station, Antioch, Contra Costa County.**

November 23, 2016

Irenne Zwierlein, Chairperson
AMAH MUTSUN TRIBAL BAND OF MISSION SAN JUAN BAUTISTA
789 Canada Road
Woodside, CA 94062

Re: Invitation to Begin Senate Bill 18 Consultation for the Wildflower Station Project, City of Antioch, California

Dear Ms. Zwierlein:

The City of Antioch (City) is proposing the Wildflower Station Project (project), a retail and commercial development which requires a General Plan amendment. As part of processing requirements for this General Plan amendment, the City is sending you this consultation notification in compliance with Senate Bill 18. The purpose of this consultation notification is to obtain any questions, comments, or concerns you may have pertaining to the proposed project. The City values your input regarding the proposed project and encourages you to submit comments. As defined in Senate Bill 18, this notification begins the 90-day comment period.

The project proposes to subdivide and develop a 22.7 acre site for retail and single- and multi-family residential uses. The site will be subdivided into three parcels to accommodate retail development along Hillcrest Avenue, high-density multi-family residential adjacent to and shared access with the retail development, and detached single-family homes at the upper portion of the site. The proposed development will include six bio-retention basins extending north and south along the slope. The large-scale mixed-use development would consist of 10.45 acres of commercial use, 7.0 acres of condominiums, 4.05 acres of single family housing, and 1.08 acres dedicated to right-of-way (ROW) on Hillcrest Avenue.

In compliance with consultation requirements pursuant to Senate Bill 18 the City requested a Native American Heritage Council Sacred Lands File Search. The Sacred Lands File search did not indicate the presence of Native American traditional cultural places or cultural landscapes within the project area. Furthermore, a cultural resources technical study was completed for the project area in 2014 (Attachment 2). No cultural resources were identified within the project area.

Your comments and concerns are important to us and we look forward to hearing from you. If you have any questions or comments regarding the project, I can be contacted via email at pjunker@mbakerintl.com or by phone at (916) 838-8384.

Sincerely,

Paul Junker, Project Planner
Community Development Department

Attachments:
Attachment 1 - Figures
Figure 1 - Project Location and Vicinity
Figure 2 - Project Area

Attachment 2 – Cultural Resources Study

November 23, 2016

Ann Marie Sayers, Chairperson
INDIAN CANYON MUTSUN BAND OF COSTANOAN
P.O. Box 28
Hollister, CA 95024

Re: Invitation to Begin Senate Bill 18 Consultation for the Wildflower Station Project, City of Antioch, California

Dear Ms. Sayers:

The City of Antioch (City) is proposing the Wildflower Station Project (project), a retail and commercial development which requires a General Plan amendment. As part of processing requirements for this General Plan amendment, the City is sending you this consultation notification in compliance with Senate Bill 18. The purpose of this consultation notification is to obtain any questions, comments, or concerns you may have pertaining to the proposed project. The City values your input regarding the proposed project and encourages you to submit comments. As defined in Senate Bill 18, this notification begins the 90-day comment period.

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Sincerely,

Paul Junker, Project Planner
Community Development Department

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November 23, 2016

Rosemary Cambra, Chairperson
MUWEKMA OHLONE INDIAN TRIBE OF THE SF BAY AREA
P.O. Box 360791
Milpitas, CA 95036

Re: Invitation to Begin Senate Bill 18 Consultation for the Wildflower Station Project, City of Antioch, California

Dear Ms. Cambra:

The City of Antioch (City) is proposing the Wildflower Station Project (project), a retail and commercial development which requires a General Plan amendment. As part of processing requirements for this General Plan amendment, the City is sending you this consultation notification in compliance with Senate Bill 18. The purpose of this consultation notification is to obtain any questions, comments, or concerns you may have pertaining to the proposed project. The City values your input regarding the proposed project and encourages you to submit comments. As defined in Senate Bill 18, this notification begins the 90-day comment period.

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In compliance with consultation requirements pursuant to Senate Bill 18 the City requested a Native American Heritage Council Sacred Lands File Search. The Sacred Lands File search did not indicate the presence of Native American traditional cultural places or cultural landscapes within the project area. Furthermore, a cultural resources technical study was completed for the project area in 2014 (Attachment 2). No cultural resources were identified within the project area.

Your comments and concerns are important to us and we look forward to hearing from you. If you have any questions or comments regarding the project, I can be contacted via email at pjunker@mbakerintl.com or by phone at (916) 838-8384.

Sincerely,

Paul Junker, Project Planner
Community Development Department

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November 23, 2016

Katherine Erolinda Perez, Chairperson
NORTH VALLEY YOKUTS TRIBE
P.O. Box 717
Linden, CA 95236

Re: Invitation to Begin Senate Bill 18 Consultation for the Wildflower Station Project, City of Antioch, California

Dear Ms. Perez:

The City of Antioch (City) is proposing the Wildflower Station Project (project), a retail and commercial development which requires a General Plan amendment. As part of processing requirements for this General Plan amendment, the City is sending you this consultation notification in compliance with Senate Bill 18. The purpose of this consultation notification is to obtain any questions, comments, or concerns you may have pertaining to the proposed project. The City values your input regarding the proposed project and encourages you to submit comments. As defined in Senate Bill 18, this notification begins the 90-day comment period.

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Sincerely,

Paul Junker, Project Planner
Community Development Department

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November 23, 2016

Andrew Galvan
THE OHLONE INDIAN TRIBE
P.O. Box 3152
Freemont, CA 94539

Re: Invitation to Begin Senate Bill 18 Consultation for the Wildflower Station Project, City of Antioch, California

Dear Mr. Galvan:

The City of Antioch (City) is proposing the Wildflower Station Project (project), a retail and commercial development which requires a General Plan amendment. As part of processing requirements for this General Plan amendment, the City is sending you this consultation notification in compliance with Senate Bill 18. The purpose of this consultation notification is to obtain any questions, comments, or concerns you may have pertaining to the proposed project. The City values your input regarding the proposed project and encourages you to submit comments. As defined in Senate Bill 18, this notification begins the 90-day comment period.

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Your comments and concerns are important to us and we look forward to hearing from you. If you have any questions or comments regarding the project, I can be contacted via email at pjunker@mbakerintl.com or by phone at (916) 838-8384.

Sincerely,

Paul Junker, Project Planner
Community Development Department

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November 23, 2016

Raymond Hitchcock, Chairperson
WILTON RANCHERIA
9728 Kent Street
Elk Grove, CA 94539

Re: Invitation to Begin Senate Bill 18 Consultation for the Wildflower Station Project, City of Antioch, California

Dear Mr. Hitchcock:

The City of Antioch (City) is proposing the Wildflower Station Project (project), a retail and commercial development which requires a General Plan amendment. As part of processing requirements for this General Plan amendment, the City is sending you this consultation notification in compliance with Senate Bill 18. The purpose of this consultation notification is to obtain any questions, comments, or concerns you may have pertaining to the proposed project. The City values your input regarding the proposed project and encourages you to submit comments. As defined in Senate Bill 18, this notification begins the 90-day comment period.

The project proposes to subdivide and develop a 22.7 acre site for retail and single- and multi-family residential uses. The site will be subdivided into three parcels to accommodate retail development along Hillcrest Avenue, high-density multi-family residential adjacent to and shared access with the retail development, and detached single-family homes at the upper portion of the site. The proposed development will include six bio-retention basins extending north and south along the slope. The large-scale mixed-use development would consist of 10.45 acres of commercial use, 7.0 acres of condominiums, 4.05 acres of single family housing, and 1.08 acres dedicated to right-of-way (ROW) on Hillcrest Avenue.

In compliance with consultation requirements pursuant to Senate Bill 18 the City requested a Native American Heritage Council Sacred Lands File Search. The Sacred Lands File search did not indicate the presence of Native American traditional cultural places or cultural landscapes within the project area. Furthermore, a cultural resources technical study was completed for the project area in 2014 (Attachment 2). No cultural resources were identified within the project area.

Your comments and concerns are important to us and we look forward to hearing from you. If you have any questions or comments regarding the project, I can be contacted via email at pjunker@mbakerintl.com or by phone at (916) 838-8384.

Sincerely,

Paul Junker, Project Planner
Community Development Department

Attachments:
Attachment 1 - Figures
Figure 1 - Project Location and Vicinity
Figure 2 - Project Area

Attachment 2 – Cultural Resources Study

Attachment 1
Figures

T:_GIS\Contra_Costa_County\MXDs\antioch\Hillcrest-Wildflower\Cultural\Project Location and Vicinity.mxd (11/16/2016)

FIGURE 1

Regional Vicinity

Michael Baker INTERNATIONAL

0 125 250
FEET

FIGURE 2
Project Area

Michael Baker
INTERNATIONAL

Attachment 2
Cultural Resources Study

A Cultural Resources Survey of the Property at Hillcrest Avenue and Wildflower Drive Antioch, Contra Costa County, California

Janine M. Origer, M.A./R.P.A.

August 2014

A Cultural Resources Survey of the property at Hillcrest Avenue and Wildflower Drive Antioch, Contra Costa County, California

Janine M. Origer, M.A./R.P.A.

Tom Origer & Associates
Post Office Box 1531
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Prepared for:

Trent Sanson
Director of Land Acquisitions
DeNova Homes, Inc.
1500 Willow Pass Ct.
Concord, California 94520

August 2014

ABSTRACT

Tom Origer & Associates conducted a cultural resources survey for the proposed parcel at Hillcrest Avenue and Wildflower Drive in Antioch. The study was designed to satisfy requirements of Section 106 of the National Historic Preservation Act.

This study included archival research at the Northwest Information Center, Sonoma State University (NWIC File No.14-0188), contact with Native American representatives, examination of the library and files of Tom Origer & Associates, and field inspection of the proposed development location.

No prehistoric or historical cultural resources were found during the survey. Documentation pertaining to this study is on file at the offices of Tom Origer & Associates (File No. 2014-098).

Synopsis

Project:	Hillcrest at Wildflower
Location:	Antioch, Contra Costa County, California
Quadrangle:	Antioch South, California 7.5' series
Study Type:	Intensive survey
Scope:	~22 acres
Finds:	None

Project Personnel

Janine M. Origer acted as project manager for this work. Ms. Origer has 30 years experience working in Northern California cultural resources management. She has been with Tom Origer & Associates since 1991. She has worked on both prehistoric and historical archaeological sites, and has completed research and documentation of historical buildings. Ms. Origer has a Bachelor of Arts in Anthropology from Sonoma State University. She holds a Master of Arts in Archaeology and Heritage from the University of Leicester. She has completed extensive continuing education in regulatory compliance, planning local surveys, and identifying historical resources. She is affiliated with the California Historical Society, International Association for Obsidian Studies, Society for American Archaeology, Society of Architectural Historians, Society for California Archaeology (Secretary of the Executive Board 2004-2006), Society for Historical Archaeology, Vernacular Architecture Forum, and the Register of Professional Archaeologists (#1066030).

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INTRODUCTION

Tom Origer & Associates conducted a cultural resources survey for the Hillcrest at Wildflower Project in Antioch, Contra Costa County, California (Figure 1). The study was completed at the request of Trent Sanson, of DeNova Homes, Inc, and was designed to satisfy requirements of Section 106 of the National Historic Preservation Act. The study area consists of approximately 22 acres, where DeNova Homes plans to develop approximately 100 housing units with associated parking. Documentation pertaining to this study is on file at Tom Origer & Associates (File No. 2014-098).

REGULATORY CONTEXT

When a project might affect a cultural resource, the project proponent is required to conduct an assessment to determine whether the effect may be one that is significant. Consequently, it is necessary to determine the importance of resources that could be affected. Because this project will have potential permitting from both state and federal agencies, Section 106 of the National Historic Preservation Act and the California Environmental Quality Act will apply to the work.

Under Section 106, when a federal agency is involved in an undertaking, it must take into account the effects of the undertaking on historic properties (36CFR Part 800). Compliance with Section 106 requires that agencies make an effort to identify historic properties that might be affected by a project, and gather information to evaluate their eligibility for inclusion on the National Register of Historic Places (National Register). Pursuant to Section 106, the goals of this study were to: 1) identify all historic resources within the project area; 2) offer a preliminary evaluation of the significance of the indentified resources; 3) determine resource vulnerability to adverse impacts that could arise from project activities; and 4) offer recommendations designed to protect historic resource values, as warranted.

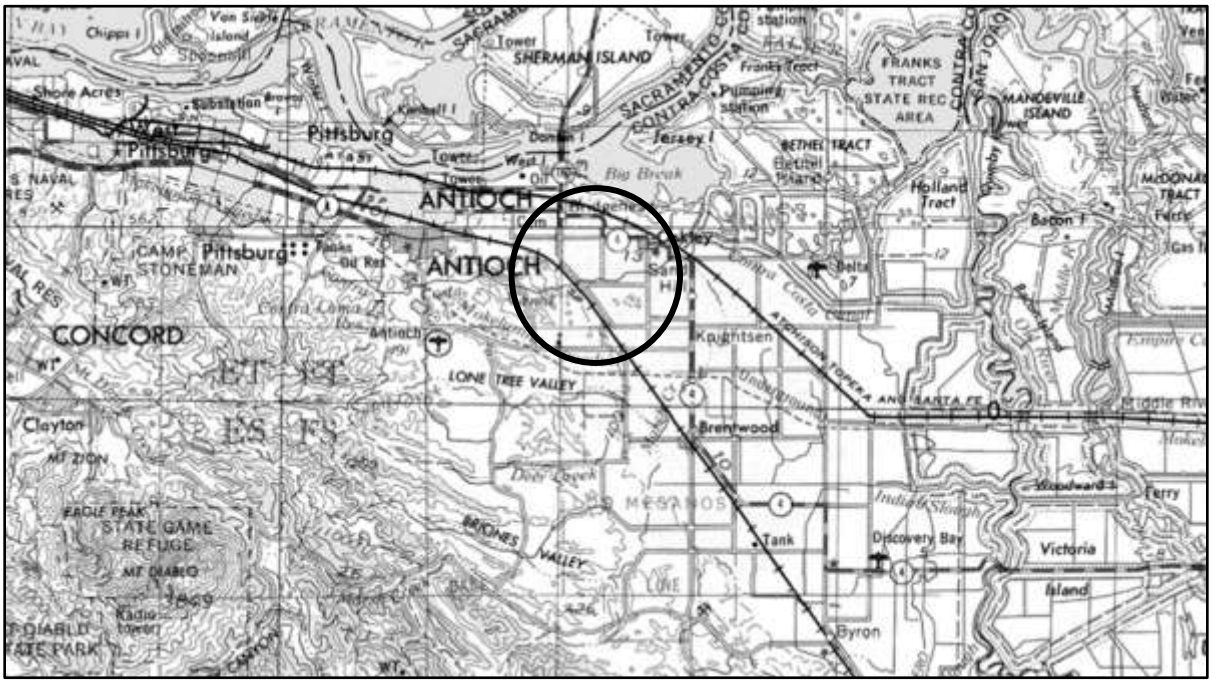

Figure 1. Project vicinity (adapted from the Sacramento and San Jose 1:250,000-scale USGS maps).

The California Environmental Quality Act (CEQA) requires that cultural resources be considered during the environmental review process. This is achieved by an inventory of resources within a study area and by assessing the potential that cultural resources could be affected by development. This cultural resources survey was designed to satisfy environmental issues specified in the CEQA and its guidelines (Title 14 CCR §15064.5) by: (1) identifying all cultural resources within the project area; (2) offering a preliminary significance evaluation of the identified cultural resources; (3) assessing resource vulnerability to effects that could arise from project activities; and (4) offering suggestions designed to protect resource integrity, as warranted.

Resource Definitions

Cultural resources are classified by the State Office of Historic Preservation (OHP) as sites, buildings, structures, objects and districts, and each is described by OHP (1995) as follows.

> **Site.** A site is the location of a significant event, a prehistoric or historic occupation or activity, or a building or structure, whether standing, ruined, or vanished, where the location itself possesses historic, cultural, or archaeological value regardless of the value of any existing structure.
>
> **Building.** A building, such as a house, barn, church, hotel, or similar construc-tion, is created principally to shelter any form of human activity. "Building" may also be used to refer to a historically and functionally related unit, such as a courthouse and jail, or a house and barn.
>
> **Structure.** The term "structure" is used to distinguish from buildings those functional constructions made usually for purposes other than creating human shelter.
>
> **Object.** The term "object" is used to distinguish from buildings and structures those constructions that are primarily artistic in nature or are relatively small in scale and simply constructed. Although it may be, by nature or design, movable, an object is associated with a specific setting or environment.
>
> **District.** A district possesses a significant concentration, linkage, or continuity of sites, buildings, structures, or objects united historically or aesthetically by plan or physical development.

Significance Criteria

Under Section 106, the importance of a historic resource is evaluated in terms of National Register criteria put forth in 36CFR60, as follows:

> The quality of significance is present in properties that possess integrity of location, design, setting, materials, workmanship, feeling, and association, and:
>
> A. That are associated with events that have made a significant contribution to the broad patterns of our history; or
>
> B. That are associated with the lives of persons significant in our past; or

C. That embody the distinct characteristics of a type, period, or method of construction, or that represent the work of a master, or that possess high artistic values, or that represent a significant and distinguishable entity whose components may lack individual distinction; or

D. That have yielded or may be likely to yield, information important in prehistory or history.

Under CEQA, the importance of a resource is measured in terms of criteria for inclusion on the California Register of Historical Resources (Title 14 CCR, §4852(a)) as listed below. A resource may be important if it meets any one of the criteria below, or if it is already listed on the California Register of Historical Resources or a local register of historical resources.

An important historical resource is one which:

1. Is associated with events that have made a significant contribution to the broad patterns of local or regional history, or the cultural heritage of California or the United States.
2. Is associated with the lives of persons important to local, California, or national history.
3. It embodies the distinctive characteristics of a type, period, region or method of construction, or represents the work of a master or possesses high artistic values.
4. It has yielded, or may be likely to yield, information important to the pre-history or history of the local area, California, or the nation.

In addition to meeting one or more of the above criteria, eligibility for the California Register requires that a resource retains sufficient integrity to convey a sense of its significance or importance. Seven elements are considered key in considering a property's integrity: location, design, setting, materials, workmanship, feeling, and association.

As part of the determination made pursuant to Section 21080.1 of the CEQA, the lead agency shall determine whether the project may have a significant effect on unique archaeological resources. If the lead agency determines that the project may have a significant effect on unique archaeological resources, the environmental impact report shall address the issue of those resources.

A "unique archaeological resource" consists of an archaeological artifact, object, or site about which it can be clearly demonstrated that, without merely adding to the current body of knowledge, there is a high probability that it meets any of the following criteria:

1. Contains information needed to answer important scientific research questions and that there is a demonstrable public interest in that information.

2. Has a special and particular quality such as being the oldest of its type or the best available example of its type.

3. Is directly associated with a scientifically recognized important prehistoric or historic event or person.

The California Office of Historic Preservation (OHP) suggests that all resources over 45 years old be recorded for inclusion in the OHP filing system (OHP 1995:2), although professional judgment is urged in determining whether a resource warrants documentation.

PROJECT SETTING

Study Area Location and Description

The study area is located in northern Contra Costa County, about one and a half miles east of central Antioch, as shown on the Antioch South, 7.5' USGS topographic map (Figure 2). The study area consists of approximately 22 acres. A seasonal stream that is currently channelized flows through the parcel.

The eastern portion of the study area comprises Pliocene deposits of the Tulare formation, which date to from 2.6 to 5.3 million years ago (Graymer *et al.* 1994). the western portion of the study area contains oils within the study area consist of Capay clay and Los Osos clay loam. (Welch 1977: Sheet 20). Capay clays are nearly level soils found in basins and on low benches, are moderate to well drained, and formed in alluvium from sedimentary rock (Welch 1977:15). Los Osos clay loam is well drained and underlain by shale and soft, fine-grained sand stone (Welch 1977: 32-33). Vegetation present on these soils consists of annual grasses, forbs, and scattered oaks (Welch 1977:15, 32-33). Historically, these soils were used for range, and occasionally for home sites.

The presence of moderately well drained soils and seasonal water suggests that the area would have been suitable for hunting or other seasonal, short duration activities.

Cultural Setting

Archaeological evidence indicates that human occupation of California began at least 10,000 years ago (Moratto 1984:71). Early occupants appear to have had an economy based largely on hunting, with limited exchange, and social structures based on the extended family unit. Later, milling technology and an inferred acorn economy were introduced. This diversification of economy appears along with the development of sedentism, and population growth and expansion. Sociopolitical complexity and status distinctions based on wealth are also observable in the archaeological record, as evidenced by an increased range and distribution of trade goods (e.g., shell beads, obsidian tool stone), which are possible indicators of both status and increasingly complex exchange systems.

At the time of European settlement, the study area was situated in an area controlled by the Bay Miwok (Kroeber 1925; Levy 1978). The Miwok were hunter-gatherers who lived in rich environments that allowed for dense populations with complex social structures (Kroeber 1925; Levy 1978). They settled in large, permanent villages about which were distributed seasonal camps and task-specific sites. Primary village sites were occupied throughout the year, and other sites were visited in order to procure particular resources that were abundant or available only during certain seasons. Sites often were situated near fresh water sources and in ecotones where plant and animal life were diverse and abundant.

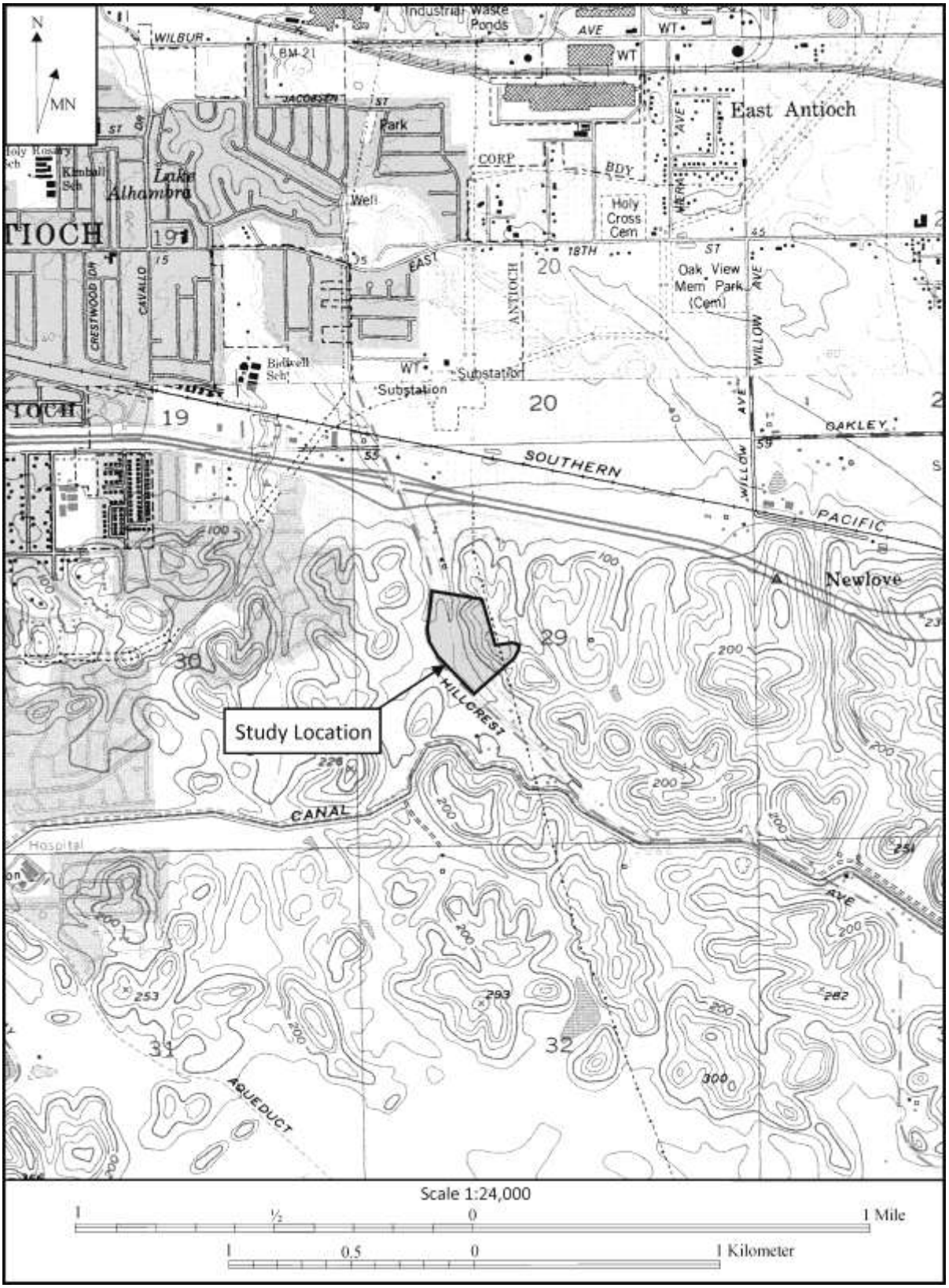

Figure 2. Study location (adapted from the USGS Anitoch South 7.5' topographic map).

STUDY PROCEDURES AND FINDINGS

Native American Contact

The State of California's Native American Heritage Commission, Katherine Erolinda Perez, the Ohlone Indian tribe, and the Trina Marine Ruano Family were contacted in writing. Andrew Galvan of the Ohlone Indian Tribe replied via email requesting a copy of the report.

A log of contact efforts and a copies of all correspondence are provided at the end of this report (Appendix A).

Archival Study Procedures

Archival research included examination of the library and project files at Tom Origer & Associates. A review (NWIC File No. 13-0699) was completed of the archaeological site base maps and records, survey reports, and other materials on file at the Northwest Information Center (NWIC), Sonoma State University, Rohnert Park. Sources of information included but were not limited to the current listings of properties on the National Register of Historic Places (National Register), California Historical Landmarks, California Register of Historical Resources (California Register), and California Points of Historical Interest as listed in the Office of Historic Preservation's *Historic Property Directory* (OHP 2012).

The Office of Historic Preservation has determined that structures older than 45 years should be considered potentially important historical resources, and former building and structure locations could be potentially important historic archaeological sites. Archival research included an examination of historical maps to gain insight into the nature and extent of historical development in the general vicinity, and especially within the study area. Maps ranged from hand-drawn maps of the 1800s (e.g., GLO plats) to topographic maps issued by the United States Geological Survey (USGS) and the Army Corps of Engineers (USACE) from the early to the middle 20th century.

In addition, ethnographic literature that describes appropriate Native American groups, county histories, and other primary and secondary sources were reviewed. Sources reviewed are listed in the "Materials Consulted" section of this report.

Archival Study Findings

Archival research found that the project area a small portion of the current study area had been previously surveyed for cultural resources(Losee 2006) . Seven historical period resources have been recorded within one-half mile of the study area. A high-voltage utility line (P-07-002951), passes over a portion of the study area. A remnant orchard to the southeast (P-07-3002), which extends onto the southern portion of the current study area was recorded by DeBaker and Cox (2009). The Contra Costa Canal (P-07-002882) is located approximately 1,000 feet south of the study area. A portion of the Southern Pacific Railroad (P-07-000813) is approximately 2,000 feet to the north. A PG&E substation (P-07-002950) is located just within the half-mile radius.

Nineteenth century and early 20th century maps show no buildings or structures within the study area. A house is depicted to the north of the current study area as early as 1922 (GLO 1885; USACE 1922; USGS 1898, 1953).

Field Survey Procedures

A field survey was completed by Janine Origer, and Julia Franco on August 20, 2013. The roughly 22-acre study area was examined intensively by walking transects spaced no more than 15 meters apart. Visibility was good in most of the study area. The eastern portion of the study area comprises a moderately steep slope. No outcrops of rock suggesting potential for petroglyphs or rock shelters are present. Hoes were used to clear small patches of vegetation, as needed, so that the ground could be inspected. The southern portion of the study area had remnants of an orchard, which is an extension of the orchard recorded by DeBaker and Cox (2009). Other subsurface soils were inspected where ground squirrels had deposited burrow spoils. Ground squirrel burrows and spoils were most common in the western and southern portions of the study area.

Based on the distribution of known cultural resources and their environmental settings, it was anticipated that historic archaeological sites could be found within the study area. Historic period site indicators generally include: fragments of glass, ceramic, and metal objects; milled and split lumber; and structure and feature remains such as building foundations and discrete trash deposits (e.g., wells, privy pits, dumps). Prehistoric archaeological site indicators expected to be found in the region include but are not limited to: obsidian and chert flakes and chipped stone tools; grinding and mashing implements such as slabs and handstones, and mortars and pestles; bedrock outcrops and boulders with mortar cups; and locally darkened midden soils containing some of the previously listed items plus fragments of bone, shellfish, and fire affected stones.

Field Survey Findings

No prehistoric or historical materials were found within the study area. Given the good ground visibility within the majority of the study area and the lack of cultural resource indicators found, it is unlikely that archaeological resources are present.

The remnant orchard does not appear likely to meet criteria for inclusion in the National Register of Historic Places, as it is no longer associated with any farm. The majority of the remaining trees are dead, though a handful still have leaves.

RECOMMENDATIONS

Known Resources

No historic properties were identified within the study area, and no resource specific recommendations are warranted.

Accidental Discovery

While there are Holocene soils in the western portion of the study area, which could contain buried deposits, the channel cutting through the property provided excellent view of buried soils to approximately three feet below the surface. Therefore it is considered unlikely that buried archaeological deposits will be discovered.

However, all soil disturbing work should be halted at the location of any discovery until a qualified archaeologist completes a significance evaluation of any find(s) pursuant to Section 106 of the National Historic Preservation Act (36CFR60.4). We recommend that a qualified archaeologist be consulted in the event that possible archaeological site indicators are found. Prehistoric archaeological site indicators expected within the general area include: chipped chert and obsidian tools and tool manufacture waste flakes; grinding and hammering implements; and for some sites, locally darkened soil that generally contains abundant archaeological specimens. Historic remains expected in the general area commonly include items of ceramic, glass, and metal. Features that might be present include structure remains (e.g., cabins or their foundations) and pits containing historic artifacts.

The following actions are promulgated in Public Resources Code 5097.98 and Health and Human Safety Code 7050.5, and pertain to the discovery of human remains. If human remains are encountered, excavation or disturbance of the location must be halted in the vicinity of the find, and the county coroner contacted. If the coroner determines the remains are Native American, the coroner will contact the Native American Heritage Commission. The Native American Heritage Commission will identify the person or persons believed to be most likely descended from the deceased Native American. The most likely descendent makes recommendations regarding the treatment of the remains with appropriate dignity.

SUMMARY

Tom Origer & Associates conducted a cultural resources survey for the proposed development at Hillcrest Avenue and Wildflower Drive in Antioch. The study was designed to satisfy requirements of Section 106 of the National Historic Preservation Act and of the California Environmental Quality Act. No prehistoric or historical resources were found within the study area and no resource-specific recommendations were warranted.

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APPENDIX A: Native American Contact

Contact Log
Correspondence and Maps

Native American Contact Efforts
Hillcrest at Wildflower Development Project
Antioch, Contra Costa County, California

Organization/Contact Person	Letters	Results
Native American Heritage Commission	08/11/14	A letter was received from the NAHC on August 19th indicating that they had no record of sacred lands within the APE. The NAHC also provided a list of individuals that it would be appropriate to contact.
Ohlone Indian Tribe Andrew Galvan	08/11/14	No response has been received as of the date of this report.
Katherine Erolinda Perez	08/11/14	No response has been received as of the date of this report.
Trina Marine Ruano Family Ramona Garibay	08/11/14	No response has been received as of the date of this report.

Sacred Lands File & Native American Contacts List Request

NATIVE AMERICAN HERITAGE COMMISSION
915 Capitol Mall, RM 364
Sacramento, CA 95814
(916) 373-3710
(916) 373-5471 – Fax
nahc@pacbell.net

Information Below is Required for a Sacred Lands File Search

Project: Hillcrest and Wildflower in Antioch
County: Contra Costa

USGS Quadrangle

Name: Antioch South
Township T2N Range R2E Section(s) 29 MDBM

Date: August 11, 2014
Company/Firm/Agency: Tom Origer & Associates
Contact Person: Dawna Meeks

Street Address: PO Box 1531
City: Rohnert Park Zip: 94927
Phone: (707) 584-8200 Fax: (707) 584-8300
Email: origer@origer.com

Project Description:
The project proponent is proposing to subdivide a 22 acre parcel at the intersection of Hillcrest and Wildflower in Antioch, California.

STATE OF CALIFORNIA Edmund G. Brown, Jr., Governor

NATIVE AMERICAN HERITAGE COMMISSION
1550 Harbor Blvd.
West Sacramento, CA 95691
(916) 373-3710
Fax (916) 373-5471

August 18, 2014

Dawna Meeks
Tom Origer & Associates
PO Box 1531
Rohnert Park, CA 94927

By Fax: 707-584-8300
2 Pages

RE: Hillcrest and Wildflower project, Contra Costa County
Ms. Meeks,

A record search of the sacred land file has failed to indicate the presence of Native American cultural resources in the immediate project area. The absence of specific site information in the sacred lands file does not indicate the absence of cultural resources in any project area. Other sources of cultural resources should also be contacted for information regarding known and recorded sites.

Enclosed is a list of Native Americans individuals/organizations who may have knowledge of cultural resources in the project area. The Commission makes no recommendation or preference of a single individual, or group over another. This list should provide a starting place in locating areas of potential adverse impact within the proposed project area. I suggest you contact all of those indicated, if they cannot supply information, they might recommend others with specific knowledge. By contacting all those listed, your organization will be better able to respond to claims of failure to consult with the appropriate tribe or group. If a response has not been received within two weeks of notification, the Commission requests that you follow-up with a telephone call to ensure that the project information has been received.

If you receive notification of change of addresses and phone numbers from any of these individuals or groups, please notify me. With your assistance we are able to assure that our lists contain current information. If you have any questions or need additional information, please contact me at (916) 373-3713.

Sincerely,

Debbie Pilas-Treadway
Environmental Specialist III

Native American Contacts
Contra Costa County
August 15, 2014

Katherine Erolinda Perez
P.O. Box 717
Linden , CA 95236
canutes@verizon.net
(209) 887-3415

Ohlone/Costanoan
Northern Valley Yokuts
Bay Miwok

The Ohlone Indian Tribe
Andrew Galvan
P.O. Box 3152
Fremont , CA 94539
chochenyo@AOL.com
(510) 882-0527 Cell
(510) 687-9393 Fax

Ohlone/Costanoan
Bay Miwok
Plains Miwok
Patwin

Trina Marine Ruano Family
Ramona Garibay, Representative
30940 Watkins Street
Union City , CA 94587
soaprootmo@comcast.net
(510) 972-0645

Ohlone/Costanoan
Bay Miwok
Plains Miwok
Patwin

This list is current only as of the date of this document.

Distribution of this list does not relieve any person of statutory responsibility as defined in Section 7050.5 of the Health and Safety Code, Section 5097.94 of the Public Resource Section 5097.98 of the Public Resources Code

This list is only applicable for contacting local Native Americans with regard to cultural resources for the proposed Hillcrest and Wildflower project, Contra Costa County

Tom Origer & Associates
Archaeology / Historical Research

August 11, 2014

Andrew Galvan
The Ohlone Indian Tribe
PO Box 3152
Fremont, CA 94539

RE: Hillcrest and Wildflower development project, Antioch, Contra Costa County

Dear Mr. Galvan:

I write to notify you of a proposed project within Contra Costa County, for which our firm is conducting a cultural resources study. The Hillcrest and Wildflower Project proponent is proposing to subdivide and develop a 22 acre parcel at the intersection of Hillcrest and Wildflower in Antioch, California. The Army Corp of Engineers will be reviewing the project for Section 106 compliance.

Enclosed is a portion of the Antioch North and Antioch South, Calif. 7.5' USGS topographic quadrangles showing the project location.

Sincerely,

Dawna Meeks

Dawna Meeks,
Associate

P.O. Box 1531, Rohnert Park, California 94927 ♦ www.origer.com Phone (707) 584-8200

Tom Origer & Associates
Archaeology / Historical Research

August 11, 2014

Ramona Garibay
Trina Marine Ruano Family
30940 Watkins St
Union City, CA 94587

RE: Hillcrest and Wildflower development project, Antioch, Contra Costa County

Dear Ms. Garibay:

I write to notify you of a proposed project within Contra Costa County, for which our firm is conducting a cultural resources study. The Hillcrest and Wildflower Project proponent is proposing to subdivide and develop a 22 acre parcel at the intersection of Hillcrest and Wildflower in Antioch, California. The Army Corp of Engineers will be reviewing the project for Section 106 compliance.

Enclosed is a portion of the Antioch North and Antioch South, Calif. 7.5' USGS topographic quadrangles showing the project location.

Sincerely,

Dawna Meeks

Dawna Meeks,
Associate

P.O. Box 1531, Rohnert Park, California 94927 ♦ www.origer.com Phone (707) 584-8200

Tom Origer & Associates
Archaeology / Historical Research

August 11, 2014

Katherine Erolinda Perez
PO Box 717
Linden, CA 95236

RE: Hillcrest and Wildflower development project, Antioch, Contra Costa County

Dear Ms. Erolinda Perez:

I write to notify you of a proposed project within Contra Costa County, for which our firm is conducting a cultural resources study. The Hillcrest and Wildflower Project proponent is proposing to subdivide and develop a 22 acre parcel at the intersection of Hillcrest and Wildflower in Antioch, California. The Army Corp of Engineers will be reviewing the project for Section 106 compliance.

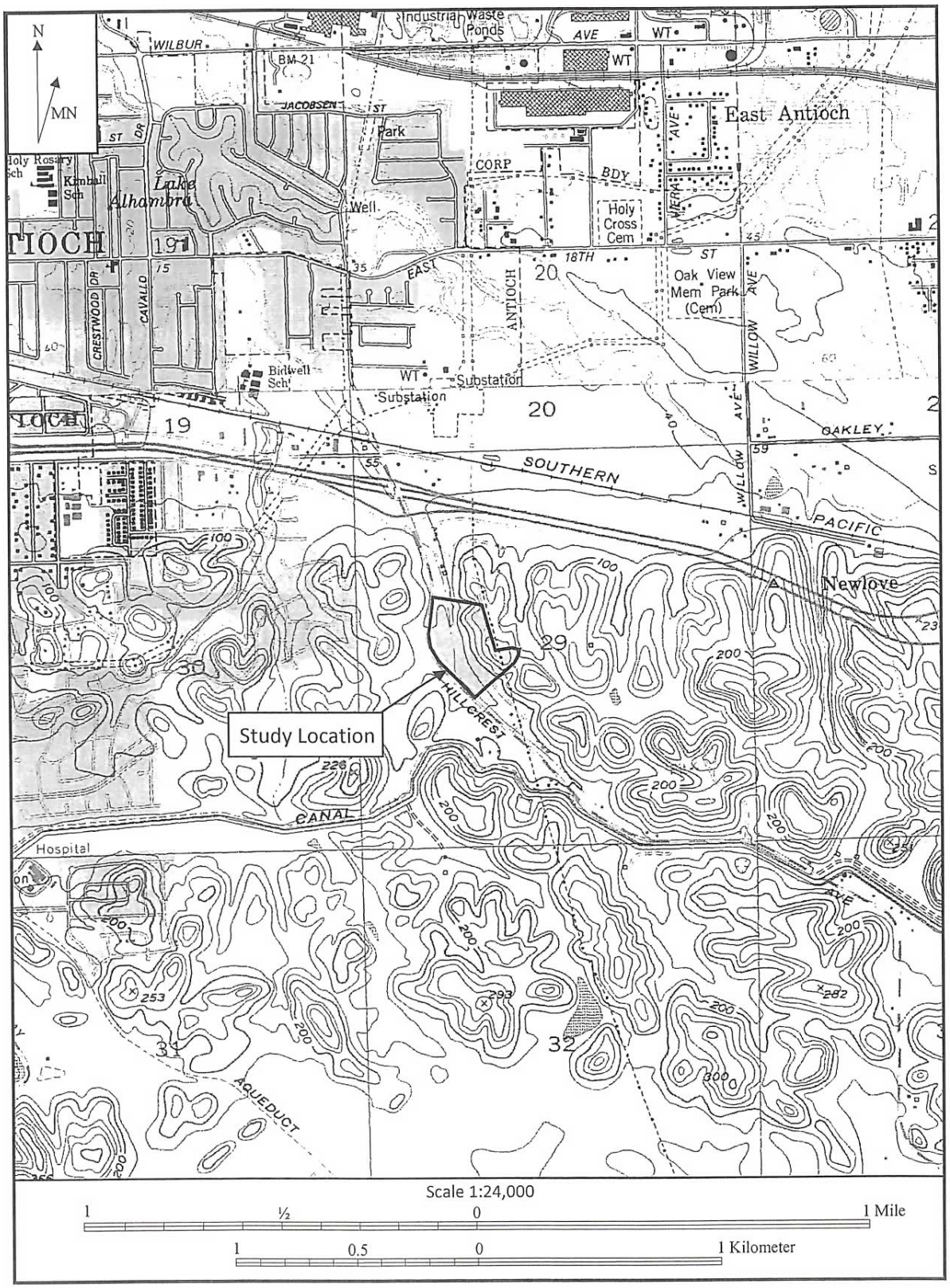
Enclosed is a portion of the Antioch North and Antioch South, Calif. 7.5' USGS topographic quadrangles showing the project location.

Sincerely,

Dawna Meeks

Dawna Meeks,
Associate

P.O. Box 1531, Rohnert Park, California 94927 ♦ www.origer.com Phone (707) 584-8200


N
MN
Industrial Waste Ponds
WILBUR
AVE
WT
BM 21
JACOBSEN
ST
Park
East Antioch
Holy Rosary Sch
Kimball Sch
Lake Alhambra
CORP
BDY
Well
Holy Cross Cem
TIOCH
19
18TH
ST
EAST
ANTIOCH
20
Oak View Mem Park (Cem)
CRESTWOOD
DR
CAVALLO
WILLOW
AVE
Bidwell Sch
Substation
OAKLEY
SOUTHERN
PACIFIC
Newlove
29
30
Study Location
HILLCREST
CANAL
Hospital
31
32
AQUEDUCT
Scale 1:24,000
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1 Mile
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1 Kilometer

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Muwekma Ohlone Indian Tribe of the SF Bay Area
Attn: Rosemary Cambra
P.O. Box 760791
Milpitas, CA 95036

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Wilton Rancheria
Attn: Raymond Hitchcock
9728 Kent Street
Elk Grove, CA 94539

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Indian Canyon Mutsun Band of Costanoan
Attn: Ann Marie Sayers
P.O. Box 28
Hollister, CA 95024

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The Ohlone Indian Tribe
Attn: Andrew Galvan
P.O.Box 3152
Freemont, CA 94539

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Street, Apt. or PO Box
City, State,

Amah Mutsun Tribal Band of Mission San Jaun Bautista
Attn: Irenne Zwierlein
789 Canada Road
Woodside, CA94062

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or PO Bo
City, Stat

North Valley Yokuts Tribe
Attn: Katherine Erolinda Perez
P.O.Box 717
Linden, CA 95236

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P.O.Box 717
Linden, CA 95236

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☐ Registered Mail Restricted Delivery
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1. Article Addressed to:

Wilton Rancheria
Attn: Raymond Hitchcock
9728 Kent Street
Elk Grove, CA 94539

9590 9402 1681 6053 1524 48

2. Article Number (Transfer from service label)

7008 1140 0004 5833 0136

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☐ Agent
☐ Addressee

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C. Date of Delivery 11/29

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If YES, enter delivery address below: ☐ No

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☐ Collect on Delivery
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United States
Postal Service

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Margo: SB18 Wildflower Station

Michael Baker
INTERNATIONAL
2729 Prospect Park Drive, Suite 220
Rancho Cordova, CA 95670

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20 HS

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Postal Service

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Margo: SB18 Wildflower Station

Michael Baker
INTERNATIONAL
2729 Prospect Park Drive, Suite 220
Rancho Cordova, CA 95670

RECEIVED
NOV 28 2016

BY:

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1. Article Addressed to:

Indian Canyon Mutsun Band of Costanoan
Attn: Ann Marie Sayers
P.O. Box 28
Hollister, CA 95024

9590 9402 1681 6053 1523 94

2. Article Number (Transfer from service label)

7008 1140 0004 5833 0174

COMPLETE THIS SECTION ON DELIVERY

A. Signature
X
☑ Agent
☐ Addressee

B. Received by (Printed Name) Kanyon Sayers Roadt
C. Date of Delivery 11/28/16

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1. Article Addressed to:

Muwekma Ohlone Indian Tribe of the SF Bay Area
Attn: Rosemary Cambra
P.O. Box 760791
Milpitas, CA 95036

9590 9402 1681 6053 1524 17

2. Article Number (Transfer from service label)

7008 1140 0004 5833 0167

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A. Signature
X Norma Sanchez
☑ Agent
☐ Addressee

B. Received by (Printed Name) Norma Sanchez
C. Date of Delivery 11/28/16

D. Is delivery address different from item 1? ☐ Yes
If YES, enter delivery address below: ☐ No

3. Service Type
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CA 950
28 NOV 16
PM 3L

9590 9402 1681 6053 1523 94

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Margo: SB18 Wildflower Station

Michael Baker
INTERNATIONAL
2729 Prospect Park Drive, Suite 220
Rancho Cordova, CA 95670

RECEIVED
NOV 30 2016
BY:

USPS TRACKING #

9590 9402 1681 6053 1524 17

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USPS
Permit No. G-10

United States
Postal Service

• Sender: Please print your name, address, and ZIP+4® in this box•

Margo: SB18 Wildflower Station

Michael Baker
INTERNATIONAL
2729 Prospect Park Drive, Suite 220
Rancho Cordova, CA 95670

RECEIVED
NOV 30 2016
BY:

Nayyar, Margo

From: Nayyar, Margo
Sent: Tuesday, January 03, 2017 9:45 AM
To: amahmutsuntribal@gmail.com
Subject: Senate Bill 18 Consultation - Wildflower Station, Antioch
Attachments: 11-23-16_Amah Mutsun SB18_Wildflower.pdf

Hello Ms. Zwierlein,

Attached is an invitation to begin Senate Bill 18 (SB18) consultation for the Wildflower Station project in the City of Antioch. The original consultation request was sent via certified mail on November 23, 2016 and was returned as unclaimed on December 20, 2016. Attached is the original consultation request letter with attachments. Please let me know if you'd like to initiate SB18 consultation for this project.

Thank you very much,

Margo Nayyar | Michael Baker International
2729 Prospect Park Drive, Suite 200 | Rancho Cordova, CA 95670 | [O] 916-231-2236
margo.nayyar@mbakerintl.com | www.mbakerintl.com

Michael Baker INTERNATIONAL
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A Cultural Resources Survey of the Property at Hillcrest Avenue and Wildflower Drive Antioch, Contra Costa County, California

Janine M. Origer, M.A./R.P.A.

August 2014

A Cultural Resources Survey of the property at Hillcrest Avenue and Wildflower Drive Antioch, Contra Costa County, California

Janine M. Origer, M.A./R.P.A.

Tom Origer & Associates
Post Office Box 1531
Rohnert Park, California 94927
(707) 584-8200

Prepared for:

Trent Sanson
Director of Land Acquisitions
DeNova Homes, Inc.
1500 Willow Pass Ct.
Concord, California 94520

August 2014

ABSTRACT

Tom Origer & Associates conducted a cultural resources survey for the proposed parcel at Hillcrest Avenue and Wildflower Drive in Antioch. The study was designed to satisfy requirements of Section 106 of the National Historic Preservation Act.

This study included archival research at the Northwest Information Center, Sonoma State University (NWIC File No.14-0188), contact with Native American representatives, examination of the library and files of Tom Origer & Associates, and field inspection of the proposed development location.

No prehistoric or historical cultural resources were found during the survey. Documentation pertaining to this study is on file at the offices of Tom Origer & Associates (File No. 2014-098).

Synopsis

Project:	Hillcrest at Wildflower
Location:	Antioch, Contra Costa County, California
Quadrangle:	Antioch South, California 7.5' series
Study Type:	Intensive survey
Scope:	~22 acres
Finds:	None

Project Personnel

Janine M. Origer acted as project manager for this work. Ms. Origer has 30 years experience working in Northern California cultural resources management. She has been with Tom Origer & Associates since 1991. She has worked on both prehistoric and historical archaeological sites, and has completed research and documentation of historical buildings. Ms. Origer has a Bachelor of Arts in Anthropology from Sonoma State University. She holds a Master of Arts in Archaeology and Heritage from the University of Leicester. She has completed extensive continuing education in regulatory compliance, planning local surveys, and identifying historical resources. She is affiliated with the California Historical Society, International Association for Obsidian Studies, Society for American Archaeology, Society of Architectural Historians, Society for California Archaeology (Secretary of the Executive Board 2004-2006), Society for Historical Archaeology, Vernacular Architecture Forum, and the Register of Professional Archaeologists (#1066030).

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Project Personnel ii

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Appendix A: Native American Contact

FIGURES

Figure 1. Project vicinity 1
Figure 2. Study location. 5

INTRODUCTION

Tom Origer & Associates conducted a cultural resources survey for the Hillcrest at Wildflower Project in Antioch, Contra Costa County, California (Figure 1). The study was completed at the request of Trent Sanson, of DeNova Homes, Inc, and was designed to satisfy requirements of Section 106 of the National Historic Preservation Act. The study area consists of approximately 22 acres, where DeNova Homes plans to develop approximately 100 housing units with associated parking. Documentation pertaining to this study is on file at Tom Origer & Associates (File No. 2014-098).

REGULATORY CONTEXT

When a project might affect a cultural resource, the project proponent is required to conduct an assessment to determine whether the effect may be one that is significant. Consequently, it is necessary to determine the importance of resources that could be affected. Because this project will have potential permitting from both state and federal agencies, Section 106 of the National Historic Preservation Act and the California Environmental Quality Act will apply to the work.

Under Section 106, when a federal agency is involved in an undertaking, it must take into account the effects of the undertaking on historic properties (36CFR Part 800). Compliance with Section 106 requires that agencies make an effort to identify historic properties that might be affected by a project, and gather information to evaluate their eligibility for inclusion on the National Register of Historic Places (National Register). Pursuant to Section 106, the goals of this study were to: 1) identify all historic resources within the project area; 2) offer a preliminary evaluation of the significance of the indentified resources; 3) determine resource vulnerability to adverse impacts that could arise from project activities; and 4) offer recommendations designed to protect historic resource values, as warranted.

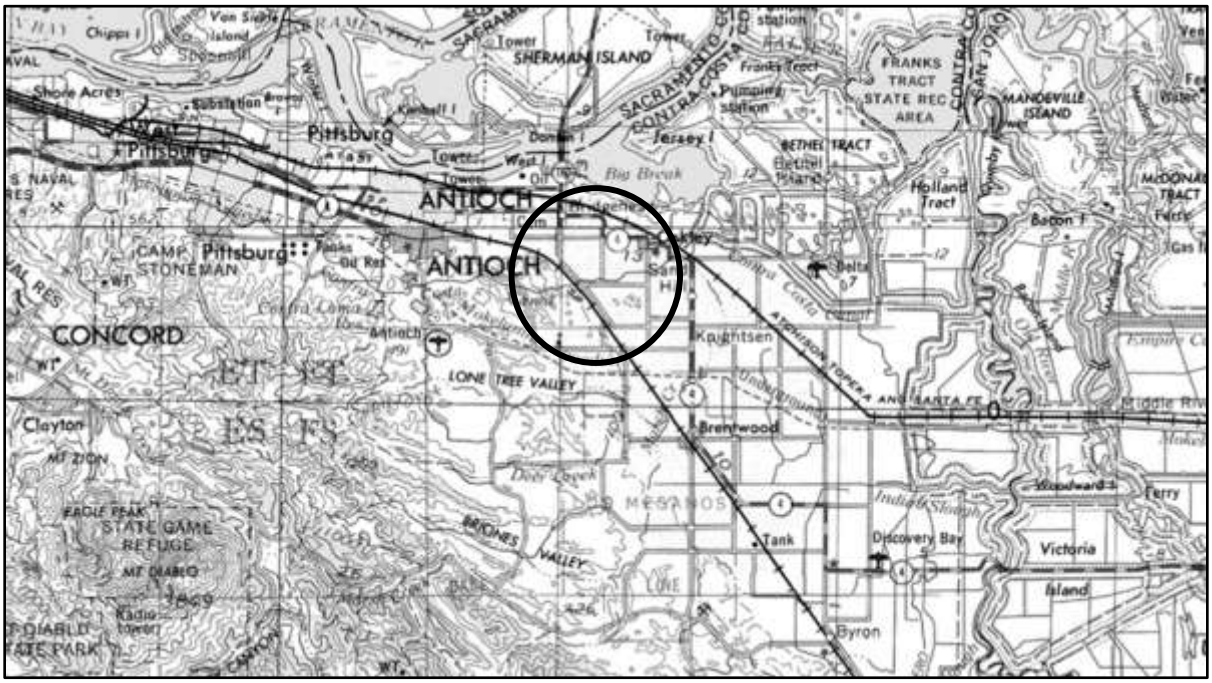

Figure 1. Project vicinity (adapted from the Sacramento and San Jose 1:250,000-scale USGS maps).

The California Environmental Quality Act (CEQA) requires that cultural resources be considered during the environmental review process. This is achieved by an inventory of resources within a study area and by assessing the potential that cultural resources could be affected by development. This cultural resources survey was designed to satisfy environmental issues specified in the CEQA and its guidelines (Title 14 CCR §15064.5) by: (1) identifying all cultural resources within the project area; (2) offering a preliminary significance evaluation of the identified cultural resources; (3) assessing resource vulnerability to effects that could arise from project activities; and (4) offering suggestions designed to protect resource integrity, as warranted.

Resource Definitions

Cultural resources are classified by the State Office of Historic Preservation (OHP) as sites, buildings, structures, objects and districts, and each is described by OHP (1995) as follows.

> **Site.** A site is the location of a significant event, a prehistoric or historic occupation or activity, or a building or structure, whether standing, ruined, or vanished, where the location itself possesses historic, cultural, or archaeological value regardless of the value of any existing structure.
>
> **Building.** A building, such as a house, barn, church, hotel, or similar construc-tion, is created principally to shelter any form of human activity. "Building" may also be used to refer to a historically and functionally related unit, such as a courthouse and jail, or a house and barn.
>
> **Structure.** The term "structure" is used to distinguish from buildings those functional constructions made usually for purposes other than creating human shelter.
>
> **Object.** The term "object" is used to distinguish from buildings and structures those constructions that are primarily artistic in nature or are relatively small in scale and simply constructed. Although it may be, by nature or design, movable, an object is associated with a specific setting or environment.
>
> **District.** A district possesses a significant concentration, linkage, or continuity of sites, buildings, structures, or objects united historically or aesthetically by plan or physical development.

Significance Criteria

Under Section 106, the importance of a historic resource is evaluated in terms of National Register criteria put forth in 36CFR60, as follows:

> The quality of significance is present in properties that possess integrity of location, design, setting, materials, workmanship, feeling, and association, and:
>
> A. That are associated with events that have made a significant contribution to the broad patterns of our history; or
>
> B. That are associated with the lives of persons significant in our past; or

C. That embody the distinct characteristics of a type, period, or method of construction, or that represent the work of a master, or that possess high artistic values, or that represent a significant and distinguishable entity whose components may lack individual distinction; or

D. That have yielded or may be likely to yield, information important in prehistory or history.

Under CEQA, the importance of a resource is measured in terms of criteria for inclusion on the California Register of Historical Resources (Title 14 CCR, §4852(a)) as listed below. A resource may be important if it meets any one of the criteria below, or if it is already listed on the California Register of Historical Resources or a local register of historical resources.

An important historical resource is one which:

1. Is associated with events that have made a significant contribution to the broad patterns of local or regional history, or the cultural heritage of California or the United States.
2. Is associated with the lives of persons important to local, California, or national history.
3. It embodies the distinctive characteristics of a type, period, region or method of construction, or represents the work of a master or possesses high artistic values.
4. It has yielded, or may be likely to yield, information important to the pre-history or history of the local area, California, or the nation.

In addition to meeting one or more of the above criteria, eligibility for the California Register requires that a resource retains sufficient integrity to convey a sense of its significance or importance. Seven elements are considered key in considering a property's integrity: location, design, setting, materials, workmanship, feeling, and association.

As part of the determination made pursuant to Section 21080.1 of the CEQA, the lead agency shall determine whether the project may have a significant effect on unique archaeological resources. If the lead agency determines that the project may have a significant effect on unique archaeological resources, the environmental impact report shall address the issue of those resources.

A "unique archaeological resource" consists of an archaeological artifact, object, or site about which it can be clearly demonstrated that, without merely adding to the current body of knowledge, there is a high probability that it meets any of the following criteria:

1. Contains information needed to answer important scientific research questions and that there is a demonstrable public interest in that information.

2. Has a special and particular quality such as being the oldest of its type or the best available example of its type.

3. Is directly associated with a scientifically recognized important prehistoric or historic event or person.

The California Office of Historic Preservation (OHP) suggests that all resources over 45 years old be recorded for inclusion in the OHP filing system (OHP 1995:2), although professional judgment is urged in determining whether a resource warrants documentation.

PROJECT SETTING

Study Area Location and Description

The study area is located in northern Contra Costa County, about one and a half miles east of central Antioch, as shown on the Antioch South, 7.5' USGS topographic map (Figure 2). The study area consists of approximately 22 acres. A seasonal stream that is currently channelized flows through the parcel.

The eastern portion of the study area comprises Pliocene deposits of the Tulare formation, which date to from 2.6 to 5.3 million years ago (Graymer *et al.* 1994). the western portion of the study area contains oils within the study area consist of Capay clay and Los Osos clay loam. (Welch 1977: Sheet 20). Capay clays are nearly level soils found in basins and on low benches, are moderate to well drained, and formed in alluvium from sedimentary rock (Welch 1977:15). Los Osos clay loam is well drained and underlain by shale and soft, fine-grained sand stone (Welch 1977: 32-33). Vegetation present on these soils consists of annual grasses, forbs, and scattered oaks (Welch 1977:15, 32-33). Historically, these soils were used for range, and occasionally for home sites.

The presence of moderately well drained soils and seasonal water suggests that the area would have been suitable for hunting or other seasonal, short duration activities.

Cultural Setting

Archaeological evidence indicates that human occupation of California began at least 10,000 years ago (Moratto 1984:71). Early occupants appear to have had an economy based largely on hunting, with limited exchange, and social structures based on the extended family unit. Later, milling technology and an inferred acorn economy were introduced. This diversification of economy appears along with the development of sedentism, and population growth and expansion. Sociopolitical complexity and status distinctions based on wealth are also observable in the archaeological record, as evidenced by an increased range and distribution of trade goods (e.g., shell beads, obsidian tool stone), which are possible indicators of both status and increasingly complex exchange systems.

At the time of European settlement, the study area was situated in an area controlled by the Bay Miwok (Kroeber 1925; Levy 1978). The Miwok were hunter-gatherers who lived in rich environments that allowed for dense populations with complex social structures (Kroeber 1925; Levy 1978). They settled in large, permanent villages about which were distributed seasonal camps and task-specific sites. Primary village sites were occupied throughout the year, and other sites were visited in order to procure particular resources that were abundant or available only during certain seasons. Sites often were situated near fresh water sources and in ecotones where plant and animal life were diverse and abundant.

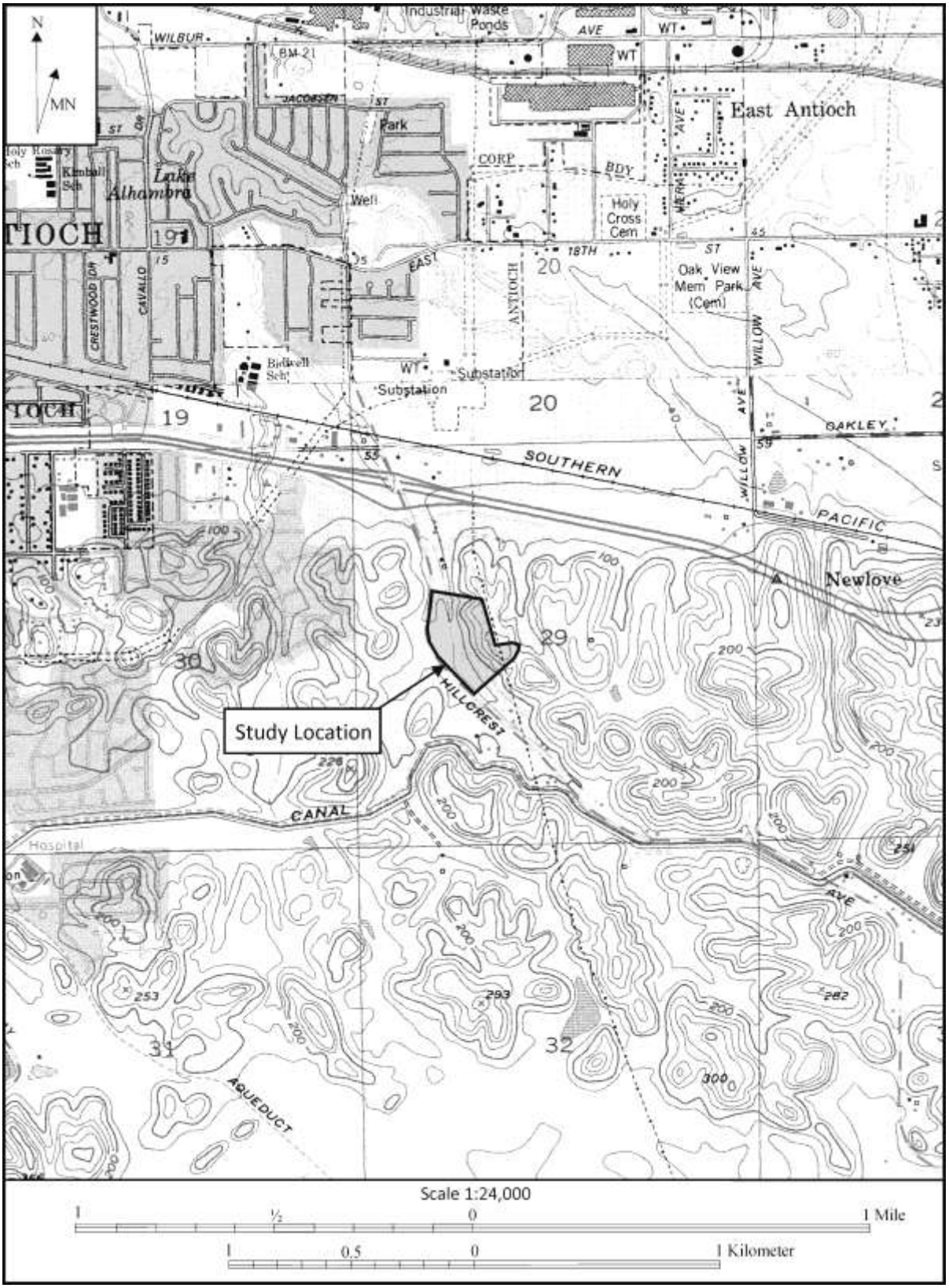

Figure 2. Study location (adapted from the USGS Anitoch South 7.5' topographic map).

STUDY PROCEDURES AND FINDINGS

Native American Contact

The State of California's Native American Heritage Commission, Katherine Erolinda Perez, the Ohlone Indian tribe, and the Trina Marine Ruano Family were contacted in writing. Andrew Galvan of the Ohlone Indian Tribe replied via email requesting a copy of the report.

A log of contact efforts and a copies of all correspondence are provided at the end of this report (Appendix A).

Archival Study Procedures

Archival research included examination of the library and project files at Tom Origer & Associates. A review (NWIC File No. 13-0699) was completed of the archaeological site base maps and records, survey reports, and other materials on file at the Northwest Information Center (NWIC), Sonoma State University, Rohnert Park. Sources of information included but were not limited to the current listings of properties on the National Register of Historic Places (National Register), California Historical Landmarks, California Register of Historical Resources (California Register), and California Points of Historical Interest as listed in the Office of Historic Preservation's *Historic Property Directory* (OHP 2012).

The Office of Historic Preservation has determined that structures older than 45 years should be considered potentially important historical resources, and former building and structure locations could be potentially important historic archaeological sites. Archival research included an examination of historical maps to gain insight into the nature and extent of historical development in the general vicinity, and especially within the study area. Maps ranged from hand-drawn maps of the 1800s (e.g., GLO plats) to topographic maps issued by the United States Geological Survey (USGS) and the Army Corps of Engineers (USACE) from the early to the middle 20th century.

In addition, ethnographic literature that describes appropriate Native American groups, county histories, and other primary and secondary sources were reviewed. Sources reviewed are listed in the "Materials Consulted" section of this report.

Archival Study Findings

Archival research found that the project area a small portion of the current study area had been previously surveyed for cultural resources(Losee 2006) . Seven historical period resources have been recorded within one-half mile of the study area. A high-voltage utility line (P-07-002951), passes over a portion of the study area. A remnant orchard to the southeast (P-07-3002), which extends onto the southern portion of the current study area was recorded by DeBaker and Cox (2009). The Contra Costa Canal (P-07-002882) is located approximately 1,000 feet south of the study area. A portion of the Southern Pacific Railroad (P-07-000813) is approximately 2,000 feet to the north. A PG&E substation (P-07-002950) is located just within the half-mile radius.

Nineteenth century and early 20th century maps show no buildings or structures within the study area. A house is depicted to the north of the current study area as early as 1922 (GLO 1885; USACE 1922; USGS 1898, 1953).

Field Survey Procedures

A field survey was completed by Janine Origer, and Julia Franco on August 20, 2013. The roughly 22-acre study area was examined intensively by walking transects spaced no more than 15 meters apart. Visibility was good in most of the study area. The eastern portion of the study area comprises a moderately steep slope. No outcrops of rock suggesting potential for petroglyphs or rock shelters are present. Hoes were used to clear small patches of vegetation, as needed, so that the ground could be inspected. The southern portion of the study area had remnants of an orchard, which is an extension of the orchard recorded by DeBaker and Cox (2009). Other subsurface soils were inspected where ground squirrels had deposited burrow spoils. Ground squirrel burrows and spoils were most common in the western and southern portions of the study area.

Based on the distribution of known cultural resources and their environmental settings, it was anticipated that historic archaeological sites could be found within the study area. Historic period site indicators generally include: fragments of glass, ceramic, and metal objects; milled and split lumber; and structure and feature remains such as building foundations and discrete trash deposits (e.g., wells, privy pits, dumps). Prehistoric archaeological site indicators expected to be found in the region include but are not limited to: obsidian and chert flakes and chipped stone tools; grinding and mashing implements such as slabs and handstones, and mortars and pestles; bedrock outcrops and boulders with mortar cups; and locally darkened midden soils containing some of the previously listed items plus fragments of bone, shellfish, and fire affected stones.

Field Survey Findings

No prehistoric or historical materials were found within the study area. Given the good ground visibility within the majority of the study area and the lack of cultural resource indicators found, it is unlikely that archaeological resources are present.

The remnant orchard does not appear likely to meet criteria for inclusion in the National Register of Historic Places, as it is no longer associated with any farm. The majority of the remaining trees are dead, though a handful still have leaves.

RECOMMENDATIONS

Known Resources

No historic properties were identified within the study area, and no resource specific recommendations are warranted.

Accidental Discovery

While there are Holocene soils in the western portion of the study area, which could contain buried deposits, the channel cutting through the property provided excellent view of buried soils to approximately three feet below the surface. Therefore it is considered unlikely that buried archaeological deposits will be discovered.

However, all soil disturbing work should be halted at the location of any discovery until a qualified archaeologist completes a significance evaluation of any find(s) pursuant to Section 106 of the National Historic Preservation Act (36CFR60.4). We recommend that a qualified archaeologist be consulted in the event that possible archaeological site indicators are found. Prehistoric archaeological site indicators expected within the general area include: chipped chert and obsidian tools and tool manufacture waste flakes; grinding and hammering implements; and for some sites, locally darkened soil that generally contains abundant archaeological specimens. Historic remains expected in the general area commonly include items of ceramic, glass, and metal. Features that might be present include structure remains (e.g., cabins or their foundations) and pits containing historic artifacts.

The following actions are promulgated in Public Resources Code 5097.98 and Health and Human Safety Code 7050.5, and pertain to the discovery of human remains. If human remains are encountered, excavation or disturbance of the location must be halted in the vicinity of the find, and the county coroner contacted. If the coroner determines the remains are Native American, the coroner will contact the Native American Heritage Commission. The Native American Heritage Commission will identify the person or persons believed to be most likely descended from the deceased Native American. The most likely descendent makes recommendations regarding the treatment of the remains with appropriate dignity.

SUMMARY

Tom Origer & Associates conducted a cultural resources survey for the proposed development at Hillcrest Avenue and Wildflower Drive in Antioch. The study was designed to satisfy requirements of Section 106 of the National Historic Preservation Act and of the California Environmental Quality Act. No prehistoric or historical resources were found within the study area and no resource-specific recommendations were warranted.

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APPENDIX A: Native American Contact

Contact Log
Correspondence and Maps

Native American Contact Efforts
Hillcrest at Wildflower Development Project
Antioch, Contra Costa County, California

Organization/Contact Person	Letters	Results
Native American Heritage Commission	08/11/14	A letter was received from the NAHC on August 19th indicating that they had no record of sacred lands within the APE. The NAHC also provided a list of individuals that it would be appropriate to contact.
Ohlone Indian Tribe Andrew Galvan	08/11/14	No response has been received as of the date of this report.
Katherine Erolinda Perez	08/11/14	No response has been received as of the date of this report.
Trina Marine Ruano Family Ramona Garibay	08/11/14	No response has been received as of the date of this report.

Sacred Lands File & Native American Contacts List Request

NATIVE AMERICAN HERITAGE COMMISSION
915 Capitol Mall, RM 364
Sacramento, CA 95814
(916) 373-3710
(916) 373-5471 – Fax
nahc@pacbell.net

Information Below is Required for a Sacred Lands File Search

Project: Hillcrest and Wildflower in Antioch
County: Contra Costa

USGS Quadrangle

Name: Antioch South
Township T2N Range R2E Section(s) 29 MDBM

Date: August 11, 2014
Company/Firm/Agency: Tom Origer & Associates
Contact Person: Dawna Meeks

Street Address: PO Box 1531
City: Rohnert Park Zip: 94927
Phone: (707) 584-8200 Fax: (707) 584-8300
Email: origer@origer.com

Project Description:
The project proponent is proposing to subdivide a 22 acre parcel at the intersection of Hillcrest and Wildflower in Antioch, California.

STATE OF CALIFORNIA Edmund G. Brown, Jr., Governor

NATIVE AMERICAN HERITAGE COMMISSION
1550 Harbor Blvd.
West Sacramento, CA 95691
(916) 373-3710
Fax (916) 373-5471

August 18, 2014

Dawna Meeks
Tom Origer & Associates
PO Box 1531
Rohnert Park, CA 94927

By Fax: 707-584-8300
2 Pages

RE: Hillcrest and Wildflower project, Contra Costa County
Ms. Meeks,

A record search of the sacred land file has failed to indicate the presence of Native American cultural resources in the immediate project area. The absence of specific site information in the sacred lands file does not indicate the absence of cultural resources in any project area. Other sources of cultural resources should also be contacted for information regarding known and recorded sites.

Enclosed is a list of Native Americans individuals/organizations who may have knowledge of cultural resources in the project area. The Commission makes no recommendation or preference of a single individual, or group over another. This list should provide a starting place in locating areas of potential adverse impact within the proposed project area. I suggest you contact all of those indicated, if they cannot supply information, they might recommend others with specific knowledge. By contacting all those listed, your organization will be better able to respond to claims of failure to consult with the appropriate tribe or group. If a response has not been received within two weeks of notification, the Commission requests that you follow-up with a telephone call to ensure that the project information has been received.

If you receive notification of change of addresses and phone numbers from any of these individuals or groups, please notify me. With your assistance we are able to assure that our lists contain current information. If you have any questions or need additional information, please contact me at (916) 373-3713.

Sincerely,

Debbie Pilas-Treadway
Environmental Specialist III

Native American Contacts
Contra Costa County
August 15, 2014

Katherine Erolinda Perez
P.O. Box 717
Linden , CA 95236
canutes@verizon.net
(209) 887-3415

Ohlone/Costanoan
Northern Valley Yokuts
Bay Miwok

The Ohlone Indian Tribe
Andrew Galvan
P.O. Box 3152
Fremont , CA 94539
chochenyo@AOL.com
(510) 882-0527 Cell
(510) 687-9393 Fax

Ohlone/Costanoan
Bay Miwok
Plains Miwok
Patwin

Trina Marine Ruano Family
Ramona Garibay, Representative
30940 Watkins Street
Union City , CA 94587
soaprootmo@comcast.net
(510) 972-0645

Ohlone/Costanoan
Bay Miwok
Plains Miwok
Patwin

This list is current only as of the date of this document.

Distribution of this list does not relieve any person of statutory responsibility as defined in Section 7050.5 of the Health and Safety Code, Section 5097.94 of the Public Resource Section 5097.98 of the Public Resources Code

This list is only applicable for contacting local Native Americans with regard to cultural resources for the proposed Hillcrest and Wildflower project, Contra Costa County

Tom Origer & Associates
Archaeology / Historical Research

August 11, 2014

Andrew Galvan
The Ohlone Indian Tribe
PO Box 3152
Fremont, CA 94539

RE: Hillcrest and Wildflower development project, Antioch, Contra Costa County

Dear Mr. Galvan:

I write to notify you of a proposed project within Contra Costa County, for which our firm is conducting a cultural resources study. The Hillcrest and Wildflower Project proponent is proposing to subdivide and develop a 22 acre parcel at the intersection of Hillcrest and Wildflower in Antioch, California. The Army Corp of Engineers will be reviewing the project for Section 106 compliance.

Enclosed is a portion of the Antioch North and Antioch South, Calif. 7.5' USGS topographic quadrangles showing the project location.

Sincerely,

Dawna Meeks

Dawna Meeks,
Associate

P.O. Box 1531, Rohnert Park, California 94927 ♦ www.origer.com Phone (707) 584-8200

Tom Origer & Associates
Archaeology / Historical Research

August 11, 2014

Ramona Garibay
Trina Marine Ruano Family
30940 Watkins St
Union City, CA 94587

RE: Hillcrest and Wildflower development project, Antioch, Contra Costa County

Dear Ms. Garibay:

I write to notify you of a proposed project within Contra Costa County, for which our firm is conducting a cultural resources study. The Hillcrest and Wildflower Project proponent is proposing to subdivide and develop a 22 acre parcel at the intersection of Hillcrest and Wildflower in Antioch, California. The Army Corp of Engineers will be reviewing the project for Section 106 compliance.

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Sincerely,

Dawna Meeks

Dawna Meeks,
Associate

P.O. Box 1531, Rohnert Park, California 94927 ♦ www.origer.com Phone (707) 584-8200

Tom Origer & Associates
Archaeology / Historical Research

August 11, 2014

Katherine Erolinda Perez
PO Box 717
Linden, CA 95236

RE: Hillcrest and Wildflower development project, Antioch, Contra Costa County

Dear Ms. Erolinda Perez:

I write to notify you of a proposed project within Contra Costa County, for which our firm is conducting a cultural resources study. The Hillcrest and Wildflower Project proponent is proposing to subdivide and develop a 22 acre parcel at the intersection of Hillcrest and Wildflower in Antioch, California. The Army Corp of Engineers will be reviewing the project for Section 106 compliance.

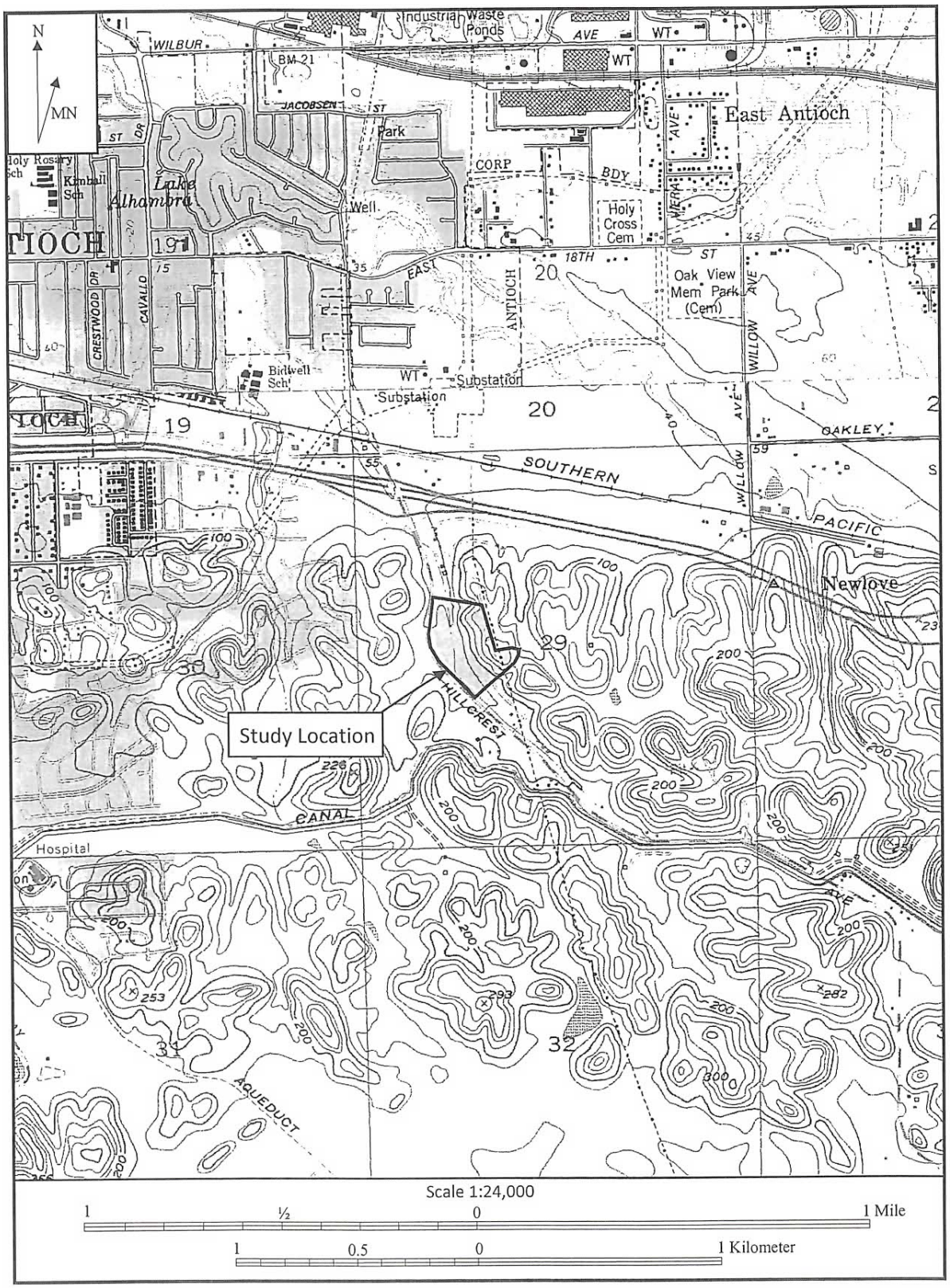
Enclosed is a portion of the Antioch North and Antioch South, Calif. 7.5' USGS topographic quadrangles showing the project location.

Sincerely,

Dawna Meeks

Dawna Meeks,
Associate

P.O. Box 1531, Rohnert Park, California 94927 ♦ www.origer.com Phone (707) 584-8200


N
MN
Industrial Waste Ponds
WILBUR
AVE
WT
BM 21
JACOBSEN
ST
Park
East Antioch
Holy Rosary Sch
Kimball Sch
Lake Alhambra
CORP
BDY
Well
Holy Cross Cem
TIOCH
19
18TH
ST
EAST
ANTIOCH
20
Oak View Mem Park (Cem)
CRESTWOOD
DR
CAVALLO
WILLOW
AVE
Bidwell Sch
Substation
OAKLEY
SOUTHERN
PACIFIC
Newlove
29
30
Study Location
HILLCREST
CANAL
Hospital
31
32
AQUEDUCT
Scale 1:24,000
1
½
0
1 Mile
1
0.5
0
1 Kilometer

Appendix GHG:
Greenhouse Gas Emissions modeling results

Wildflower Station

Contra Costa County, Annual

1.0 Project Characteristics

1.1 Land Usage

Land Uses	Size	Metric	Lot Acreage	Floor Surface Area	Population
Other Asphalt Surfaces	37.26	1000sqft	0.86	37,260.00	0
Other Asphalt Surfaces	113.69	1000sqft	2.61	113,690.00	0
Condo/Townhouse High Rise	98.00	Dwelling Unit	7.00	100,094.00	316
Single Family Housing	22.00	Dwelling Unit	1.82	4,930.00	71
Strip Mall	89.42	1000sqft	2.05	89,425.00	0

1.2 Other Project Characteristics

Urbanization	Urban	**Wind Speed (m/s)**	2.2	**Precipitation Freq (Days)**	58
Climate Zone	4			**Operational Year**	2020
Utility Company	Pacific Gas & Electric Company				
CO2 Intensity (lb/MWhr)	641.35	**CH4 Intensity (lb/MWhr)**	0.029	**N2O Intensity (lb/MWhr)**	0.006

1.3 User Entered Comments & Non-Default Data

Project Characteristics -

Land Use - Land uses, quantity, and size from Wildflower Preliminary Developement Plan 2017.
Population calculation by a density of 3.22 persons/du from the City of Antioch Housing Element 2015.

Construction Phase - Demolition phase deleted. The property contains no structures and vegetation consists mostly of grass and ruderal vegetation.
Architectural Coating phase overlapped with Building Construction phase to reflect actual construction practices.

Grading - The preliminary grading plan indicates no material imported or exported.

Architectural Coating -

Vehicle Trips - Non-resident C-C Trip Length from City of Antioch Neighborhood Commecial District zone definition.
Non-resident C-W and C-C Trip % adjusted to reflect estimated 179 employees.

Construction Off-road Equipment Mitigation - Fugative dust mitigation per BAAQMD best construction management practices.
Tier 3 Engines required on all grading and excavation equipment to limit daily NOx emissions.

Mobile Land Use Mitigation - Mitigation for mixed use development (LUT-3), transit access (LUT-5), and improved project site walkability (SDT-1) applied.

Area Mitigation - No wood hearths in new construction per BAAQMD regulation 6, rule 3.

Table Name	Column Name	Default Value	New Value
tblConstDustMitigation	WaterUnpavedRoadVehicleSpeed	40	15
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	2.00
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	1.00
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	4.00
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	2.00
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	9.00
tblConstEquipMitigation	Tier	No Change	Tier 3
tblConstEquipMitigation	Tier	No Change	Tier 3
tblConstEquipMitigation	Tier	No Change	Tier 3
tblConstEquipMitigation	Tier	No Change	Tier 3
tblConstEquipMitigation	Tier	No Change	Tier 3
tblConstructionPhase	NumDays	20.00	50.00
tblConstructionPhase	PhaseEndDate	11/25/2019	10/14/2019
tblConstructionPhase	PhaseEndDate	8/19/2019	9/16/2019
tblConstructionPhase	PhaseEndDate	9/16/2019	7/23/2018

tblConstructionPhase	PhaseStartDate	9/17/2019	8/6/2019
tblConstructionPhase	PhaseStartDate	6/26/2018	7/24/2018
tblConstructionPhase	PhaseStartDate	8/20/2019	6/26/2018
tblLandUse	BuildingSpaceSquareFeet	98,000.00	100,094.00
tblLandUse	BuildingSpaceSquareFeet	39,600.00	4,930.00
tblLandUse	BuildingSpaceSquareFeet	89,420.00	89,425.00
tblLandUse	LandUseSquareFeet	98,000.00	100,094.00
tblLandUse	LandUseSquareFeet	39,600.00	4,930.00
tblLandUse	LandUseSquareFeet	89,420.00	89,425.00
tblLandUse	LotAcreage	1.53	7.00
tblLandUse	LotAcreage	7.14	1.82
tblLandUse	Population	280.00	316.00
tblLandUse	Population	63.00	71.00
tblProjectCharacteristics	OperationalYear	2018	2020
tblVehicleTrips	CC_TL	7.30	2.00
tblVehicleTrips	CC_TTP	64.40	71.10
tblVehicleTrips	CW_TTP	16.60	9.90

2.0 Emissions Summary

2.1 Overall Construction

Unmitigated Construction

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Year	tons/yr										MT/yr					
2018	0.3332	3.0906	2.2355	4.5700e-003	0.3224	0.1521	0.4745	0.1312	0.1418	0.2729	0.0000	415.6741	415.6741	0.0785	0.0000	417.6374
2019	1.5474	2.6533	2.2616	5.2100e-003	0.1638	0.1279	0.2918	0.0443	0.1205	0.1648	0.0000	469.8301	469.8301	0.0635	0.0000	471.4178
Maximum	**1.5474**	**3.0906**	**2.2616**	**5.2100e-003**	**0.3224**	**0.1521**	**0.4745**	**0.1312**	**0.1418**	**0.2729**	**0.0000**	**469.8301**	**469.8301**	**0.0785**	**0.0000**	**471.4178**

Mitigated Construction

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Year	tons/yr										MT/yr					
2018	0.2328	2.3666	2.2632	4.5700e-003	0.2011	0.1141	0.3153	0.0742	0.1103	0.1845	0.0000	415.6738	415.6738	0.0785	0.0000	417.6371
2019	1.5093	2.5069	2.2712	5.2100e-003	0.1638	0.1196	0.2834	0.0443	0.1152	0.1595	0.0000	469.8298	469.8298	0.0635	0.0000	471.4176
Maximum	**1.5093**	**2.5069**	**2.2712**	**5.2100e-003**	**0.2011**	**0.1196**	**0.3153**	**0.0742**	**0.1152**	**0.1845**	**0.0000**	**469.8298**	**469.8298**	**0.0785**	**0.0000**	**471.4176**

	ROG	**NOx**	**CO**	**SO2**	**Fugitive PM10**	**Exhaust PM10**	**PM10 Total**	**Fugitive PM2.5**	**Exhaust PM2.5**	**PM2.5 Total**	**Bio- CO2**	**NBio-CO2**	**Total CO2**	**CH4**	**N20**	**CO2e**
Percent Reduction	**7.36**	**15.15**	**-0.83**	**0.00**	**24.94**	**16.54**	**21.87**	**32.47**	**14.05**	**21.43**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**

Quarter	Start Date	End Date	Maximum Unmitigated ROG + NOX (tons/quarter)	Maximum Mitigated ROG + NOX (tons/quarter)
1	5-1-2018	7-31-2018	1.5317	0.8631
2	8-1-2018	10-31-2018	1.1367	1.0431
3	11-1-2018	1-31-2019	1.1063	1.0221
4	2-1-2019	4-30-2019	1.0000	0.9366
5	5-1-2019	7-31-2019	1.0291	0.9636
6	8-1-2019	9-30-2019	1.5618	1.5283
		Highest	1.5618	1.5283

2.2 Overall Operational

Unmitigated Operational

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Area	1.2761	0.0184	1.3961	1.0600e-003		0.0766	0.0766		0.0766	0.0766	7.2642	3.9815	11.2457	0.0139	4.5000e-004	11.7281
Energy	0.0113	0.0969	0.0455	6.1000e-004		7.7800e-003	7.7800e-003		7.7800e-003	7.7800e-003	0.0000	584.8842	584.8842	0.0235	6.4700e-003	587.4016
Mobile	0.9940	3.7260	8.2184	0.0205	1.5500	0.0214	1.5714	0.4160	0.0201	0.4360	0.0000	1,874.1199	1,874.1199	0.0958	0.0000	1,876.5144
Waste						0.0000	0.0000		0.0000	0.0000	34.2628	0.0000	34.2628	2.0249	0.0000	84.8848
Water						0.0000	0.0000		0.0000	0.0000	4.5818	31.8857	36.4675	0.4720	0.0114	51.6686
Total	**2.2814**	**3.8413**	**9.6601**	**0.0222**	**1.5500**	**0.1058**	**1.6558**	**0.4160**	**0.1045**	**0.5205**	**46.1089**	**2,494.8713**	**2,540.9802**	**2.6301**	**0.0183**	**2,612.1973**

2.2 Overall Operational

Mitigated Operational

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Area	0.9209	0.0154	0.8983	8.0000e-005		5.3300e-003	5.3300e-003		5.3300e-003	5.3300e-003	0.0000	7.2423	7.2423	1.5400e-003	1.1000e-004	7.3124
Energy	0.0113	0.0969	0.0455	6.1000e-004		7.7800e-003	7.7800e-003		7.7800e-003	7.7800e-003	0.0000	584.8842	584.8842	0.0235	6.4700e-003	587.4016
Mobile	0.9747	3.5800	7.7503	0.0186	1.3810	0.0196	1.4007	0.3706	0.0184	0.3890	0.0000	1,700.9526	1,700.9526	0.0910	0.0000	1,703.2264
Waste						0.0000	0.0000		0.0000	0.0000	34.2628	0.0000	34.2628	2.0249	0.0000	84.8848
Water						0.0000	0.0000		0.0000	0.0000	4.5818	31.8857	36.4675	0.4720	0.0114	51.6686
Total	**1.9069**	**3.6922**	**8.6942**	**0.0193**	**1.3810**	**0.0328**	**1.4138**	**0.3706**	**0.0315**	**0.4021**	**38.8446**	**2,324.9648**	**2,363.8095**	**2.6130**	**0.0180**	**2,434.4937**

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio-CO2	Total CO2	CH4	N20	CO2e
Percent Reduction	**16.42**	**3.88**	**10.00**	**12.96**	**10.90**	**69.06**	**14.62**	**10.90**	**69.84**	**22.73**	**15.75**	**6.81**	**6.97**	**0.65**	**1.85**	**6.80**

3.0 Construction Detail

Construction Phase

Phase Number	Phase Name	Phase Type	Start Date	End Date	Num Days Week	Num Days	Phase Description
1	Site Preparation	Site Preparation	5/1/2018	5/14/2018	5	10	
2	Grading	Grading	5/15/2018	6/25/2018	5	30	
3	Building Construction	Building Construction	7/24/2018	9/16/2019	5	300	
4	Paving	Paving	6/26/2018	7/23/2018	5	20	
5	Architectural Coating	Architectural Coating	8/6/2019	10/14/2019	5	50	

Acres of Grading (Site Preparation Phase): 0

Acres of Grading (Grading Phase): 75

Acres of Paving: 3.47

Residential Indoor: 212,674; Residential Outdoor: 70,891; Non-Residential Indoor: 134,138; Non-Residential Outdoor: 44,713; Striped Parking Area: 9,057 (Architectural Coating – sqft)

OffRoad Equipment

Phase Name	Offroad Equipment Type	Amount	Usage Hours	Horse Power	Load Factor
Site Preparation	Rubber Tired Dozers	3	8.00	247	0.40
Site Preparation	Tractors/Loaders/Backhoes	4	8.00	97	0.37
Grading	Excavators	2	8.00	158	0.38
Grading	Graders	1	8.00	187	0.41
Grading	Rubber Tired Dozers	1	8.00	247	0.40
Grading	Scrapers	2	8.00	367	0.48
Grading	Tractors/Loaders/Backhoes	2	8.00	97	0.37
Building Construction	Cranes	1	7.00	231	0.29
Building Construction	Forklifts	3	8.00	89	0.20
Building Construction	Generator Sets	1	8.00	84	0.74
Building Construction	Tractors/Loaders/Backhoes	3	7.00	97	0.37
Building Construction	Welders	1	8.00	46	0.45
Paving	Pavers	2	8.00	130	0.42
Paving	Paving Equipment	2	8.00	132	0.36
Paving	Rollers	2	8.00	80	0.38
Architectural Coating	Air Compressors	1	6.00	78	0.48

Trips and VMT

Phase Name	Offroad Equipment Count	Worker Trip Number	Vendor Trip Number	Hauling Trip Number	Worker Trip Length	Vendor Trip Length	Hauling Trip Length	Worker Vehicle Class	Vendor Vehicle Class	Hauling Vehicle Class
Site Preparation	7	18.00	0.00	0.00	10.80	7.30	20.00	LD_Mix	HDT_Mix	HHDT
Grading	8	20.00	0.00	0.00	10.80	7.30	20.00	LD_Mix	HDT_Mix	HHDT
Building Construction	9	171.00	52.00	0.00	10.80	7.30	20.00	LD_Mix	HDT_Mix	HHDT
Paving	6	15.00	0.00	0.00	10.80	7.30	20.00	LD_Mix	HDT_Mix	HHDT
Architectural Coating	1	34.00	0.00	0.00	10.80	7.30	20.00	LD_Mix	HDT_Mix	HHDT

3.1 Mitigation Measures Construction

Use Cleaner Engines for Construction Equipment

Water Exposed Area

Reduce Vehicle Speed on Unpaved Roads

3.2 Site Preparation - 2018

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Fugitive Dust					0.0903	0.0000	0.0903	0.0497	0.0000	0.0497	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Off-Road	0.0228	0.2410	0.1124	1.9000e-004		0.0129	0.0129		0.0119	0.0119	0.0000	17.3800	17.3800	5.4100e-003	0.0000	17.5152
Total	**0.0228**	**0.2410**	**0.1124**	**1.9000e-004**	**0.0903**	**0.0129**	**0.1032**	**0.0497**	**0.0119**	**0.0615**	**0.0000**	**17.3800**	**17.3800**	**5.4100e-003**	**0.0000**	**17.5152**

3.2 Site Preparation - 2018

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	3.7000e-004	2.8000e-004	2.8600e-003	1.0000e-005	7.1000e-004	0.0000	7.2000e-004	1.9000e-004	0.0000	1.9000e-004	0.0000	0.6669	0.6669	2.0000e-005	0.0000	0.6674
Total	**3.7000e-004**	**2.8000e-004**	**2.8600e-003**	**1.0000e-005**	**7.1000e-004**	**0.0000**	**7.2000e-004**	**1.9000e-004**	**0.0000**	**1.9000e-004**	**0.0000**	**0.6669**	**0.6669**	**2.0000e-005**	**0.0000**	**0.6674**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Fugitive Dust					0.0407	0.0000	0.0407	0.0223	0.0000	0.0223	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Off-Road	4.6600e-003	0.0953	0.1148	1.9000e-004		4.7300e-003	4.7300e-003		4.7300e-003	4.7300e-003	0.0000	17.3799	17.3799	5.4100e-003	0.0000	17.5152
Total	**4.6600e-003**	**0.0953**	**0.1148**	**1.9000e-004**	**0.0407**	**4.7300e-003**	**0.0454**	**0.0223**	**4.7300e-003**	**0.0271**	**0.0000**	**17.3799**	**17.3799**	**5.4100e-003**	**0.0000**	**17.5152**

3.2 Site Preparation - 2018

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	3.7000e-004	2.8000e-004	2.8600e-003	1.0000e-005	7.1000e-004	0.0000	7.2000e-004	1.9000e-004	0.0000	1.9000e-004	0.0000	0.6669	0.6669	2.0000e-005	0.0000	0.6674
Total	**3.7000e-004**	**2.8000e-004**	**2.8600e-003**	**1.0000e-005**	**7.1000e-004**	**0.0000**	**7.2000e-004**	**1.9000e-004**	**0.0000**	**1.9000e-004**	**0.0000**	**0.6669**	**0.6669**	**2.0000e-005**	**0.0000**	**0.6674**

3.3 Grading - 2018

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Fugitive Dust					0.1301	0.0000	0.1301	0.0540	0.0000	0.0540	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Off-Road	0.0764	0.8928	0.5263	9.3000e-004		0.0395	0.0395		0.0364	0.0364	0.0000	84.9728	84.9728	0.0265	0.0000	85.6341
Total	**0.0764**	**0.8928**	**0.5263**	**9.3000e-004**	**0.1301**	**0.0395**	**0.1696**	**0.0540**	**0.0364**	**0.0903**	**0.0000**	**84.9728**	**84.9728**	**0.0265**	**0.0000**	**85.6341**

3.3 Grading - 2018

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	1.2300e-003	9.4000e-004	9.5400e-003	2.0000e-005	2.3800e-003	2.0000e-005	2.4000e-003	6.3000e-004	2.0000e-005	6.5000e-004	0.0000	2.2230	2.2230	7.0000e-005	0.0000	2.2247
Total	**1.2300e-003**	**9.4000e-004**	**9.5400e-003**	**2.0000e-005**	**2.3800e-003**	**2.0000e-005**	**2.4000e-003**	**6.3000e-004**	**2.0000e-005**	**6.5000e-004**	**0.0000**	**2.2230**	**2.2230**	**7.0000e-005**	**0.0000**	**2.2247**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Fugitive Dust					0.0586	0.0000	0.0586	0.0243	0.0000	0.0243	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Off-Road	0.0229	0.4497	0.5508	9.3000e-004		0.0195	0.0195		0.0195	0.0195	0.0000	84.9727	84.9727	0.0265	0.0000	85.6340
Total	**0.0229**	**0.4497**	**0.5508**	**9.3000e-004**	**0.0586**	**0.0195**	**0.0780**	**0.0243**	**0.0195**	**0.0438**	**0.0000**	**84.9727**	**84.9727**	**0.0265**	**0.0000**	**85.6340**

3.3 Grading - 2018

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	1.2300e-003	9.4000e-004	9.5400e-003	2.0000e-005	2.3800e-003	2.0000e-005	2.4000e-003	6.3000e-004	2.0000e-005	6.5000e-004	0.0000	2.2230	2.2230	7.0000e-005	0.0000	2.2247
Total	**1.2300e-003**	**9.4000e-004**	**9.5400e-003**	**2.0000e-005**	**2.3800e-003**	**2.0000e-005**	**2.4000e-003**	**6.3000e-004**	**2.0000e-005**	**6.5000e-004**	**0.0000**	**2.2230**	**2.2230**	**7.0000e-005**	**0.0000**	**2.2247**

3.4 Building Construction - 2018

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Off-Road	0.1541	1.3449	1.0109	1.5500e-003		0.0862	0.0862		0.0811	0.0811	0.0000	136.7162	136.7162	0.0335	0.0000	137.5535
Total	**0.1541**	**1.3449**	**1.0109**	**1.5500e-003**		**0.0862**	**0.0862**		**0.0811**	**0.0811**	**0.0000**	**136.7162**	**136.7162**	**0.0335**	**0.0000**	**137.5535**

3.4 Building Construction - 2018

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0165	0.4040	0.1082	8.3000e-004	0.0197	3.3200e-003	0.0230	5.6800e-003	3.1700e-003	8.8600e-003	0.0000	78.9335	78.9335	4.3800e-003	0.0000	79.0430
Worker	0.0402	0.0309	0.3126	8.1000e-004	0.0780	5.4000e-004	0.0785	0.0207	5.0000e-004	0.0212	0.0000	72.8588	72.8588	2.1900e-003	0.0000	72.9136
Total	**0.0568**	**0.4349**	**0.4208**	**1.6400e-003**	**0.0976**	**3.8600e-003**	**0.1015**	**0.0264**	**3.6700e-003**	**0.0301**	**0.0000**	**151.7923**	**151.7923**	**6.5700e-003**	**0.0000**	**151.9566**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Off-Road	0.1254	1.2098	1.0117	1.5500e-003		0.0765	0.0765		0.0735	0.0735	0.0000	136.7160	136.7160	0.0335	0.0000	137.5534
Total	**0.1254**	**1.2098**	**1.0117**	**1.5500e-003**		**0.0765**	**0.0765**		**0.0735**	**0.0735**	**0.0000**	**136.7160**	**136.7160**	**0.0335**	**0.0000**	**137.5534**

3.4 Building Construction - 2018

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0165	0.4040	0.1082	8.3000e-004	0.0197	3.3200e-003	0.0230	5.6800e-003	3.1700e-003	8.8600e-003	0.0000	78.9335	78.9335	4.3800e-003	0.0000	79.0430
Worker	0.0402	0.0309	0.3126	8.1000e-004	0.0780	5.4000e-004	0.0785	0.0207	5.0000e-004	0.0212	0.0000	72.8588	72.8588	2.1900e-003	0.0000	72.9136
Total	**0.0568**	**0.4349**	**0.4208**	**1.6400e-003**	**0.0976**	**3.8600e-003**	**0.1015**	**0.0264**	**3.6700e-003**	**0.0301**	**0.0000**	**151.7923**	**151.7923**	**6.5700e-003**	**0.0000**	**151.9566**

3.4 Building Construction - 2019

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Off-Road	0.2184	1.9498	1.5877	2.4900e-003		0.1193	0.1193		0.1122	0.1122	0.0000	217.4714	217.4714	0.0530	0.0000	218.7958
Total	**0.2184**	**1.9498**	**1.5877**	**2.4900e-003**		**0.1193**	**0.1193**		**0.1122**	**0.1122**	**0.0000**	**217.4714**	**217.4714**	**0.0530**	**0.0000**	**218.7958**

3.4 Building Construction - 2019

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0239	0.6118	0.1595	1.3200e-003	0.0316	4.5100e-003	0.0361	9.1400e-003	4.3100e-003	0.0135	0.0000	126.1954	126.1954	6.7200e-003	0.0000	126.3635
Worker	0.0582	0.0435	0.4445	1.2600e-003	0.1255	8.6000e-004	0.1263	0.0334	7.9000e-004	0.0342	0.0000	113.6717	113.6717	3.1000e-003	0.0000	113.7493
Total	**0.0821**	**0.6553**	**0.6041**	**2.5800e-003**	**0.1571**	**5.3700e-003**	**0.1625**	**0.0425**	**5.1000e-003**	**0.0476**	**0.0000**	**239.8671**	**239.8671**	**9.8200e-003**	**0.0000**	**240.1127**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Off-Road	0.1803	1.8034	1.5972	2.4900e-003		0.1109	0.1109		0.1068	0.1068	0.0000	217.4711	217.4711	0.0530	0.0000	218.7956
Total	**0.1803**	**1.8034**	**1.5972**	**2.4900e-003**		**0.1109**	**0.1109**		**0.1068**	**0.1068**	**0.0000**	**217.4711**	**217.4711**	**0.0530**	**0.0000**	**218.7956**

3.4 Building Construction - 2019

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0239	0.6118	0.1595	1.3200e-003	0.0316	4.5100e-003	0.0361	9.1400e-003	4.3100e-003	0.0135	0.0000	126.1954	126.1954	6.7200e-003	0.0000	126.3635
Worker	0.0582	0.0435	0.4445	1.2600e-003	0.1255	8.6000e-004	0.1263	0.0334	7.9000e-004	0.0342	0.0000	113.6717	113.6717	3.1000e-003	0.0000	113.7493
Total	**0.0821**	**0.6553**	**0.6041**	**2.5800e-003**	**0.1571**	**5.3700e-003**	**0.1625**	**0.0425**	**5.1000e-003**	**0.0476**	**0.0000**	**239.8671**	**239.8671**	**9.8200e-003**	**0.0000**	**240.1127**

3.5 Paving - 2018

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Off-Road	0.0164	0.1752	0.1480	2.3000e-004		9.5600e-003	9.5600e-003		8.8000e-003	8.8000e-003	0.0000	20.8116	20.8116	6.4800e-003	0.0000	20.9736
Paving	4.5500e-003					0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Total	**0.0210**	**0.1752**	**0.1480**	**2.3000e-004**		**9.5600e-003**	**9.5600e-003**		**8.8000e-003**	**8.8000e-003**	**0.0000**	**20.8116**	**20.8116**	**6.4800e-003**	**0.0000**	**20.9736**

3.5 Paving - 2018

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	6.1000e-004	4.7000e-004	4.7700e-003	1.0000e-005	1.1900e-003	1.0000e-005	1.2000e-003	3.2000e-004	1.0000e-005	3.2000e-004	0.0000	1.1115	1.1115	3.0000e-005	0.0000	1.1123
Total	**6.1000e-004**	**4.7000e-004**	**4.7700e-003**	**1.0000e-005**	**1.1900e-003**	**1.0000e-005**	**1.2000e-003**	**3.2000e-004**	**1.0000e-005**	**3.2000e-004**	**0.0000**	**1.1115**	**1.1115**	**3.0000e-005**	**0.0000**	**1.1123**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Off-Road	0.0164	0.1752	0.1480	2.3000e-004		9.5600e-003	9.5600e-003		8.8000e-003	8.8000e-003	0.0000	20.8116	20.8116	6.4800e-003	0.0000	20.9736
Paving	4.5500e-003					0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Total	**0.0210**	**0.1752**	**0.1480**	**2.3000e-004**		**9.5600e-003**	**9.5600e-003**		**8.8000e-003**	**8.8000e-003**	**0.0000**	**20.8116**	**20.8116**	**6.4800e-003**	**0.0000**	**20.9736**

3.5 Paving - 2018

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	6.1000e-004	4.7000e-004	4.7700e-003	1.0000e-005	1.1900e-003	1.0000e-005	1.2000e-003	3.2000e-004	1.0000e-005	3.2000e-004	0.0000	1.1115	1.1115	3.0000e-005	0.0000	1.1123
Total	**6.1000e-004**	**4.7000e-004**	**4.7700e-003**	**1.0000e-005**	**1.1900e-003**	**1.0000e-005**	**1.2000e-003**	**3.2000e-004**	**1.0000e-005**	**3.2000e-004**	**0.0000**	**1.1115**	**1.1115**	**3.0000e-005**	**0.0000**	**1.1123**

3.6 Architectural Coating - 2019

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Archit. Coating	1.2371					0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Off-Road	6.6600e-003	0.0459	0.0460	7.0000e-005		3.2200e-003	3.2200e-003		3.2200e-003	3.2200e-003	0.0000	6.3831	6.3831	5.4000e-004	0.0000	6.3966
Total	**1.2438**	**0.0459**	**0.0460**	**7.0000e-005**		**3.2200e-003**	**3.2200e-003**		**3.2200e-003**	**3.2200e-003**	**0.0000**	**6.3831**	**6.3831**	**5.4000e-004**	**0.0000**	**6.3966**

3.6 Architectural Coating - 2019

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	3.1300e-003	2.3400e-003	0.0239	7.0000e-005	6.7400e-003	5.0000e-005	6.7900e-003	1.7900e-003	4.0000e-005	1.8400e-003	0.0000	6.1085	6.1085	1.7000e-004	0.0000	6.1127
Total	**3.1300e-003**	**2.3400e-003**	**0.0239**	**7.0000e-005**	**6.7400e-003**	**5.0000e-005**	**6.7900e-003**	**1.7900e-003**	**4.0000e-005**	**1.8400e-003**	**0.0000**	**6.1085**	**6.1085**	**1.7000e-004**	**0.0000**	**6.1127**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Archit. Coating	1.2371					0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Off-Road	6.6600e-003	0.0459	0.0460	7.0000e-005		3.2200e-003	3.2200e-003		3.2200e-003	3.2200e-003	0.0000	6.3831	6.3831	5.4000e-004	0.0000	6.3966
Total	**1.2438**	**0.0459**	**0.0460**	**7.0000e-005**		**3.2200e-003**	**3.2200e-003**		**3.2200e-003**	**3.2200e-003**	**0.0000**	**6.3831**	**6.3831**	**5.4000e-004**	**0.0000**	**6.3966**

3.6 Architectural Coating - 2019

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	3.1300e-003	2.3400e-003	0.0239	7.0000e-005	6.7400e-003	5.0000e-005	6.7900e-003	1.7900e-003	4.0000e-005	1.8400e-003	0.0000	6.1085	6.1085	1.7000e-004	0.0000	6.1127
Total	**3.1300e-003**	**2.3400e-003**	**0.0239**	**7.0000e-005**	**6.7400e-003**	**5.0000e-005**	**6.7900e-003**	**1.7900e-003**	**4.0000e-005**	**1.8400e-003**	**0.0000**	**6.1085**	**6.1085**	**1.7000e-004**	**0.0000**	**6.1127**

4.0 Operational Detail - Mobile

4.1 Mitigation Measures Mobile

Increase Diversity

Increase Transit Accessibility

Improve Pedestrian Network

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Mitigated	0.9747	3.5800	7.7503	0.0186	1.3810	0.0196	1.4007	0.3706	0.0184	0.3890	0.0000	1,700.9526	1,700.9526	0.0910	0.0000	1,703.2264
Unmitigated	0.9940	3.7260	8.2184	0.0205	1.5500	0.0214	1.5714	0.4160	0.0201	0.4360	0.0000	1,874.1199	1,874.1199	0.0958	0.0000	1,876.5144

4.2 Trip Summary Information

	Average Daily Trip Rate			Unmitigated	Mitigated
Land Use	Weekday	Saturday	Sunday	Annual VMT	Annual VMT
Condo/Townhouse High Rise	409.64	422.38	336.14	926,060	825,120
Other Asphalt Surfaces	0.00	0.00	0.00		
Other Asphalt Surfaces	0.00	0.00	0.00		
Single Family Housing	209.44	218.02	189.64	480,022	427,700
Strip Mall	3,963.09	3,759.22	1826.85	2,743,765	2,444,695
Total	4,582.17	4,399.62	2,352.63	4,149,847	3,697,514

4.3 Trip Type Information

	Miles			Trip %			Trip Purpose %		
Land Use	H-W or C-W	H-S or C-C	H-O or C-NW	H-W or C-W	H-S or C-C	H-O or C-NW	Primary	Diverted	Pass-by
Condo/Townhouse High Rise	10.80	4.80	5.70	31.00	15.00	54.00	86	11	3
Other Asphalt Surfaces	9.50	7.30	7.30	0.00	0.00	0.00	0	0	0
Other Asphalt Surfaces	9.50	7.30	7.30	0.00	0.00	0.00	0	0	0
Single Family Housing	10.80	4.80	5.70	31.00	15.00	54.00	86	11	3
Strip Mall	9.50	2.00	7.30	9.90	71.10	19.00	45	40	15

4.4 Fleet Mix

Land Use	LDA	LDT1	LDT2	MDV	LHD1	LHD2	MHD	HHD	OBUS	UBUS	MCY	SBUS	MH
Other Asphalt Surfaces	0.577244	0.040114	0.186710	0.126359	0.018084	0.005120	0.010527	0.023222	0.001588	0.001850	0.005513	0.002759	0.000910
Other Asphalt Surfaces	0.577244	0.040114	0.186710	0.126359	0.018084	0.005120	0.010527	0.023222	0.001588	0.001850	0.005513	0.002759	0.000910
Condo/Townhouse High Rise	0.577244	0.040114	0.186710	0.126359	0.018084	0.005120	0.010527	0.023222	0.001588	0.001850	0.005513	0.002759	0.000910
Single Family Housing	0.577244	0.040114	0.186710	0.126359	0.018084	0.005120	0.010527	0.023222	0.001588	0.001850	0.005513	0.002759	0.000910
Strip Mall	0.577244	0.040114	0.186710	0.126359	0.018084	0.005120	0.010527	0.023222	0.001588	0.001850	0.005513	0.002759	0.000910

5.0 Energy Detail

Historical Energy Use: N

5.1 Mitigation Measures Energy

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Electricity Mitigated						0.0000	0.0000		0.0000	0.0000	0.0000	473.4308	473.4308	0.0214	4.4300e-003	475.2859
Electricity Unmitigated						0.0000	0.0000		0.0000	0.0000	0.0000	473.4308	473.4308	0.0214	4.4300e-003	475.2859
NaturalGas Mitigated	0.0113	0.0969	0.0455	6.1000e-004		7.7800e-003	7.7800e-003		7.7800e-003	7.7800e-003	0.0000	111.4534	111.4534	2.1400e-003	2.0400e-003	112.1157
NaturalGas Unmitigated	0.0113	0.0969	0.0455	6.1000e-004		7.7800e-003	7.7800e-003		7.7800e-003	7.7800e-003	0.0000	111.4534	111.4534	2.1400e-003	2.0400e-003	112.1157

5.2 Energy by Land Use - NaturalGas

Unmitigated

	NaturalGas Use	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Land Use	kBTU/yr	tons/yr										MT/yr					
Condo/Townhouse High Rise	1.08477e+006	5.8500e-003	0.0500	0.0213	3.2000e-004		4.0400e-003	4.0400e-003		4.0400e-003	4.0400e-003	0.0000	57.8874	57.8874	1.1100e-003	1.0600e-003	58.2314
Other Asphalt Surfaces	0	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Single Family Housing	790957	4.2600e-003	0.0365	0.0155	2.3000e-004		2.9500e-003	2.9500e-003		2.9500e-003	2.9500e-003	0.0000	42.2085	42.2085	8.1000e-004	7.7000e-004	42.4593
Strip Mall	212832	1.1500e-003	0.0104	8.7600e-003	6.0000e-005		7.9000e-004	7.9000e-004		7.9000e-004	7.9000e-004	0.0000	11.3575	11.3575	2.2000e-004	2.1000e-004	11.4250
Total		**0.0113**	**0.0969**	**0.0455**	**6.1000e-004**		**7.7800e-003**	**7.7800e-003**		**7.7800e-003**	**7.7800e-003**	**0.0000**	**111.4534**	**111.4534**	**2.1400e-003**	**2.0400e-003**	**112.1157**

5.2 Energy by Land Use - NaturalGas

Mitigated

	NaturalGas Use	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Land Use	kBTU/yr	tons/yr										MT/yr					
Condo/Townhouse High Rise	1.08477e+006	5.8500e-003	0.0500	0.0213	3.2000e-004		4.0400e-003	4.0400e-003		4.0400e-003	4.0400e-003	0.0000	57.8874	57.8874	1.1100e-003	1.0600e-003	58.2314
Other Asphalt Surfaces	0	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Single Family Housing	790957	4.2600e-003	0.0365	0.0155	2.3000e-004		2.9500e-003	2.9500e-003		2.9500e-003	2.9500e-003	0.0000	42.2085	42.2085	8.1000e-004	7.7000e-004	42.4593
Strip Mall	212832	1.1500e-003	0.0104	8.7600e-003	6.0000e-005		7.9000e-004	7.9000e-004		7.9000e-004	7.9000e-004	0.0000	11.3575	11.3575	2.2000e-004	2.1000e-004	11.4250
Total		**0.0113**	**0.0969**	**0.0455**	**6.1000e-004**		**7.7800e-003**	**7.7800e-003**		**7.7800e-003**	**7.7800e-003**	**0.0000**	**111.4534**	**111.4534**	**2.1400e-003**	**2.0400e-003**	**112.1157**

5.3 Energy by Land Use - Electricity

Unmitigated

	Electricity Use	Total CO2	CH4	N2O	CO2e
Land Use	kWh/yr	MT/yr			
Condo/Townhouse High Rise	457722	133.1565	6.0200e-003	1.2500e-003	133.6783
Other Asphalt Surfaces	0	0.0000	0.0000	0.0000	0.0000
Single Family Housing	190480	55.4127	2.5100e-003	5.2000e-004	55.6299
Strip Mall	979204	284.8616	0.0129	2.6600e-003	285.9778
Total		**473.4308**	**0.0214**	**4.4300e-003**	**475.2859**

5.3 Energy by Land Use - Electricity

Mitigated

	Electricity Use	Total CO2	CH4	N2O	CO2e
Land Use	kWh/yr	MT/yr			
Condo/Townhouse High Rise	457722	133.1565	6.0200e-003	1.2500e-003	133.6783
Other Asphalt Surfaces	0	0.0000	0.0000	0.0000	0.0000
Single Family Housing	190480	55.4127	2.5100e-003	5.2000e-004	55.6299
Strip Mall	979204	284.8616	0.0129	2.6600e-003	285.9778
Total		**473.4308**	**0.0214**	**4.4300e-003**	**475.2859**

6.0 Area Detail

6.1 Mitigation Measures Area

Use only Natural Gas Hearths

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Mitigated	0.9209	0.0154	0.8983	8.0000e-005		5.3300e-003	5.3300e-003		5.3300e-003	5.3300e-003	0.0000	7.2423	7.2423	1.5400e-003	1.1000e-004	7.3124
Unmitigated	1.2761	0.0184	1.3961	1.0600e-003		0.0766	0.0766		0.0766	0.0766	7.2642	3.9815	11.2457	0.0139	4.5000e-004	11.7281

6.2 Area by SubCategory

Unmitigated

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
SubCategory	tons/yr										MT/yr					
Architectural Coating	0.1237					0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Consumer Products	0.7692					0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Hearth	0.3558	8.0500e-003	0.4999	1.0100e-003		0.0717	0.0717		0.0717	0.0717	7.2642	2.5218	9.7860	0.0125	4.5000e-004	10.2325
Landscaping	0.0274	0.0104	0.8962	5.0000e-005		4.9200e-003	4.9200e-003		4.9200e-003	4.9200e-003	0.0000	1.4598	1.4598	1.4300e-003	0.0000	1.4955
Total	**1.2761**	**0.0184**	**1.3961**	**1.0600e-003**		**0.0766**	**0.0766**		**0.0766**	**0.0766**	**7.2642**	**3.9815**	**11.2457**	**0.0139**	**4.5000e-004**	**11.7281**

6.2 Area by SubCategory

Mitigated

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
SubCategory	tons/yr										MT/yr					
Architectural Coating	0.1237					0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Consumer Products	0.7692					0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Hearth	5.8000e-004	4.9900e-003	2.1200e-003	3.0000e-005		4.0000e-004	4.0000e-004		4.0000e-004	4.0000e-004	0.0000	5.7826	5.7826	1.1000e-004	1.1000e-004	5.8169
Landscaping	0.0274	0.0104	0.8962	5.0000e-005		4.9200e-003	4.9200e-003		4.9200e-003	4.9200e-003	0.0000	1.4598	1.4598	1.4300e-003	0.0000	1.4955
Total	**0.9209**	**0.0154**	**0.8983**	**8.0000e-005**		**5.3200e-003**	**5.3200e-003**		**5.3200e-003**	**5.3200e-003**	**0.0000**	**7.2423**	**7.2423**	**1.5400e-003**	**1.1000e-004**	**7.3124**

7.0 Water Detail

7.1 Mitigation Measures Water

	Total CO2	CH4	N2O	CO2e
Category	MT/yr			
Mitigated	36.4675	0.4720	0.0114	51.6686
Unmitigated	36.4675	0.4720	0.0114	51.6686

7.2 Water by Land Use

Unmitigated

	Indoor/Outdoor Use	Total CO2	CH4	N2O	CO2e
Land Use	Mgal	MT/yr			
Condo/Townhouse High Rise	6.38509 / 4.02539	16.1752	0.2087	5.0500e-003	22.8961
Other Asphalt Surfaces	0 / 0	0.0000	0.0000	0.0000	0.0000
Single Family Housing	1.43339 / 0.903658	3.6312	0.0469	1.1300e-003	5.1399
Strip Mall	6.62356 / 4.0596	16.6611	0.2165	5.2300e-003	23.6325
Total		**36.4675**	**0.4720**	**0.0114**	**51.6686**

7.2 Water by Land Use

Mitigated

	Indoor/Outdoor Use	Total CO2	CH4	N2O	CO2e
Land Use	Mgal	MT/yr			
Condo/Townhouse High Rise	6.38509 / 4.02539	16.1752	0.2087	5.0500e-003	22.8961
Other Asphalt Surfaces	0 / 0	0.0000	0.0000	0.0000	0.0000
Single Family Housing	1.43339 / 0.903658	3.6312	0.0469	1.1300e-003	5.1399
Strip Mall	6.62356 / 4.0596	16.6611	0.2165	5.2300e-003	23.6325
Total		**36.4675**	**0.4720**	**0.0114**	**51.6686**

8.0 Waste Detail

8.1 Mitigation Measures Waste

Category/Year

	Total CO2	CH4	N2O	CO2e
	MT/yr			
Mitigated	34.2628	2.0249	0.0000	84.8848
Unmitigated	34.2628	2.0249	0.0000	84.8848

8.2 Waste by Land Use

Unmitigated

	Waste Disposed	Total CO2	CH4	N2O	CO2e
Land Use	tons	MT/yr			
Condo/Townhouse High Rise	45.08	9.1508	0.5408	0.0000	22.6708
Other Asphalt Surfaces	0	0.0000	0.0000	0.0000	0.0000
Single Family Housing	29.82	6.0532	0.3577	0.0000	14.9965
Strip Mall	93.89	19.0588	1.1263	0.0000	47.2174
Total		**34.2628**	**2.0249**	**0.0000**	**84.8847**

8.2 Waste by Land Use

Mitigated

	Waste Disposed	Total CO2	CH4	N2O	CO2e
Land Use	tons	MT/yr			
Condo/Townhouse High Rise	45.08	9.1508	0.5408	0.0000	22.6708
Other Asphalt Surfaces	0	0.0000	0.0000	0.0000	0.0000
Single Family Housing	29.82	6.0532	0.3577	0.0000	14.9965
Strip Mall	93.89	19.0588	1.1263	0.0000	47.2174
Total		**34.2628**	**2.0249**	**0.0000**	**84.8847**

9.0 Operational Offroad

Equipment Type	Number	Hours/Day	Days/Year	Horse Power	Load Factor	Fuel Type

10.0 Stationary Equipment

Fire Pumps and Emergency Generators

Equipment Type	Number	Hours/Day	Hours/Year	Horse Power	Load Factor	Fuel Type

Boilers

Equipment Type	Number	Heat Input/Day	Heat Input/Year	Boiler Rating	Fuel Type

User Defined Equipment

Equipment Type	Number

11.0 Vegetation

Wildflower Station

Contra Costa County, Summer

1.0 Project Characteristics

1.1 Land Usage

Land Uses	Size	Metric	Lot Acreage	Floor Surface Area	Population
Other Asphalt Surfaces	37.26	1000sqft	0.86	37,260.00	0
Other Asphalt Surfaces	113.69	1000sqft	2.61	113,690.00	0
Condo/Townhouse High Rise	98.00	Dwelling Unit	7.00	100,094.00	316
Single Family Housing	22.00	Dwelling Unit	1.82	4,930.00	71
Strip Mall	89.42	1000sqft	2.05	89,425.00	0

1.2 Other Project Characteristics

Urbanization	Urban	**Wind Speed (m/s)**	2.2	**Precipitation Freq (Days)**	58
Climate Zone	4			**Operational Year**	2020
Utility Company	Pacific Gas & Electric Company				
CO2 Intensity (lb/MWhr)	641.35	**CH4 Intensity (lb/MWhr)**	0.029	**N2O Intensity (lb/MWhr)**	0.006

1.3 User Entered Comments & Non-Default Data

Wildflower Station - Contra Costa County, Summer

Project Characteristics -

Land Use - Land uses, quantity, and size from Wildflower Preliminary Developement Plan 2017.
Population calculation by a density of 3.22 persons/du from the City of Antioch Housing Element 2015.

Construction Phase - Demolition phase deleted. The property contains no structures and vegetation consists mostly of grass and ruderal vegetation.
Architectural Coating phase overlapped with Building Construction phase to reflect actual construction practices.

Grading - The preliminary grading plan indicates no material imported or exported.

Architectural Coating -

Vehicle Trips - Non-resident C-C Trip Length from City of Antioch Neighborhood Commecial District zone definition.
Non-resident C-W and C-C Trip % adjusted to reflect estimated 179 employees.

Construction Off-road Equipment Mitigation - Fugative dust mitigation per BAAQMD best construction management practices.
Tier 3 Engines required on all grading and excavation equipment to limit daily NOx emissions.

Mobile Land Use Mitigation - Mitigation for mixed use development (LUT-3), transit access (LUT-5), and improved project site walkability (SDT-1) applied.

Area Mitigation - No wood hearths in new construction per BAAQMD regulation 6, rule 3.

Table Name	Column Name	Default Value	New Value
tblConstDustMitigation	WaterUnpavedRoadVehicleSpeed	40	15
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	2.00
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	1.00
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	4.00
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	2.00
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	9.00
tblConstEquipMitigation	Tier	No Change	Tier 3
tblConstEquipMitigation	Tier	No Change	Tier 3
tblConstEquipMitigation	Tier	No Change	Tier 3
tblConstEquipMitigation	Tier	No Change	Tier 3
tblConstEquipMitigation	Tier	No Change	Tier 3
tblConstructionPhase	NumDays	20.00	50.00
tblConstructionPhase	PhaseEndDate	11/25/2019	10/14/2019
tblConstructionPhase	PhaseEndDate	8/19/2019	9/16/2019
tblConstructionPhase	PhaseEndDate	9/16/2019	7/23/2018

tblConstructionPhase	PhaseStartDate	9/17/2019	8/6/2019
tblConstructionPhase	PhaseStartDate	6/26/2018	7/24/2018
tblConstructionPhase	PhaseStartDate	8/20/2019	6/26/2018
tblLandUse	BuildingSpaceSquareFeet	98,000.00	100,094.00
tblLandUse	BuildingSpaceSquareFeet	39,600.00	4,930.00
tblLandUse	BuildingSpaceSquareFeet	89,420.00	89,425.00
tblLandUse	LandUseSquareFeet	98,000.00	100,094.00
tblLandUse	LandUseSquareFeet	39,600.00	4,930.00
tblLandUse	LandUseSquareFeet	89,420.00	89,425.00
tblLandUse	LotAcreage	1.53	7.00
tblLandUse	LotAcreage	7.14	1.82
tblLandUse	Population	280.00	316.00
tblLandUse	Population	63.00	71.00
tblProjectCharacteristics	OperationalYear	2018	2020
tblVehicleTrips	CC_TL	7.30	2.00
tblVehicleTrips	CC_TTP	64.40	71.10
tblVehicleTrips	CW_TTP	16.60	9.90

2.0 Emissions Summary

2.1 Overall Construction (Maximum Daily Emission)

Unmitigated Construction

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Year	lb/day										lb/day					
2018	5.1787	59.5781	35.7950	0.0638	18.2141	2.6349	20.7920	9.9699	2.4241	12.3416	0.0000	6,422.4832	6,422.4832	1.9493	0.0000	6,471.2152
2019	53.1828	29.9420	27.0449	0.0621	2.0360	1.4782	3.5141	0.5480	1.3980	1.9460	0.0000	6,163.0929	6,163.0929	0.7801	0.0000	6,182.5960
Maximum	**53.1828**	**59.5781**	**35.7950**	**0.0638**	**18.2141**	**2.6349**	**20.7920**	**9.9699**	**2.4241**	**12.3416**	**0.0000**	**6,422.4832**	**6,422.4832**	**1.9493**	**0.0000**	**6,471.2152**

Mitigated Construction

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Year	lb/day										lb/day					
2018	3.2205	30.0345	37.4282	0.0638	8.2777	1.3967	9.2249	4.5080	1.3426	5.4551	0.0000	6,422.4832	6,422.4832	1.9493	0.0000	6,471.2152
2019	52.7711	28.3592	27.1483	0.0621	2.0360	1.3876	3.4235	0.5480	1.3402	1.8882	0.0000	6,163.0929	6,163.0929	0.7801	0.0000	6,182.5960
Maximum	**52.7711**	**30.0345**	**37.4282**	**0.0638**	**8.2777**	**1.3967**	**9.2249**	**4.5080**	**1.3426**	**5.4551**	**0.0000**	**6,422.4832**	**6,422.4832**	**1.9493**	**0.0000**	**6,471.2152**

	ROG	**NOx**	**CO**	**SO2**	**Fugitive PM10**	**Exhaust PM10**	**PM10 Total**	**Fugitive PM2.5**	**Exhaust PM2.5**	**PM2.5 Total**	**Bio- CO2**	**NBio-CO2**	**Total CO2**	**CH4**	**N20**	**CO2e**
Percent Reduction	**4.06**	**34.77**	**-2.76**	**0.00**	**49.07**	**32.31**	**47.96**	**51.93**	**29.81**	**48.60**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**

2.2 Overall Operational

Unmitigated Operational

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Area	68.2998	1.4451	92.6930	0.1586		11.7837	11.7837		11.7837	11.7837	1,268.6664	516.9377	1,785.6041	1.6945	0.0896	1,854.6720
Energy	0.0617	0.5308	0.2496	3.3700e-003		0.0426	0.0426		0.0426	0.0426		673.1852	673.1852	0.0129	0.0123	677.1856
Mobile	7.2480	21.7226	47.9304	0.1299	9.5079	0.1265	9.6344	2.5442	0.1185	2.6627		13,097.2919	13,097.2919	0.6148		13,112.6627
Total	**75.6095**	**23.6985**	**140.8730**	**0.2919**	**9.5079**	**11.9528**	**21.4607**	**2.5442**	**11.9448**	**14.4890**	**1,268.6664**	**14,287.4149**	**15,556.0812**	**2.3222**	**0.1020**	**15,644.5203**

Mitigated Operational

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Area	5.3022	1.0115	10.3392	6.2500e-003		0.1272	0.1272		0.1272	0.1272	0.0000	1,162.2554	1,162.2554	0.0395	0.0210	1,169.4939
Energy	0.0617	0.5308	0.2496	3.3700e-003		0.0426	0.0426		0.0426	0.0426		673.1852	673.1852	0.0129	0.0123	677.1856
Mobile	7.1297	20.9071	44.7084	0.1178	8.4715	0.1159	8.5874	2.2668	0.1086	2.3754		11,882.0500	11,882.0500	0.5811		11,896.5768
Total	**12.4936**	**22.4494**	**55.2972**	**0.1274**	**8.4715**	**0.2857**	**8.7572**	**2.2668**	**0.2784**	**2.5452**	**0.0000**	**13,717.4905**	**13,717.4905**	**0.6334**	**0.0333**	**13,743.2563**

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio-CO2	Total CO2	CH4	N20	CO2e
Percent Reduction	**83.48**	**5.27**	**60.75**	**56.35**	**10.90**	**97.61**	**59.19**	**10.90**	**97.67**	**82.43**	**100.00**	**3.99**	**11.82**	**72.72**	**67.32**	**12.15**

3.0 Construction Detail

Construction Phase

Phase Number	Phase Name	Phase Type	Start Date	End Date	Num Days Week	Num Days	Phase Description
1	Site Preparation	Site Preparation	5/1/2018	5/14/2018	5	10	
2	Grading	Grading	5/15/2018	6/25/2018	5	30	
3	Building Construction	Building Construction	7/24/2018	9/16/2019	5	300	
4	Paving	Paving	6/26/2018	7/23/2018	5	20	
5	Architectural Coating	Architectural Coating	8/6/2019	10/14/2019	5	50	

Acres of Grading (Site Preparation Phase): 0

Acres of Grading (Grading Phase): 75

Acres of Paving: 3.47

Residential Indoor: 212,674; Residential Outdoor: 70,891; Non-Residential Indoor: 134,138; Non-Residential Outdoor: 44,713; Striped Parking Area: 9,057 (Architectural Coating – sqft)

OffRoad Equipment

Phase Name	Offroad Equipment Type	Amount	Usage Hours	Horse Power	Load Factor
Site Preparation	Rubber Tired Dozers	3	8.00	247	0.40
Site Preparation	Tractors/Loaders/Backhoes	4	8.00	97	0.37
Grading	Excavators	2	8.00	158	0.38
Grading	Graders	1	8.00	187	0.41
Grading	Rubber Tired Dozers	1	8.00	247	0.40
Grading	Scrapers	2	8.00	367	0.48
Grading	Tractors/Loaders/Backhoes	2	8.00	97	0.37
Building Construction	Cranes	1	7.00	231	0.29
Building Construction	Forklifts	3	8.00	89	0.20
Building Construction	Generator Sets	1	8.00	84	0.74
Building Construction	Tractors/Loaders/Backhoes	3	7.00	97	0.37
Building Construction	Welders	1	8.00	46	0.45
Paving	Pavers	2	8.00	130	0.42
Paving	Paving Equipment	2	8.00	132	0.36
Paving	Rollers	2	8.00	80	0.38
Architectural Coating	Air Compressors	1	6.00	78	0.48

Trips and VMT

Phase Name	Offroad Equipment Count	Worker Trip Number	Vendor Trip Number	Hauling Trip Number	Worker Trip Length	Vendor Trip Length	Hauling Trip Length	Worker Vehicle Class	Vendor Vehicle Class	Hauling Vehicle Class
Site Preparation	7	18.00	0.00	0.00	10.80	7.30	20.00	LD_Mix	HDT_Mix	HHDT
Grading	8	20.00	0.00	0.00	10.80	7.30	20.00	LD_Mix	HDT_Mix	HHDT
Building Construction	9	171.00	52.00	0.00	10.80	7.30	20.00	LD_Mix	HDT_Mix	HHDT
Paving	6	15.00	0.00	0.00	10.80	7.30	20.00	LD_Mix	HDT_Mix	HHDT
Architectural Coating	1	34.00	0.00	0.00	10.80	7.30	20.00	LD_Mix	HDT_Mix	HHDT

3.1 Mitigation Measures Construction

Use Cleaner Engines for Construction Equipment

Water Exposed Area

Reduce Vehicle Speed on Unpaved Roads

3.2 Site Preparation - 2018

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Fugitive Dust					18.0663	0.0000	18.0663	9.9307	0.0000	9.9307			0.0000			0.0000
Off-Road	4.5627	48.1988	22.4763	0.0380		2.5769	2.5769		2.3708	2.3708		3,831.6239	3,831.6239	1.1928		3,861.4448
Total	**4.5627**	**48.1988**	**22.4763**	**0.0380**	**18.0663**	**2.5769**	**20.6432**	**9.9307**	**2.3708**	**12.3014**		**3,831.6239**	**3,831.6239**	**1.1928**		**3,861.4448**

3.2 Site Preparation - 2018

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.0798	0.0506	0.6350	1.6100e-003	0.1479	9.9000e-004	0.1489	0.0392	9.2000e-004	0.0401		160.2493	160.2493	4.7700e-003		160.3687
Total	**0.0798**	**0.0506**	**0.6350**	**1.6100e-003**	**0.1479**	**9.9000e-004**	**0.1489**	**0.0392**	**9.2000e-004**	**0.0401**		**160.2493**	**160.2493**	**4.7700e-003**		**160.3687**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Fugitive Dust					8.1298	0.0000	8.1298	4.4688	0.0000	4.4688			0.0000			0.0000
Off-Road	0.9312	19.0656	22.9600	0.0380		0.9462	0.9462		0.9462	0.9462	0.0000	3,831.6239	3,831.6239	1.1928		3,861.4448
Total	**0.9312**	**19.0656**	**22.9600**	**0.0380**	**8.1298**	**0.9462**	**9.0760**	**4.4688**	**0.9462**	**5.4150**	**0.0000**	**3,831.6239**	**3,831.6239**	**1.1928**		**3,861.4448**

3.2 Site Preparation - 2018

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.0798	0.0506	0.6350	1.6100e-003	0.1479	9.9000e-004	0.1489	0.0392	9.2000e-004	0.0401		160.2493	160.2493	4.7700e-003		160.3687
Total	**0.0798**	**0.0506**	**0.6350**	**1.6100e-003**	**0.1479**	**9.9000e-004**	**0.1489**	**0.0392**	**9.2000e-004**	**0.0401**		**160.2493**	**160.2493**	**4.7700e-003**		**160.3687**

3.3 Grading - 2018

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Fugitive Dust					8.6733	0.0000	8.6733	3.5965	0.0000	3.5965			0.0000			0.0000
Off-Road	5.0901	59.5218	35.0894	0.0620		2.6337	2.6337		2.4230	2.4230		6,244.4284	6,244.4284	1.9440		6,293.0278
Total	**5.0901**	**59.5218**	**35.0894**	**0.0620**	**8.6733**	**2.6337**	**11.3071**	**3.5965**	**2.4230**	**6.0195**		**6,244.4284**	**6,244.4284**	**1.9440**		**6,293.0278**

3.3 Grading - 2018

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.0886	0.0563	0.7056	1.7900e-003	0.1643	1.1100e-003	0.1654	0.0436	1.0200e-003	0.0446		178.0548	178.0548	5.3000e-003		178.1874
Total	**0.0886**	**0.0563**	**0.7056**	**1.7900e-003**	**0.1643**	**1.1100e-003**	**0.1654**	**0.0436**	**1.0200e-003**	**0.0446**		**178.0548**	**178.0548**	**5.3000e-003**		**178.1874**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Fugitive Dust					3.9030	0.0000	3.9030	1.6184	0.0000	1.6184			0.0000			0.0000
Off-Road	1.5231	29.9782	36.7226	0.0620		1.2994	1.2994		1.2994	1.2994	0.0000	6,244.4284	6,244.4284	1.9440		6,293.0278
Total	**1.5231**	**29.9782**	**36.7226**	**0.0620**	**3.9030**	**1.2994**	**5.2024**	**1.6184**	**1.2994**	**2.9179**	**0.0000**	**6,244.4284**	**6,244.4284**	**1.9440**		**6,293.0278**

3.3 Grading - 2018

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.0886	0.0563	0.7056	1.7900e-003	0.1643	1.1100e-003	0.1654	0.0436	1.0200e-003	0.0446		178.0548	178.0548	5.3000e-003		178.1874
Total	**0.0886**	**0.0563**	**0.7056**	**1.7900e-003**	**0.1643**	**1.1100e-003**	**0.1654**	**0.0436**	**1.0200e-003**	**0.0446**		**178.0548**	**178.0548**	**5.3000e-003**		**178.1874**

3.4 Building Construction - 2018

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Off-Road	2.6795	23.3900	17.5804	0.0269		1.4999	1.4999		1.4099	1.4099		2,620.9351	2,620.9351	0.6421		2,636.9883
Total	**2.6795**	**23.3900**	**17.5804**	**0.0269**		**1.4999**	**1.4999**		**1.4099**	**1.4099**		**2,620.9351**	**2,620.9351**	**0.6421**		**2,636.9883**

3.4 Building Construction - 2018

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.2826	6.9239	1.7695	0.0145	0.3519	0.0574	0.4093	0.1013	0.0549	0.1562		1,529.1198	1,529.1198	0.0808		1,531.1388
Worker	0.7576	0.4811	6.0328	0.0153	1.4047	9.4500e-003	1.4142	0.3726	8.7100e-003	0.3813		1,522.3687	1,522.3687	0.0453		1,523.5021
Total	**1.0401**	**7.4050**	**7.8023**	**0.0298**	**1.7567**	**0.0668**	**1.8235**	**0.4739**	**0.0636**	**0.5375**		**3,051.4885**	**3,051.4885**	**0.1261**		**3,054.6409**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Off-Road	2.1804	21.0398	17.5945	0.0269		1.3299	1.3299		1.2790	1.2790	0.0000	2,620.9351	2,620.9351	0.6421		2,636.9883
Total	**2.1804**	**21.0398**	**17.5945**	**0.0269**		**1.3299**	**1.3299**		**1.2790**	**1.2790**	**0.0000**	**2,620.9351**	**2,620.9351**	**0.6421**		**2,636.9883**

3.4 Building Construction - 2018

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.2826	6.9239	1.7695	0.0145	0.3519	0.0574	0.4093	0.1013	0.0549	0.1562		1,529.1198	1,529.1198	0.0808		1,531.1388
Worker	0.7576	0.4811	6.0328	0.0153	1.4047	9.4500e-003	1.4142	0.3726	8.7100e-003	0.3813		1,522.3687	1,522.3687	0.0453		1,523.5021
Total	**1.0401**	**7.4050**	**7.8023**	**0.0298**	**1.7567**	**0.0668**	**1.8235**	**0.4739**	**0.0636**	**0.5375**		**3,051.4885**	**3,051.4885**	**0.1261**		**3,054.6409**

3.4 Building Construction - 2019

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Off-Road	2.3612	21.0788	17.1638	0.0269		1.2899	1.2899		1.2127	1.2127		2,591.5802	2,591.5802	0.6313		2,607.3635
Total	**2.3612**	**21.0788**	**17.1638**	**0.0269**		**1.2899**	**1.2899**		**1.2127**	**1.2127**		**2,591.5802**	**2,591.5802**	**0.6313**		**2,607.3635**

3.4 Building Construction - 2019

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.2536	6.5232	1.6183	0.0144	0.3519	0.0484	0.4004	0.1013	0.0463	0.1476		1,519.8741	1,519.8741	0.0770		1,521.8002
Worker	0.6824	0.4209	5.3565	0.0148	1.4047	9.2600e-003	1.4140	0.3726	8.5300e-003	0.3811		1,476.5980	1,476.5980	0.0400		1,477.5984
Total	**0.9359**	**6.9441**	**6.9747**	**0.0293**	**1.7567**	**0.0577**	**1.8143**	**0.4739**	**0.0548**	**0.5288**		**2,996.4721**	**2,996.4721**	**0.1171**		**2,999.3986**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Off-Road	1.9494	19.4960	17.2672	0.0269		1.1993	1.1993		1.1549	1.1549	0.0000	2,591.5802	2,591.5802	0.6313		2,607.3635
Total	**1.9494**	**19.4960**	**17.2672**	**0.0269**		**1.1993**	**1.1993**		**1.1549**	**1.1549**	**0.0000**	**2,591.5802**	**2,591.5802**	**0.6313**		**2,607.3635**

3.4 Building Construction - 2019

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.2536	6.5232	1.6183	0.0144	0.3519	0.0484	0.4004	0.1013	0.0463	0.1476		1,519.8741	1,519.8741	0.0770		1,521.8002
Worker	0.6824	0.4209	5.3565	0.0148	1.4047	9.2600e-003	1.4140	0.3726	8.5300e-003	0.3811		1,476.5980	1,476.5980	0.0400		1,477.5984
Total	**0.9359**	**6.9441**	**6.9747**	**0.0293**	**1.7567**	**0.0577**	**1.8143**	**0.4739**	**0.0548**	**0.5288**		**2,996.4721**	**2,996.4721**	**0.1171**		**2,999.3986**

3.5 Paving - 2018

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Off-Road	1.6437	17.5209	14.7964	0.0228		0.9561	0.9561		0.8797	0.8797		2,294.0887	2,294.0887	0.7142		2,311.9432
Paving	0.4546					0.0000	0.0000		0.0000	0.0000			0.0000			0.0000
Total	**2.0983**	**17.5209**	**14.7964**	**0.0228**		**0.9561**	**0.9561**		**0.8797**	**0.8797**		**2,294.0887**	**2,294.0887**	**0.7142**		**2,311.9432**

3.5 Paving - 2018

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.0665	0.0422	0.5292	1.3400e-003	0.1232	8.3000e-004	0.1241	0.0327	7.6000e-004	0.0335		133.5411	133.5411	3.9800e-003		133.6405
Total	**0.0665**	**0.0422**	**0.5292**	**1.3400e-003**	**0.1232**	**8.3000e-004**	**0.1241**	**0.0327**	**7.6000e-004**	**0.0335**		**133.5411**	**133.5411**	**3.9800e-003**		**133.6405**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Off-Road	1.6437	17.5209	14.7964	0.0228		0.9561	0.9561		0.8797	0.8797	0.0000	2,294.0887	2,294.0887	0.7142		2,311.9432
Paving	0.4546					0.0000	0.0000		0.0000	0.0000			0.0000			0.0000
Total	**2.0983**	**17.5209**	**14.7964**	**0.0228**		**0.9561**	**0.9561**		**0.8797**	**0.8797**	**0.0000**	**2,294.0887**	**2,294.0887**	**0.7142**		**2,311.9432**

3.5 Paving - 2018

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.0665	0.0422	0.5292	1.3400e-003	0.1232	8.3000e-004	0.1241	0.0327	7.6000e-004	0.0335		133.5411	133.5411	3.9800e-003		133.6405
Total	**0.0665**	**0.0422**	**0.5292**	**1.3400e-003**	**0.1232**	**8.3000e-004**	**0.1241**	**0.0327**	**7.6000e-004**	**0.0335**		**133.5411**	**133.5411**	**3.9800e-003**		**133.6405**

3.6 Architectural Coating - 2019

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Archit. Coating	49.4836					0.0000	0.0000		0.0000	0.0000			0.0000			0.0000
Off-Road	0.2664	1.8354	1.8413	2.9700e-003		0.1288	0.1288		0.1288	0.1288		281.4481	281.4481	0.0238		282.0423
Total	**49.7500**	**1.8354**	**1.8413**	**2.9700e-003**		**0.1288**	**0.1288**		**0.1288**	**0.1288**		**281.4481**	**281.4481**	**0.0238**		**282.0423**

3.6 Architectural Coating - 2019

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.1357	0.0837	1.0650	2.9500e-003	0.2793	1.8400e-003	0.2811	0.0741	1.7000e-003	0.0758		293.5926	293.5926	7.9600e-003		293.7915
Total	**0.1357**	**0.0837**	**1.0650**	**2.9500e-003**	**0.2793**	**1.8400e-003**	**0.2811**	**0.0741**	**1.7000e-003**	**0.0758**		**293.5926**	**293.5926**	**7.9600e-003**		**293.7915**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Archit. Coating	49.4836					0.0000	0.0000		0.0000	0.0000			0.0000			0.0000
Off-Road	0.2664	1.8354	1.8413	2.9700e-003		0.1288	0.1288		0.1288	0.1288	0.0000	281.4481	281.4481	0.0238		282.0423
Total	**49.7500**	**1.8354**	**1.8413**	**2.9700e-003**		**0.1288**	**0.1288**		**0.1288**	**0.1288**	**0.0000**	**281.4481**	**281.4481**	**0.0238**		**282.0423**

3.6 Architectural Coating - 2019

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.1357	0.0837	1.0650	2.9500e-003	0.2793	1.8400e-003	0.2811	0.0741	1.7000e-003	0.0758		293.5926	293.5926	7.9600e-003		293.7915
Total	**0.1357**	**0.0837**	**1.0650**	**2.9500e-003**	**0.2793**	**1.8400e-003**	**0.2811**	**0.0741**	**1.7000e-003**	**0.0758**		**293.5926**	**293.5926**	**7.9600e-003**		**293.7915**

4.0 Operational Detail - Mobile

4.1 Mitigation Measures Mobile

Increase Diversity

Increase Transit Accessibility

Improve Pedestrian Network

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Mitigated	7.1297	20.9071	44.7084	0.1178	8.4715	0.1159	8.5874	2.2668	0.1086	2.3754		11,882.0500	11,882.0500	0.5811		11,896.5768
Unmitigated	7.2480	21.7226	47.9304	0.1299	9.5079	0.1265	9.6344	2.5442	0.1185	2.6627		13,097.2919	13,097.2919	0.6148		13,112.6627

4.2 Trip Summary Information

	Average Daily Trip Rate			Unmitigated	Mitigated
Land Use	Weekday	Saturday	Sunday	Annual VMT	Annual VMT
Condo/Townhouse High Rise	409.64	422.38	336.14	926,060	825,120
Other Asphalt Surfaces	0.00	0.00	0.00		
Other Asphalt Surfaces	0.00	0.00	0.00		
Single Family Housing	209.44	218.02	189.64	480,022	427,700
Strip Mall	3,963.09	3,759.22	1826.85	2,743,765	2,444,695
Total	4,582.17	4,399.62	2,352.63	4,149,847	3,697,514

4.3 Trip Type Information

	Miles			Trip %			Trip Purpose %		
Land Use	H-W or C-W	H-S or C-C	H-O or C-NW	H-W or C-W	H-S or C-C	H-O or C-NW	Primary	Diverted	Pass-by
Condo/Townhouse High Rise	10.80	4.80	5.70	31.00	15.00	54.00	86	11	3
Other Asphalt Surfaces	9.50	7.30	7.30	0.00	0.00	0.00	0	0	0
Other Asphalt Surfaces	9.50	7.30	7.30	0.00	0.00	0.00	0	0	0
Single Family Housing	10.80	4.80	5.70	31.00	15.00	54.00	86	11	3
Strip Mall	9.50	2.00	7.30	9.90	71.10	19.00	45	40	15

4.4 Fleet Mix

Land Use	LDA	LDT1	LDT2	MDV	LHD1	LHD2	MHD	HHD	OBUS	UBUS	MCY	SBUS	MH
Other Asphalt Surfaces	0.577244	0.040114	0.186710	0.126359	0.018084	0.005120	0.010527	0.023222	0.001588	0.001850	0.005513	0.002759	0.000910
Other Asphalt Surfaces	0.577244	0.040114	0.186710	0.126359	0.018084	0.005120	0.010527	0.023222	0.001588	0.001850	0.005513	0.002759	0.000910
Condo/Townhouse High Rise	0.577244	0.040114	0.186710	0.126359	0.018084	0.005120	0.010527	0.023222	0.001588	0.001850	0.005513	0.002759	0.000910
Single Family Housing	0.577244	0.040114	0.186710	0.126359	0.018084	0.005120	0.010527	0.023222	0.001588	0.001850	0.005513	0.002759	0.000910
Strip Mall	0.577244	0.040114	0.186710	0.126359	0.018084	0.005120	0.010527	0.023222	0.001588	0.001850	0.005513	0.002759	0.000910

5.0 Energy Detail

Historical Energy Use: N

5.1 Mitigation Measures Energy

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
NaturalGas Mitigated	0.0617	0.5308	0.2496	3.3700e-003		0.0426	0.0426		0.0426	0.0426		673.1852	673.1852	0.0129	0.0123	677.1856
NaturalGas Unmitigated	0.0617	0.5308	0.2496	3.3700e-003		0.0426	0.0426		0.0426	0.0426		673.1852	673.1852	0.0129	0.0123	677.1856

5.2 Energy by Land Use - NaturalGas

Unmitigated

	NaturalGas Use	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Land Use	kBTU/yr	lb/day										lb/day					
Condo/Townhouse High Rise	2971.97	0.0321	0.2739	0.1166	1.7500e-003		0.0221	0.0221		0.0221	0.0221		349.6435	349.6435	6.7000e-003	6.4100e-003	351.7212
Other Asphalt Surfaces	0	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000
Single Family Housing	2167	0.0234	0.1997	0.0850	1.2700e-003		0.0162	0.0162		0.0162	0.0162		254.9417	254.9417	4.8900e-003	4.6700e-003	256.4567
Strip Mall	583.1	6.2900e-003	0.0572	0.0480	3.4000e-004		4.3400e-003	4.3400e-003		4.3400e-003	4.3400e-003		68.6000	68.6000	1.3100e-003	1.2600e-003	69.0077
Total		**0.0617**	**0.5308**	**0.2496**	**3.3600e-003**		**0.0426**	**0.0426**		**0.0426**	**0.0426**		**673.1852**	**673.1852**	**0.0129**	**0.0123**	**677.1856**

5.2 Energy by Land Use - NaturalGas

Mitigated

	NaturalGas Use	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Land Use	kBTU/yr	lb/day										lb/day					
Condo/Townhouse High Rise	2.97197	0.0321	0.2739	0.1166	1.7500e-003		0.0221	0.0221		0.0221	0.0221		349.6435	349.6435	6.7000e-003	6.4100e-003	351.7212
Other Asphalt Surfaces	0	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000
Single Family Housing	2.167	0.0234	0.1997	0.0850	1.2700e-003		0.0162	0.0162		0.0162	0.0162		254.9417	254.9417	4.8900e-003	4.6700e-003	256.4567
Strip Mall	0.5831	6.2900e-003	0.0572	0.0480	3.4000e-004		4.3400e-003	4.3400e-003		4.3400e-003	4.3400e-003		68.6000	68.6000	1.3100e-003	1.2600e-003	69.0077
Total		**0.0617**	**0.5308**	**0.2496**	**3.3600e-003**		**0.0426**	**0.0426**		**0.0426**	**0.0426**		**673.1852**	**673.1852**	**0.0129**	**0.0123**	**677.1856**

6.0 Area Detail

6.1 Mitigation Measures Area

Use only Natural Gas Hearths

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Mitigated	5.3022	1.0115	10.3392	6.2500e-003		0.1272	0.1272		0.1272	0.1272	0.0000	1,162.2554	1,162.2554	0.0395	0.0210	1,169.4939
Unmitigated	68.2998	1.4451	92.6930	0.1586		11.7837	11.7837		11.7837	11.7837	1,268.6664	516.9377	1,785.6041	1.6945	0.0896	1,854.6720

6.2 Area by SubCategory

Unmitigated

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
SubCategory	lb/day										lb/day					
Architectural Coating	0.6779					0.0000	0.0000		0.0000	0.0000			0.0000			0.0000
Consumer Products	4.2147					0.0000	0.0000		0.0000	0.0000			0.0000			0.0000
Hearth	63.1025	1.3300	82.7352	0.1581		11.7290	11.7290		11.7290	11.7290	1,268.6664	499.0588	1,767.7252	1.6769	0.0896	1,836.3550
Landscaping	0.3048	0.1151	9.9578	5.2000e-004		0.0547	0.0547		0.0547	0.0547		17.8789	17.8789	0.0175		18.3170
Total	**68.2998**	**1.4451**	**92.6930**	**0.1586**		**11.7837**	**11.7837**		**11.7837**	**11.7837**	**1,268.6664**	**516.9377**	**1,785.6041**	**1.6945**	**0.0896**	**1,854.6720**

6.2 Area by SubCategory

Mitigated

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
SubCategory	lb/day										lb/day					
Architectural Coating	0.6779					0.0000	0.0000		0.0000	0.0000			0.0000			0.0000
Consumer Products	4.2147					0.0000	0.0000		0.0000	0.0000			0.0000			0.0000
Hearth	0.1049	0.8964	0.3815	5.7200e-003		0.0725	0.0725		0.0725	0.0725	0.0000	1,144.3765	1,144.3765	0.0219	0.0210	1,151.1769
Landscaping	0.3048	0.1151	9.9578	5.2000e-004		0.0547	0.0547		0.0547	0.0547		17.8789	17.8789	0.0175		18.3170
Total	**5.3022**	**1.0115**	**10.3392**	**6.2400e-003**		**0.1272**	**0.1272**		**0.1272**	**0.1272**	**0.0000**	**1,162.2554**	**1,162.2554**	**0.0395**	**0.0210**	**1,169.4939**

7.0 Water Detail

7.1 Mitigation Measures Water

8.0 Waste Detail

8.1 Mitigation Measures Waste

9.0 Operational Offroad

Equipment Type	Number	Hours/Day	Days/Year	Horse Power	Load Factor	Fuel Type

10.0 Stationary Equipment

Fire Pumps and Emergency Generators

Equipment Type	Number	Hours/Day	Hours/Year	Horse Power	Load Factor	Fuel Type

Boilers

Equipment Type	Number	Heat Input/Day	Heat Input/Year	Boiler Rating	Fuel Type

User Defined Equipment

Equipment Type	Number

11.0 Vegetation

Wildflower Station

Contra Costa County, Winter

1.0 Project Characteristics

1.1 Land Usage

Land Uses	Size	Metric	Lot Acreage	Floor Surface Area	Population
Other Asphalt Surfaces	37.26	1000sqft	0.86	37,260.00	0
Other Asphalt Surfaces	113.69	1000sqft	2.61	113,690.00	0
Condo/Townhouse High Rise	98.00	Dwelling Unit	7.00	100,094.00	316
Single Family Housing	22.00	Dwelling Unit	1.82	4,930.00	71
Strip Mall	89.42	1000sqft	2.05	89,425.00	0

1.2 Other Project Characteristics

Urbanization	Urban	**Wind Speed (m/s)**	2.2	**Precipitation Freq (Days)**	58
Climate Zone	4			**Operational Year**	2020
Utility Company	Pacific Gas & Electric Company				
CO2 Intensity (lb/MWhr)	641.35	**CH4 Intensity (lb/MWhr)**	0.029	**N2O Intensity (lb/MWhr)**	0.006

1.3 User Entered Comments & Non-Default Data

Wildflower Station - Contra Costa County, Winter

Project Characteristics -

Land Use - Land uses, quantity, and size from Wildflower Preliminary Developement Plan 2017.
Population calculation by a density of 3.22 persons/du from the City of Antioch Housing Element 2015.

Construction Phase - Demolition phase deleted. The property contains no structures and vegetation consists mostly of grass and ruderal vegetation.
Architectural Coating phase overlapped with Building Construction phase to reflect actual construction practices.

Grading - The preliminary grading plan indicates no material imported or exported.

Architectural Coating -

Vehicle Trips - Non-resident C-C Trip Length from City of Antioch Neighborhood Commecial District zone definition.
Non-resident C-W and C-C Trip % adjusted to reflect estimated 179 employees.

Construction Off-road Equipment Mitigation - Fugative dust mitigation per BAAQMD best construction management practices.
Tier 3 Engines required on all grading and excavation equipment to limit daily NOx emissions.

Mobile Land Use Mitigation - Mitigation for mixed use development (LUT-3), transit access (LUT-5), and improved project site walkability (SDT-1) applied.

Area Mitigation - No wood hearths in new construction per BAAQMD regulation 6, rule 3.

Table Name	Column Name	Default Value	New Value
tblConstDustMitigation	WaterUnpavedRoadVehicleSpeed	40	15
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	2.00
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	1.00
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	4.00
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	2.00
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	9.00
tblConstEquipMitigation	Tier	No Change	Tier 3
tblConstEquipMitigation	Tier	No Change	Tier 3
tblConstEquipMitigation	Tier	No Change	Tier 3
tblConstEquipMitigation	Tier	No Change	Tier 3
tblConstEquipMitigation	Tier	No Change	Tier 3
tblConstructionPhase	NumDays	20.00	50.00
tblConstructionPhase	PhaseEndDate	11/25/2019	10/14/2019
tblConstructionPhase	PhaseEndDate	8/19/2019	9/16/2019
tblConstructionPhase	PhaseEndDate	9/16/2019	7/23/2018

tblConstructionPhase	PhaseStartDate	9/17/2019	8/6/2019
tblConstructionPhase	PhaseStartDate	6/26/2018	7/24/2018
tblConstructionPhase	PhaseStartDate	8/20/2019	6/26/2018
tblLandUse	BuildingSpaceSquareFeet	98,000.00	100,094.00
tblLandUse	BuildingSpaceSquareFeet	39,600.00	4,930.00
tblLandUse	BuildingSpaceSquareFeet	89,420.00	89,425.00
tblLandUse	LandUseSquareFeet	98,000.00	100,094.00
tblLandUse	LandUseSquareFeet	39,600.00	4,930.00
tblLandUse	LandUseSquareFeet	89,420.00	89,425.00
tblLandUse	LotAcreage	1.53	7.00
tblLandUse	LotAcreage	7.14	1.82
tblLandUse	Population	280.00	316.00
tblLandUse	Population	63.00	71.00
tblProjectCharacteristics	OperationalYear	2018	2020
tblVehicleTrips	CC_TL	7.30	2.00
tblVehicleTrips	CC_TTP	64.40	71.10
tblVehicleTrips	CW_TTP	16.60	9.90

2.0 Emissions Summary

2.1 Overall Construction (Maximum Daily Emission)

Unmitigated Construction

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Year	lb/day										lb/day					
2018	5.1802	59.5912	35.7447	0.0637	18.2141	2.6349	20.7920	9.9699	2.4241	12.3416	0.0000	6,405.7778	6,405.7778	1.9489	0.0000	6,454.5006
2019	53.2062	30.1500	26.7788	0.0601	2.0360	1.4789	3.5149	0.5480	1.3987	1.9467	0.0000	5,958.6955	5,958.6955	0.7836	0.0000	5,978.2855
Maximum	**53.2062**	**59.5912**	**35.7447**	**0.0637**	**18.2141**	**2.6349**	**20.7920**	**9.9699**	**2.4241**	**12.3416**	**0.0000**	**6,405.7778**	**6,405.7778**	**1.9489**	**0.0000**	**6,454.5006**

Mitigated Construction

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Year	lb/day										lb/day					
2018	3.2458	30.0476	37.3779	0.0637	8.2777	1.3975	9.2249	4.5080	1.3434	5.4551	0.0000	6,405.7778	6,405.7778	1.9489	0.0000	6,454.5006
2019	52.7945	28.5672	26.8822	0.0601	2.0360	1.3883	3.4243	0.5480	1.3409	1.8889	0.0000	5,958.6955	5,958.6955	0.7836	0.0000	5,978.2855
Maximum	**52.7945**	**30.0476**	**37.3779**	**0.0637**	**8.2777**	**1.3975**	**9.2249**	**4.5080**	**1.3434**	**5.4551**	**0.0000**	**6,405.7778**	**6,405.7778**	**1.9489**	**0.0000**	**6,454.5006**

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio-CO2	Total CO2	CH4	N20	CO2e
Percent Reduction	**4.02**	**34.68**	**-2.78**	**0.00**	**49.07**	**32.28**	**47.96**	**51.93**	**29.78**	**48.60**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**

2.2 Overall Operational

Unmitigated Operational

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Area	68.2998	1.4451	92.6930	0.1586		11.7837	11.7837		11.7837	11.7837	1,268.6664	516.9377	1,785.6041	1.6945	0.0896	1,854.6720
Energy	0.0617	0.5308	0.2496	3.3700e-003		0.0426	0.0426		0.0426	0.0426		673.1852	673.1852	0.0129	0.0123	677.1856
Mobile	5.7829	22.4675	53.2383	0.1198	9.5079	0.1286	9.6364	2.5442	0.1205	2.6646		12,072.1804	12,072.1804	0.6591		12,088.6586
Total	**74.1444**	**24.4433**	**146.1809**	**0.2818**	**9.5079**	**11.9549**	**21.4628**	**2.5442**	**11.9468**	**14.4910**	**1,268.6664**	**13,262.3033**	**14,530.9697**	**2.3665**	**0.1020**	**14,620.5163**

Mitigated Operational

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Area	5.3022	1.0115	10.3392	6.2500e-003		0.1272	0.1272		0.1272	0.1272	0.0000	1,162.2554	1,162.2554	0.0395	0.0210	1,169.4939
Energy	0.0617	0.5308	0.2496	3.3700e-003		0.0426	0.0426		0.0426	0.0426		673.1852	673.1852	0.0129	0.0123	677.1856
Mobile	5.6676	21.5646	50.4579	0.1087	8.4715	0.1180	8.5895	2.2668	0.1105	2.3773		10,951.0252	10,951.0252	0.6277		10,966.7185
Total	**11.0315**	**23.1069**	**61.0467**	**0.1183**	**8.4715**	**0.2878**	**8.7593**	**2.2668**	**0.2803**	**2.5472**	**0.0000**	**12,786.4657**	**12,786.4657**	**0.6801**	**0.0333**	**12,813.3980**

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio-CO2	Total CO2	CH4	N20	CO2e
Percent Reduction	**85.12**	**5.47**	**58.24**	**58.02**	**10.90**	**97.59**	**59.19**	**10.90**	**97.65**	**82.42**	**100.00**	**3.59**	**12.01**	**71.26**	**67.32**	**12.36**

3.0 Construction Detail

Construction Phase

Phase Number	Phase Name	Phase Type	Start Date	End Date	Num Days Week	Num Days	Phase Description
1	Site Preparation	Site Preparation	5/1/2018	5/14/2018	5	10	
2	Grading	Grading	5/15/2018	6/25/2018	5	30	
3	Building Construction	Building Construction	7/24/2018	9/16/2019	5	300	
4	Paving	Paving	6/26/2018	7/23/2018	5	20	
5	Architectural Coating	Architectural Coating	8/6/2019	10/14/2019	5	50	

Acres of Grading (Site Preparation Phase): 0

Acres of Grading (Grading Phase): 75

Acres of Paving: 3.47

Residential Indoor: 212,674; Residential Outdoor: 70,891; Non-Residential Indoor: 134,138; Non-Residential Outdoor: 44,713; Striped Parking Area: 9,057 (Architectural Coating – sqft)

OffRoad Equipment

Phase Name	Offroad Equipment Type	Amount	Usage Hours	Horse Power	Load Factor
Site Preparation	Rubber Tired Dozers	3	8.00	247	0.40
Site Preparation	Tractors/Loaders/Backhoes	4	8.00	97	0.37
Grading	Excavators	2	8.00	158	0.38
Grading	Graders	1	8.00	187	0.41
Grading	Rubber Tired Dozers	1	8.00	247	0.40
Grading	Scrapers	2	8.00	367	0.48
Grading	Tractors/Loaders/Backhoes	2	8.00	97	0.37
Building Construction	Cranes	1	7.00	231	0.29
Building Construction	Forklifts	3	8.00	89	0.20
Building Construction	Generator Sets	1	8.00	84	0.74
Building Construction	Tractors/Loaders/Backhoes	3	7.00	97	0.37
Building Construction	Welders	1	8.00	46	0.45
Paving	Pavers	2	8.00	130	0.42
Paving	Paving Equipment	2	8.00	132	0.36
Paving	Rollers	2	8.00	80	0.38
Architectural Coating	Air Compressors	1	6.00	78	0.48

Trips and VMT

Phase Name	Offroad Equipment Count	Worker Trip Number	Vendor Trip Number	Hauling Trip Number	Worker Trip Length	Vendor Trip Length	Hauling Trip Length	Worker Vehicle Class	Vendor Vehicle Class	Hauling Vehicle Class
Site Preparation	7	18.00	0.00	0.00	10.80	7.30	20.00	LD_Mix	HDT_Mix	HHDT
Grading	8	20.00	0.00	0.00	10.80	7.30	20.00	LD_Mix	HDT_Mix	HHDT
Building Construction	9	171.00	52.00	0.00	10.80	7.30	20.00	LD_Mix	HDT_Mix	HHDT
Paving	6	15.00	0.00	0.00	10.80	7.30	20.00	LD_Mix	HDT_Mix	HHDT
Architectural Coating	1	34.00	0.00	0.00	10.80	7.30	20.00	LD_Mix	HDT_Mix	HHDT

3.1 Mitigation Measures Construction

Use Cleaner Engines for Construction Equipment

Water Exposed Area

Reduce Vehicle Speed on Unpaved Roads

3.2 Site Preparation - 2018

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Fugitive Dust					18.0663	0.0000	18.0663	9.9307	0.0000	9.9307			0.0000			0.0000
Off-Road	4.5627	48.1988	22.4763	0.0380		2.5769	2.5769		2.3708	2.3708		3,831.6239	3,831.6239	1.1928		3,861.4448
Total	**4.5627**	**48.1988**	**22.4763**	**0.0380**	**18.0663**	**2.5769**	**20.6432**	**9.9307**	**2.3708**	**12.3014**		**3,831.6239**	**3,831.6239**	**1.1928**		**3,861.4448**

3.2 Site Preparation - 2018

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.0810	0.0625	0.5898	1.4600e-003	0.1479	9.9000e-004	0.1489	0.0392	9.2000e-004	0.0401		145.2144	145.2144	4.4400e-003		145.3256
Total	**0.0810**	**0.0625**	**0.5898**	**1.4600e-003**	**0.1479**	**9.9000e-004**	**0.1489**	**0.0392**	**9.2000e-004**	**0.0401**		**145.2144**	**145.2144**	**4.4400e-003**		**145.3256**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Fugitive Dust					8.1298	0.0000	8.1298	4.4688	0.0000	4.4688			0.0000			0.0000
Off-Road	0.9312	19.0656	22.9600	0.0380		0.9462	0.9462		0.9462	0.9462	0.0000	3,831.6239	3,831.6239	1.1928		3,861.4448
Total	**0.9312**	**19.0656**	**22.9600**	**0.0380**	**8.1298**	**0.9462**	**9.0760**	**4.4688**	**0.9462**	**5.4150**	**0.0000**	**3,831.6239**	**3,831.6239**	**1.1928**		**3,861.4448**

3.2 Site Preparation - 2018

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.0810	0.0625	0.5898	1.4600e-003	0.1479	9.9000e-004	0.1489	0.0392	9.2000e-004	0.0401		145.2144	145.2144	4.4400e-003		145.3256
Total	**0.0810**	**0.0625**	**0.5898**	**1.4600e-003**	**0.1479**	**9.9000e-004**	**0.1489**	**0.0392**	**9.2000e-004**	**0.0401**		**145.2144**	**145.2144**	**4.4400e-003**		**145.3256**

3.3 Grading - 2018

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Fugitive Dust					8.6733	0.0000	8.6733	3.5965	0.0000	3.5965			0.0000			0.0000
Off-Road	5.0901	59.5218	35.0894	0.0620		2.6337	2.6337		2.4230	2.4230		6,244.4284	6,244.4284	1.9440		6,293.0278
Total	**5.0901**	**59.5218**	**35.0894**	**0.0620**	**8.6733**	**2.6337**	**11.3071**	**3.5965**	**2.4230**	**6.0195**		**6,244.4284**	**6,244.4284**	**1.9440**		**6,293.0278**

3.3 Grading - 2018

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.0900	0.0694	0.6553	1.6200e-003	0.1643	1.1100e-003	0.1654	0.0436	1.0200e-003	0.0446		161.3494	161.3494	4.9400e-003		161.4728
Total	**0.0900**	**0.0694**	**0.6553**	**1.6200e-003**	**0.1643**	**1.1100e-003**	**0.1654**	**0.0436**	**1.0200e-003**	**0.0446**		**161.3494**	**161.3494**	**4.9400e-003**		**161.4728**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Fugitive Dust					3.9030	0.0000	3.9030	1.6184	0.0000	1.6184			0.0000			0.0000
Off-Road	1.5231	29.9782	36.7226	0.0620		1.2994	1.2994		1.2994	1.2994	0.0000	6,244.4284	6,244.4284	1.9440		6,293.0278
Total	**1.5231**	**29.9782**	**36.7226**	**0.0620**	**3.9030**	**1.2994**	**5.2024**	**1.6184**	**1.2994**	**2.9179**	**0.0000**	**6,244.4284**	**6,244.4284**	**1.9440**		**6,293.0278**

3.3 Grading - 2018

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.0900	0.0694	0.6553	1.6200e-003	0.1643	1.1100e-003	0.1654	0.0436	1.0200e-003	0.0446		161.3494	161.3494	4.9400e-003		161.4728
Total	**0.0900**	**0.0694**	**0.6553**	**1.6200e-003**	**0.1643**	**1.1100e-003**	**0.1654**	**0.0436**	**1.0200e-003**	**0.0446**		**161.3494**	**161.3494**	**4.9400e-003**		**161.4728**

3.4 Building Construction - 2018

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Off-Road	2.6795	23.3900	17.5804	0.0269		1.4999	1.4999		1.4099	1.4099		2,620.9351	2,620.9351	0.6421		2,636.9883
Total	**2.6795**	**23.3900**	**17.5804**	**0.0269**		**1.4999**	**1.4999**		**1.4099**	**1.4099**		**2,620.9351**	**2,620.9351**	**0.6421**		**2,636.9883**

3.4 Building Construction - 2018

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.2957	7.0287	2.0209	0.0142	0.3519	0.0582	0.4101	0.1013	0.0557	0.1570		1,491.2470	1,491.2470	0.0881		1,493.4497
Worker	0.7697	0.5937	5.6031	0.0139	1.4047	9.4500e-003	1.4142	0.3726	8.7100e-003	0.3813		1,379.5371	1,379.5371	0.0422		1,380.5927
Total	**1.0655**	**7.6224**	**7.6240**	**0.0280**	**1.7567**	**0.0677**	**1.8243**	**0.4739**	**0.0644**	**0.5383**		**2,870.7840**	**2,870.7840**	**0.1303**		**2,874.0424**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Off-Road	2.1804	21.0398	17.5945	0.0269		1.3299	1.3299		1.2790	1.2790	0.0000	2,620.9351	2,620.9351	0.6421		2,636.9883
Total	**2.1804**	**21.0398**	**17.5945**	**0.0269**		**1.3299**	**1.3299**		**1.2790**	**1.2790**	**0.0000**	**2,620.9351**	**2,620.9351**	**0.6421**		**2,636.9883**

3.4 Building Construction - 2018

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.2957	7.0287	2.0209	0.0142	0.3519	0.0582	0.4101	0.1013	0.0557	0.1570		1,491.2470	1,491.2470	0.0881		1,493.4497
Worker	0.7697	0.5937	5.6031	0.0139	1.4047	9.4500e-003	1.4142	0.3726	8.7100e-003	0.3813		1,379.5371	1,379.5371	0.0422		1,380.5927
Total	**1.0655**	**7.6224**	**7.6240**	**0.0280**	**1.7567**	**0.0677**	**1.8243**	**0.4739**	**0.0644**	**0.5383**		**2,870.7840**	**2,870.7840**	**0.1303**		**2,874.0424**

3.4 Building Construction - 2019

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Off-Road	2.3612	21.0788	17.1638	0.0269		1.2899	1.2899		1.2127	1.2127		2,591.5802	2,591.5802	0.6313		2,607.3635
Total	**2.3612**	**21.0788**	**17.1638**	**0.0269**		**1.2899**	**1.2899**		**1.2127**	**1.2127**		**2,591.5802**	**2,591.5802**	**0.6313**		**2,607.3635**

3.4 Building Construction - 2019

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.2656	6.6130	1.8528	0.0141	0.3519	0.0492	0.4011	0.1013	0.0470	0.1483		1,481.7539	1,481.7539	0.0841		1,483.8556
Worker	0.6918	0.5195	4.9389	0.0134	1.4047	9.2600e-003	1.4140	0.3726	8.5300e-003	0.3811		1,337.8984	1,337.8984	0.0371		1,338.8250
Total	**0.9574**	**7.1325**	**6.7917**	**0.0275**	**1.7567**	**0.0584**	**1.8151**	**0.4739**	**0.0556**	**0.5295**		**2,819.6524**	**2,819.6524**	**0.1211**		**2,822.6806**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Off-Road	1.9494	19.4960	17.2672	0.0269		1.1993	1.1993		1.1549	1.1549	0.0000	2,591.5802	2,591.5802	0.6313		2,607.3635
Total	**1.9494**	**19.4960**	**17.2672**	**0.0269**		**1.1993**	**1.1993**		**1.1549**	**1.1549**	**0.0000**	**2,591.5802**	**2,591.5802**	**0.6313**		**2,607.3635**

3.4 Building Construction - 2019

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.2656	6.6130	1.8528	0.0141	0.3519	0.0492	0.4011	0.1013	0.0470	0.1483		1,481.7539	1,481.7539	0.0841		1,483.8556
Worker	0.6918	0.5195	4.9389	0.0134	1.4047	9.2600e-003	1.4140	0.3726	8.5300e-003	0.3811		1,337.8984	1,337.8984	0.0371		1,338.8250
Total	**0.9574**	**7.1325**	**6.7917**	**0.0275**	**1.7567**	**0.0584**	**1.8151**	**0.4739**	**0.0556**	**0.5295**		**2,819.6524**	**2,819.6524**	**0.1211**		**2,822.6806**

3.5 Paving - 2018

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Off-Road	1.6437	17.5209	14.7964	0.0228		0.9561	0.9561		0.8797	0.8797		2,294.0887	2,294.0887	0.7142		2,311.9432
Paving	0.4546					0.0000	0.0000		0.0000	0.0000			0.0000			0.0000
Total	**2.0983**	**17.5209**	**14.7964**	**0.0228**		**0.9561**	**0.9561**		**0.8797**	**0.8797**		**2,294.0887**	**2,294.0887**	**0.7142**		**2,311.9432**

3.5 Paving - 2018

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.0675	0.0521	0.4915	1.2200e-003	0.1232	8.3000e-004	0.1241	0.0327	7.6000e-004	0.0335		121.0120	121.0120	3.7000e-003		121.1046
Total	**0.0675**	**0.0521**	**0.4915**	**1.2200e-003**	**0.1232**	**8.3000e-004**	**0.1241**	**0.0327**	**7.6000e-004**	**0.0335**		**121.0120**	**121.0120**	**3.7000e-003**		**121.1046**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Off-Road	1.6437	17.5209	14.7964	0.0228		0.9561	0.9561		0.8797	0.8797	0.0000	2,294.0887	2,294.0887	0.7142		2,311.9432
Paving	0.4546					0.0000	0.0000		0.0000	0.0000			0.0000			0.0000
Total	**2.0983**	**17.5209**	**14.7964**	**0.0228**		**0.9561**	**0.9561**		**0.8797**	**0.8797**	**0.0000**	**2,294.0887**	**2,294.0887**	**0.7142**		**2,311.9432**

3.5 Paving - 2018

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.0675	0.0521	0.4915	1.2200e-003	0.1232	8.3000e-004	0.1241	0.0327	7.6000e-004	0.0335		121.0120	121.0120	3.7000e-003		121.1046
Total	**0.0675**	**0.0521**	**0.4915**	**1.2200e-003**	**0.1232**	**8.3000e-004**	**0.1241**	**0.0327**	**7.6000e-004**	**0.0335**		**121.0120**	**121.0120**	**3.7000e-003**		**121.1046**

3.6 Architectural Coating - 2019

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Archit. Coating	49.4836					0.0000	0.0000		0.0000	0.0000			0.0000			0.0000
Off-Road	0.2664	1.8354	1.8413	2.9700e-003		0.1288	0.1288		0.1288	0.1288		281.4481	281.4481	0.0238		282.0423
Total	**49.7500**	**1.8354**	**1.8413**	**2.9700e-003**		**0.1288**	**0.1288**		**0.1288**	**0.1288**		**281.4481**	**281.4481**	**0.0238**		**282.0423**

3.6 Architectural Coating - 2019

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.1376	0.1033	0.9820	2.6700e-003	0.2793	1.8400e-003	0.2811	0.0741	1.7000e-003	0.0758		266.0149	266.0149	7.3700e-003		266.1991
Total	**0.1376**	**0.1033**	**0.9820**	**2.6700e-003**	**0.2793**	**1.8400e-003**	**0.2811**	**0.0741**	**1.7000e-003**	**0.0758**		**266.0149**	**266.0149**	**7.3700e-003**		**266.1991**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Archit. Coating	49.4836					0.0000	0.0000		0.0000	0.0000			0.0000			0.0000
Off-Road	0.2664	1.8354	1.8413	2.9700e-003		0.1288	0.1288		0.1288	0.1288	0.0000	281.4481	281.4481	0.0238		282.0423
Total	**49.7500**	**1.8354**	**1.8413**	**2.9700e-003**		**0.1288**	**0.1288**		**0.1288**	**0.1288**	**0.0000**	**281.4481**	**281.4481**	**0.0238**		**282.0423**

3.6 Architectural Coating - 2019

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.1376	0.1033	0.9820	2.6700e-003	0.2793	1.8400e-003	0.2811	0.0741	1.7000e-003	0.0758		266.0149	266.0149	7.3700e-003		266.1991
Total	**0.1376**	**0.1033**	**0.9820**	**2.6700e-003**	**0.2793**	**1.8400e-003**	**0.2811**	**0.0741**	**1.7000e-003**	**0.0758**		**266.0149**	**266.0149**	**7.3700e-003**		**266.1991**

4.0 Operational Detail - Mobile

4.1 Mitigation Measures Mobile

Increase Diversity

Increase Transit Accessibility

Improve Pedestrian Network

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Mitigated	5.6676	21.5646	50.4579	0.1087	8.4715	0.1180	8.5895	2.2668	0.1105	2.3773		10,951.0252	10,951.0252	0.6277		10,966.7185
Unmitigated	5.7829	22.4675	53.2383	0.1198	9.5079	0.1286	9.6364	2.5442	0.1205	2.6646		12,072.1804	12,072.1804	0.6591		12,088.6586

4.2 Trip Summary Information

	Average Daily Trip Rate			Unmitigated	Mitigated
Land Use	Weekday	Saturday	Sunday	Annual VMT	Annual VMT
Condo/Townhouse High Rise	409.64	422.38	336.14	926,060	825,120
Other Asphalt Surfaces	0.00	0.00	0.00		
Other Asphalt Surfaces	0.00	0.00	0.00		
Single Family Housing	209.44	218.02	189.64	480,022	427,700
Strip Mall	3,963.09	3,759.22	1826.85	2,743,765	2,444,695
Total	4,582.17	4,399.62	2,352.63	4,149,847	3,697,514

4.3 Trip Type Information

	Miles			Trip %			Trip Purpose %		
Land Use	H-W or C-W	H-S or C-C	H-O or C-NW	H-W or C-W	H-S or C-C	H-O or C-NW	Primary	Diverted	Pass-by
Condo/Townhouse High Rise	10.80	4.80	5.70	31.00	15.00	54.00	86	11	3
Other Asphalt Surfaces	9.50	7.30	7.30	0.00	0.00	0.00	0	0	0
Other Asphalt Surfaces	9.50	7.30	7.30	0.00	0.00	0.00	0	0	0
Single Family Housing	10.80	4.80	5.70	31.00	15.00	54.00	86	11	3
Strip Mall	9.50	2.00	7.30	9.90	71.10	19.00	45	40	15

4.4 Fleet Mix

Land Use	LDA	LDT1	LDT2	MDV	LHD1	LHD2	MHD	HHD	OBUS	UBUS	MCY	SBUS	MH
Other Asphalt Surfaces	0.577244	0.040114	0.186710	0.126359	0.018084	0.005120	0.010527	0.023222	0.001588	0.001850	0.005513	0.002759	0.000910
Other Asphalt Surfaces	0.577244	0.040114	0.186710	0.126359	0.018084	0.005120	0.010527	0.023222	0.001588	0.001850	0.005513	0.002759	0.000910
Condo/Townhouse High Rise	0.577244	0.040114	0.186710	0.126359	0.018084	0.005120	0.010527	0.023222	0.001588	0.001850	0.005513	0.002759	0.000910
Single Family Housing	0.577244	0.040114	0.186710	0.126359	0.018084	0.005120	0.010527	0.023222	0.001588	0.001850	0.005513	0.002759	0.000910
Strip Mall	0.577244	0.040114	0.186710	0.126359	0.018084	0.005120	0.010527	0.023222	0.001588	0.001850	0.005513	0.002759	0.000910

5.0 Energy Detail

Historical Energy Use: N

5.1 Mitigation Measures Energy

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
NaturalGas Mitigated	0.0617	0.5308	0.2496	3.3700e-003		0.0426	0.0426		0.0426	0.0426		673.1852	673.1852	0.0129	0.0123	677.1856
NaturalGas Unmitigated	0.0617	0.5308	0.2496	3.3700e-003		0.0426	0.0426		0.0426	0.0426		673.1852	673.1852	0.0129	0.0123	677.1856

5.2 Energy by Land Use - NaturalGas

Unmitigated

	NaturalGas Use	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Land Use	kBTU/yr	lb/day										lb/day					
Condo/Townhouse High Rise	2971.97	0.0321	0.2739	0.1166	1.7500e-003		0.0221	0.0221		0.0221	0.0221		349.6435	349.6435	6.7000e-003	6.4100e-003	351.7212
Other Asphalt Surfaces	0	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000
Single Family Housing	2167	0.0234	0.1997	0.0850	1.2700e-003		0.0162	0.0162		0.0162	0.0162		254.9417	254.9417	4.8900e-003	4.6700e-003	256.4567
Strip Mall	583.1	6.2900e-003	0.0572	0.0480	3.4000e-004		4.3400e-003	4.3400e-003		4.3400e-003	4.3400e-003		68.6000	68.6000	1.3100e-003	1.2600e-003	69.0077
Total		**0.0617**	**0.5308**	**0.2496**	**3.3600e-003**		**0.0426**	**0.0426**		**0.0426**	**0.0426**		**673.1852**	**673.1852**	**0.0129**	**0.0123**	**677.1856**

5.2 Energy by Land Use - NaturalGas

Mitigated

	NaturalGas Use	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Land Use	kBTU/yr	lb/day										lb/day					
Condo/Townhouse High Rise	2.97197	0.0321	0.2739	0.1166	1.7500e-003		0.0221	0.0221		0.0221	0.0221		349.6435	349.6435	6.7000e-003	6.4100e-003	351.7212
Other Asphalt Surfaces	0	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000
Single Family Housing	2.167	0.0234	0.1997	0.0850	1.2700e-003		0.0162	0.0162		0.0162	0.0162		254.9417	254.9417	4.8900e-003	4.6700e-003	256.4567
Strip Mall	0.5831	6.2900e-003	0.0572	0.0480	3.4000e-004		4.3400e-003	4.3400e-003		4.3400e-003	4.3400e-003		68.6000	68.6000	1.3100e-003	1.2600e-003	69.0077
Total		**0.0617**	**0.5308**	**0.2496**	**3.3600e-003**		**0.0426**	**0.0426**		**0.0426**	**0.0426**		**673.1852**	**673.1852**	**0.0129**	**0.0123**	**677.1856**

6.0 Area Detail

6.1 Mitigation Measures Area

Use only Natural Gas Hearths

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Mitigated	5.3022	1.0115	10.3392	6.2500e-003		0.1272	0.1272		0.1272	0.1272	0.0000	1,162.2554	1,162.2554	0.0395	0.0210	1,169.4939
Unmitigated	68.2998	1.4451	92.6930	0.1586		11.7837	11.7837		11.7837	11.7837	1,268.6664	516.9377	1,785.6041	1.6945	0.0896	1,854.6720

6.2 Area by SubCategory

Unmitigated

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
SubCategory	lb/day										lb/day					
Architectural Coating	0.6779					0.0000	0.0000		0.0000	0.0000			0.0000			0.0000
Consumer Products	4.2147					0.0000	0.0000		0.0000	0.0000			0.0000			0.0000
Hearth	63.1025	1.3300	82.7352	0.1581		11.7290	11.7290		11.7290	11.7290	1,268.6664	499.0588	1,767.7252	1.6769	0.0896	1,836.3550
Landscaping	0.3048	0.1151	9.9578	5.2000e-004		0.0547	0.0547		0.0547	0.0547		17.8789	17.8789	0.0175		18.3170
Total	**68.2998**	**1.4451**	**92.6930**	**0.1586**		**11.7837**	**11.7837**		**11.7837**	**11.7837**	**1,268.6664**	**516.9377**	**1,785.6041**	**1.6945**	**0.0896**	**1,854.6720**

6.2 Area by SubCategory

Mitigated

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
SubCategory	lb/day										lb/day					
Architectural Coating	0.6779					0.0000	0.0000		0.0000	0.0000			0.0000			0.0000
Consumer Products	4.2147					0.0000	0.0000		0.0000	0.0000			0.0000			0.0000
Hearth	0.1049	0.8964	0.3815	5.7200e-003		0.0725	0.0725		0.0725	0.0725	0.0000	1,144.3765	1,144.3765	0.0219	0.0210	1,151.1769
Landscaping	0.3048	0.1151	9.9578	5.2000e-004		0.0547	0.0547		0.0547	0.0547		17.8789	17.8789	0.0175		18.3170
Total	**5.3022**	**1.0115**	**10.3392**	**6.2400e-003**		**0.1272**	**0.1272**		**0.1272**	**0.1272**	**0.0000**	**1,162.2554**	**1,162.2554**	**0.0395**	**0.0210**	**1,169.4939**

7.0 Water Detail

7.1 Mitigation Measures Water

8.0 Waste Detail

8.1 Mitigation Measures Waste

9.0 Operational Offroad

Equipment Type	Number	Hours/Day	Days/Year	Horse Power	Load Factor	Fuel Type

10.0 Stationary Equipment

Fire Pumps and Emergency Generators

Equipment Type	Number	Hours/Day	Hours/Year	Horse Power	Load Factor	Fuel Type

Boilers

Equipment Type	Number	Heat Input/Day	Heat Input/Year	Boiler Rating	Fuel Type

User Defined Equipment

Equipment Type	Number

11.0 Vegetation

Appendix NOI:
Noise modeling results

Summary

File Name on Meter	EF_HS.051
File Name on PC	SLM_0003788_EF_HS_051.00.ldbin
Serial Number	0003788
Model	SoundExpert® LxT
Firmware Version	2.301
User	
Location	
Job Description	
Note	

Measurement

Description	EF Academy Project
Start	2017-06-27 16:29:21
Stop	2017-06-27 16:39:21
Duration	00:10:00.0
Run Time	00:10:00.0
Pause	00:00:00.0
Pre Calibration	2017-06-27 16:21:26
Post Calibration	None
Calibration Deviation	---

Overall Settings

RMS Weight	A Weighting	
Peak Weight	A Weighting	
Detector	Slow	
Preamp	PRMLxT1L	
Microphone Correction	Off	
Integration Method	Exponential	
OBA Range	Normal	
OBA Bandwidth	1/1 and 1/3	
OBA Freq. Weighting	A Weighting	
OBA Max Spectrum	At LMax	
Overload	120.3 dB	
	A	**C**
Under Range Peak	**76.6**	73.6
Under Range Limit	**25.3**	24.8
Noise Floor	15.9	15.7

Results

LASeq	50.5 dB	
LASE	78.3 dB	
EAS	7.485 µPa²h	
LASpeak (max)	2017-06-27 16:29:38	82.0
LASmax	2017-06-27 16:33:39	55.4
LASmin	2017-06-27 16:38:47	46.5
SEA	-99.9 dB	

LAS > 85.0 dB (Exceedance Counts / Duration)	0	0.0
LAS > 115.0 dB (Exceedance Counts / Duration)	0	0.0
LASpeak > 135.0 dB (Exceedance Counts / Duration)	0	0.0
LASpeak > 137.0 dB (Exceedance Counts / Duration)	0	0.0
LASpeak > 140.0 dB (Exceedance Counts / Duration)	0	0.0

Community Noise	**Ldn**	**LDay 07:00-23:00**
	50.5	50.5

LCSeq	67.3	dB
LASeq	50.5	dB
LCSeq - LASeq	16.8	dB
LAIeq	51.3	dB
LAeq	50.5	dB
LAIeq - LAeq	0.8	dB

	A	
	dB	**Time Stamp**
Leq	50.5	
LS(max)	55.4	2017/06/27 16:33:39
LS(min)	46.5	2017/06/27 16:38:47
LPeak(max)	82.0	2017/06/27 16:29:38

# Overloads	0	
Overload Duration	0.0	s
# OBA Overloads	0	
OBA Overload Duration	0.0	s

Statistics

LAS5.00	52.6	dB
LAS10.00	52.1	dB
LAS33.30	50.9	dB
LAS50.00	50.2	dB
LAS66.60	49.6	dB
LAS90.00	48.4	dB

Calibration History

Preamp	**Date**	**dB re. 1V/Pa**
Direct	2017-01-03 10:54:35	-27.0
Direct	2017-01-03 10:30:13	-26.0
Direct	2014-07-01 09:45:44	-27.0
PRMLxT1L	2017-06-27 16:21:22	-26.6
PRMLxT1L	2017-06-26 11:13:28	-26.6
PRMLxT1L	2017-06-20 10:09:05	-26.6
PRMLxT1L	2017-06-12 12:50:10	-26.6
PRMLxT1L	2017-06-06 15:05:30	-26.6
PRMLxT1L	2017-05-05 15:45:44	-26.6

PRMLxT1L	2017-04-29 09:09:14	-26.6
PRMLxT1L	2017-04-21 11:23:22	-26.5
PRMLxT1L	2017-03-31 13:13:53	-26.6
PRMLxT1L	2017-03-14 08:18:51	-26.6
PRMLxT1L	2017-03-10 10:18:04	-26.5

Z
78.6 dB
31.3 dB
21.4 dB

dB
dB
dB

s
s
s
s
s

LNight 23:00-07:00	Lden	LDay 07:00-19:00	LEvening 19:00-23:00	LNight 23:00-07:00
-99.9	50.5	50.5	-99.9	-99.9

C		Z	
dB	Time Stamp	dB	Time Stamp

6.3	**8.0**	**10.0**	**12.5**
2.5	1.9	3.3	7.7
61.7	59.8	59.2	54.2
64.6	55.5	59.0	60.8
61.3	59.9	62.9	60.0
61.9	63.5	53.7	67.2
48.3	50.2	49.4	58.8
48.5	42.2	44.8	43.0
51.3	59.2	56.0	47.6

39.5	40.2	49.9	42.2
37.9	45.8	40.7	31.9
48.6	50.1	57.0	56.7
42.4	46.2	50.2	47.7
39.5	42.0	44.7	43.1

dB

16.0	**20.0**	**25.0**	**31.5**	**40.0**	**50.0**	**63.0**	**80.0**	**100**	**125**	**160**	**200**	**250**	**315**	**400**	**500**
-1.0	2.3	0.5	3.1	2.3	0.9	2.9	4.5	6.7	17.0	7.3	3.9	12.5	9.3	7.1	3.6
61.0	44.5	36.3	44.2	35.5	41.3	42.1	33.4	39.3	37.9	29.0	27.5	26.0	24.1	19.7	20.0
56.7	50.3	53.1	46.7	42.7	47.4	40.0	41.2	44.2	46.7	45.4	44.6	39.9	34.1	34.7	33.9
65.2	53.8	52.2	50.6	50.7	52.6	45.8	44.1	41.8	44.0	42.5	41.5	38.5	35.7	32.7	29.0
67.9	53.0	49.2	51.6	57.3	49.4	45.7	39.6	47.2	42.3	41.2	46.7	48.5	50.6	52.0	52.6
56.7	47.6	39.9	34.8	38.1	45.6	39.2	37.3	40.3	35.3	35.2	42.1	40.0	45.1	45.4	46.2
58.8	54.4	33.4	42.3	46.2	55.6	46.5	32.9	42.4	39.2	36.9	40.1	40.7	33.7	38.1	29.8
45.2	40.7	49.8	45.0	52.4	46.9	41.8	43.5	35.1	39.5	37.8	37.0	35.6	32.8	30.4	25.8

45.9	36.9	38.3	43.8	40.7	37.6	37.8	33.8	31.5	32.4	25.3	25.4	27.3	21.4	22.2	16.4
36.8	39.9	42.4	45.7	48.9	45.8	39.0	52.1	54.6	47.0	39.7	35.5	37.4	33.6	27.9	20.6
53.2	49.6	43.0	43.6	51.3	49.2	46.0	36.2	40.9	37.3	40.1	37.5	41.7	38.4	36.1	31.9
43.3	32.8	41.8	42.5	43.5	40.8	40.8	37.3	31.2	30.3	22.9	15.8	17.3	15.7	15.4	15.3
44.6	36.6	31.4	30.2	38.4	45.3	53.3	44.1	43.4	43.7	42.7	49.0	55.1	45.6	51.4	53.3

630	800	1000	1250	1600	2000	2500	3150	4000	5000	6300	8000	10000	12500
8.0	9.0	7.3	10.0	9.2	9.8	11.6	12.5	13.2	40.2	17.7	16.3	18.1	20.4
17.4	28.0	113.0	48.1	19.6	62.7	18.7	56.6	25.5	27.7	20.7	22.0	23.6	25.3
21.4	29.3	114.0	49.1	19.8	66.0	18.7	57.5	29.4	28.0	21.3	22.9	24.6	26.4
17.4	28.6	114.0	49.1	19.1	65.8	18.9	57.4	29.4	27.8	21.7	22.9	24.2	26.2
43.9	30.1	114.0	49.1	20.9	65.8	19.0	57.4	29.5	27.9	21.5	22.7	24.6	26.3
32.4	30.2	114.0	49.2	19.3	65.9	19.4	57.4	29.6	28.0	21.5	22.9	24.4	26.2
22.0	28.8	114.0	49.1	19.1	66.0	19.0	57.5	29.5	27.8	21.4	22.7	24.5	26.4
20.4	28.5	113.9	49.0	19.0	66.0	19.2	57.4	29.7	27.7	21.7	22.8	24.6	26.3

16.8	28.8	113.9	49.0	18.9	65.7	19.4	57.2	29.4	27.9	21.1	22.5	24.3	26.0
18.1	28.8	114.1	49.2	19.2	65.9	19.0	56.7	28.8	27.3	21.5	23.0	24.6	26.4
20.9	28.6	114.0	49.1	19.4	65.9	19.3	57.5	29.5	27.9	21.5	22.6	24.3	26.5
18.2	29.5	113.9	49.1	19.3	65.7	19.4	57.2	29.6	28.1	21.7	22.8	24.3	26.0
45.3	30.8	114.1	49.2	21.1	66.1	19.5	57.6	29.8	28.3	21.9	22.9	24.6	26.3

16000	20000
20.2	21.5
28.1	30.6
28.8	31.4
28.8	31.5
28.9	31.5
28.8	31.9
28.8	31.6
28.7	31.2

28.7	31.2
28.9	31.6
28.7	31.3
28.7	31.3
28.8	31.6

1/1 Octave

Frequency (Hz)	8.0	16.0	31.5	63.0	125	250	500	1000	2000	4000	8000	16000
Overall 1/1 Spectra	6.1	16.0	26.7	32.0	32.7	34.4	41.7	47.4	43.9	39.6	31.9	19.2
Max 1/1 Spectra	16.3	28.0	41.2	44.1	42.3	41.1	45.7	49.7	49.5	48.2	40.6	26.8
Min 1/1 Spectra	5.9	3.2	16.2	23.9	25.9	28.6	36.1	43.0	39.4	31.7	24.9	16.0

1/3 Octave

Frequency (Hz)	6.3	8.0	10.0	12.5	16.0	20.0	25.0	31.5	40.0	50.0	63.0	80.0
Overall 1/3 Spectra	1.9	1.0	1.4	5.0	9.9	14.3	18.6	21.4	24.0	27.7	27.2	27.0
Max 1/3 Spectra	1.9	5.0	15.5	17.5	18.6	26.8	31.9	34.2	36.9	39.3	39.4	39.0
Min 1/3 Spectra	1.9	0.9	0.3	-0.8	-1.6	-0.4	5.1	9.3	13.9	14.2	17.5	18.8

1/1 OBA Ref. Spectra

Frequency (Hz)	8.0	16.0	31.5	63.0	125	250	500	1000	2000	4000	8000	16000
1	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
2	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
3	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
4	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

1/3 OBA Ref. Spectra

Frequency (Hz)	6.3	8.0	10.0	12.5	16.0	20.0	25.0	31.5	40.0	50.0	63.0	80.0
1	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
2	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
3	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
4	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

1/1 OBA Under Range

Frequency (Hz)	8.0	16.0	31.5	63.0	125	250	500	1000	2000	4000	8000	16000
Under Range Limit	20.3	17.6	15.7	13.9	12.3	13.0	14.3	16.5	19.1	22.3	24.9	28.1
Noise Floor	15.9	13.2	11.1	9.2	7.6	7.4	8.6	10.6	13.0	16.0	18.7	21.7

1/3 OBA Under Range

Frequency (Hz)	6.3	8.0	10.0	12.5	16.0	20.0	25.0	31.5	40.0	50.0	63.0	80.0
Under Range Limit	21.9	20.9	20.3	19.2	18.4	17.6	16.9	16.3	15.7	14.9	14.5	13.9
Noise Floor	11.9	10.9	10.3	9.2	8.4	7.6	6.9	6.3	5.7	4.9	4.5	3.9

100	125	160	200	250	315	400	500	630	800	1000	1250	1600	2000	2500	3150
28.2	28.2	27.5	28.4	29.3	30.9	33.6	36.7	39.1	42.1	43.6	42.1	40.4	38.8	37.9	36.4
39.0	37.1	36.0	36.0	36.8	37.0	39.0	41.2	42.2	44.4	45.6	45.1	44.7	44.7	44.7	45.0
20.1	21.0	21.8	21.0	23.4	25.1	28.3	31.0	33.2	36.3	39.1	38.1	35.7	33.9	31.1	28.7

100	125	160	200	250	315	400	500	630	800	1000	1250	1600	2000	2500	3150
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

100	125	160	200	250	315	400	500	630	800	1000	1250	1600	2000	2500	3150
13.3	12.7	12.3	12.4	12.5	13.0	13.4	13.8	14.3	15.1	15.7	16.5	17.3	18.2	19.1	20.1
3.3	2.7	2.3	2.4	2.5	3.0	3.4	3.8	4.3	5.1	5.7	6.5	7.3	8.2	9.1	10.1

4000	5000	6300	8000	10000	12500	16000	20000
34.8	32.5	29.9	26.1	22.0	17.1	12.9	10.2
43.6	41.4	38.7	34.9	30.5	25.1	19.9	15.6
26.4	24.1	22.4	19.5	16.6	13.1	10.2	8.6

4000	5000	6300	8000	10000	12500	16000	20000
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

4000	5000	6300	8000	10000	12500	16000	20000
21.0	22.3	22.8	23.8	24.9	25.8	26.7	28.1
11.0	12.3	12.8	13.8	14.9	15.8	16.7	18.1

Record #	Date	Time	Record Type	Cause	#	TH Record
1	2017-06-27	16:21:26	Calibration Change	Key	0.04 dB	1
2	2017-06-27	16:29:21	Run	Key	1	2
3	2017-06-27	16:39:21	Stop	Timer	1	123

Sound Record

Statistics		
Level (dB)	**Count**	**Percent**
Under	0	0.00
46.5	11	0.02
46.6	18	0.03
46.7	41	0.07
46.8	139	0.23
46.9	207	0.34
47.0	247	0.41
47.1	320	0.53
47.2	419	0.70
47.3	465	0.77
47.4	533	0.89
47.5	353	0.59
47.6	318	0.53
47.7	536	0.89
47.8	358	0.60
47.9	259	0.43
48.0	272	0.45
48.1	367	0.61
48.2	441	0.74
48.3	496	0.83
48.4	434	0.72
48.5	409	0.68
48.6	729	1.22
48.7	813	1.36
48.8	953	1.59
48.9	1074	1.79
49.0	945	1.58
49.1	1007	1.68
49.2	1192	1.99
49.3	1348	2.25
49.4	1610	2.68
49.5	2252	3.75
49.6	2002	3.34
49.7	1811	3.02
49.8	1492	2.49
49.9	1470	2.45
50.0	1693	2.82
50.1	2005	3.34
50.2	1723	2.87
50.3	1428	2.38
50.4	1161	1.93
50.5	1287	2.14
50.6	1521	2.54
50.7	1778	2.96
50.8	1809	3.02
50.9	1484	2.47

51.0	1666	2.78
51.1	1601	2.67
51.2	1324	2.21
51.3	1483	2.47
51.4	1127	1.88
51.5	1051	1.75
51.6	1054	1.76
51.7	885	1.48
51.8	849	1.41
51.9	902	1.50
52.0	656	1.09
52.1	643	1.07
52.2	567	0.94
52.3	721	1.20
52.4	750	1.25
52.5	414	0.69
52.6	409	0.68
52.7	291	0.49
52.8	241	0.40
52.9	181	0.30
53.0	188	0.31
53.1	157	0.26
53.2	113	0.19
53.3	122	0.20
53.4	85	0.14
53.5	88	0.15
53.6	167	0.28
53.7	161	0.27
53.8	76	0.13
53.9	105	0.18
54.0	74	0.12
54.1	143	0.24
54.2	68	0.11
54.3	93	0.16
54.4	22	0.04
54.5	12	0.02
54.6	19	0.03
54.7	27	0.04
54.8	17	0.03
54.9	17	0.03
55.0	19	0.03
55.1	19	0.03
55.2	87	0.14
55.3	57	0.09
55.4	19	0.03
Over	0	0.00
Total Count	60000	

Record #	Date	Time	Run Duration	Run Time	Pause	LASeq	LASE	LASmin
1	2017-06-27	16:29:21	00:10:00.0	00:10:00.0	00:00:00.0	50.5	78.3	46.5

LASmin Time	LASmax	LASmax Time	LApeak (max)	LApeak (max) Time	SPL 1 Count
16:38:47	55.4	16:33:39	82.0	16:29:38	0

SPL 1 Duration	SPL 2 Count	SPL 2 Duration	Peak 1 Count	Peak 1 Duration	Peak 2 Count
0.0	0	0.0	0	0.0	0

Peak 2 Duration	Peak 3 Count	Peak 3 Duration	LAS5.00	LAS10.00	LAS33.30	LAS50.00
0.0	0	0.0	52.6	52.1	50.9	50.2

LAS66.60	LAS90.00	SEA	LCSeq	LASeq	LCSeq - LASeq	LAIeq	LAeq	LAIeq - LAeq
49.6	48.4	-99.9	67.3	50.5	16.8	51.3	50.5	0.8

# Overloads	Overloads Duration	# OBA Overloads	OBA Overloads Duration	1/1 LASeq 8.0
0	0.0	0	0.0	6.1

1/1 LASeq 16.0	1/1 LASeq 31.5	1/1 LASeq 63.0	1/1 LASeq 125	1/1 LASeq 250	1/1 LASeq 500
16.0	26.7	32.0	32.7	34.4	41.7

1/1 LASeq 1000	1/1 LASeq 2000	1/1 LASeq 4000	1/1 LASeq 8000	1/1 LASeq 16000
47.4	43.9	39.6	31.9	19.2

1/1 LASmax 8.0	1/1 LASmax 16.0	1/1 LASmax 31.5	1/1 LASmax 63.0	1/1 LASmax 125
16.3	28.0	41.2	44.1	42.3

1/1 LASmax 250	1/1 LASmax 500	1/1 LASmax 1000	1/1 LASmax 2000	1/1 LASmax 4000
41.1	45.7	49.7	49.5	48.2

1/1 LASmax 8000	1/1 LASmax 16000	1/1 LASmin 8.0	1/1 LASmin 16.0	1/1 LASmin 31.5
40.6	26.8	5.9	3.2	16.2

1/1 LASmin 63.0	1/1 LASmin 125	1/1 LASmin 250	1/1 LASmin 500	1/1 LASmin 1000
23.9	25.9	28.6	36.1	43.0

1/1 LASmin 2000	1/1 LASmin 4000	1/1 LASmin 8000	1/1 LASmin 16000	1/3 LASeq 6.3
39.4	31.7	24.9	16.0	1.9

1/3 LASeq 8.0	1/3 LASeq 10.0	1/3 LASeq 12.5	1/3 LASeq 16.0	1/3 LASeq 20.0	1/3 LASeq 25.0
1.0	1.4	5.0	9.9	14.3	18.6

1/3 LASeq 31.5	1/3 LASeq 40.0	1/3 LASeq 50.0	1/3 LASeq 63.0	1/3 LASeq 80.0	1/3 LASeq 100
21.4	24.0	27.7	27.2	27.0	28.2

1/3 LASeq 125	1/3 LASeq 160	1/3 LASeq 200	1/3 LASeq 250	1/3 LASeq 315	1/3 LASeq 400
28.2	27.5	28.4	29.3	30.9	33.6

1/3 LASeq 500	1/3 LASeq 630	1/3 LASeq 800	1/3 LASeq 1000	1/3 LASeq 1250	1/3 LASeq 1600
36.7	39.1	42.1	43.6	42.1	40.4

1/3 LASeq 2000	1/3 LASeq 2500	1/3 LASeq 3150	1/3 LASeq 4000	1/3 LASeq 5000
38.8	37.9	36.4	34.8	32.5

1/3 LASeq 6300	1/3 LASeq 8000	1/3 LASeq 10000	1/3 LASeq 12500	1/3 LASeq 16000
29.9	26.1	22.0	17.1	12.9

1/3 LASeq 20000	1/3 LASmax 6.3	1/3 LASmax 8.0	1/3 LASmax 10.0	1/3 LASmax 12.5
10.2	1.9	5.0	15.5	17.5

1/3 LASmax 16.0	1/3 LASmax 20.0	1/3 LASmax 25.0	1/3 LASmax 31.5	1/3 LASmax 40.0
18.6	26.8	31.9	34.2	36.9

1/3 LASmax 50.0	1/3 LASmax 63.0	1/3 LASmax 80.0	1/3 LASmax 100	1/3 LASmax 125
39.3	39.4	39.0	39.0	37.1

1/3 LASmax 160	1/3 LASmax 200	1/3 LASmax 250	1/3 LASmax 315	1/3 LASmax 400
36.0	36.0	36.8	37.0	39.0

1/3 LASmax 500	1/3 LASmax 630	1/3 LASmax 800	1/3 LASmax 1000	1/3 LASmax 1250
41.2	42.2	44.4	45.6	45.1

1/3 LASmax 1600	1/3 LASmax 2000	1/3 LASmax 2500	1/3 LASmax 3150	1/3 LASmax 4000
44.7	44.7	44.7	45.0	43.6

1/3 LASmax 5000	1/3 LASmax 6300	1/3 LASmax 8000	1/3 LASmax 10000	1/3 LASmax 12500
41.4	38.7	34.9	30.5	25.1

1/3 LASmax 16000	1/3 LASmax 20000	1/3 LASmin 6.3	1/3 LASmin 8.0	1/3 LASmin 10.0
19.9	15.6	1.9	0.9	0.3

1/3 LASmin 12.5	1/3 LASmin 16.0	1/3 LASmin 20.0	1/3 LASmin 25.0	1/3 LASmin 31.5
-0.8	-1.6	-0.4	5.1	9.3

1/3 LASmin 40.0	1/3 LASmin 50.0	1/3 LASmin 63.0	1/3 LASmin 80.0	1/3 LASmin 100
13.9	14.2	17.5	18.8	20.1

1/3 LASmin 125	1/3 LASmin 160	1/3 LASmin 200	1/3 LASmin 250	1/3 LASmin 315
21.0	21.8	21.0	23.4	25.1

1/3 LASmin 400	1/3 LASmin 500	1/3 LASmin 630	1/3 LASmin 800	1/3 LASmin 1000
28.3	31.0	33.2	36.3	39.1

1/3 LASmin 1250	1/3 LASmin 1600	1/3 LASmin 2000	1/3 LASmin 2500	1/3 LASmin 3150
38.1	35.7	33.9	31.1	28.7

1/3 LASmin 4000	1/3 LASmin 5000	1/3 LASmin 6300	1/3 LASmin 8000	1/3 LASmin 10000
26.4	24.1	22.4	19.5	16.6

1/3 LASmin 12500	1/3 LASmin 16000	1/3 LASmin 20000
13.1	10.2	8.6

Record #	Record Type	Date	Time	LASeq	LApeak	LASmax	LASmin	Battery
1	alibration Chang	2017-06-27	16:21:26					
2	Run	2017-06-27	16:29:21					
3		2017-06-27	16:29:21	51.5	66.4	52.5	50.0	5.0
4		2017-06-27	16:29:26	50.3	70.6	51.0	49.9	5.0
5		2017-06-27	16:29:31	49.9	70.6	51.2	49.1	5.0
6		2017-06-27	16:29:36	51.7	82.0	52.7	51.2	5.0
7		2017-06-27	16:29:41	50.6	72.7	51.3	49.9	5.0
8		2017-06-27	16:29:46	49.9	70.3	50.4	49.4	5.0
9		2017-06-27	16:29:51	50.9	69.9	51.4	50.3	5.0
10		2017-06-27	16:29:56	50.5	74.7	51.3	49.7	5.0
11		2017-06-27	16:30:01	51.2	65.0	52.5	49.9	5.0
12		2017-06-27	16:30:06	51.6	65.6	52.6	50.9	5.0
13		2017-06-27	16:30:11	51.7	65.3	52.0	51.4	5.0
14		2017-06-27	16:30:16	52.2	65.0	52.8	51.6	5.0
15		2017-06-27	16:30:21	51.0	63.8	51.7	50.5	5.0
16		2017-06-27	16:30:26	50.6	63.4	51.4	49.9	5.0
17		2017-06-27	16:30:31	50.2	74.1	50.7	49.8	5.0
18		2017-06-27	16:30:36	49.5	61.6	49.8	49.3	5.0
19		2017-06-27	16:30:41	49.7	62.8	50.5	49.1	5.0
20		2017-06-27	16:30:46	50.9	64.1	51.5	50.5	5.0
21		2017-06-27	16:30:51	52.0	66.0	52.9	51.1	5.0
22		2017-06-27	16:30:56	51.4	65.7	51.7	51.0	5.0
23		2017-06-27	16:31:01	50.5	62.8	51.4	49.5	5.0
24		2017-06-27	16:31:06	50.2	74.2	51.1	49.6	5.0
25		2017-06-27	16:31:11	50.8	63.4	51.3	50.5	5.0
26		2017-06-27	16:31:16	52.7	65.7	53.8	51.2	5.0
27		2017-06-27	16:31:21	53.2	66.5	53.7	52.3	5.0
28		2017-06-27	16:31:26	52.0	65.4	52.4	51.3	5.0
29		2017-06-27	16:31:31	51.3	66.8	52.5	50.5	5.0
30		2017-06-27	16:31:36	51.1	74.6	51.6	50.7	5.0
31		2017-06-27	16:31:41	50.4	65.5	51.0	49.9	5.0
32		2017-06-27	16:31:46	49.7	62.8	50.1	49.4	5.0
33		2017-06-27	16:31:51	51.0	64.7	51.6	49.8	5.0
34		2017-06-27	16:31:56	51.2	63.8	51.5	51.0	5.0
35		2017-06-27	16:32:01	51.6	64.5	51.8	51.2	5.0
36		2017-06-27	16:32:06	51.2	64.1	51.4	50.9	5.0
37		2017-06-27	16:32:11	51.0	63.7	51.4	50.6	5.0
38		2017-06-27	16:32:16	50.4	74.9	51.2	50.0	5.0
39		2017-06-27	16:32:21	50.0	61.8	51.0	49.3	5.0
40		2017-06-27	16:32:26	49.6	62.1	49.9	49.2	5.0
41		2017-06-27	16:32:31	50.0	63.4	50.4	49.3	5.0
42		2017-06-27	16:32:36	49.8	65.4	50.2	49.3	5.0
43		2017-06-27	16:32:41	50.2	63.8	50.6	49.8	5.0
44		2017-06-27	16:32:46	50.7	63.7	51.7	50.2	5.0
45		2017-06-27	16:32:51	51.3	64.2	51.9	50.8	5.0
46		2017-06-27	16:32:56	49.9	62.8	50.9	49.4	5.0
47		2017-06-27	16:33:01	50.4	63.5	50.9	49.4	5.0

48	2017-06-27	16:33:06	51.0	71.5	52.4	50.2	5.0
49	2017-06-27	16:33:11	52.0	65.8	52.4	51.4	5.0
50	2017-06-27	16:33:16	52.1	64.3	52.4	51.7	5.0
51	2017-06-27	16:33:21	51.8	65.9	52.0	51.4	5.0
52	2017-06-27	16:33:26	50.4	63.6	52.1	49.1	5.0
53	2017-06-27	16:33:31	50.0	63.2	50.7	49.0	5.0
54	2017-06-27	16:33:36	54.1	68.6	55.4	50.7	5.0
55	2017-06-27	16:33:41	52.9	67.5	54.8	51.1	5.0
56	2017-06-27	16:33:46	50.4	63.3	51.1	49.0	5.0
57	2017-06-27	16:33:51	48.6	61.0	49.0	48.2	5.0
58	2017-06-27	16:33:56	49.5	63.3	50.3	48.3	5.0
59	2017-06-27	16:34:01	49.9	64.1	50.4	49.4	5.0
60	2017-06-27	16:34:06	49.3	61.8	49.8	48.9	5.0
61	2017-06-27	16:34:11	48.7	62.2	49.5	48.0	5.0
62	2017-06-27	16:34:16	48.2	61.6	48.4	47.9	5.0
63	2017-06-27	16:34:21	49.2	63.8	49.9	48.2	5.0
64	2017-06-27	16:34:26	49.5	62.6	50.0	49.1	5.0
65	2017-06-27	16:34:31	50.4	67.6	51.5	49.2	5.0
66	2017-06-27	16:34:36	49.0	62.5	49.7	48.6	5.0
67	2017-06-27	16:34:41	49.3	62.7	49.8	48.7	5.0
68	2017-06-27	16:34:46	49.2	62.8	49.6	48.8	5.0
69	2017-06-27	16:34:51	49.6	69.3	50.5	48.6	5.0
70	2017-06-27	16:34:56	49.2	62.7	50.2	48.6	5.0
71	2017-06-27	16:35:01	50.3	63.7	50.8	50.0	5.0
72	2017-06-27	16:35:06	49.8	62.6	50.4	49.6	5.0
73	2017-06-27	16:35:11	49.5	62.0	49.7	49.2	5.0
74	2017-06-27	16:35:16	49.6	66.6	49.9	49.4	5.0
75	2017-06-27	16:35:21	49.5	68.3	50.2	48.9	5.0
76	2017-06-27	16:35:26	49.4	61.9	49.8	49.1	5.0
77	2017-06-27	16:35:31	49.4	72.8	50.0	48.7	5.0
78	2017-06-27	16:35:36	49.4	67.5	49.8	49.0	5.0
79	2017-06-27	16:35:41	49.6	62.8	50.2	48.6	5.0
80	2017-06-27	16:35:46	50.0	63.6	50.5	49.4	5.0
81	2017-06-27	16:35:51	51.0	65.3	51.5	50.3	5.0
82	2017-06-27	16:35:56	52.3	67.6	53.3	51.5	5.0
83	2017-06-27	16:36:01	51.2	64.0	52.8	50.4	5.0
84	2017-06-27	16:36:06	51.3	64.3	51.8	50.5	5.0
85	2017-06-27	16:36:11	52.1	65.8	52.7	51.4	5.0
86	2017-06-27	16:36:16	50.8	63.4	51.4	50.3	5.0
87	2017-06-27	16:36:21	50.9	64.0	51.4	50.6	5.0
88	2017-06-27	16:36:26	51.9	65.2	52.4	51.2	5.0
89	2017-06-27	16:36:31	53.2	67.5	54.2	51.2	5.0
90	2017-06-27	16:36:36	53.5	69.0	54.3	52.2	5.0
91	2017-06-27	16:36:41	52.4	64.5	52.8	51.9	5.0
92	2017-06-27	16:36:46	52.2	65.4	53.1	51.0	5.0
93	2017-06-27	16:36:51	50.8	64.7	51.1	50.5	5.0
94	2017-06-27	16:36:56	50.6	63.4	51.0	50.0	5.0
95	2017-06-27	16:37:01	50.2	62.9	51.0	49.0	5.0

96		2017-06-27	16:37:06	50.0	64.2	51.1	48.7	5.0
97		2017-06-27	16:37:11	49.7	62.5	51.1	48.8	5.0
98		2017-06-27	16:37:16	49.3	62.2	50.2	48.7	5.0
99		2017-06-27	16:37:21	51.3	66.9	52.8	49.6	5.0
100		2017-06-27	16:37:26	50.8	63.8	52.2	50.0	5.0
101		2017-06-27	16:37:31	50.3	65.0	50.7	49.9	5.0
102		2017-06-27	16:37:36	49.7	62.6	50.5	48.8	5.0
103		2017-06-27	16:37:41	48.8	61.7	49.3	48.6	5.0
104		2017-06-27	16:37:46	48.5	62.0	49.3	47.5	5.0
105		2017-06-27	16:37:51	48.4	62.3	48.9	47.6	5.0
106		2017-06-27	16:37:56	48.7	61.9	49.2	48.2	5.0
107		2017-06-27	16:38:01	49.4	65.8	52.5	47.9	4.9
108		2017-06-27	16:38:06	51.1	63.2	52.2	50.2	5.0
109		2017-06-27	16:38:11	50.3	63.7	51.1	49.6	5.0
110		2017-06-27	16:38:16	49.1	62.3	49.7	48.3	5.0
111		2017-06-27	16:38:21	48.7	62.1	50.0	46.9	5.0
112		2017-06-27	16:38:26	47.2	65.0	47.9	46.7	5.0
113		2017-06-27	16:38:31	47.9	61.5	48.7	46.9	5.0
114		2017-06-27	16:38:36	47.5	67.8	48.3	46.8	5.0
115		2017-06-27	16:38:41	47.4	62.0	48.1	46.7	5.0
116		2017-06-27	16:38:46	47.1	69.4	47.6	46.5	5.0
117		2017-06-27	16:38:51	47.5	61.5	48.1	47.0	5.0
118		2017-06-27	16:38:56	49.3	63.2	50.2	48.1	5.0
119		2017-06-27	16:39:01	49.7	62.6	50.3	48.9	5.0
120		2017-06-27	16:39:06	48.4	66.6	49.3	47.5	5.0
121		2017-06-27	16:39:11	47.3	60.8	47.5	47.0	5.0
122		2017-06-27	16:39:16	47.6	70.4	47.9	47.4	5.0
123	Stop	2017-06-27	16:39:21					

Int. Temp (°F)	LCSeq-LASeq	1/1 LASeq 8.0	1/1 LASeq 16.0	1/1 LASeq 31.5	1/1 LASeq 63.0
86.3	11.2	5.9	8.2	22.7	28.1
86.3	15.3	5.9	14.8	24.5	29.8
86.4	11.1	5.9	10.8	20.8	28.8
86.8	14.1	5.9	10.7	21.4	31.4
86.8	14.7	5.9	13.9	23.5	32.0
86.8	16.3	5.9	13.9	25.4	30.3
87.1	19.7	5.9	18.3	30.0	34.0
87.2	16.1	5.9	17.2	27.3	31.1
87.2	14.8	5.9	14.3	24.7	30.4
87.2	14.4	5.9	14.9	25.0	31.1
87.7	16.5	5.9	16.8	27.9	31.4
87.7	19.3	5.9	19.4	31.2	35.1
87.7	17.7	6.0	17.9	27.9	32.3
87.8	16.5	5.9	15.7	28.1	32.9
88.2	16.7	5.9	15.3	27.3	33.0
88.2	15.4	5.9	11.7	22.5	30.4
88.2	16.0	5.9	15.4	25.5	30.6
88.3	12.5	5.9	12.1	22.2	31.8
88.7	11.9	5.9	11.7	20.7	34.5
88.7	12.3	5.9	9.8	19.3	34.0
88.7	15.5	5.9	14.9	23.2	31.7
88.8	17.4	5.9	16.8	26.5	32.8
89.0	15.9	5.9	15.5	25.7	31.9
89.1	15.2	5.9	16.2	25.8	33.2
89.1	17.8	5.9	21.1	29.9	34.2
89.1	16.1	5.9	16.3	27.4	32.6
89.2	15.3	5.9	15.2	26.6	31.6
89.5	15.5	5.9	15.2	25.9	30.8
89.6	14.0	5.9	12.2	24.0	29.3
89.6	14.6	5.9	11.2	24.3	29.3
89.6	16.2	5.9	14.5	25.7	31.7
89.8	15.5	5.9	16.1	26.5	30.9
90.1	12.8	5.9	12.3	22.7	30.7
90.1	18.2	6.3	18.6	28.5	31.7
90.1	13.7	5.9	15.1	24.0	29.9
90.1	11.9	5.9	10.7	22.0	29.4
90.4	15.2	5.9	12.5	24.1	30.8
90.6	13.5	5.9	10.7	21.5	30.4
90.6	16.2	5.9	14.5	24.6	32.2
90.6	15.2	5.9	12.7	23.2	33.6
90.6	15.5	5.9	12.4	23.0	34.7
90.8	15.2	5.9	13.5	23.5	32.2
91.0	14.7	5.9	16.0	24.7	33.5
91.0	14.9	5.9	12.7	21.6	33.4
91.0	12.4	5.9	8.6	21.8	31.4

91.0	14.5	5.9	12.6	23.6	30.9
91.1	21.3	7.5	21.5	31.5	34.8
91.4	17.5	5.9	19.3	28.1	32.0
91.5	19.3	5.9	20.0	30.8	35.2
91.5	17.8	5.9	18.4	27.5	32.5
91.5	17.9	5.9	15.9	25.3	31.5
91.7	22.0	8.8	22.3	35.9	39.8
92.0	21.0	11.0	24.5	35.9	38.7
92.0	14.7	5.9	14.8	24.5	30.1
92.0	12.7	5.9	7.0	18.4	31.5
92.0	13.3	5.9	8.8	19.6	30.8
92.0	14.5	5.9	12.4	22.4	30.5
92.0	15.8	5.9	12.9	23.5	31.0
92.3	16.3	5.9	13.4	24.3	30.7
92.5	15.6	5.9	13.1	22.7	30.5
92.5	17.1	5.9	14.0	24.3	31.3
92.5	14.1	5.9	14.5	25.7	29.5
92.5	14.1	5.9	12.0	23.0	30.7
92.6	14.3	5.9	12.1	22.1	30.0
92.9	13.1	5.9	10.3	20.7	29.9
92.9	16.6	5.9	13.3	23.7	31.3
92.9	21.3	5.9	19.1	30.4	36.1
92.9	17.4	6.5	15.9	26.5	31.8
92.9	16.9	5.9	16.8	25.4	31.6
93.0	13.6	5.9	11.8	21.7	29.4
93.3	14.7	5.9	11.4	21.9	29.6
93.4	15.9	5.9	14.6	24.6	30.3
93.4	14.6	5.9	12.3	23.4	30.0
93.4	13.2	5.9	10.5	22.3	29.8
93.4	12.3	5.9	8.9	21.1	29.2
93.8	15.3	5.9	13.0	22.7	30.1
93.6	17.1	5.9	15.0	25.4	31.2
93.9	15.3	5.9	14.9	26.3	30.1
93.9	16.3	5.9	13.7	23.5	30.7
93.9	14.8	5.9	17.8	26.7	32.6
93.9	13.7	5.9	11.8	22.5	32.7
93.9	14.7	5.9	14.7	25.0	29.3
93.9	14.8	5.9	15.2	26.0	29.8
94.2	15.2	5.9	13.6	24.0	29.9
94.3	16.9	5.9	17.8	25.9	31.6
94.3	19.1	5.9	18.9	32.3	36.3
94.3	17.4	5.9	16.3	28.9	35.6
94.3	21.4	7.8	24.1	35.6	40.2
94.3	15.9	6.1	18.0	28.1	31.9
94.6	14.8	5.9	17.4	26.3	30.1
94.7	16.0	5.9	15.9	24.3	30.5
94.8	17.5	5.9	17.8	26.9	32.2
94.8	12.6	5.9	14.1	22.5	29.4

94.8	20.3	6.3	17.2	27.8	31.4
94.8	18.1	6.0	18.1	27.9	31.2
94.8	14.5	5.9	14.8	24.0	28.2
95.2	15.6	5.9	12.4	24.5	30.2
95.3	14.8	5.9	16.6	25.8	28.6
95.3	15.8	5.9	13.4	25.3	30.0
95.3	16.9	5.9	14.8	26.1	29.4
95.3	20.6	5.9	18.9	29.2	30.3
95.3	17.8	5.9	16.0	26.2	29.0
95.3	14.9	5.9	12.6	22.3	26.2
95.4	14.7	5.9	12.9	22.2	25.4
95.7	20.9	5.9	12.9	23.2	31.6
95.7	22.4	10.7	23.0	34.4	37.2
95.8	18.0	5.9	17.4	27.6	31.5
95.8	17.6	5.9	18.6	26.0	29.2
95.8	13.1	5.9	10.7	20.6	24.8
95.8	16.4	5.9	12.4	22.3	26.6
95.8	13.7	5.9	11.1	21.9	25.9
95.8	10.8	5.9	6.2	20.0	24.9
95.8	17.9	5.9	13.8	23.5	27.3
96.0	14.8	5.9	10.4	20.2	26.1
96.1	15.5	5.9	13.1	22.4	27.1
96.2	13.0	5.9	10.5	21.4	27.5
96.2	15.4	5.9	14.4	24.7	28.8
96.2	13.3	5.9	10.9	22.6	27.2
96.2	11.8	5.9	4.9	20.2	25.5
96.2	16.3	5.9	13.3	24.5	27.7

1/1 LASeq 125	1/1 LASeq 250	1/1 LASeq 500	1/1 LASeq 1000	1/1 LASeq 2000	1/1 LASeq 4000
29.9	31.4	42.6	49.7	43.6	34.1
30.4	32.1	40.9	48.0	43.4	37.0
30.2	34.0	40.5	46.7	43.6	39.9
31.5	36.4	42.3	47.8	46.0	43.1
31.5	34.8	41.6	47.2	44.2	40.7
32.0	33.5	40.5	46.8	43.5	39.0
33.3	35.1	41.8	47.2	44.5	41.4
31.9	33.7	41.6	47.9	43.2	38.4
31.6	33.4	42.2	49.0	43.6	36.6
32.4	34.0	43.3	49.5	43.3	37.1
33.2	34.5	42.9	49.0	44.6	40.2
34.4	35.1	43.1	49.6	44.8	40.8
32.6	35.0	42.8	48.3	43.6	38.8
33.3	35.3	42.1	47.7	43.2	38.8
33.3	34.3	41.3	47.5	42.8	38.5
31.3	33.2	41.0	47.0	42.2	37.2
31.5	34.1	40.9	47.3	42.2	36.2
32.2	35.1	42.8	48.7	43.0	35.9
33.6	35.7	45.0	49.4	43.6	38.5
35.5	35.1	44.3	48.6	43.3	37.7
33.4	34.2	43.4	47.7	42.8	36.7
34.8	34.2	42.9	47.3	42.4	37.3
36.7	35.2	43.3	47.9	43.2	36.8
37.2	36.6	45.3	49.1	45.6	42.2
35.6	37.0	46.1	50.0	45.6	42.1
32.8	35.2	44.4	48.7	44.8	41.7
32.8	34.7	43.8	48.2	44.4	39.8
32.5	35.5	42.6	47.5	44.8	41.8
31.3	34.3	41.1	47.0	44.3	40.8
31.2	33.6	40.1	46.7	43.3	38.9
34.4	35.6	42.0	47.4	44.8	41.1
32.7	35.3	42.4	47.9	44.9	41.2
32.4	35.3	43.0	48.7	44.7	40.7
33.4	35.7	42.3	48.2	44.3	40.7
33.1	34.3	41.8	48.3	44.1	40.3
31.8	34.0	41.2	48.0	43.3	37.4
32.2	33.0	40.8	47.5	43.1	35.8
32.6	33.0	40.2	47.0	42.5	36.5
32.7	33.6	41.0	47.6	42.7	36.2
33.9	34.1	41.0	47.3	42.3	34.7
35.6	35.2	41.2	47.3	42.9	38.6
33.0	35.2	41.2	47.6	43.6	41.1
33.9	35.6	41.8	48.8	44.3	39.1
38.2	35.1	40.0	47.1	42.6	36.5
32.3	33.8	41.7	48.4	42.2	34.5

32.3	34.6	42.7	48.2	43.8	39.4
34.7	35.4	42.9	48.8	45.3	41.8
32.1	36.0	42.9	48.9	45.6	42.3
33.7	36.6	43.2	48.2	45.1	42.2
32.1	34.9	42.6	47.5	43.0	39.2
31.2	34.7	41.3	46.3	43.6	41.2
38.4	39.4	44.5	48.6	48.1	46.9
36.8	39.1	43.9	47.9	46.6	45.4
31.3	36.7	41.8	46.7	43.6	41.7
30.4	34.8	40.3	45.6	41.4	37.1
32.0	34.6	41.3	47.0	42.0	36.0
30.6	34.0	40.9	47.3	42.9	37.8
30.4	33.2	40.5	46.3	42.7	38.2
29.9	31.3	39.9	46.2	42.0	35.3
29.7	32.3	39.1	45.0	41.7	37.9
31.0	32.8	39.2	45.8	43.6	38.6
30.0	33.5	39.6	46.1	43.7	39.7
31.3	33.6	40.3	46.9	45.3	39.5
29.5	32.6	39.6	45.4	44.3	36.4
30.4	32.5	39.4	46.0	44.0	37.1
31.8	33.8	40.5	46.0	42.6	38.0
33.5	34.7	40.4	46.0	43.0	39.6
31.4	34.3	40.0	45.8	42.8	39.2
31.7	35.5	41.2	47.1	43.8	39.8
30.8	34.0	40.5	47.0	43.3	38.2
30.8	33.5	40.2	46.7	43.0	38.0
31.4	33.9	40.1	46.8	43.1	37.7
30.1	32.6	39.9	46.9	43.1	36.7
29.4	32.1	39.4	46.5	43.6	37.4
29.2	31.9	39.7	46.6	43.5	37.2
29.7	33.0	39.8	46.1	43.7	39.3
30.9	32.1	39.2	46.6	44.0	37.7
30.2	32.4	40.0	46.9	44.5	38.2
30.9	34.3	41.5	47.4	45.7	40.6
34.0	35.4	44.1	49.3	45.9	40.1
35.2	35.1	42.7	48.3	44.3	38.7
36.5	35.6	42.0	47.5	45.5	41.8
34.1	34.7	42.7	48.6	46.9	41.5
34.2	34.8	41.8	47.9	43.6	40.1
34.0	36.2	42.2	47.8	44.2	40.0
35.4	37.1	43.1	48.2	45.4	42.2
33.9	37.6	44.3	48.8	47.1	45.2
37.1	38.6	44.5	48.7	47.5	45.6
32.1	36.7	43.3	48.6	46.5	43.4
31.1	35.7	43.2	48.6	46.3	43.0
32.1	34.4	42.5	47.6	44.1	40.4
32.0	35.1	42.9	47.1	44.2	39.6
30.6	33.6	41.8	47.7	43.2	36.5

31.2	33.2	41.4	47.2	42.9	38.0
31.1	33.6	41.7	46.7	42.7	38.1
29.5	32.6	40.3	46.4	42.9	37.7
29.7	32.9	41.9	48.8	44.5	39.4
30.1	32.8	41.0	47.2	45.9	39.8
31.0	35.2	41.2	46.1	44.8	41.2
31.6	34.1	41.0	45.7	44.4	39.9
31.3	32.5	40.7	45.4	42.8	36.7
30.0	31.8	41.9	44.8	42.4	35.2
28.7	31.2	40.5	44.9	42.9	35.9
28.7	31.8	41.4	45.9	41.4	35.9
34.3	33.8	40.3	46.2	42.3	38.2
37.3	36.0	41.9	47.1	44.6	41.5
34.1	35.2	41.0	46.5	44.4	41.1
30.3	32.6	39.9	45.9	42.4	39.7
27.6	30.3	41.0	46.2	40.8	36.6
28.7	30.8	40.2	44.0	40.2	35.1
29.5	30.2	39.4	45.3	41.2	35.0
29.2	29.2	37.7	44.7	42.0	35.3
30.8	30.1	36.6	43.3	43.4	34.9
31.2	31.5	37.0	43.5	42.1	35.5
31.1	31.3	38.1	44.2	42.0	35.8
30.1	31.8	40.4	47.0	42.5	34.8
30.9	31.4	40.2	47.5	42.8	33.9
29.7	30.4	39.4	46.2	41.5	32.6
30.6	31.1	38.9	44.9	40.2	32.7
30.1	30.9	38.4	44.9	40.9	35.3

1/1 LASeq 8000	1/1 LASeq 16000	1/1 LASmax 8.0	1/1 LASmax 16.0	1/1 LASmax 31.5
26.1	16.4	5.9	11.4	25.3
29.6	18.7	5.9	17.5	26.8
32.1	19.4	5.9	15.1	24.2
35.4	21.4	5.9	16.6	26.0
33.0	20.3	5.9	17.0	25.3
31.6	19.2	5.9	16.1	27.6
34.3	20.9	5.9	20.5	33.2
30.9	18.5	5.9	19.4	31.4
28.8	17.4	5.9	15.6	27.4
29.5	17.9	5.9	17.9	27.4
32.6	19.7	5.9	18.7	29.7
33.3	20.8	5.9	22.9	33.7
31.6	19.5	7.3	20.5	30.1
31.4	19.2	5.9	18.4	30.9
30.4	18.8	5.9	16.8	29.5
30.2	18.0	5.9	15.7	28.3
28.7	17.6	5.9	18.0	28.5
27.9	17.0	5.9	15.9	25.3
30.3	17.8	5.9	14.8	22.3
29.5	17.5	5.9	11.4	20.9
28.8	17.6	5.9	21.4	24.6
28.7	18.5	5.9	19.3	28.6
28.7	17.9	5.9	18.7	28.1
34.4	20.8	5.9	18.0	27.5
34.3	21.0	5.9	24.0	31.9
33.5	20.2	5.9	18.5	32.7
31.8	19.2	5.9	17.6	31.5
34.1	20.7	5.9	17.1	28.9
33.1	19.6	5.9	13.8	25.1
31.5	18.7	5.9	13.9	26.3
33.4	20.0	5.9	16.3	28.1
33.5	20.0	5.9	17.9	29.6
33.0	19.6	5.9	13.7	24.2
32.9	20.3	7.5	21.5	31.4
32.7	19.4	5.9	19.6	27.0
29.3	17.4	5.9	14.1	23.2
27.7	16.9	5.9	15.3	26.5
28.4	17.1	5.9	13.5	24.0
28.1	17.3	5.9	17.7	26.8
26.9	16.9	5.9	14.7	25.1
30.9	18.4	5.9	14.5	25.2
33.5	19.9	5.9	19.2	28.4
31.6	18.7	5.9	18.7	27.0
28.8	17.4	5.9	15.6	22.2
26.8	16.5	5.9	9.9	23.9

32.3	19.2	5.9	16.6	26.5
34.4	20.8	10.3	24.3	34.6
34.9	21.4	5.9	23.1	31.0
34.6	21.2	5.9	22.3	33.0
31.5	18.8	5.9	20.2	30.0
33.5	20.1	6.5	18.4	27.4
39.3	25.3	16.2	26.5	41.2
37.8	24.0	16.3	28.0	38.2
34.2	20.7	6.1	18.2	28.8
30.0	17.6	5.9	11.1	20.3
28.5	17.2	5.9	12.3	22.3
30.6	18.4	5.9	14.7	24.3
30.7	18.4	5.9	15.0	26.6
27.4	17.2	5.9	14.9	26.1
30.1	17.9	5.9	14.9	24.8
30.5	18.1	5.9	19.6	29.3
31.8	18.7	5.9	19.2	29.0
31.8	18.5	5.9	14.5	25.3
29.1	17.4	5.9	14.2	23.7
29.6	17.6	5.9	12.6	22.0
30.4	18.2	5.9	16.5	27.5
31.8	20.0	5.9	21.8	33.3
31.5	19.0	8.7	19.9	30.3
32.1	19.4	5.9	19.8	27.2
30.2	18.0	5.9	14.2	23.0
30.1	18.0	5.9	16.3	24.3
29.9	18.0	5.9	16.9	28.2
27.9	17.0	5.9	13.8	25.3
29.1	17.4	5.9	13.1	24.2
29.2	17.4	5.9	12.8	22.6
31.9	18.9	5.9	17.3	25.0
29.1	18.0	5.9	17.9	28.1
30.1	18.3	5.9	16.9	28.6
32.9	19.6	5.9	18.9	29.6
32.8	19.8	5.9	21.2	29.6
30.9	18.4	5.9	14.5	25.5
33.5	19.9	5.9	16.5	26.8
32.5	19.3	5.9	16.9	28.6
32.3	19.3	5.9	16.7	26.3
32.2	19.8	5.9	20.7	28.6
34.8	22.5	5.9	21.0	35.9
37.5	23.5	5.9	23.6	34.4
37.7	23.7	9.8	26.3	37.8
34.6	20.8	7.8	22.5	32.3
35.2	21.5	5.9	20.4	30.1
32.7	19.8	5.9	19.5	27.2
31.6	19.2	5.9	20.6	28.6
28.1	17.1	5.9	19.8	26.5

30.5	18.7	8.9	21.0	33.1
30.8	18.6	7.5	21.2	31.0
30.2	18.0	5.9	18.9	28.5
31.6	19.0	5.9	19.7	30.2
32.1	19.3	5.9	20.3	29.8
33.9	20.8	5.9	16.3	29.6
32.4	19.3	5.9	16.4	29.2
29.4	18.3	5.9	21.5	32.1
27.9	17.5	5.9	19.0	27.9
27.4	16.9	5.9	14.3	24.4
27.8	17.0	5.9	15.4	23.2
30.4	18.6	5.9	19.3	32.7
33.9	21.5	14.8	26.1	37.8
33.4	20.2	6.3	18.9	30.4
31.6	18.9	5.9	21.7	28.6
28.4	17.2	5.9	12.9	22.7
27.6	17.1	5.9	15.2	24.0
26.4	16.4	5.9	15.1	23.5
26.6	16.5	5.9	10.1	21.5
26.9	17.0	5.9	18.1	26.9
27.3	16.8	5.9	13.8	24.4
27.3	16.8	5.9	15.9	24.3
27.0	16.9	5.9	12.2	23.0
26.4	16.9	5.9	17.5	26.1
25.5	16.3	5.9	13.5	24.5
25.5	16.6	5.9	9.4	22.0
29.3	18.3	5.9	17.0	27.8

1/1 LASmax 63.0	1/1 LASmax 125	1/1 LASmax 250	1/1 LASmax 500	1/1 LASmax 1000
29.5	30.8	32.2	43.9	50.9
31.6	31.5	32.8	42.1	48.8
30.5	30.8	35.9	42.2	47.4
34.2	33.1	36.9	42.8	49.4
33.6	32.9	36.1	42.1	47.5
31.6	33.2	34.2	41.3	47.2
35.9	34.3	35.7	42.2	48.3
33.4	32.9	34.7	42.2	48.8
33.7	33.1	34.0	43.7	50.6
33.4	33.9	34.5	43.9	50.8
32.3	34.3	34.9	43.4	49.4
38.2	36.7	36.3	43.6	50.3
34.5	33.6	35.4	43.8	49.1
35.3	33.9	36.4	43.5	48.3
34.3	34.5	34.8	41.8	48.1
32.7	32.3	34.1	41.3	47.3
32.5	32.7	35.8	41.6	48.1
34.2	33.6	36.5	43.9	49.1
36.4	34.5	36.4	46.8	50.3
36.2	36.7	36.1	45.7	49.2
33.5	35.0	34.8	43.9	49.0
34.5	35.9	35.5	43.9	48.0
33.9	39.2	35.9	43.8	48.5
34.3	39.1	38.1	46.5	50.0
35.8	38.1	38.7	47.3	50.4
34.7	33.9	36.1	45.3	49.5
33.9	34.2	35.9	46.5	49.3
32.4	34.4	36.3	44.3	48.5
30.4	32.0	35.4	41.7	47.5
30.2	32.6	34.5	40.8	47.4
33.2	36.2	36.7	43.0	48.2
32.0	34.0	36.0	42.9	48.1
32.9	33.2	35.9	43.5	49.3
33.1	34.3	36.3	42.8	48.6
30.5	34.6	35.7	42.9	48.9
30.3	32.5	34.6	41.8	48.6
32.0	32.8	34.4	41.6	48.3
31.2	33.5	33.9	40.8	47.5
34.0	33.9	34.2	41.5	48.1
36.9	36.7	35.8	41.6	47.8
37.3	37.0	35.7	41.7	47.6
34.1	34.1	36.0	42.3	48.9
34.6	37.1	36.4	42.4	49.5
35.1	40.6	36.1	41.2	48.0
32.5	33.9	34.5	43.1	49.2

31.6	33.5	35.6	43.5	48.8
36.9	36.8	36.1	43.5	49.8
33.7	33.3	36.9	43.5	49.4
37.1	34.9	37.3	45.5	48.8
34.8	33.6	35.9	45.6	49.2
33.6	32.5	35.6	42.0	46.9
44.1	42.3	41.1	45.7	49.7
42.0	39.0	40.6	45.3	49.2
31.1	32.7	37.4	42.6	47.1
32.2	31.0	36.6	40.9	45.8
31.4	33.6	35.7	42.4	47.8
31.9	31.8	35.5	42.2	48.0
32.7	31.5	34.3	41.0	47.1
31.8	31.0	32.0	40.9	47.1
31.2	30.3	32.7	39.6	45.3
32.9	32.9	34.0	39.8	46.5
31.9	31.8	33.9	40.0	46.7
31.7	32.5	34.2	41.0	47.8
30.7	30.1	33.2	40.6	45.9
31.1	32.6	33.3	39.7	46.3
32.9	32.8	34.6	41.2	46.4
39.7	34.8	35.8	41.4	46.8
34.3	32.4	36.1	41.6	46.8
33.3	32.9	36.3	41.5	48.2
30.3	32.4	34.7	41.1	47.9
30.9	31.5	34.1	40.7	47.1
31.0	32.6	35.1	40.9	47.2
30.7	31.4	33.6	40.8	47.6
30.4	29.9	32.5	39.8	47.0
29.8	30.3	32.4	40.3	47.2
30.8	30.7	34.0	40.3	46.5
32.9	32.1	32.8	40.4	47.5
31.5	31.8	32.9	40.6	47.6
34.7	33.0	34.9	43.1	48.2
35.6	36.3	36.2	45.3	50.7
35.5	36.6	36.2	44.0	50.2
31.0	39.4	36.4	42.7	48.3
32.0	35.3	36.2	43.5	49.2
30.8	35.3	35.8	43.1	48.3
33.6	34.9	37.1	42.8	48.3
39.6	37.6	37.9	44.0	48.8
42.0	37.1	38.9	45.1	49.7
42.3	38.7	39.4	45.3	49.1
35.1	33.6	38.0	43.7	49.1
32.5	32.6	36.8	44.5	49.5
32.8	33.4	35.0	43.5	48.2
33.8	33.5	36.3	44.2	47.6
30.9	31.8	35.0	43.2	48.4

34.9	33.6	34.6	43.0	48.1
34.0	33.7	34.7	43.0	48.0
30.3	30.8	33.3	41.5	47.8
35.0	33.3	34.6	43.1	49.9
32.7	31.8	33.9	42.7	49.2
33.3	32.9	35.8	41.9	46.5
32.3	33.0	35.3	41.9	46.3
31.2	32.6	33.1	41.3	46.2
31.0	31.2	32.7	43.5	45.9
27.6	29.1	31.8	41.5	45.8
26.4	29.6	32.4	42.6	46.4
41.0	41.8	38.7	41.8	48.0
41.4	41.3	38.4	42.6	47.7
34.2	35.5	36.3	41.8	47.3
32.1	32.4	33.9	40.2	46.2
26.2	28.4	31.3	42.5	47.6
27.9	29.3	31.5	42.0	44.3
26.6	31.3	31.0	40.1	46.3
26.1	30.6	29.8	38.6	45.8
29.3	31.9	30.7	37.2	43.7
28.8	32.8	32.7	37.5	43.9
28.7	32.7	31.8	39.7	45.1
29.4	30.9	32.9	41.0	48.4
29.8	32.3	32.0	41.0	48.5
29.3	30.1	31.1	40.3	47.5
27.3	31.6	31.9	39.4	45.2
30.4	30.8	31.6	39.5	45.3

1/1 LASmax 2000	1/1 LASmax 4000	1/1 LASmax 8000	1/1 LASmax 16000	1/1 LASmin 8.0
44.5	34.5	26.4	16.6	5.9
44.1	38.1	30.9	20.1	5.9
44.9	42.4	34.6	20.8	5.9
47.5	43.5	35.8	21.8	5.9
45.7	42.4	34.6	22.1	5.9
44.4	40.4	33.3	20.6	5.9
45.0	41.8	35.8	21.6	5.9
44.6	40.7	33.4	20.3	5.9
44.1	37.3	29.3	18.1	5.9
44.3	38.1	30.3	18.7	5.9
44.9	41.2	33.9	20.3	5.9
45.2	41.4	34.1	21.5	5.9
44.2	40.3	33.0	20.4	5.9
44.3	40.5	33.2	20.3	5.9
43.4	40.1	30.9	19.2	5.9
42.5	37.6	30.5	18.2	5.9
43.1	36.8	29.8	18.2	5.9
43.2	36.3	28.4	17.2	5.9
44.0	39.4	31.3	18.2	5.9
43.8	38.9	30.8	18.0	5.9
43.7	37.9	30.1	18.1	5.9
44.0	40.8	30.3	19.4	5.9
43.9	37.4	29.3	18.3	5.9
47.1	44.5	36.8	22.3	5.9
46.8	44.0	36.2	22.0	5.9
45.2	42.5	34.5	21.3	5.9
45.2	41.1	33.0	20.0	5.9
45.4	43.0	35.2	21.4	5.9
45.4	42.9	34.0	20.4	5.9
43.9	40.7	32.9	19.5	5.9
45.3	41.6	34.0	20.2	5.9
45.4	41.8	34.0	20.4	5.9
45.3	42.1	34.5	20.6	5.9
44.8	41.3	33.5	20.6	5.9
44.5	41.0	33.4	20.1	5.9
44.9	39.0	31.1	18.3	5.9
44.5	37.6	28.7	17.2	5.9
42.8	37.5	29.3	17.5	5.9
43.3	36.8	28.7	17.4	5.9
42.6	35.6	27.6	17.1	5.9
43.7	41.2	33.3	20.0	5.9
44.8	41.6	34.1	20.2	5.9
45.0	41.0	33.4	19.8	5.9
44.0	37.6	30.0	17.9	5.9
42.8	35.4	27.7	16.8	5.9

46.8	42.8	37.2	22.3	5.9
46.4	42.4	35.9	21.6	5.9
46.2	43.1	35.8	22.3	5.9
45.5	42.6	35.1	21.6	5.9
43.9	40.6	33.0	19.8	5.9
44.7	43.0	35.4	21.5	5.9
49.5	48.2	40.6	26.8	5.9
48.8	47.8	40.2	26.3	5.9
44.8	43.1	35.6	22.1	5.9
42.2	38.8	31.3	18.4	5.9
43.0	36.2	29.4	17.6	5.9
43.5	39.1	31.8	19.1	5.9
43.1	39.1	31.7	19.0	5.9
42.9	36.8	28.7	17.5	5.9
42.0	38.5	30.8	18.2	5.9
44.7	39.4	31.7	18.6	5.9
44.6	40.3	32.2	19.1	5.9
46.9	40.6	32.5	18.9	5.9
45.1	37.3	30.8	18.0	5.9
45.2	38.0	30.3	17.9	5.9
43.2	39.1	31.3	18.9	5.9
44.1	41.1	33.3	20.9	5.9
43.9	41.3	33.7	20.5	5.9
44.4	41.3	33.7	20.5	5.9
43.7	39.2	31.0	18.3	5.9
43.3	38.5	30.7	18.5	5.9
43.4	38.3	30.4	18.5	5.9
44.2	37.8	29.5	17.6	5.9
44.8	38.4	29.8	17.7	5.9
45.2	38.2	30.1	17.7	5.9
44.5	40.2	32.9	19.8	5.9
45.1	38.9	30.3	18.5	5.9
45.9	39.7	31.4	18.5	5.9
47.0	41.2	33.6	20.3	5.9
46.8	40.9	34.1	20.9	5.9
45.8	40.1	32.2	19.4	5.9
45.9	42.8	34.3	20.5	5.9
49.1	43.0	34.4	20.5	5.9
44.5	41.1	33.1	19.7	5.9
44.7	41.4	33.9	21.2	5.9
45.9	43.2	35.5	23.1	5.9
48.3	46.8	38.9	24.7	5.9
48.4	46.6	38.7	24.7	5.9
47.4	44.3	35.4	21.9	5.9
47.7	44.3	36.4	22.5	5.9
44.8	40.9	33.2	20.0	5.9
44.8	40.7	32.9	20.2	5.9
44.6	38.4	29.2	17.8	5.9

44.1	40.1	32.5	20.0	5.9
44.1	40.0	32.4	19.8	5.9
43.7	38.0	30.8	18.4	5.9
47.1	42.0	34.1	20.7	5.9
46.5	41.2	33.3	20.1	5.9
45.4	42.2	34.9	21.6	5.9
45.6	41.1	33.6	20.1	5.9
43.7	38.4	30.8	18.7	5.9
43.7	35.9	28.8	18.0	5.9
44.5	37.3	28.2	17.2	5.9
41.9	36.7	28.7	17.4	5.9
45.3	42.1	34.2	21.6	5.9
45.1	42.6	34.9	22.1	5.9
45.2	41.5	33.6	20.8	5.9
43.5	41.1	33.1	20.1	5.9
41.5	37.6	29.3	17.9	5.9
40.9	36.0	28.3	17.4	5.9
42.9	36.5	26.8	16.7	5.9
43.6	35.8	27.3	16.7	5.9
44.7	36.0	27.7	17.4	5.9
43.0	36.3	28.2	17.0	5.9
42.6	37.2	27.9	17.1	5.9
43.2	36.2	28.3	17.4	5.9
43.3	34.2	26.9	17.0	5.9
41.9	33.8	26.5	16.7	5.9
40.7	33.9	26.6	17.2	5.9
41.2	37.5	33.3	19.6	5.9

1/1 LASmin 16.0	1/1 LASmin 31.5	1/1 LASmin 63.0	1/1 LASmin 125	1/1 LASmin 250
4.8	20.8	26.4	29.1	30.5
11.0	22.0	28.8	29.1	31.2
5.4	18.8	27.6	29.7	31.8
5.1	18.7	29.4	29.9	35.7
11.7	20.8	30.3	30.3	33.6
11.3	21.5	28.1	31.1	32.7
12.7	23.0	28.8	32.3	34.2
14.1	22.1	28.6	31.2	32.9
12.4	21.7	28.4	30.7	32.8
12.2	22.9	29.2	31.2	33.4
14.2	24.3	29.6	31.6	34.2
15.7	26.0	29.8	31.3	33.7
15.3	25.0	29.9	32.0	34.4
12.4	23.7	31.0	32.9	33.8
11.5	23.7	31.1	31.5	33.4
5.2	19.2	29.2	30.4	32.5
12.2	22.5	29.1	30.9	33.1
8.3	19.4	28.6	31.2	34.1
8.6	19.1	32.5	32.8	35.1
7.8	17.9	32.5	33.5	34.0
8.3	20.2	29.6	32.4	33.2
14.1	22.8	29.7	33.7	32.8
13.8	23.0	30.2	35.3	34.1
13.8	24.3	32.2	35.7	34.4
16.3	25.7	32.7	32.7	35.1
12.8	23.1	30.9	32.2	34.6
11.8	23.1	30.1	32.1	33.8
12.9	23.6	29.5	31.2	34.6
10.0	22.2	28.3	30.5	33.7
6.3	22.5	28.4	30.5	33.1
11.6	23.1	29.3	32.4	34.3
12.8	23.1	29.1	31.6	34.7
10.6	20.4	29.1	31.7	34.6
12.7	22.5	29.7	32.3	34.8
10.3	22.0	29.0	31.1	33.3
7.1	20.3	28.6	30.8	33.2
7.8	21.5	29.3	31.6	32.3
8.4	20.1	28.9	31.5	32.0
9.1	21.5	30.5	31.2	32.9
11.0	20.5	31.5	31.4	32.7
10.1	20.9	31.5	34.1	34.6
6.7	19.4	30.8	31.8	34.7
12.5	21.8	32.5	32.7	34.8
9.1	20.3	31.7	33.9	34.0
6.5	20.3	30.3	31.5	33.0

5.7	20.9	29.5	31.2	32.8
11.9	21.0	31.2	32.7	34.7
15.7	25.3	30.0	31.5	34.9
17.6	29.5	33.3	32.6	35.5
16.2	25.6	29.9	30.8	33.5
11.0	21.5	29.2	30.1	33.5
13.6	23.2	30.4	30.0	35.4
18.2	28.8	31.2	32.7	37.3
11.2	20.3	29.2	29.9	34.6
3.9	16.2	29.6	29.8	33.1
4.4	16.7	30.1	30.0	32.9
9.6	20.3	28.9	30.0	33.0
11.0	21.2	29.5	29.1	31.4
11.1	22.1	29.8	28.9	30.7
10.4	21.1	29.5	29.1	31.7
11.0	20.7	29.7	29.0	31.5
8.0	21.6	28.5	29.1	32.9
7.4	19.6	29.1	29.4	32.8
9.7	20.5	28.9	28.8	31.7
5.8	18.2	28.9	28.7	31.6
7.3	20.0	29.9	31.1	33.0
14.4	25.5	30.7	31.7	33.3
13.2	23.6	30.2	30.1	32.7
14.0	21.6	29.5	30.2	34.6
9.5	19.7	28.6	29.0	33.1
6.8	19.3	28.4	29.9	32.8
11.8	21.7	29.8	30.3	32.7
10.7	21.0	29.3	29.0	31.9
8.2	20.5	29.3	29.0	31.8
6.1	19.0	28.4	28.6	31.3
4.2	19.4	29.2	28.6	31.7
10.9	20.8	29.7	29.4	31.5
10.6	22.0	28.6	28.2	31.9
8.1	19.3	28.5	28.5	32.8
14.5	23.4	31.4	32.5	34.2
9.0	19.6	29.4	33.3	33.8
12.0	23.4	28.2	33.7	35.0
12.5	23.1	28.2	32.4	33.2
11.0	22.5	29.2	32.1	33.9
14.3	22.7	28.9	33.4	35.4
15.9	27.2	31.2	33.2	35.9
13.8	24.7	30.6	31.8	35.7
22.4	32.2	35.1	33.6	37.7
12.4	24.4	29.1	30.8	35.6
12.0	22.2	28.2	29.9	34.3
11.9	21.1	28.3	30.2	33.7
15.8	24.4	30.8	30.8	33.7
6.9	18.8	27.5	28.7	32.4

7.4	18.9	27.2	28.6	31.5
14.8	23.8	29.1	29.3	32.9
8.7	19.2	26.0	27.3	31.9
5.9	17.5	24.0	25.9	31.5
9.9	23.3	24.9	29.2	32.3
9.2	22.5	26.0	29.1	33.2
12.9	23.6	27.3	30.1	32.5
14.5	24.4	28.6	30.0	31.9
14.2	22.8	26.4	28.6	30.7
10.4	19.9	24.8	28.2	30.8
10.8	21.0	24.1	28.0	30.9
9.3	19.5	25.4	28.7	31.1
17.4	29.1	30.9	33.4	34.3
15.4	25.7	29.4	31.2	33.6
12.9	22.6	26.2	27.9	30.6
8.3	19.4	23.9	26.9	28.8
8.3	19.5	25.4	27.7	29.0
7.8	19.6	24.6	27.8	29.1
3.2	18.5	24.0	28.5	28.6
3.3	18.4	25.5	29.5	29.1
7.5	18.5	24.8	29.4	30.1
9.9	20.8	25.5	29.2	30.8
8.9	19.7	25.8	29.0	30.9
8.9	21.5	27.6	29.1	30.4
8.5	20.8	24.9	29.2	30.1
3.2	19.1	24.6	29.6	30.3
8.6	20.1	24.5	29.1	29.9

1/1 LASmin 500	1/1 LASmin 1000	1/1 LASmin 2000	1/1 LASmin 4000	1/1 LASmin 8000
40.6	48.1	42.4	33.6	25.7
39.9	47.3	42.4	34.3	26.4
39.5	46.1	42.5	37.0	29.3
41.7	47.2	44.9	42.4	34.6
40.8	46.8	43.1	39.3	31.5
39.8	46.2	42.9	37.8	30.4
40.7	46.4	43.9	40.5	33.3
41.1	47.1	42.1	36.6	28.7
41.2	47.4	42.6	36.2	27.9
42.5	48.5	42.9	36.1	29.0
42.1	48.7	44.2	38.1	30.3
42.2	48.8	44.2	40.2	32.5
42.0	47.8	42.9	37.1	29.9
41.1	47.2	42.4	36.8	29.3
40.8	46.9	42.5	37.4	29.4
40.5	46.6	41.9	36.8	29.8
39.8	46.6	41.8	35.7	27.9
41.6	48.1	42.6	35.3	27.4
43.5	48.5	42.7	36.0	28.1
42.7	48.3	42.9	35.9	27.6
42.6	46.7	41.4	35.2	27.6
42.3	46.9	41.5	35.4	27.9
42.8	47.3	42.7	36.2	28.1
43.6	48.1	43.8	37.2	29.3
44.7	49.4	44.7	40.4	32.5
43.2	47.9	44.4	40.2	32.1
41.9	47.5	43.6	38.9	30.8
41.7	46.8	44.3	40.0	32.4
40.5	46.5	43.6	38.7	32.2
39.5	46.0	43.0	37.8	30.3
40.3	46.0	43.9	40.4	32.6
41.8	47.5	44.5	40.6	32.9
42.5	47.8	44.1	39.1	31.3
41.7	48.0	44.0	40.0	32.1
41.2	47.8	43.4	39.0	31.1
40.9	47.7	42.5	36.4	28.3
39.9	46.7	42.6	35.0	27.1
39.7	46.6	42.2	35.0	27.1
40.2	47.0	42.0	34.7	26.7
40.3	46.9	41.9	33.9	26.2
40.7	47.1	41.9	35.2	27.4
40.7	47.1	43.1	40.5	32.8
40.7	48.0	43.8	37.6	30.0
39.2	46.5	41.8	35.4	27.7
39.4	47.2	41.6	34.0	26.3

42.1	47.7	42.3	34.4	26.5
41.9	48.0	44.6	41.2	33.8
42.3	48.3	45.0	41.5	33.8
42.4	47.8	43.9	40.6	33.0
40.5	46.0	42.2	38.1	30.3
40.1	45.9	42.2	37.8	30.1
41.5	46.4	44.6	43.0	35.3
42.5	46.7	44.8	43.1	35.4
40.5	45.6	42.2	38.9	31.3
39.3	45.3	41.0	36.2	29.0
39.6	45.7	41.0	35.8	28.0
40.1	46.6	42.4	36.1	28.6
39.9	45.7	42.2	36.8	28.7
38.8	45.2	41.3	34.6	26.7
38.6	44.8	41.3	36.2	28.5
38.6	44.8	41.9	37.9	29.5
39.1	45.8	43.1	39.1	31.1
39.2	45.8	43.7	37.3	30.0
38.8	45.1	43.7	35.5	28.0
39.1	45.4	43.1	35.9	28.4
39.6	45.6	42.0	36.2	28.7
39.5	45.4	41.6	37.7	30.2
38.8	45.1	42.0	37.6	29.9
41.0	46.0	43.5	37.6	29.8
40.0	46.6	43.0	37.2	29.5
39.5	46.2	42.6	37.6	29.7
39.4	46.4	42.9	36.9	29.2
39.3	46.4	42.2	35.8	27.0
39.0	46.2	42.6	35.8	27.4
39.2	45.9	42.5	36.0	28.5
38.7	45.7	43.3	37.2	30.1
38.4	45.5	42.9	36.4	28.4
39.6	46.3	42.9	36.6	28.8
40.2	47.0	44.8	39.5	31.3
42.8	48.1	44.8	38.7	30.8
41.5	46.6	43.7	37.1	29.2
41.3	46.5	44.4	39.8	31.9
42.2	48.1	44.5	40.1	30.9
40.9	47.5	43.0	39.4	31.8
41.7	47.3	43.7	39.5	31.6
42.5	47.7	44.4	41.3	33.9
42.7	47.6	44.6	41.3	33.8
43.3	48.0	45.9	44.0	35.3
42.8	48.0	45.6	42.4	34.0
42.2	48.1	44.1	40.4	32.7
41.9	47.0	43.7	39.9	32.3
41.7	46.5	43.7	38.3	29.2
40.0	46.7	41.9	34.1	26.3

39.8	46.2	41.5	34.1	26.3
40.2	45.6	41.6	36.4	29.8
39.7	45.6	42.0	37.2	29.8
40.5	47.1	42.5	37.2	29.2
40.3	45.9	45.1	39.1	31.4
40.2	45.7	44.1	40.1	32.5
40.2	45.1	43.0	38.4	30.9
40.1	44.6	41.4	35.6	28.6
39.8	43.8	41.6	34.7	27.0
39.0	44.0	41.7	34.8	26.9
40.2	45.6	40.9	34.9	26.5
39.4	45.6	40.3	34.2	26.3
41.2	46.5	44.0	40.4	33.0
39.9	45.8	43.5	40.8	33.0
39.6	45.3	41.2	36.8	28.9
39.0	44.1	39.5	34.2	26.8
38.9	43.8	39.4	34.1	26.8
38.7	43.9	40.2	34.2	25.6
36.7	43.5	40.9	34.4	25.7
36.1	43.0	42.3	33.6	25.9
36.2	43.1	41.4	34.5	26.4
37.0	43.7	41.2	34.0	26.4
39.6	45.0	41.3	33.1	25.6
39.6	46.6	41.7	33.4	25.9
38.6	45.1	40.6	31.8	24.9
38.5	44.5	39.7	31.7	24.9
37.3	44.4	40.2	33.4	26.6

1/1 LASmin 16000	1/3 LASeq 6.3	1/3 LASeq 8.0	1/3 LASeq 10.0	1/3 LASeq 12.5
16.3	1.9	0.9	0.3	-0.8
16.5	1.9	0.9	0.3	3.1
18.3	1.9	0.9	0.3	1.3
20.8	1.9	0.9	0.3	0.7
18.9	1.9	0.9	0.3	5.8
18.5	1.9	0.9	0.3	1.6
20.3	1.9	0.9	1.0	4.1
17.2	1.9	0.9	0.5	8.8
16.9	1.9	0.9	0.3	1.5
17.7	1.9	0.9	0.3	1.8
18.7	1.9	0.9	1.3	5.2
19.9	1.9	0.9	0.5	6.9
18.7	1.9	0.9	3.8	6.1
18.3	1.9	0.9	1.1	5.6
18.2	1.9	0.9	0.3	2.6
17.7	1.9	0.9	0.3	3.7
17.2	1.9	0.9	0.3	3.9
16.8	1.9	0.9	0.3	2.0
17.0	1.9	0.9	0.3	-0.7
16.8	1.9	0.9	0.3	-0.8
16.8	1.9	0.9	0.3	0.1
17.7	1.9	0.9	0.4	6.4
17.7	1.9	0.9	0.3	3.9
18.3	1.9	0.9	0.3	4.9
19.6	1.9	0.9	1.2	8.3
19.3	1.9	1.0	0.3	5.0
18.5	1.9	0.9	0.6	3.8
19.8	1.9	0.9	0.3	2.5
19.0	1.9	0.9	0.5	3.4
18.3	1.9	0.9	0.3	1.3
19.5	1.9	0.9	0.7	2.1
19.5	1.9	0.9	1.3	3.4
18.5	1.9	0.9	0.3	2.6
19.9	1.9	0.9	3.5	6.6
18.3	1.9	0.9	2.3	6.7
16.9	1.9	0.9	0.3	-0.1
16.7	1.9	0.9	0.3	0.1
16.7	1.9	0.9	0.3	0.7
17.1	1.9	0.9	0.3	4.0
16.7	1.9	0.9	0.3	2.2
16.9	1.9	0.9	0.3	0.4
19.6	1.9	0.9	0.3	2.5
17.9	1.9	0.9	0.3	1.8
16.8	1.9	0.9	0.5	2.6
16.2	1.9	0.9	0.3	-0.6

16.5	1.9	0.9	0.3	-0.7
20.2	1.9	1.0	4.1	10.1
20.1	1.9	2.0	1.4	9.7
19.8	1.9	0.9	0.5	7.3
18.1	1.9	0.9	0.3	7.7
17.9	1.9	0.9	0.9	4.4
21.5	1.9	1.9	3.9	7.9
21.5	2.0	3.1	11.0	14.1
18.4	1.9	0.9	2.4	8.4
17.1	1.9	0.9	0.3	2.5
16.7	1.9	0.9	0.3	-0.8
17.6	1.9	0.9	0.3	1.7
17.5	1.9	0.9	0.3	2.7
16.8	1.9	0.9	0.3	0.9
17.3	1.9	0.9	0.3	1.3
17.6	1.9	0.9	0.3	-0.5
18.3	1.9	0.9	0.4	3.7
17.9	1.9	0.9	0.3	-0.2
16.9	1.9	0.9	0.3	1.3
17.2	1.9	0.9	0.3	-0.6
17.2	1.9	0.9	0.3	0.9
18.7	1.9	0.9	1.6	5.4
18.1	1.9	0.9	4.5	6.4
17.7	1.9	0.9	1.7	3.7
17.7	1.9	0.9	0.3	4.4
17.6	1.9	0.9	0.3	0.7
17.4	1.9	0.9	0.3	0.9
16.7	1.9	0.9	0.3	2.1
16.9	1.9	0.9	0.3	1.2
17.2	1.9	0.9	0.3	-0.6
17.7	1.9	0.9	0.4	0.3
17.7	1.9	0.9	0.4	1.9
17.9	1.9	0.9	0.6	3.5
18.3	1.9	0.9	0.3	1.1
18.4	1.9	0.9	0.9	5.4
17.7	1.9	0.9	0.3	1.7
19.0	1.9	0.9	0.6	2.9
18.5	1.9	0.9	0.3	2.9
18.9	1.9	0.9	0.5	6.3
19.5	1.9	0.9	0.6	7.1
21.2	1.9	0.9	0.6	4.9
21.2	1.9	0.9	1.5	3.8
21.3	1.9	1.3	5.0	10.1
20.3	1.9	2.0	3.6	10.0
19.7	1.9	0.9	0.9	4.7
19.5	1.9	0.9	0.3	3.6
17.8	1.9	0.9	0.3	4.6
16.5	1.9	0.9	0.4	2.8

16.5	1.9	0.9	1.7	6.9
17.9	1.9	0.9	3.8	10.0
17.6	1.9	0.9	0.4	4.1
17.4	1.9	0.9	0.3	-0.7
18.6	1.9	0.9	0.6	4.9
19.7	1.9	0.9	0.3	1.1
18.7	1.9	0.9	0.3	4.7
18.0	1.9	0.9	0.4	6.9
17.1	1.9	0.9	0.7	7.2
16.7	1.9	0.9	0.4	3.0
16.7	1.9	0.9	0.3	2.3
16.7	1.9	0.9	0.3	2.2
20.8	1.9	1.7	9.7	15.1
20.0	1.9	1.3	3.2	8.1
17.3	1.9	0.9	0.7	6.5
16.8	1.9	0.9	0.3	1.6
16.7	1.9	0.9	0.3	0.6
16.1	1.9	0.9	0.3	1.5
16.2	1.9	0.9	0.3	-0.7
16.6	1.9	0.9	0.3	1.5
16.6	1.9	0.9	0.5	3.8
16.6	1.9	0.9	0.3	1.1
16.6	1.9	0.9	0.3	-0.7
16.7	1.9	0.9	0.3	3.2
16.1	1.9	0.9	0.3	0.4
16.0	1.9	0.9	0.3	-0.8
17.2	1.9	0.9	0.3	1.3

1/3 LASeq 16.0	1/3 LASeq 20.0	1/3 LASeq 25.0	1/3 LASeq 31.5	1/3 LASeq 40.0	1/3 LASeq 50.0
2.8	5.1	12.7	14.7	21.0	20.5
7.4	13.2	16.8	18.6	22.3	23.0
5.0	10.0	14.5	14.9	19.4	18.9
2.7	8.3	13.0	15.6	18.5	24.5
7.6	11.8	18.7	17.9	20.6	26.5
7.0	12.5	18.1	19.6	22.1	26.5
11.2	16.1	22.8	24.8	26.2	29.7
11.9	15.8	19.5	23.0	24.3	27.9
8.4	13.1	17.7	19.0	21.7	26.8
8.8	13.3	16.9	20.1	23.2	27.8
9.0	14.9	19.5	22.8	26.2	27.6
12.0	17.5	24.7	27.3	28.5	31.5
13.9	16.3	19.5	24.0	24.1	28.5
12.0	13.3	19.5	22.6	25.6	29.5
9.3	13.5	18.7	21.1	24.7	28.5
6.4	9.9	13.6	16.5	20.1	26.5
8.5	14.1	19.4	19.1	23.1	26.0
6.7	10.5	13.5	14.7	20.7	27.2
5.9	10.4	11.6	14.8	18.5	27.0
4.8	7.4	11.3	13.5	17.4	27.3
4.6	12.5	13.5	16.6	21.5	27.1
10.6	15.4	18.6	21.2	24.4	28.5
9.5	14.6	17.1	20.3	23.4	28.0
10.2	14.1	17.2	20.8	23.5	29.0
14.3	19.5	23.4	25.6	26.9	29.6
11.0	15.1	19.0	22.7	23.6	28.3
10.1	13.8	18.7	23.3	23.7	28.5
8.6	13.4	17.2	21.8	23.0	27.1
7.7	10.3	16.7	18.6	21.2	26.4
4.2	9.1	15.5	17.4	22.3	26.7
8.9	12.6	16.9	21.3	23.2	27.3
9.8	14.8	18.1	21.3	23.6	26.5
6.4	10.6	14.2	16.4	21.1	26.4
11.3	17.1	19.6	21.6	26.3	27.3
10.6	12.8	17.2	19.2	22.0	26.8
7.2	9.2	13.7	15.3	19.3	25.5
5.8	10.1	17.4	17.9	21.4	26.9
7.0	9.3	14.9	17.3	18.4	26.3
7.6	12.6	16.4	19.9	22.0	28.8
5.8	11.4	16.8	17.3	20.2	27.5
7.1	10.4	14.8	17.6	20.8	26.8
6.7	10.0	16.4	18.7	20.7	28.5
11.3	14.2	17.2	20.6	20.9	28.3
8.4	11.3	12.8	14.8	19.6	28.4
3.5	6.8	13.6	15.8	19.3	27.2

5.7	10.5	14.6	17.5	21.4	26.5
16.9	18.3	24.2	26.6	27.9	30.3
13.3	18.1	21.0	23.6	24.7	28.6
13.5	18.4	24.1	26.9	28.1	30.6
13.4	16.5	21.4	23.4	24.4	29.0
9.6	14.4	18.1	20.2	22.7	28.1
13.0	20.5	26.2	29.0	32.1	34.8
18.4	23.4	28.4	29.9	32.8	34.4
10.0	13.7	17.7	19.2	21.9	26.3
2.2	5.8	10.3	13.1	16.1	26.5
1.5	6.7	11.3	12.5	17.6	26.2
5.3	10.3	13.8	16.5	20.1	26.6
7.5	11.2	16.4	19.3	21.0	27.0
7.3	11.4	16.7	19.3	21.0	26.6
6.5	12.1	15.2	17.8	20.7	26.3
7.1	11.1	15.1	18.0	22.0	27.1
7.4	14.4	15.4	18.1	25.1	26.4
4.7	10.1	15.6	16.2	20.5	26.4
6.4	10.5	13.5	16.0	20.1	26.3
4.3	9.2	14.0	14.2	18.7	26.5
5.6	10.6	14.6	18.6	20.5	27.4
11.3	17.4	21.5	25.6	28.3	32.2
11.3	15.1	19.0	21.9	24.0	28.4
10.2	15.1	18.5	20.1	23.3	27.9
7.7	9.9	14.1	15.0	19.3	26.4
5.5	8.8	14.1	16.4	18.7	26.3
7.0	13.7	15.6	18.0	21.9	27.5
6.7	10.4	15.9	17.0	21.4	26.5
3.9	8.8	13.8	15.4	20.4	26.4
2.5	8.0	11.9	15.1	19.3	25.9
5.8	11.1	12.3	16.7	20.9	26.6
8.1	13.1	17.2	18.7	23.2	27.4
8.2	14.2	17.5	22.7	22.7	27.2
5.6	10.6	14.4	17.7	20.7	26.8
13.2	16.0	20.5	21.8	24.3	27.7
7.6	9.6	15.4	17.1	20.5	26.0
9.3	12.7	16.7	18.9	23.3	26.6
9.0	12.9	17.1	18.5	24.6	26.8
9.6	11.3	16.9	17.7	22.2	27.0
11.2	15.6	16.5	19.3	24.3	27.3
13.4	17.0	22.6	26.5	30.4	31.9
10.7	15.1	19.0	23.7	26.8	31.0
16.0	22.6	25.6	30.5	33.1	36.6
15.3	17.0	21.7	23.5	25.4	28.7
12.6	15.1	19.2	20.8	24.0	28.0
8.3	13.7	16.7	19.3	21.3	26.7
12.2	16.1	20.3	21.6	24.1	28.9
9.5	13.9	15.8	16.6	20.4	26.9

9.9	13.4	19.4	23.1	24.1	27.3
12.3	17.0	20.2	23.1	25.8	27.4
9.7	13.7	17.0	17.6	22.0	26.3
4.1	8.9	14.0	20.7	20.5	24.6
12.7	14.8	18.0	22.5	22.7	24.1
5.6	11.9	15.2	18.7	23.0	24.1
8.1	12.8	19.2	20.2	24.2	23.8
11.0	17.4	23.1	23.8	25.6	24.8
10.5	14.6	19.7	20.9	24.0	23.9
7.0	11.3	15.4	16.7	19.8	21.1
6.4	11.3	13.9	16.9	19.1	20.5
6.7	10.0	14.2	16.6	19.6	25.2
14.4	21.4	24.1	29.7	31.4	33.3
12.5	15.0	20.0	22.9	24.4	25.6
13.7	17.0	19.3	21.3	23.6	23.2
6.3	9.3	12.3	15.1	18.8	17.8
6.2	10.3	13.9	16.6	20.1	19.9
6.4	9.4	11.6	14.4	20.6	18.8
2.6	4.9	9.9	11.7	18.9	15.7
7.2	11.1	16.3	17.6	21.4	21.3
6.8	8.8	12.4	14.1	18.4	18.7
7.6	11.2	15.9	16.3	20.1	19.8
5.7	8.7	12.7	15.8	19.3	21.4
5.8	12.9	16.1	19.3	22.5	22.3
7.1	9.2	13.5	17.5	20.2	21.7
0.5	3.1	8.9	12.1	19.0	18.9
4.1	12.4	14.7	19.6	21.6	20.4

1/3 LASeq 63.0	1/3 LASeq 80.0	1/3 LASeq 100	1/3 LASeq 125	1/3 LASeq 160	1/3 LASeq 200
25.2	22.6	24.1	26.4	24.8	25.6
26.4	25.2	24.9	25.2	26.0	25.4
25.5	25.7	24.7	25.9	25.6	26.5
26.6	27.9	26.2	26.3	27.8	29.3
27.5	28.0	27.6	25.8	26.9	28.9
24.6	26.0	27.2	25.5	28.2	27.9
28.3	28.2	29.7	27.3	27.6	29.5
24.8	25.7	28.3	26.4	26.9	27.7
23.9	25.0	27.4	26.6	26.1	27.4
24.9	25.4	27.6	27.7	27.7	27.8
26.1	26.5	28.2	28.2	28.8	29.3
30.0	29.9	30.4	29.7	28.5	29.3
26.4	27.5	28.2	27.4	27.5	28.9
26.7	27.7	28.1	28.7	28.8	29.5
27.0	28.6	28.5	29.2	27.9	28.5
24.8	25.2	26.3	26.1	26.9	27.2
26.0	25.6	27.6	26.3	26.0	27.6
27.6	25.9	28.0	27.0	27.6	27.4
31.3	29.7	28.3	28.7	28.8	28.8
31.0	29.1	30.5	30.4	30.5	28.5
26.3	27.1	28.8	28.5	27.8	28.2
27.1	27.9	29.7	31.1	29.6	29.8
26.1	26.8	29.3	33.7	31.6	30.1
28.4	28.5	29.8	35.0	30.3	30.0
29.9	29.4	31.6	31.0	30.3	31.3
29.3	25.7	28.4	28.1	28.1	28.6
27.6	24.5	28.1	28.6	27.6	28.3
25.5	25.4	28.4	28.0	27.4	29.6
22.8	22.5	27.1	26.1	26.5	28.4
23.0	22.9	26.0	26.5	27.4	27.3
26.9	26.6	30.9	29.2	28.7	29.8
24.6	27.9	27.9	28.2	27.9	29.2
23.2	26.8	28.4	26.7	27.7	29.4
26.2	26.6	27.6	28.3	28.9	30.0
23.5	24.6	27.7	29.2	27.5	28.8
24.0	24.4	26.9	27.4	26.9	29.4
26.1	25.8	27.3	27.6	26.8	27.9
25.2	25.1	27.9	27.1	29.1	27.3
26.2	26.9	30.1	26.2	27.7	28.5
28.8	30.4	30.0	27.8	29.3	29.3
30.7	32.1	31.7	30.1	30.5	30.1
26.4	27.6	29.1	27.8	27.0	28.8
28.5	28.9	30.0	28.7	28.5	29.5
30.0	27.7	34.0	35.2	29.4	30.5
27.7	25.9	27.9	28.1	27.6	28.6

27.0	25.7	27.5	27.5	28.1	28.3
29.7	29.0	31.0	30.3	29.6	29.4
26.8	26.4	28.5	26.5	27.3	29.2
30.0	30.0	30.2	28.0	29.3	30.4
27.6	26.9	28.5	27.4	27.5	28.5
26.3	25.4	27.2	25.7	26.5	28.4
34.8	34.6	34.5	33.4	32.7	33.4
34.1	33.9	33.5	31.4	31.3	33.0
25.2	25.0	28.2	25.3	25.9	28.7
25.3	27.9	26.7	24.6	25.7	27.2
25.5	26.1	27.1	26.7	27.5	27.4
26.5	22.8	25.9	25.8	26.5	27.1
26.6	25.1	26.6	25.6	25.3	27.2
26.4	24.2	26.3	24.5	24.5	25.8
26.3	23.6	26.1	24.7	24.2	26.8
27.0	24.8	26.1	26.9	25.5	27.3
25.0	22.9	25.9	25.0	24.9	27.5
26.1	25.1	27.0	26.5	26.4	27.8
25.5	24.0	25.7	23.9	24.8	26.0
25.4	22.4	26.4	24.5	25.0	26.7
26.8	24.4	27.8	26.6	26.4	28.3
30.6	29.3	29.5	28.6	28.4	29.6
27.6	25.0	27.4	26.3	26.2	28.8
27.3	25.8	27.6	27.1	27.0	29.7
25.4	20.8	25.3	25.8	27.0	28.5
25.8	21.5	26.9	25.5	25.1	28.2
26.0	22.7	27.8	25.6	26.0	29.3
26.5	22.6	26.6	24.2	25.1	27.2
25.1	21.2	25.6	23.6	24.5	26.1
24.9	21.9	25.0	23.2	25.0	26.4
25.6	22.7	24.7	24.2	25.3	27.0
26.4	25.1	26.8	26.3	25.6	26.3
24.3	25.3	27.0	25.2	25.2	26.3
25.3	24.8	26.8	24.5	26.3	28.3
28.6	27.2	28.7	30.3	27.9	29.3
28.9	28.8	29.1	29.9	31.7	29.8
23.8	23.8	28.4	34.7	29.9	28.9
23.3	24.5	28.4	31.4	26.5	27.7
23.5	24.6	28.9	31.2	25.0	27.9
26.2	26.8	29.7	30.0	28.0	29.7
31.6	31.6	32.3	29.7	29.4	31.1
29.9	29.2	29.7	28.0	28.8	31.2
35.0	34.1	33.1	31.5	31.3	32.5
26.7	26.2	28.2	27.0	27.4	30.5
23.9	24.5	28.1	24.7	26.6	29.2
24.1	25.0	28.9	26.3	26.6	27.9
26.1	26.3	28.1	27.2	27.0	29.2
21.8	23.3	26.5	25.9	25.5	27.7

24.9	26.3	28.2	24.9	25.7	27.4
25.9	26.6	27.3	26.0	26.3	27.6
22.2	21.2	25.5	23.9	24.7	25.8
25.0	25.9	25.4	24.2	24.8	25.6
24.3	24.7	23.5	26.0	26.1	26.0
24.2	24.8	25.8	26.5	27.0	29.1
24.1	25.2	27.2	26.6	26.5	27.5
25.3	25.8	27.1	27.0	25.5	25.9
24.6	24.7	25.3	26.0	23.8	26.0
21.6	22.3	22.9	25.1	23.8	24.8
20.2	21.8	22.5	24.7	24.1	24.2
25.5	28.0	29.3	28.8	27.9	28.7
34.2	34.9	33.1	32.4	31.9	31.7
26.9	28.1	27.9	30.4	29.5	29.1
26.0	24.5	24.0	26.9	25.7	26.2
20.4	21.3	21.5	24.2	23.2	23.2
21.1	23.8	22.2	25.2	24.3	24.2
21.2	22.5	24.0	25.9	24.0	24.0
19.6	22.7	22.3	26.3	23.9	22.0
22.4	23.4	22.8	28.1	25.1	23.7
21.1	22.7	23.7	28.4	25.3	25.7
22.8	23.5	24.3	28.1	26.1	25.3
22.6	24.2	24.4	25.6	25.5	24.7
23.7	25.5	25.5	27.7	24.3	24.9
23.0	23.4	23.7	26.8	23.6	23.7
22.0	20.7	25.9	27.1	24.6	24.1
22.7	23.9	23.1	26.8	25.0	24.6

1/3 LASeq 250	1/3 LASeq 315	1/3 LASeq 400	1/3 LASeq 500	1/3 LASeq 630	1/3 LASeq 800
26.1	27.9	33.3	38.6	39.5	44.4
26.6	28.8	32.5	36.8	37.7	42.7
28.7	30.9	33.2	35.6	37.5	41.3
32.2	32.6	35.8	37.5	39.2	42.1
29.9	31.3	34.1	36.6	38.6	41.9
28.3	30.1	32.8	35.4	37.8	41.4
30.2	31.2	33.7	36.7	39.1	41.7
28.7	30.1	33.3	36.2	39.1	43.1
28.1	30.4	33.2	37.1	39.9	44.4
28.7	30.4	33.3	38.6	40.5	44.8
29.5	31.0	33.7	38.2	40.2	44.1
29.8	31.2	34.2	37.7	40.9	44.5
29.6	31.4	34.1	38.9	39.6	42.9
29.6	32.0	33.8	37.7	39.1	42.7
28.5	31.0	32.9	37.0	38.4	42.2
27.5	29.9	32.6	35.8	38.4	41.8
28.1	31.3	32.4	35.4	38.5	42.2
27.7	33.0	33.9	37.8	40.2	43.8
29.3	33.3	35.6	40.1	42.4	44.9
29.3	32.3	35.4	38.6	42.2	43.8
28.8	30.8	33.3	37.3	41.7	42.6
28.8	29.9	33.4	37.9	40.5	42.2
29.4	31.4	34.9	38.1	40.9	42.7
31.9	33.0	35.8	39.2	43.8	43.8
31.8	33.4	35.8	38.7	45.3	45.1
29.8	32.6	34.2	37.5	43.1	43.7
29.3	31.6	33.9	36.4	42.4	43.3
30.2	31.8	34.6	37.0	40.5	42.4
29.5	30.9	33.2	35.9	38.5	40.9
28.3	30.2	32.6	34.8	37.5	40.5
30.3	31.7	33.9	37.1	39.2	41.7
29.6	31.9	34.8	37.1	39.8	42.5
30.0	32.1	34.8	37.4	40.4	43.4
30.4	31.7	34.4	36.8	39.6	42.8
29.2	30.5	33.8	37.0	39.4	43.1
28.0	30.1	33.2	35.9	38.7	42.7
27.4	29.5	32.6	35.4	38.5	42.5
27.3	29.2	32.4	35.1	37.7	41.8
28.4	29.7	33.0	35.8	38.3	42.2
28.8	30.2	32.7	35.8	38.3	42.3
30.6	30.5	33.8	35.7	38.4	42.3
30.5	31.0	33.9	35.9	38.4	42.3
31.0	31.2	33.6	36.7	39.1	43.5
30.1	30.5	32.3	34.6	37.4	41.5
28.9	30.0	33.0	36.0	39.3	43.5

29.8	31.0	34.8	37.4	40.1	43.2
30.2	31.7	34.7	37.7	40.3	44.3
31.0	32.7	34.7	37.7	40.3	43.7
31.9	32.7	35.3	37.8	40.5	43.4
29.8	31.5	34.0	37.1	40.3	43.6
29.5	31.6	34.2	35.9	38.1	41.5
35.0	35.3	37.8	39.7	41.1	43.3
34.6	35.3	37.6	38.7	40.5	42.6
32.0	34.0	36.0	36.4	38.3	41.6
30.2	31.5	33.8	34.9	37.1	40.6
29.7	31.6	33.8	36.6	38.0	41.6
29.2	30.8	33.4	36.4	37.7	41.6
28.0	29.7	32.3	35.8	37.5	41.1
25.9	28.0	31.3	35.7	36.7	40.5
26.3	29.2	31.9	34.6	36.0	39.0
27.4	28.9	32.2	34.1	36.1	40.0
27.7	30.1	32.4	34.8	36.3	39.8
28.5	29.9	32.8	35.5	37.1	40.8
27.1	29.0	33.1	34.4	36.4	39.3
27.7	28.7	31.8	34.6	36.5	40.3
28.3	30.2	32.7	36.4	37.2	40.8
29.5	30.7	32.8	35.9	37.2	40.4
29.9	30.5	32.8	35.1	37.0	40.1
31.1	31.2	33.9	36.1	38.2	41.5
29.1	29.9	33.0	35.0	37.7	41.2
28.3	29.4	32.5	34.7	37.5	40.9
29.3	29.4	32.2	34.7	37.3	41.0
27.5	29.0	31.7	34.2	37.3	41.4
26.9	28.7	31.0	33.9	37.1	41.0
26.0	28.7	30.7	33.8	37.6	40.7
28.1	29.3	32.1	34.5	37.1	40.4
26.6	28.8	30.8	33.5	37.0	41.0
27.0	29.4	31.9	34.6	37.4	41.2
29.0	30.7	33.7	36.5	38.7	41.9
29.0	32.3	36.4	39.6	40.9	44.4
28.2	31.9	36.3	37.4	39.5	43.3
30.3	32.3	35.3	36.8	38.9	42.4
28.5	32.3	34.1	37.3	40.1	43.7
28.0	32.7	33.8	36.3	39.2	42.7
30.5	33.3	34.4	37.3	39.1	42.4
32.2	33.4	35.2	38.4	40.2	43.3
32.4	34.2	36.5	39.6	41.2	43.7
33.8	35.0	37.7	39.6	41.5	43.4
31.8	33.5	35.6	38.5	40.4	43.7
30.4	32.4	35.5	37.9	40.7	42.9
29.1	31.1	33.9	37.2	40.2	42.6
29.1	31.9	35.2	37.7	40.3	42.1
27.6	30.5	34.5	36.3	39.0	42.6

27.5	30.3	32.4	36.7	38.8	42.1
28.0	30.3	33.1	37.3	38.4	41.2
27.7	29.3	31.5	35.5	37.7	41.2
28.1	29.9	32.4	37.3	39.2	42.8
27.6	29.5	32.9	35.9	38.2	41.5
30.4	31.6	34.2	36.4	38.0	41.0
30.0	30.3	33.3	36.1	38.3	40.5
27.9	29.1	32.5	36.1	37.9	40.2
27.1	28.0	31.3	38.5	38.9	39.6
27.0	27.4	31.3	35.8	37.8	39.4
26.9	28.7	31.7	37.8	38.3	40.5
28.2	29.8	32.3	35.8	37.4	40.7
31.2	31.8	34.1	37.6	38.9	41.1
30.5	31.2	33.5	36.6	37.8	40.8
27.9	28.7	31.3	35.1	37.3	40.4
25.7	27.2	29.9	37.2	38.0	40.5
26.8	26.9	30.1	37.6	35.7	38.9
25.7	26.7	29.9	36.1	35.8	40.0
24.1	25.9	29.3	33.2	34.4	39.0
25.3	26.4	28.9	32.0	33.6	37.3
26.5	27.6	29.6	32.0	34.1	37.5
26.2	27.5	29.9	33.8	35.1	38.4
27.0	28.5	31.3	35.6	37.8	41.0
26.5	28.3	30.3	35.2	38.0	41.9
25.8	27.1	30.2	34.4	37.2	40.5
26.3	27.7	30.7	34.4	36.0	39.2
25.8	27.8	31.1	33.4	35.8	39.0

1/3 LASeq 1000	1/3 LASeq 1250	1/3 LASeq 1600	1/3 LASeq 2000	1/3 LASeq 2500
45.7	44.5	41.1	38.9	34.1
44.1	42.6	40.7	38.5	35.5
43.1	41.6	40.3	38.4	37.3
43.4	43.1	42.4	40.3	40.5
43.3	41.9	40.8	39.0	38.7
43.0	41.8	40.3	38.3	36.7
43.3	42.5	41.1	39.3	38.3
44.0	42.3	40.2	37.9	36.2
45.1	43.2	41.2	38.1	35.3
45.8	43.5	40.8	37.9	35.1
45.1	43.4	41.7	39.2	37.4
45.8	43.9	41.8	39.4	37.9
44.6	42.9	40.7	38.3	36.4
43.8	42.1	40.4	37.8	36.3
43.8	42.0	39.8	37.5	36.2
43.2	41.1	39.3	36.6	34.8
43.7	41.3	39.7	36.8	34.2
44.9	42.8	40.6	37.3	34.7
45.7	43.0	40.8	38.1	36.4
44.7	42.8	40.7	37.8	35.7
44.0	42.2	40.1	37.4	35.0
43.6	41.7	39.7	36.7	36.1
44.0	42.3	40.3	37.6	36.0
45.2	43.7	42.2	40.4	39.6
45.7	44.3	42.4	40.3	39.3
44.5	43.3	41.7	39.5	38.3
44.1	42.9	41.4	39.1	37.4
43.4	42.3	41.4	39.7	38.7
43.3	42.1	40.9	39.2	38.1
43.3	41.7	40.4	38.0	36.4
43.7	42.4	41.6	39.5	38.5
43.8	42.8	41.7	39.7	38.6
44.7	43.5	41.9	39.3	37.9
44.1	43.1	41.3	38.8	37.8
44.5	42.7	41.0	38.7	37.7
44.5	42.6	40.7	38.0	35.2
43.5	42.6	40.6	37.8	34.6
43.3	41.8	39.8	37.2	34.5
43.7	42.4	40.0	37.3	34.5
43.6	41.7	39.9	36.8	33.7
43.5	42.0	40.0	37.6	36.0
43.9	42.1	40.2	38.5	37.7
45.2	43.1	41.5	38.9	36.7
43.5	42.0	40.0	37.3	34.6
44.9	42.3	40.1	36.6	33.3

44.3	42.8	40.6	38.7	36.8
44.5	43.3	41.9	40.2	39.0
44.9	43.9	42.6	40.2	39.2
43.7	43.1	41.6	40.0	39.1
42.8	41.5	40.0	37.7	36.3
42.2	41.0	40.1	38.7	37.8
44.5	44.0	43.4	43.3	43.3
43.6	43.2	42.3	41.7	41.5
42.6	41.5	39.9	38.4	38.0
41.6	40.1	38.6	36.2	34.4
43.3	41.4	39.6	36.3	34.3
43.7	41.9	40.3	37.4	35.4
42.6	41.0	39.8	37.3	35.8
42.5	41.0	39.5	36.6	34.0
41.4	40.0	38.7	36.3	35.0
42.0	41.0	39.5	38.7	38.3
42.5	41.3	39.7	38.9	38.0
43.3	42.0	40.4	42.0	38.7
41.8	40.5	39.3	41.5	36.8
42.5	40.8	39.0	41.0	37.0
42.4	40.3	39.1	38.0	35.8
42.3	40.7	39.5	37.9	36.9
42.1	40.7	39.6	37.6	36.5
43.3	42.2	40.8	38.6	37.0
43.4	42.2	40.5	38.2	35.8
42.9	41.8	40.2	37.6	35.7
43.0	42.1	40.3	38.0	35.6
43.1	41.8	40.3	37.9	35.5
42.9	41.3	40.1	39.4	35.7
43.1	41.3	39.9	38.5	37.2
42.2	41.0	39.8	38.5	38.5
42.8	41.5	40.0	37.5	39.8
43.6	41.6	40.2	38.6	40.5
43.7	42.2	40.7	41.8	40.7
45.6	43.5	41.8	42.3	38.4
44.5	42.7	40.9	39.5	37.7
43.6	42.3	40.6	39.9	41.5
44.9	42.9	40.5	39.4	44.7
44.2	42.5	40.1	38.1	37.7
44.0	42.9	40.9	39.1	37.3
44.2	42.8	41.7	40.1	39.8
44.7	43.8	42.6	41.9	42.5
44.4	43.8	42.8	41.9	43.3
44.5	43.4	42.0	41.4	41.8
44.9	43.3	41.8	40.7	41.9
43.6	42.1	40.3	38.8	38.3
43.0	41.5	40.2	40.3	37.3
43.8	42.2	40.5	38.2	35.4

43.4	41.8	40.2	37.4	35.6
43.1	41.3	39.8	37.2	35.8
42.9	40.8	39.0	36.6	38.3
45.5	43.6	41.2	38.0	39.6
43.5	42.3	40.8	41.2	41.3
42.1	41.0	39.8	40.7	39.4
41.8	40.6	39.2	41.3	37.3
41.8	39.8	38.1	39.3	36.1
41.3	39.0	37.2	38.8	36.6
41.3	39.3	37.5	37.2	39.3
42.2	40.5	38.6	35.7	34.7
42.2	41.2	39.3	36.6	36.0
43.0	42.7	40.8	39.8	38.5
42.4	41.9	39.9	39.5	39.6
42.1	41.0	38.5	36.8	37.5
42.8	41.2	37.7	35.2	34.1
40.3	38.8	37.0	34.7	34.0
41.5	39.9	37.8	34.9	36.3
41.1	39.5	37.6	36.1	38.0
39.5	38.7	36.1	38.3	40.6
39.7	38.8	36.7	37.3	37.7
40.7	39.4	37.5	36.4	37.4
43.6	41.9	40.3	36.7	33.9
44.1	42.1	40.7	37.2	32.9
42.8	40.5	39.1	36.3	32.3
41.1	39.7	37.8	34.7	31.7
41.3	40.0	38.1	35.8	33.4

1/3 LASeq 3150	1/3 LASeq 4000	1/3 LASeq 5000	1/3 LASeq 6300	1/3 LASeq 8000
31.2	28.9	26.4	23.8	20.6
33.9	32.1	29.9	27.4	24.0
36.7	35.3	32.7	30.1	26.3
39.8	38.6	36.0	33.5	29.6
37.5	36.0	33.5	30.9	27.2
35.6	34.4	32.1	29.5	25.8
38.0	36.8	34.6	32.3	28.3
35.3	33.8	31.2	28.8	25.3
33.5	31.8	29.0	26.7	23.2
33.6	32.4	30.0	27.4	23.9
36.8	35.7	33.4	30.7	26.7
37.3	36.2	33.9	31.3	27.5
35.5	34.1	31.8	29.6	26.0
35.5	34.3	31.9	29.4	25.6
35.7	33.6	30.9	28.3	24.6
33.8	32.4	30.4	28.1	24.6
32.9	31.4	29.1	26.5	23.0
32.9	31.0	28.4	25.8	22.3
35.3	33.7	31.1	28.4	24.5
34.6	32.9	30.4	27.6	23.8
33.6	31.9	29.5	26.7	23.1
34.8	31.3	28.3	26.6	23.0
33.8	31.8	29.3	26.5	23.1
38.7	37.5	35.2	32.5	28.5
39.0	37.3	34.8	32.2	28.6
38.9	36.5	33.8	31.4	28.0
36.8	34.9	32.4	29.8	26.1
38.5	37.1	34.8	32.1	28.2
37.8	35.8	33.5	31.1	27.5
35.7	34.1	31.8	29.4	25.8
37.8	36.4	34.1	31.4	27.6
38.0	36.6	34.1	31.5	27.7
37.3	36.0	33.7	31.0	27.1
37.3	36.0	33.6	30.9	27.1
37.0	35.7	33.2	30.7	26.9
34.4	32.5	29.9	27.3	23.4
33.0	30.8	28.0	25.6	22.1
33.4	31.5	29.1	26.3	22.7
33.2	31.2	28.7	26.0	22.4
31.8	29.8	27.2	24.7	21.2
35.3	34.1	31.5	28.9	25.0
37.7	36.6	34.3	31.6	27.7
35.8	34.4	32.1	29.6	25.9
33.3	31.8	29.3	26.7	23.1
31.5	29.6	27.0	24.5	21.3

36.2	34.8	32.4	30.0	27.1
38.5	37.2	34.6	32.3	29.0
38.8	37.8	35.5	32.9	29.1
38.8	37.4	35.3	32.7	28.8
35.9	34.5	32.0	29.5	25.7
37.9	36.6	34.2	31.5	27.6
43.6	42.3	40.0	37.4	33.5
42.0	40.8	38.5	35.8	32.0
38.6	37.1	34.6	32.1	28.5
33.8	32.4	30.2	27.9	24.4
32.9	31.0	28.6	26.3	22.9
34.4	33.3	30.7	28.5	24.9
34.9	33.6	31.1	28.7	25.0
32.2	30.5	27.9	25.3	21.7
34.5	33.2	30.8	28.1	24.4
35.4	33.9	31.2	28.5	24.7
36.5	35.1	32.6	29.8	26.0
36.4	34.5	32.2	29.9	26.0
33.2	31.6	29.1	27.1	23.4
33.9	32.3	29.8	27.4	24.0
34.9	33.2	30.9	28.4	24.7
36.3	34.8	32.4	29.8	26.0
35.9	34.5	32.1	29.5	25.6
36.5	35.2	32.8	30.2	26.3
35.0	33.5	30.8	28.1	24.5
34.8	33.3	30.8	28.1	24.2
34.4	33.1	30.6	28.0	24.0
34.3	31.3	28.4	25.7	22.2
34.5	32.5	29.8	27.1	23.5
34.2	31.9	29.6	27.0	23.7
35.9	34.6	32.3	29.8	26.1
35.1	31.9	29.4	27.0	23.5
34.9	33.2	30.7	28.0	24.3
37.1	35.9	33.5	30.9	27.0
36.6	35.5	33.3	30.8	26.9
35.6	34.0	31.5	28.8	25.1
38.7	36.9	34.4	31.6	27.5
37.9	35.9	33.6	30.5	26.6
36.6	35.5	33.1	30.4	26.6
36.7	35.3	32.7	30.2	26.4
38.9	37.6	35.3	32.8	29.1
42.1	40.4	38.1	35.6	31.6
42.7	40.5	38.3	35.7	31.9
41.4	37.4	35.1	32.7	28.7
39.7	38.2	35.9	33.2	29.3
37.0	35.6	33.4	30.7	26.8
36.7	34.6	32.3	29.6	25.7
33.9	31.2	28.6	25.9	22.4

34.7	33.3	30.9	28.4	24.8
35.0	33.3	31.1	28.7	25.2
34.6	32.8	30.4	28.0	24.6
36.0	34.6	32.4	29.6	25.6
36.3	35.0	32.9	30.2	26.2
37.7	36.5	34.5	31.9	28.0
36.5	35.3	33.0	30.4	26.6
33.3	32.1	29.8	27.3	23.7
32.0	30.4	28.1	25.8	22.4
33.4	30.1	27.6	25.3	21.8
33.1	30.8	28.3	25.6	22.1
35.0	33.5	31.0	28.4	24.5
38.1	36.9	34.6	32.0	28.0
37.8	36.4	34.2	31.5	27.6
36.5	34.9	32.4	29.6	25.8
33.4	32.0	29.1	26.4	22.7
31.9	30.3	28.0	25.6	21.8
32.4	29.3	26.8	24.2	20.7
32.4	29.9	27.2	24.4	21.0
31.8	29.6	27.2	24.6	21.3
32.6	30.2	27.7	25.1	21.6
33.5	30.2	27.6	25.2	21.7
31.5	30.2	27.3	24.8	21.3
30.7	29.0	26.5	24.2	20.8
29.7	27.5	25.1	23.0	20.2
29.8	27.6	25.2	23.0	20.1
32.0	30.5	28.3	27.2	23.0

1/3 LASeq 10000	1/3 LASeq 12500	1/3 LASeq 16000	1/3 LASeq 20000	1/3 LASmax 6.3
17.2	13.7	10.7	8.7	1.9
20.4	16.3	12.9	10.2	1.9
22.3	17.3	13.0	9.8	1.9
25.2	19.7	14.5	10.5	1.9
23.2	18.2	14.1	10.6	1.9
21.9	17.0	13.0	10.2	1.9
24.3	18.9	14.5	11.1	1.9
21.2	16.2	12.4	9.9	1.9
19.4	14.8	11.5	9.5	1.9
19.9	15.5	11.9	9.7	1.9
22.6	17.6	13.4	10.4	1.9
23.4	18.6	14.7	11.5	1.9
22.0	17.2	13.4	10.6	1.9
21.6	16.9	13.3	10.5	1.9
20.8	16.3	13.0	10.3	1.9
20.7	15.7	11.8	9.3	1.9
19.3	15.1	11.8	9.4	1.9
18.7	14.5	11.2	8.9	1.9
20.4	15.6	11.5	8.9	1.9
19.7	15.2	11.4	8.9	1.9
19.2	15.1	11.8	9.4	1.9
19.5	15.7	13.1	10.7	1.9
19.4	15.3	12.1	9.8	1.9
24.2	18.9	14.0	10.4	1.9
24.4	19.1	14.2	10.7	1.9
23.8	18.4	13.4	9.8	1.9
22.2	17.1	12.9	9.9	1.9
24.1	18.8	14.1	10.5	1.9
23.1	17.7	12.9	9.6	1.9
21.7	16.6	12.4	9.4	1.9
23.3	18.0	13.4	10.2	1.9
23.5	18.1	13.3	10.0	1.9
22.8	17.7	13.0	9.8	1.9
23.0	18.2	14.2	11.0	1.9
22.7	17.5	12.8	9.5	1.9
19.6	15.1	11.4	8.9	1.9
18.2	14.3	11.1	9.2	1.9
19.0	14.7	11.0	8.9	1.9
18.7	14.7	11.4	9.4	1.9
17.9	14.2	11.3	9.2	1.9
21.1	16.2	12.1	9.5	1.9
23.4	18.0	13.1	9.7	1.9
21.7	16.6	12.3	9.6	1.9
19.1	14.9	11.5	9.3	1.9
17.7	13.8	10.7	8.8	1.9

22.8	17.2	12.7	9.7	1.9
24.5	18.8	14.2	11.0	1.9
24.9	19.5	14.7	11.0	1.9
24.5	19.3	14.5	11.0	1.9
21.6	16.6	12.6	9.9	1.9
23.6	18.1	13.5	10.3	1.9
29.2	23.6	18.3	14.0	1.9
27.7	22.2	17.3	13.2	2.8
24.7	19.0	13.7	10.2	1.9
20.4	15.3	11.3	9.0	1.9
19.0	14.6	11.3	9.2	1.9
21.0	16.1	12.3	9.8	1.9
21.0	16.0	12.2	9.8	1.9
18.3	14.5	11.4	9.5	1.9
20.3	15.6	11.7	9.3	1.9
20.6	15.9	11.9	9.5	1.9
21.8	16.7	12.2	9.4	1.9
21.8	16.5	11.8	9.2	1.9
19.5	15.0	11.3	9.2	1.9
20.1	15.3	11.4	9.2	1.9
20.8	15.9	12.0	9.4	1.9
22.0	17.5	14.2	11.5	1.9
21.6	16.8	12.9	10.2	1.9
22.1	17.3	13.2	10.3	1.9
20.5	15.7	11.7	9.4	1.9
20.2	15.6	11.9	9.5	1.9
20.1	15.5	11.9	9.7	1.9
18.4	14.4	11.1	9.2	1.9
19.6	15.1	11.3	9.2	1.9
19.6	15.0	11.3	9.3	1.9
22.0	16.9	12.2	9.5	1.9
19.8	15.5	12.2	10.0	1.9
20.5	15.9	12.3	10.0	1.9
22.7	17.5	13.2	10.3	1.9
22.8	17.8	13.3	10.4	1.9
21.0	16.2	12.1	9.7	1.9
23.2	18.0	13.2	10.1	1.9
22.5	17.3	12.6	9.8	1.9
22.3	17.2	12.8	9.9	1.9
22.4	17.6	13.5	10.6	1.9
25.1	20.3	16.5	13.2	1.9
27.3	21.7	16.7	12.6	1.9
27.6	21.9	16.8	13.0	1.9
24.4	18.9	14.1	10.9	1.9
25.0	19.6	14.7	11.2	1.9
22.7	17.6	13.4	10.6	1.9
21.6	17.0	13.1	10.6	1.9
18.6	14.5	11.2	9.4	1.9

20.8	16.3	12.7	10.5	1.9
21.2	16.3	12.4	10.1	1.9
20.7	15.6	11.7	9.6	1.9
21.6	16.7	12.7	10.4	1.9
22.0	17.1	12.9	10.2	1.9
23.9	18.7	14.3	11.2	1.9
22.3	17.2	12.9	10.2	1.9
19.9	15.7	12.4	10.4	1.9
18.7	14.8	11.7	10.0	1.9
18.2	14.3	11.0	9.5	1.9
18.5	14.5	11.1	9.5	1.9
20.6	16.2	12.6	10.5	1.9
23.9	19.2	15.4	12.5	1.9
23.4	18.2	13.7	10.8	1.9
21.8	16.8	12.4	10.1	1.9
19.0	14.7	11.2	9.5	1.9
18.2	14.4	11.2	9.7	1.9
17.5	13.7	10.6	9.3	1.9
17.4	13.8	10.5	9.3	1.9
17.8	14.2	11.2	9.7	1.9
18.1	14.1	10.8	9.3	1.9
18.1	14.2	10.9	9.3	1.9
18.0	14.2	11.0	9.5	1.9
17.5	14.1	11.1	9.7	1.9
17.0	13.5	10.5	9.3	1.9
17.1	13.7	10.9	9.3	1.9
19.6	15.8	12.3	10.2	1.9

1/3 LASmax 8.0	1/3 LASmax 10.0	1/3 LASmax 12.5	1/3 LASmax 16.0	1/3 LASmax 20.0
0.9	0.3	-0.8	6.0	8.6
0.9	0.5	7.5	9.3	16.5
0.9	0.3	6.2	8.2	14.0
0.9	0.3	4.1	6.7	11.3
0.9	0.4	10.3	11.1	14.3
0.9	0.3	4.6	8.9	15.0
0.9	3.2	7.2	14.4	18.7
0.9	1.6	11.8	15.1	17.8
0.9	0.3	3.9	9.7	14.5
0.9	0.4	3.6	12.0	16.6
0.9	4.5	7.2	13.8	16.6
0.9	3.0	8.2	17.8	20.8
0.9	6.4	7.2	17.2	19.9
0.9	3.1	8.1	14.4	15.9
0.9	0.3	4.8	12.1	15.8
0.9	0.3	6.8	9.8	14.3
0.9	0.3	6.6	10.6	17.1
0.9	0.3	4.2	10.1	14.1
0.9	0.3	0.2	9.5	13.5
0.9	0.3	-0.8	6.7	8.8
0.9	0.3	1.8	7.3	20.5
0.9	1.9	9.2	12.8	19.7
0.9	0.3	6.4	12.5	18.1
0.9	0.5	7.1	12.4	16.4
0.9	2.6	12.8	17.3	23.1
1.9	1.4	9.6	14.6	18.3
0.9	2.5	5.9	11.2	16.3
0.9	0.3	5.1	10.5	15.7
0.9	1.8	7.2	9.7	12.8
0.9	1.1	3.1	7.3	12.3
0.9	2.5	6.2	10.9	14.7
0.9	3.2	5.6	11.6	17.1
0.9	0.6	4.2	9.1	12.3
0.9	7.4	10.8	14.3	19.9
0.9	6.9	10.0	15.1	16.4
0.9	0.3	1.3	9.7	13.2
0.9	0.3	2.7	10.9	13.3
0.9	0.3	2.8	10.2	12.7
0.9	0.3	8.1	10.8	16.4
0.9	0.3	5.8	7.5	13.3
0.9	0.3	3.1	11.1	11.9
0.9	0.3	5.6	9.2	17.3
0.9	0.3	4.8	14.7	17.2
0.9	2.1	5.3	12.3	13.8
0.9	0.3	0.8	5.9	7.7

0.9	0.3	1.9	11.4	14.9
3.0	8.1	14.7	21.5	21.0
5.1	5.4	12.2	15.6	21.9
0.9	1.7	8.3	16.7	21.1
0.9	1.3	10.9	15.7	18.2
0.9	5.1	7.3	13.1	17.5
5.0	10.7	15.5	18.6	25.3
5.8	15.5	17.5	21.2	26.8
0.9	5.3	11.8	14.9	18.3
0.9	0.3	5.8	6.0	10.3
0.9	0.3	-0.8	4.5	11.0
0.9	0.3	3.9	6.9	12.3
0.9	0.3	4.6	10.3	13.7
0.9	0.3	3.3	9.4	14.2
0.9	0.3	3.0	8.7	14.5
0.9	0.3	2.5	8.7	16.6
0.9	1.6	6.4	11.4	18.7
0.9	0.3	1.7	8.4	13.0
0.9	0.3	4.0	8.3	13.0
0.9	0.3	1.4	6.1	10.9
0.9	0.3	3.5	9.8	14.6
0.9	5.2	9.0	14.2	20.7
0.9	8.1	9.2	14.8	19.2
0.9	4.5	7.1	12.3	18.5
0.9	0.3	7.6	11.2	12.9
0.9	0.3	3.7	10.3	10.9
0.9	0.3	2.1	10.0	16.2
0.9	0.3	4.3	9.2	11.7
0.9	0.3	3.1	6.0	11.4
0.9	0.3	0.3	4.4	12.2
0.9	2.1	2.7	10.4	15.8
0.9	1.3	4.4	11.7	16.3
0.9	2.2	5.5	11.4	16.0
0.9	0.3	4.3	10.7	16.5
0.9	2.1	7.7	16.0	19.5
0.9	0.3	4.0	10.9	13.5
0.9	2.8	4.1	10.9	14.6
0.9	0.3	6.9	12.4	14.7
0.9	1.6	8.5	12.4	14.5
0.9	2.2	10.9	14.4	19.6
0.9	3.4	8.5	15.8	19.7
0.9	4.3	6.7	14.9	18.4
2.8	8.3	14.4	19.5	25.1
3.6	7.5	13.4	20.2	22.0
0.9	2.5	7.4	16.3	18.5
0.9	0.6	5.4	10.5	18.0
0.9	0.5	6.8	14.7	18.2
0.9	1.5	5.7	13.8	19.2

0.9	7.8	14.3	15.4	18.5
0.9	8.0	14.0	15.1	20.1
0.9	1.1	7.3	12.9	17.8
0.9	0.3	0.5	6.3	15.6
0.9	1.8	7.6	16.7	17.8
0.9	0.3	4.0	6.9	15.6
0.9	0.3	8.0	10.2	14.9
0.9	1.5	9.7	14.2	20.4
0.9	2.6	10.9	13.7	18.0
0.9	1.5	5.9	10.1	13.1
0.9	0.3	4.4	8.1	14.1
0.9	0.3	5.1	8.5	12.6
4.4	14.3	19.7	18.2	24.3
4.0	7.8	11.6	14.9	16.1
1.2	2.3	8.8	17.2	19.7
0.9	0.3	5.2	9.8	12.7
0.9	0.3	2.6	9.6	13.3
0.9	0.3	4.5	9.0	13.2
0.9	0.3	0.2	5.5	9.1
0.9	0.3	7.1	13.1	15.8
0.9	2.3	8.2	11.5	13.2
0.9	0.3	2.7	10.1	14.3
0.9	0.3	-0.1	8.0	10.6
0.9	0.3	7.6	8.1	16.4
0.9	0.3	2.7	10.0	12.6
0.9	0.3	-0.8	4.3	8.0
0.9	0.3	3.9	7.8	16.4

1/3 LASmax 25.0	1/3 LASmax 31.5	1/3 LASmax 40.0	1/3 LASmax 50.0	1/3 LASmax 63.0
15.1	17.2	22.9	23.3	27.7
19.1	20.7	25.1	24.5	28.6
17.9	18.3	21.9	20.8	28.2
20.7	19.8	22.8	29.6	28.6
22.7	20.3	22.2	28.2	28.5
21.6	21.5	24.1	27.7	26.5
25.4	28.5	28.7	31.8	31.4
23.3	26.6	28.8	30.7	27.1
21.0	22.3	24.6	28.6	26.9
19.6	22.2	26.1	29.2	26.9
21.5	24.9	28.2	28.7	27.7
28.3	30.2	31.0	34.6	33.3
22.4	26.7	26.5	30.7	29.7
21.7	25.1	27.8	30.3	30.6
20.9	23.4	26.7	30.8	28.4
17.8	19.2	25.9	27.6	29.6
21.6	22.1	26.2	27.4	30.0
17.0	17.6	23.3	28.4	31.7
12.6	16.7	20.4	28.3	34.2
12.8	15.1	18.9	28.8	33.4
16.8	19.2	23.1	28.0	28.7
22.1	24.4	26.7	30.3	28.8
21.8	22.5	25.9	29.6	28.9
19.0	21.9	25.4	30.3	29.9
26.4	27.7	30.1	32.0	30.9
23.4	28.8	29.4	30.3	31.3
23.4	28.8	28.6	30.0	31.0
20.0	25.3	25.1	28.4	27.9
20.3	20.4	23.5	27.7	24.0
19.6	20.0	23.3	27.7	24.3
19.0	23.7	25.6	28.2	29.8
21.3	25.2	25.7	28.0	25.7
16.4	18.2	22.6	27.6	25.0
22.4	23.7	29.1	29.0	28.4
21.7	23.2	25.3	28.0	24.6
15.2	17.6	20.6	26.7	25.9
21.3	21.4	24.0	28.9	28.3
17.5	19.8	20.8	27.1	26.9
18.7	22.7	24.7	30.7	27.3
19.2	19.4	22.0	28.7	32.1
16.5	20.7	23.6	27.6	33.7
19.9	25.3	23.2	31.8	29.0
20.1	24.0	22.7	30.2	31.6
14.3	17.7	20.8	29.5	33.5
16.4	17.1	21.1	28.6	30.2

18.5	21.3	23.6	27.6	29.2
26.9	29.9	31.1	32.4	31.4
24.2	27.3	27.2	30.1	29.2
26.3	30.1	30.3	32.5	31.8
23.8	27.0	27.3	31.3	29.7
20.7	23.1	25.0	29.8	28.4
31.9	34.2	36.9	39.3	39.4
30.5	31.9	34.8	38.4	36.9
23.4	23.9	26.3	27.2	27.4
12.9	14.8	18.4	27.1	27.0
13.7	14.4	20.6	27.5	27.5
17.3	19.0	21.4	28.6	27.4
19.6	23.0	24.0	28.4	28.2
19.3	20.5	23.4	28.1	28.0
16.2	19.9	23.4	27.2	27.2
19.7	22.9	27.9	29.4	28.5
19.7	23.0	28.1	28.8	26.9
18.2	19.0	22.9	27.4	27.5
15.9	18.7	21.2	27.5	26.7
17.0	16.5	20.4	27.6	26.7
18.8	23.5	24.5	28.6	27.7
23.9	28.3	31.7	36.4	33.4
22.3	24.8	28.5	31.0	30.1
20.3	22.4	25.9	28.7	28.6
16.5	16.7	20.7	27.1	27.1
17.2	18.8	22.1	28.1	27.0
17.2	20.3	25.9	28.3	27.2
17.4	19.1	23.3	27.5	27.4
16.1	17.8	22.2	27.0	26.0
14.3	17.0	20.8	26.6	25.4
15.2	20.2	23.0	27.3	26.7
20.3	21.7	25.8	28.4	27.9
18.9	25.5	24.5	28.4	26.5
21.1	22.5	26.8	29.3	29.9
23.1	25.2	27.2	29.0	33.5
17.5	20.4	23.5	27.3	34.0
18.6	22.1	25.5	27.6	26.3
21.7	22.1	27.7	28.3	26.0
21.4	21.6	24.0	27.8	26.3
19.9	22.0	27.6	30.3	28.1
25.8	31.0	34.3	35.1	35.7
23.5	29.7	32.2	37.1	37.9
27.6	32.7	35.2	38.7	36.7
25.9	28.3	29.9	32.2	30.1
22.4	24.7	27.9	30.0	26.9
20.7	22.8	25.1	28.7	27.1
22.2	24.4	25.4	30.6	28.4
19.7	21.8	24.1	28.2	24.6

26.3	29.3	28.7	30.3	28.1
24.1	26.5	29.3	29.0	28.7
20.9	21.9	26.2	27.4	25.4
21.0	28.3	26.1	29.9	31.0
20.7	27.4	25.8	28.5	28.7
18.7	22.7	28.0	27.4	27.5
22.6	22.8	27.8	27.2	27.2
27.3	26.8	27.6	26.1	26.5
21.1	22.2	25.5	25.6	26.9
18.8	19.4	21.6	23.3	22.9
16.1	18.0	20.3	22.1	21.0
19.3	22.7	24.7	36.4	37.7
27.3	32.8	34.8	37.2	38.7
21.9	26.3	27.2	28.7	29.3
22.0	24.2	26.0	26.5	29.2
15.9	17.2	20.8	19.0	22.2
16.6	18.7	21.6	21.8	22.4
14.6	17.9	22.0	20.2	23.0
11.2	12.9	20.7	17.2	22.0
21.2	21.5	24.5	24.3	24.9
15.5	17.1	21.1	22.7	22.7
18.5	18.2	21.5	22.4	23.8
14.9	17.9	20.6	23.6	23.5
18.5	21.9	25.1	23.6	25.1
15.9	20.5	21.6	23.7	25.0
11.6	15.3	21.0	21.0	23.1
18.4	23.5	24.4	22.0	25.4

1/3 LASmax 80.0	1/3 LASmax 100	1/3 LASmax 125	1/3 LASmax 160	1/3 LASmax 200
24.6	26.2	28.1	27.1	27.5
28.2	26.7	26.3	26.9	26.3
28.2	25.8	26.5	26.4	29.5
30.8	28.7	27.8	29.1	30.4
30.1	28.8	27.9	28.2	30.0
28.1	28.0	26.7	29.4	29.0
30.8	31.0	28.7	28.6	30.4
28.2	29.9	27.6	28.8	29.3
28.1	29.3	28.8	27.3	28.6
28.2	29.1	29.0	29.7	28.7
29.0	29.3	29.3	30.4	30.2
33.0	32.7	32.2	30.5	30.1
29.6	29.2	28.8	28.7	29.9
29.5	30.3	29.7	29.3	30.7
30.3	29.5	30.6	28.8	29.3
27.8	27.4	27.7	28.2	28.8
27.2	29.2	27.2	27.5	28.2
28.8	29.1	29.1	29.6	27.9
32.8	29.2	30.2	29.7	30.2
32.3	32.3	32.1	31.9	29.4
30.8	30.8	30.0	28.9	29.0
29.7	31.1	33.1	31.2	31.5
28.2	30.5	38.1	32.6	31.1
30.2	32.7	38.1	32.2	32.4
31.6	34.2	33.3	32.4	33.6
28.2	29.9	28.7	29.5	29.2
26.7	30.0	30.7	28.7	29.2
27.6	30.6	30.6	28.5	30.7
24.1	28.4	26.8	27.6	29.8
24.8	27.0	27.5	28.6	28.6
28.4	33.5	31.1	30.7	31.4
29.6	29.5	29.5	29.5	30.3
29.6	29.7	27.7	28.5	29.9
28.4	28.4	30.8	29.9	30.9
25.8	28.2	31.6	29.4	30.1
26.1	28.0	28.1	28.1	30.2
26.8	28.3	28.5	28.1	29.4
26.4	29.5	28.4	31.4	28.8
28.3	32.1	27.3	29.5	29.3
35.3	32.5	30.7	33.0	31.6
34.9	33.6	31.2	33.0	31.5
29.3	30.8	30.0	28.1	30.0
30.2	32.2	33.3	29.4	31.5
29.0	36.5	38.6	31.1	32.2
28.3	30.4	29.2	28.9	30.2

27.4	28.4	29.9	29.6	29.5
31.2	33.9	32.2	31.4	30.5
29.7	29.5	27.4	28.7	30.1
32.1	31.9	29.3	30.3	31.2
29.0	30.6	28.6	29.2	29.8
27.9	28.0	26.9	28.1	29.5
39.0	39.0	37.1	36.0	36.0
36.9	35.7	34.0	33.8	35.2
26.5	30.4	26.0	27.3	30.3
29.2	27.4	25.4	27.3	28.4
28.4	28.6	28.4	28.5	28.6
24.2	27.1	27.3	28.3	28.4
28.6	28.3	27.5	26.5	28.1
25.7	28.2	25.4	25.2	26.4
25.8	27.2	25.6	25.2	27.8
27.1	28.2	29.4	27.5	29.2
24.8	27.6	28.0	25.7	28.3
26.7	28.3	28.6	28.2	28.8
25.7	26.7	25.0	25.4	27.3
23.9	28.6	27.1	27.0	28.3
26.9	29.0	27.2	28.0	29.1
32.4	30.9	30.2	29.8	31.1
27.1	29.1	27.4	27.7	30.3
28.7	29.1	28.5	28.0	31.1
22.6	26.3	27.1	29.5	29.7
23.8	28.0	26.4	25.9	29.5
24.1	29.2	26.8	27.0	31.0
23.4	27.8	25.4	27.2	29.1
22.4	26.6	24.3	25.1	26.9
23.2	25.9	23.6	25.5	27.1
24.5	25.8	25.3	26.5	28.0
27.8	28.3	27.6	26.8	27.0
27.4	28.7	26.7	26.6	27.3
29.7	29.3	27.8	28.1	29.3
29.0	29.6	34.2	29.2	30.5
31.7	32.9	34.5	34.2	31.9
26.8	32.5	38.6	33.4	30.1
27.3	30.2	33.1	30.6	29.6
26.0	30.5	32.7	26.2	28.8
28.6	31.3	30.9	29.7	31.2
35.0	34.9	31.6	30.9	32.0
34.8	32.9	31.5	30.9	33.4
36.1	35.1	33.8	32.8	33.5
29.7	30.4	29.0	28.3	31.7
25.6	29.0	27.6	28.3	30.3
27.4	30.7	28.1	28.1	29.0
27.7	30.0	28.2	28.2	30.9
24.8	28.0	27.6	26.5	28.6

30.7	31.0	29.0	27.7	29.1
30.6	29.9	29.1	28.0	28.9
23.4	27.5	25.5	25.5	26.6
30.6	30.2	27.6	28.1	28.1
28.8	27.2	27.2	27.6	27.4
27.3	29.6	28.1	28.2	30.3
26.7	29.5	28.1	27.5	28.9
27.1	28.0	28.1	27.4	27.1
27.1	26.4	26.9	24.8	27.1
24.2	23.9	26.2	24.6	26.5
23.0	23.6	25.8	25.3	25.3
40.2	38.7	35.3	35.4	35.8
40.1	37.9	35.4	35.6	35.6
29.9	31.3	32.1	31.2	30.6
26.5	27.0	28.8	27.5	28.0
22.9	23.2	25.3	24.2	23.8
25.1	23.2	26.0	25.3	25.4
24.4	25.3	28.2	26.2	24.8
24.1	23.7	27.6	26.1	23.3
24.5	23.5	29.5	26.7	24.7
26.1	25.9	30.2	26.8	26.7
26.0	25.9	29.9	27.2	26.2
26.2	25.1	26.5	27.0	25.4
26.7	27.2	29.2	25.5	25.8
26.3	25.5	27.8	24.7	24.3
22.2	28.2	27.8	25.7	24.9
26.5	24.9	27.7	26.4	26.0

1/3 LASmax 250	1/3 LASmax 315	1/3 LASmax 400	1/3 LASmax 500	1/3 LASmax 630
26.8	29.1	34.2	39.8	41.3
27.1	29.7	33.5	38.7	39.1
30.8	32.6	35.3	36.9	39.4
32.9	33.5	36.5	38.4	40.1
31.7	32.4	35.0	37.3	39.0
29.5	30.8	34.1	36.3	38.6
30.8	32.0	34.8	37.3	39.5
29.7	31.9	34.6	37.0	39.7
29.4	31.5	34.1	38.9	41.3
29.2	31.2	33.9	39.2	41.5
30.2	31.8	34.6	39.0	40.6
31.2	32.2	35.1	38.7	41.6
30.7	32.2	34.8	40.8	40.3
30.8	33.1	34.7	40.1	40.0
29.5	31.7	33.9	38.3	39.0
28.7	30.4	33.5	36.3	38.8
29.0	33.7	33.7	36.4	39.3
28.4	34.9	35.2	39.2	41.6
30.4	34.3	37.1	42.3	44.1
30.0	33.7	36.8	39.7	43.8
29.3	31.8	34.2	38.1	42.4
30.0	30.8	35.9	39.0	41.4
30.5	32.2	36.0	39.3	41.9
33.7	34.5	36.8	40.3	45.5
33.5	34.0	36.9	39.4	46.7
30.7	33.6	34.6	38.0	44.3
30.3	33.1	34.8	37.2	45.7
31.4	32.5	35.4	37.7	43.2
30.6	32.0	34.1	36.8	39.1
29.1	31.2	33.3	35.5	38.2
31.6	32.5	35.0	38.5	40.6
30.6	32.5	35.4	37.6	40.4
30.6	32.9	35.2	38.1	41.2
31.2	32.6	34.8	37.7	40.4
30.3	31.7	34.9	37.9	40.1
28.9	31.4	34.3	36.5	39.5
28.4	31.0	34.4	36.0	39.2
27.9	29.9	33.2	36.0	38.1
29.5	30.5	34.4	36.6	39.1
30.4	32.2	33.8	36.9	38.9
31.8	31.4	34.4	36.4	39.0
31.5	31.9	34.7	36.8	39.1
32.0	31.9	34.4	37.6	40.1
31.2	31.7	33.7	35.5	38.7
29.7	31.2	34.6	37.8	40.7

30.9	32.3	36.0	39.1	40.7
31.0	32.3	35.6	38.6	41.2
32.3	33.9	35.3	38.1	41.1
33.1	33.3	35.9	39.6	43.4
30.8	32.4	35.9	39.6	43.5
30.8	32.6	35.7	36.8	38.8
36.8	37.0	39.0	41.2	42.2
36.2	36.7	38.6	40.7	41.7
33.1	35.0	37.5	37.3	39.0
33.2	32.7	35.3	35.6	38.0
31.8	33.1	35.2	37.9	39.0
31.7	32.6	35.2	37.7	38.7
29.8	30.9	33.6	36.4	38.3
26.5	28.8	31.9	37.3	37.8
26.8	29.7	32.8	35.2	36.5
29.2	29.6	32.8	35.0	36.8
28.7	30.9	33.3	35.5	37.0
29.1	30.8	33.6	36.6	37.8
28.1	29.9	35.7	34.8	37.1
28.8	29.4	32.2	35.3	37.0
29.3	31.2	33.1	37.1	38.4
31.2	32.3	34.7	36.7	38.2
32.0	32.0	34.9	36.5	38.0
32.1	32.1	35.0	36.7	38.8
31.0	30.7	33.8	36.2	38.7
29.3	29.8	33.2	35.3	38.5
30.7	30.1	32.8	35.4	38.1
28.9	29.6	32.9	35.1	38.1
27.8	29.6	31.7	34.4	37.6
26.8	29.3	31.9	34.6	38.2
29.3	30.3	32.8	35.1	37.8
27.4	30.4	31.9	34.5	38.2
27.7	30.4	32.5	35.3	37.9
29.7	31.3	35.0	39.1	40.0
29.9	33.5	38.4	40.6	42.0
29.6	32.5	37.6	39.5	41.1
31.5	33.2	36.6	38.0	39.9
29.8	34.2	35.3	38.7	40.6
29.2	33.6	35.0	38.1	40.2
31.6	34.1	35.3	38.3	39.9
33.5	34.2	36.0	39.0	41.1
33.6	35.2	37.7	40.4	41.8
34.7	35.6	38.6	40.5	42.2
33.4	35.0	36.9	39.3	40.9
31.6	33.6	36.9	39.0	42.2
29.8	32.2	34.5	37.6	41.4
30.1	33.0	37.4	39.3	41.4
29.0	32.3	36.9	37.4	40.2

29.4	31.7	33.5	38.3	40.1
28.9	31.6	33.7	38.3	40.1
29.3	30.3	32.2	36.4	39.0
29.3	31.9	34.3	39.0	40.2
29.3	30.6	34.0	38.3	39.8
31.4	32.2	34.9	37.3	38.8
31.2	31.4	34.5	37.3	39.0
28.4	30.0	33.7	37.1	39.0
28.2	28.5	32.2	40.6	40.4
27.8	28.0	32.0	37.1	39.1
27.8	30.1	32.4	39.5	39.2
33.3	33.4	34.2	37.3	38.7
33.0	33.4	34.8	38.2	39.7
31.8	32.6	34.3	37.6	38.7
29.5	29.8	32.5	35.9	37.8
26.9	28.0	30.7	38.8	39.8
28.1	27.8	30.7	40.3	36.1
26.8	27.6	30.4	37.5	36.9
24.9	26.7	30.0	34.4	35.8
26.0	27.1	29.8	32.6	34.1
27.5	29.0	30.3	32.9	34.8
26.9	28.1	30.4	35.5	36.9
28.1	29.5	31.9	36.5	38.4
27.5	29.0	31.4	35.8	39.2
26.5	27.4	30.8	34.9	38.1
27.8	28.5	31.9	35.3	36.8
26.6	28.9	31.9	34.9	36.9

1/3 LASmax 800	1/3 LASmax 1000	1/3 LASmax 1250	1/3 LASmax 1600	1/3 LASmax 2000
45.5	47.1	45.6	42.0	39.7
43.6	44.8	43.2	41.3	39.3
41.9	43.9	42.5	41.2	39.6
42.7	43.9	45.3	45.2	41.1
42.4	43.8	42.5	41.5	40.6
41.9	43.6	42.3	40.8	39.6
42.9	44.1	43.7	41.7	39.7
44.1	45.0	43.4	41.4	39.4
45.8	47.1	44.5	42.1	38.6
46.3	47.2	44.6	41.9	38.9
44.8	45.8	44.4	42.1	39.7
45.7	46.6	44.5	42.5	39.8
43.5	45.6	43.6	41.3	38.9
43.6	44.4	43.2	41.4	39.0
43.5	44.5	42.5	40.3	38.0
42.3	43.8	41.6	39.8	37.1
43.0	44.5	42.5	40.6	37.7
44.7	45.3	43.1	40.9	37.7
46.2	46.7	43.6	41.1	38.6
44.4	45.3	43.8	41.2	38.2
44.0	45.1	43.7	41.1	38.4
42.8	44.3	42.6	40.8	38.0
43.1	44.9	43.0	41.4	38.3
44.3	46.0	44.9	43.5	42.0
45.8	46.2	44.7	43.2	41.7
44.6	45.3	43.9	42.1	39.9
44.9	45.0	43.8	42.2	39.9
43.8	44.5	43.2	41.9	40.2
41.6	44.0	42.7	41.3	40.2
41.6	44.0	42.4	41.1	38.8
42.5	44.6	43.2	42.3	40.0
43.0	44.1	43.2	42.2	40.3
44.1	45.4	44.1	42.3	40.4
43.6	44.7	43.4	41.8	39.6
44.1	45.4	43.0	41.4	39.2
43.1	44.9	44.0	41.9	41.1
43.2	44.5	43.8	41.8	39.7
42.2	43.9	42.1	40.1	37.7
42.6	44.3	43.2	40.6	37.8
43.0	44.3	42.1	40.2	37.3
42.8	43.8	42.5	40.3	38.4
43.0	45.1	43.7	41.7	39.9
44.4	45.9	44.0	42.1	40.1
42.5	44.4	42.7	41.3	38.8
44.4	46.0	43.0	40.7	37.1

44.4	45.1	43.9	42.4	42.5
46.1	45.2	44.3	43.1	41.7
44.4	45.6	44.5	43.2	41.0
45.6	44.4	43.7	42.1	40.6
46.3	43.6	42.4	40.8	38.6
42.2	42.6	41.5	40.7	40.0
44.4	45.6	45.1	44.7	44.7
43.7	45.1	44.9	44.2	44.0
42.1	43.3	42.0	41.0	39.8
40.9	41.9	40.4	39.0	37.2
42.5	44.1	42.6	40.8	37.1
42.4	44.3	42.7	40.8	38.3
42.1	43.3	41.7	40.4	38.0
41.6	43.6	42.0	40.4	37.4
39.5	41.8	40.3	39.0	36.7
40.6	42.9	41.9	39.9	40.2
40.6	43.2	41.5	40.3	40.3
41.6	44.4	42.7	41.1	44.2
39.8	42.2	41.6	40.2	42.4
40.9	42.8	41.3	39.4	42.7
41.5	42.8	40.8	39.6	39.9
41.3	43.1	41.4	40.2	39.1
41.3	43.0	41.6	40.4	38.8
42.4	44.8	43.2	42.0	39.2
42.1	44.2	43.0	41.2	38.6
41.5	43.5	42.3	40.7	38.0
41.8	43.7	42.3	40.6	38.5
42.0	44.0	42.8	41.3	38.8
41.4	43.8	41.8	40.6	41.9
41.3	43.8	42.1	40.5	40.8
40.8	42.9	41.4	40.3	39.4
42.4	43.8	42.4	40.7	38.3
42.4	44.1	42.3	41.1	40.0
43.1	44.3	42.6	41.7	44.1
46.0	47.4	44.5	42.7	44.0
45.3	46.9	44.1	42.1	41.7
43.2	44.5	42.9	41.1	41.4
44.3	45.2	43.6	41.3	40.2
43.6	44.8	43.2	41.0	39.3
43.0	44.7	43.7	41.6	39.6
44.2	45.0	43.3	42.2	40.6
44.6	45.4	44.7	43.7	43.1
43.8	45.2	44.6	43.5	42.8
44.2	45.4	43.9	42.4	42.5
44.0	45.6	44.2	42.8	42.2
43.1	44.8	42.6	40.9	40.4
42.9	43.6	42.1	40.9	41.2
43.5	44.3	42.9	41.1	40.7

42.9	44.4	42.8	41.5	38.7
42.8	44.3	42.5	41.2	38.7
42.5	44.1	42.3	40.0	37.3
43.9	46.9	45.0	42.8	40.2
43.1	45.6	44.1	42.7	42.7
41.6	42.7	41.5	40.3	41.6
41.8	42.1	41.3	40.3	42.7
41.5	42.7	40.2	38.8	41.0
40.9	42.4	40.2	37.8	41.4
40.6	42.2	40.1	37.9	39.2
41.1	42.7	41.1	39.3	36.4
41.7	43.0	45.0	42.1	39.3
41.7	43.5	44.6	41.9	40.5
41.4	43.0	43.4	40.8	41.2
41.2	42.7	41.8	39.0	37.7
42.1	44.3	42.6	38.4	35.9
39.3	40.9	39.2	37.5	35.2
40.9	42.7	41.0	38.8	35.8
40.5	42.2	40.2	38.5	37.8
38.0	39.9	39.2	36.5	40.5
37.9	40.3	39.4	37.6	38.6
39.1	41.5	40.3	38.5	38.3
42.2	45.4	43.3	41.3	37.6
42.7	45.4	43.3	41.5	37.7
41.8	44.4	41.1	39.6	37.0
39.6	41.6	40.2	38.4	35.3
39.8	41.8	40.4	38.6	36.4

1/3 LASmax 2500	1/3 LASmax 3150	1/3 LASmax 4000	1/3 LASmax 5000	1/3 LASmax 6300
34.7	31.6	29.5	26.9	24.1
36.2	34.8	33.3	31.2	28.7
39.1	39.1	37.9	35.4	32.6
42.9	40.4	38.9	36.5	33.9
41.1	39.2	37.5	35.2	32.6
38.3	37.0	35.9	33.8	31.3
38.9	38.4	37.2	35.3	33.6
37.9	37.5	36.2	33.9	31.3
36.0	34.4	32.8	29.3	27.1
36.0	34.7	33.2	30.8	28.2
38.1	37.7	36.6	34.6	32.0
38.5	37.9	36.9	34.6	32.2
37.5	36.8	35.7	33.5	31.0
37.7	37.1	35.8	33.5	31.2
38.2	38.1	34.4	31.6	28.9
35.2	34.3	32.8	30.7	28.4
34.6	33.3	32.1	30.0	27.7
35.3	33.4	31.6	28.7	26.1
37.2	36.2	34.8	32.1	29.4
36.5	35.6	34.3	31.8	28.9
35.9	34.6	33.1	30.9	28.1
39.5	39.0	33.3	29.2	28.8
36.5	34.3	32.6	30.1	27.2
41.7	41.0	39.8	37.4	34.9
41.1	40.5	39.3	37.0	34.3
39.0	39.9	37.5	35.0	32.3
38.2	38.5	35.8	33.3	30.9
40.2	40.3	38.4	35.9	33.2
40.3	40.5	37.3	35.0	31.9
37.7	37.5	35.8	33.8	31.0
39.3	38.3	37.0	34.6	32.0
39.2	38.6	37.1	34.8	32.1
39.1	38.8	37.5	35.2	32.5
38.6	38.0	36.7	34.2	31.6
38.4	37.6	36.3	33.9	31.4
36.3	35.9	34.3	31.8	29.2
35.8	35.1	32.3	29.0	26.8
35.1	34.5	32.5	30.0	27.1
34.9	33.9	31.9	29.3	26.7
34.3	32.6	30.6	28.1	25.5
37.7	37.7	36.8	34.1	31.5
38.3	38.3	37.1	35.0	32.2
38.2	37.6	36.5	34.1	31.4
35.7	34.4	32.8	30.5	28.0
33.7	32.2	30.8	28.0	25.6

40.5	39.6	38.2	35.6	34.0
40.0	39.2	37.8	35.2	33.1
39.8	39.5	38.6	36.4	33.9
39.6	39.2	38.1	35.9	33.2
37.6	37.4	35.9	33.7	31.1
39.5	39.6	38.4	36.1	33.5
44.7	45.0	43.6	41.4	38.7
44.0	44.4	43.3	41.0	38.3
39.4	40.0	38.5	36.2	33.6
35.8	35.4	34.3	32.0	29.3
34.7	33.1	31.4	29.1	27.2
36.4	35.7	34.7	32.1	29.7
36.5	35.7	34.4	32.1	29.7
34.8	33.6	32.0	29.4	26.7
35.4	35.1	34.0	31.4	28.8
40.0	36.3	34.9	32.4	29.8
39.2	37.0	35.6	33.1	30.3
41.0	38.0	35.2	32.9	30.6
37.4	34.1	32.5	30.2	29.0
38.4	34.7	33.4	30.7	28.1
36.4	35.9	34.3	31.9	29.4
38.5	37.8	36.4	33.9	31.4
38.0	37.9	36.7	34.4	31.7
38.1	37.9	36.8	34.4	31.8
36.5	36.0	34.5	31.9	29.0
36.1	35.3	33.9	31.4	28.8
36.0	35.0	33.7	31.2	28.5
36.7	35.3	33.0	30.2	27.4
36.6	35.6	33.5	30.6	27.9
40.1	35.5	33.0	30.5	28.0
40.1	36.8	35.7	33.4	31.0
42.0	36.9	32.9	30.3	28.1
43.4	36.2	34.9	32.1	29.4
42.2	37.7	36.5	34.2	31.6
39.1	37.4	36.4	34.3	32.0
38.8	36.9	35.5	32.8	30.2
42.8	39.8	37.8	35.4	32.4
47.8	39.7	37.9	35.5	32.5
40.3	37.6	36.5	34.1	31.2
38.5	37.9	36.7	34.5	31.9
40.5	40.0	38.5	36.1	33.6
44.0	44.1	41.6	39.4	37.1
44.7	43.6	41.6	39.4	36.7
43.4	42.8	38.2	36.1	33.5
44.4	41.1	39.4	37.2	34.5
39.2	37.8	36.0	33.9	31.3
38.0	37.4	35.8	33.7	31.0
37.4	36.4	32.7	29.8	27.1

37.2	36.7	35.6	33.1	30.5
37.1	36.6	35.4	33.0	30.5
40.6	35.1	33.3	30.9	28.5
43.4	38.5	37.1	35.2	32.3
42.6	37.8	36.3	34.3	31.6
40.6	38.7	37.5	35.5	32.9
38.5	37.6	36.6	34.1	31.5
38.1	34.9	33.9	31.4	28.8
38.5	32.6	31.3	29.0	26.7
41.6	35.8	30.9	28.4	26.1
37.1	34.4	31.7	29.4	26.7
39.0	38.7	37.4	35.2	32.3
39.3	39.3	38.0	35.6	33.0
40.5	38.2	37.0	34.5	31.7
39.6	37.9	36.5	34.0	31.1
35.6	34.6	33.1	30.0	27.2
35.5	32.8	31.1	28.9	26.3
39.6	34.7	29.8	27.2	24.7
40.9	33.5	31.0	28.1	25.1
41.7	33.3	30.6	28.1	25.5
39.8	33.6	31.1	28.5	26.0
39.2	35.6	31.6	28.2	25.8
35.3	33.2	32.1	28.5	26.2
33.3	30.9	29.4	27.0	24.7
32.7	30.6	29.0	26.6	24.3
32.6	31.1	28.9	26.5	24.2
34.6	33.3	33.5	31.4	31.8

1/3 LASmax 8000	1/3 LASmax 10000	1/3 LASmax 12500	1/3 LASmax 16000	1/3 LASmax 20000
20.8	17.4	13.9	10.9	9.0
25.3	21.8	17.8	14.3	11.2
28.8	24.4	19.1	13.7	10.2
30.0	25.6	20.1	14.9	11.1
28.9	24.6	19.8	16.4	12.5
27.3	23.8	18.7	14.2	11.1
29.2	25.2	19.6	15.1	11.4
27.8	23.6	18.2	14.0	10.8
23.9	20.1	15.5	12.3	10.1
24.6	20.6	16.2	12.7	10.4
28.0	23.8	18.4	13.8	10.6
28.4	24.3	19.3	15.5	12.2
27.3	23.3	18.2	14.2	11.1
27.3	23.2	18.2	14.1	10.9
25.1	21.4	16.7	13.4	10.7
24.9	20.9	15.9	12.1	9.7
24.3	20.4	15.8	12.2	9.6
22.7	19.2	14.8	11.4	9.1
25.3	21.2	16.1	11.8	9.0
25.0	20.7	15.9	11.7	9.1
24.4	20.2	15.7	12.3	10.0
24.0	20.5	16.6	14.1	11.6
23.6	19.9	15.9	12.6	10.0
30.9	26.4	20.7	15.2	10.8
30.2	26.0	20.4	14.8	11.5
28.6	25.6	19.7	14.3	10.1
27.2	23.8	18.2	13.7	10.4
29.4	25.2	19.7	14.7	10.8
28.2	23.9	18.6	13.7	10.1
27.2	22.9	17.6	12.9	9.9
28.1	23.7	18.3	13.8	10.9
28.1	23.9	18.5	13.6	10.4
28.8	24.3	18.8	13.9	11.2
27.8	23.4	18.6	14.4	11.5
27.6	23.3	18.2	13.8	10.4
25.3	21.1	16.2	11.9	9.1
22.9	18.8	14.7	11.4	9.5
23.6	19.8	15.2	11.3	9.1
23.1	19.2	15.1	11.7	9.8
22.0	18.4	14.3	11.7	9.6
27.4	23.3	18.1	13.4	10.1
28.2	23.9	18.3	13.4	10.0
27.5	23.4	17.9	13.1	9.9
24.2	20.1	15.5	11.9	9.6
22.0	18.3	14.2	11.0	9.1

33.1	28.2	20.6	14.9	11.1
31.3	26.6	19.8	14.9	11.7
30.1	26.0	20.6	15.5	11.5
29.5	25.1	19.8	15.1	11.5
27.2	22.8	17.7	13.4	10.4
29.4	25.1	19.8	14.5	10.9
34.9	30.5	25.1	19.9	15.6
34.4	30.1	24.5	19.7	15.6
30.0	26.7	20.8	14.8	10.8
25.6	21.6	16.3	11.9	9.3
24.0	19.8	15.0	11.9	9.7
26.2	22.1	16.9	12.8	10.3
26.0	22.0	16.7	12.6	10.1
23.0	19.2	15.0	11.8	9.9
25.1	20.9	16.0	12.0	9.6
25.6	21.5	16.6	12.3	9.9
26.4	22.4	17.1	12.5	9.7
26.7	22.4	16.9	12.2	9.5
24.8	20.4	15.7	11.7	9.4
24.7	20.5	15.7	11.6	9.4
25.5	21.5	16.6	12.9	10.1
27.3	23.2	18.6	15.1	12.2
27.8	23.5	18.5	14.1	10.8
27.8	23.6	18.5	14.1	10.9
25.3	21.2	16.1	11.9	9.6
25.0	20.8	16.3	12.3	9.7
24.6	20.6	15.9	12.5	10.7
23.5	19.5	15.3	11.5	9.4
24.1	20.1	15.5	11.5	9.4
24.6	20.4	15.4	11.4	9.5
27.0	22.9	18.1	12.8	9.7
24.7	20.9	16.0	12.6	10.2
25.5	21.5	16.3	12.6	10.3
27.7	23.4	18.2	14.1	11.2
28.0	24.2	18.8	14.4	11.0
26.3	22.1	17.2	13.1	10.5
28.3	24.2	18.7	13.7	10.3
28.4	24.2	18.7	13.6	10.1
27.3	22.8	17.7	13.6	10.6
28.3	24.0	19.3	14.6	11.3
29.7	25.7	20.7	17.5	14.4
32.9	28.7	23.0	17.8	13.7
32.9	28.7	22.9	17.9	13.9
29.6	25.2	19.9	15.5	12.3
30.5	26.2	20.7	15.7	12.3
27.2	23.0	17.9	13.7	10.9
27.0	22.8	17.9	14.0	11.1
23.4	19.6	15.4	11.9	9.8

26.8	22.7	17.7	13.9	11.3
26.8	22.4	17.6	13.6	11.0
25.3	21.3	16.1	12.2	10.0
28.0	23.9	18.7	14.3	11.5
27.2	23.0	18.0	13.5	10.6
29.0	24.7	19.6	15.1	11.9
27.8	23.6	18.2	13.5	10.5
25.0	20.9	16.3	12.7	10.6
23.2	19.5	15.4	12.3	10.4
22.4	18.7	14.7	11.3	9.6
23.0	19.2	14.9	11.2	9.7
28.2	24.1	19.4	15.5	12.9
28.9	24.8	20.0	15.9	13.0
27.9	23.6	18.5	14.7	11.9
27.4	23.3	18.1	13.5	10.8
23.3	20.3	15.5	11.6	9.7
22.5	18.8	14.8	11.6	10.0
21.2	18.0	13.9	10.9	9.5
21.6	17.9	14.2	10.8	9.4
22.1	18.5	14.8	11.6	9.9
22.5	18.9	14.4	11.0	9.5
22.2	18.7	14.6	11.0	9.5
22.5	19.2	15.0	11.2	9.6
21.3	17.9	14.2	11.3	9.9
20.9	17.5	13.9	10.8	9.5
21.1	18.1	14.4	11.6	9.7
25.6	21.3	17.7	13.5	11.2

1/3 LASmin 6.3	1/3 LASmin 8.0	1/3 LASmin 10.0	1/3 LASmin 12.5	1/3 LASmin 16.0
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	5.1
1.9	0.9	0.3	-0.8	-0.5
1.9	0.9	0.3	-0.8	-0.6
1.9	0.9	0.3	-0.2	2.8
1.9	0.9	0.3	-0.8	4.3
1.9	0.9	0.3	0.6	6.6
1.9	0.9	0.3	3.5	7.7
1.9	0.9	0.3	-0.8	6.4
1.9	0.9	0.3	-0.2	4.3
1.9	0.9	0.3	-0.8	2.9
1.9	0.9	0.3	5.2	7.2
1.9	0.9	1.2	4.8	9.1
1.9	0.9	0.3	3.2	7.6
1.9	0.9	0.3	0.0	7.1
1.9	0.9	0.3	-0.8	0.1
1.9	0.9	0.3	-0.8	3.2
1.9	0.9	0.3	-0.2	2.9
1.9	0.9	0.3	-0.8	2.6
1.9	0.9	0.3	-0.8	3.2
1.9	0.9	0.3	-0.8	1.3
1.9	0.9	0.3	1.4	6.6
1.9	0.9	0.3	1.5	6.0
1.9	0.9	0.3	1.7	7.9
1.9	0.9	0.3	1.7	10.3
1.9	0.9	0.3	0.9	6.2
1.9	0.9	0.3	-0.8	8.6
1.9	0.9	0.3	-0.8	5.9
1.9	0.9	0.3	-0.8	3.8
1.9	0.9	0.3	-0.8	-0.2
1.9	0.9	0.3	-0.8	6.6
1.9	0.9	0.3	1.0	8.0
1.9	0.9	0.3	0.2	2.9
1.9	0.9	0.3	-0.5	5.3
1.9	0.9	0.3	1.3	4.5
1.9	0.9	0.3	-0.8	2.6
1.9	0.9	0.3	-0.8	1.4
1.9	0.9	0.3	-0.8	3.4
1.9	0.9	0.3	-0.8	3.0
1.9	0.9	0.3	-0.8	2.9
1.9	0.9	0.3	-0.8	2.7
1.9	0.9	0.3	-0.8	2.5
1.9	0.9	0.3	-0.8	2.5
1.9	0.9	0.3	0.0	2.9
1.9	0.9	0.3	-0.8	0.8

1.9	0.9	0.3	-0.8	-0.5
1.9	0.9	0.3	0.3	8.1
1.9	0.9	0.3	6.5	9.7
1.9	0.9	0.3	6.2	9.8
1.9	0.9	0.3	4.7	10.7
1.9	0.9	0.3	-0.8	6.1
1.9	0.9	0.3	2.5	8.2
1.9	0.9	4.4	10.7	14.8
1.9	0.9	0.3	4.3	5.1
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	2.9
1.9	0.9	0.3	0.1	4.5
1.9	0.9	0.3	-0.8	4.1
1.9	0.9	0.3	-0.5	4.1
1.9	0.9	0.3	-0.8	5.9
1.9	0.9	0.3	-0.8	0.3
1.9	0.9	0.3	-0.8	0.5
1.9	0.9	0.3	-0.8	4.2
1.9	0.9	0.3	-0.8	0.5
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	1.8	9.2
1.9	0.9	0.3	2.9	6.9
1.9	0.9	0.3	0.4	7.3
1.9	0.9	0.3	0.1	3.6
1.9	0.9	0.3	-0.8	1.7
1.9	0.9	0.3	-0.8	4.4
1.9	0.9	0.3	-0.8	4.2
1.9	0.9	0.3	-0.8	0.9
1.9	0.9	0.3	-0.8	-0.2
1.9	0.9	0.3	-0.8	-0.3
1.9	0.9	0.3	-0.8	4.9
1.9	0.9	0.3	1.0	4.4
1.9	0.9	0.3	-0.8	0.5
1.9	0.9	0.3	1.8	10.1
1.9	0.9	0.3	-0.4	4.5
1.9	0.9	0.3	0.3	5.3
1.9	0.9	0.3	1.0	6.3
1.9	0.9	0.3	2.2	5.4
1.9	0.9	0.3	1.4	7.5
1.9	0.9	0.3	1.6	9.6
1.9	0.9	0.3	0.5	7.4
1.9	0.9	0.3	3.1	8.0
1.9	0.9	0.3	4.7	9.3
1.9	0.9	0.3	2.2	7.9
1.9	0.9	0.3	1.2	6.1
1.9	0.9	0.3	0.2	9.4
1.9	0.9	0.3	-0.8	1.8

1.9	0.9	0.3	-0.8	0.2
1.9	0.9	0.3	2.4	7.0
1.9	0.9	0.3	0.1	3.8
1.9	0.9	0.3	-0.8	-0.2
1.9	0.9	0.3	0.6	5.5
1.9	0.9	0.3	-0.8	3.1
1.9	0.9	0.3	-0.3	4.8
1.9	0.9	0.3	2.0	7.6
1.9	0.9	0.3	4.0	7.4
1.9	0.9	0.3	0.8	3.4
1.9	0.9	0.3	-0.1	3.8
1.9	0.9	0.3	-0.8	4.4
1.9	0.9	0.3	-0.8	4.4
1.9	0.9	0.3	2.8	10.6
1.9	0.9	0.3	2.5	9.6
1.9	0.9	0.3	-0.8	2.5
1.9	0.9	0.3	-0.8	2.2
1.9	0.9	0.3	-0.8	3.0
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	2.0
1.9	0.9	0.3	-0.8	2.2
1.9	0.9	0.3	-0.8	2.1
1.9	0.9	0.3	-0.8	1.9
1.9	0.9	0.3	-0.8	4.3
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6

1/3 LASmin 20.0	1/3 LASmin 25.0	1/3 LASmin 31.5	1/3 LASmin 40.0	1/3 LASmin 50.0
0.5	10.3	12.2	18.9	18.8
6.7	13.5	16.5	19.8	20.8
4.0	9.3	12.1	17.3	17.4
3.2	8.6	12.7	16.1	18.4
8.9	12.4	14.1	18.7	24.8
9.7	12.3	14.5	19.4	24.8
11.1	14.6	18.3	19.5	25.4
12.7	15.3	18.0	18.1	26.3
11.2	14.6	17.4	17.5	25.6
10.8	14.1	18.1	20.0	26.9
12.9	17.6	17.9	21.4	26.7
13.3	17.4	21.9	23.7	27.3
14.0	17.5	20.8	20.7	27.1
8.9	15.9	18.5	22.0	28.3
9.4	14.3	18.0	21.3	27.1
2.8	8.6	13.3	17.4	25.5
10.6	15.4	15.0	20.4	24.3
6.1	9.2	12.5	17.9	26.4
7.3	10.5	13.0	16.5	25.6
6.1	9.2	12.0	15.7	25.7
5.5	8.8	11.8	18.0	26.2
12.9	14.0	16.4	20.9	26.1
11.7	14.0	17.0	20.3	26.7
11.6	14.5	18.8	22.2	27.9
14.5	16.7	19.9	23.7	27.8
11.0	14.0	18.1	20.7	26.7
9.1	14.7	17.2	19.2	27.4
9.0	15.7	17.0	20.0	25.6
8.2	13.5	15.9	19.2	25.5
4.7	11.3	13.3	21.0	26.0
9.8	15.0	17.6	21.3	25.9
10.7	15.0	16.8	20.8	25.3
9.0	12.1	13.8	18.9	25.1
11.2	12.0	14.0	20.0	24.9
8.3	13.3	16.2	19.4	25.6
4.5	11.8	12.3	17.9	24.8
4.5	12.7	13.2	18.5	24.8
6.0	13.2	15.2	16.2	25.5
5.7	13.9	15.4	18.7	26.6
9.6	12.8	14.4	17.9	26.4
8.1	12.4	13.9	18.3	25.6
4.3	11.8	14.0	15.6	26.5
10.1	13.5	17.7	19.0	25.5
7.3	10.8	13.1	18.4	26.6
5.6	11.3	14.2	17.5	25.6

3.8	9.8	14.0	18.9	25.5
8.6	14.1	15.5	19.4	26.9
13.7	17.3	20.4	21.9	26.8
15.0	17.5	23.3	25.7	28.5
13.5	18.1	21.2	22.4	27.3
9.4	14.2	17.0	18.8	26.2
12.3	14.4	17.6	20.4	27.5
18.4	23.4	23.9	26.3	27.0
10.3	11.7	14.2	17.9	25.3
1.8	7.7	10.3	13.9	25.6
2.9	8.2	10.6	14.1	25.1
8.0	11.5	13.8	18.2	25.2
8.9	13.5	16.5	18.5	25.9
9.6	12.9	18.0	19.1	25.6
8.3	13.5	15.7	18.6	24.5
7.9	12.0	14.6	18.0	25.2
7.1	8.9	13.2	20.5	25.4
5.5	13.1	10.9	18.0	25.4
7.9	9.6	14.2	17.6	24.9
4.3	10.0	11.8	16.7	24.7
5.3	9.6	13.6	17.9	26.5
12.4	18.2	21.8	22.4	26.4
11.5	16.2	18.5	19.9	26.6
11.9	16.5	16.3	19.2	26.7
7.4	11.8	13.3	16.9	25.5
4.6	10.9	13.3	15.8	24.8
9.7	13.7	15.6	18.5	26.9
8.6	14.3	15.5	19.0	25.3
6.3	11.4	12.6	19.0	25.7
2.1	10.1	12.7	16.8	25.2
1.4	8.5	11.3	17.5	25.8
8.9	11.4	14.1	18.2	26.7
10.3	12.7	18.6	19.7	26.0
5.7	9.1	13.5	18.0	25.5
13.6	16.6	17.1	21.3	26.1
5.8	11.6	13.5	17.5	25.1
6.9	10.9	14.7	19.5	25.4
11.0	14.2	15.3	21.1	25.2
8.6	13.5	15.3	19.9	26.3
9.9	13.0	16.7	20.7	25.3
13.8	17.7	20.9	24.6	28.1
12.3	15.1	19.0	22.5	27.2
12.8	21.4	27.3	29.7	32.2
9.9	17.0	17.4	21.4	25.9
9.9	16.0	15.2	18.8	25.5
9.2	13.7	15.2	17.5	25.2
14.4	17.9	19.1	22.5	27.7
6.1	10.4	11.1	18.0	25.5

5.0	8.7	12.0	17.4	25.3
13.9	16.6	18.9	20.8	25.5
7.0	9.9	13.0	17.1	22.8
4.3	8.1	12.6	15.6	19.6
8.3	13.5	15.5	21.2	19.8
7.6	13.2	14.1	20.1	20.0
10.7	15.3	18.2	21.2	21.1
12.3	15.2	18.9	23.3	23.8
12.1	18.4	18.2	21.1	21.7
8.7	12.3	13.7	18.0	18.2
8.0	11.4	15.7	17.3	19.0
7.3	12.2	13.6	17.5	18.9
12.0	18.9	22.5	25.1	26.3
12.9	17.1	19.6	21.5	23.7
12.7	15.9	17.2	20.5	17.4
7.3	9.0	13.2	17.4	16.6
5.7	11.5	12.7	17.5	17.4
5.6	9.0	12.5	17.8	16.7
0.6	7.9	9.3	17.4	14.2
1.1	5.9	10.7	17.2	15.7
5.1	10.6	11.6	16.2	16.9
7.4	12.1	14.0	18.5	17.0
7.4	10.4	13.6	17.9	19.4
7.3	13.1	15.6	18.7	20.6
7.1	10.9	14.7	19.3	19.0
-0.4	5.1	9.6	17.8	17.1
0.6	5.4	13.5	18.1	18.9

1/3 LASmin 63.0	1/3 LASmin 80.0	1/3 LASmin 100	1/3 LASmin 125	1/3 LASmin 160
23.2	21.3	21.3	24.4	23.4
23.7	22.9	23.5	24.3	24.1
23.8	23.6	23.0	25.3	24.5
24.6	24.5	23.1	25.1	26.0
25.4	25.7	25.8	23.7	25.9
23.1	24.0	26.5	23.7	27.0
22.8	24.0	27.0	25.5	26.8
22.2	22.8	26.9	25.6	25.5
21.1	22.8	26.6	25.3	25.0
22.6	23.6	26.7	26.8	26.2
23.6	23.7	26.9	26.6	27.6
24.2	25.0	27.1	26.3	26.7
23.0	25.1	27.2	26.3	26.7
22.4	25.4	26.7	28.0	28.0
24.9	25.7	27.5	26.8	26.6
22.6	22.9	25.3	25.0	25.4
23.3	24.0	26.1	25.4	24.9
21.1	22.6	27.0	24.7	25.8
28.0	25.2	27.4	27.1	28.1
26.6	25.0	27.6	28.1	28.3
23.9	24.1	27.5	27.5	26.7
24.5	23.9	27.8	29.5	27.2
23.3	24.6	28.2	31.3	30.1
27.3	27.3	28.3	31.6	28.7
28.7	26.7	28.4	28.4	27.1
26.4	23.5	27.2	26.7	26.7
25.0	23.0	27.1	27.2	26.6
23.5	23.9	26.5	25.7	26.3
21.5	21.2	25.9	25.5	25.2
21.5	20.8	24.9	25.7	26.5
21.8	24.4	27.0	26.9	26.7
22.6	26.5	27.2	26.2	26.4
21.5	23.9	27.0	25.3	26.8
23.8	24.2	26.8	27.3	27.8
22.0	23.4	27.1	25.7	24.9
22.2	22.9	26.1	25.8	25.4
23.3	24.7	26.4	26.1	25.1
23.2	23.5	26.2	25.8	25.6
25.1	23.9	28.1	24.9	26.5
26.1	27.5	28.1	25.1	25.2
28.1	27.7	29.2	28.4	27.7
23.7	25.9	27.0	25.8	25.9
25.6	27.6	28.9	27.4	27.6
24.9	26.7	30.4	29.1	28.1
24.6	24.3	26.2	26.9	26.1

24.9	23.6	26.7	25.9	26.9
24.9	24.7	28.2	27.4	27.6
24.8	24.5	27.7	25.3	26.6
27.9	28.4	28.3	25.8	28.6
25.4	23.5	26.6	25.7	25.8
23.1	21.5	25.7	24.5	25.5
26.2	23.1	25.4	24.4	25.9
27.4	26.2	30.2	25.9	27.2
23.5	23.2	26.5	24.1	24.8
23.3	22.8	25.9	23.7	24.5
23.9	22.8	25.6	24.2	24.6
25.2	20.8	24.7	24.2	25.5
25.4	21.8	24.9	23.7	23.4
25.0	22.0	24.8	23.8	23.7
25.0	21.8	24.9	23.5	23.4
25.9	22.8	23.7	24.6	23.6
23.7	21.6	24.8	22.9	23.6
25.0	21.5	25.0	24.1	24.0
24.4	22.1	25.1	22.3	24.2
24.2	21.1	24.5	22.7	23.9
25.5	22.8	26.6	25.4	25.5
25.9	25.0	27.4	27.0	27.2
25.9	23.7	26.0	25.0	24.8
25.2	22.6	26.0	25.3	26.3
24.0	18.9	24.5	24.2	24.8
24.3	18.8	25.5	24.5	24.5
24.7	21.5	26.0	24.4	25.2
25.7	21.4	25.5	22.4	23.3
24.1	19.8	24.6	22.6	23.7
24.4	20.0	24.1	22.4	24.4
24.5	21.1	24.0	23.0	24.3
24.0	21.8	24.6	24.0	24.5
20.7	21.1	24.9	22.6	23.5
20.6	20.8	24.7	22.5	24.2
26.8	25.9	27.9	27.3	26.8
21.4	25.1	26.1	24.9	28.0
22.2	22.1	25.4	28.0	25.7
21.5	21.9	25.9	28.8	23.6
21.4	23.3	26.6	28.6	24.0
23.5	24.3	28.4	27.6	25.6
24.6	25.9	29.6	26.6	26.8
23.7	25.2	27.6	25.5	27.5
30.1	29.6	30.4	29.0	28.3
23.2	22.8	26.4	24.8	26.2
20.9	23.0	27.3	23.1	25.1
20.7	21.7	27.3	23.8	24.9
24.2	24.5	26.3	25.5	25.9
19.0	20.7	24.6	23.7	23.7

18.9	20.1	25.5	22.3	23.8
23.4	22.1	25.2	23.7	24.3
19.2	19.1	22.8	22.6	23.3
18.4	19.8	20.1	21.0	21.8
19.5	20.7	21.0	25.2	25.1
21.5	21.6	22.0	24.8	25.1
20.8	23.4	24.3	25.1	25.2
23.3	24.1	25.7	26.1	23.3
22.8	21.9	23.3	25.2	22.7
20.0	20.5	21.7	24.2	23.0
18.7	20.1	20.7	24.0	23.1
18.1	21.1	21.9	25.3	23.5
26.1	27.6	28.2	29.2	28.0
24.1	26.2	25.7	27.4	26.2
22.3	22.4	20.7	24.5	23.2
18.4	19.5	20.2	23.0	22.4
19.4	22.1	21.1	23.9	22.9
19.0	20.5	21.5	24.1	22.2
17.5	21.7	20.4	25.0	22.0
19.3	21.7	21.6	25.9	23.0
19.8	21.2	21.6	26.5	24.2
21.4	21.4	22.4	25.5	23.9
21.7	21.5	23.4	24.7	23.9
21.8	24.2	23.8	24.8	23.0
20.8	21.0	21.8	25.6	22.7
20.6	18.8	22.7	26.4	23.4
19.1	20.5	21.1	25.9	23.6

1/3 LASmin 200	1/3 LASmin 250	1/3 LASmin 315	1/3 LASmin 400	1/3 LASmin 500
23.8	25.1	27.0	31.1	37.2
23.8	26.1	27.3	31.3	35.1
24.1	26.9	28.3	31.3	34.4
28.3	30.3	31.9	35.0	36.7
27.9	28.7	30.2	32.9	35.9
27.0	27.1	29.2	31.5	34.6
28.8	29.0	30.5	32.5	35.5
26.2	27.3	29.1	32.3	35.6
26.1	26.8	29.8	32.4	35.7
26.8	27.9	29.3	32.7	37.8
28.1	28.8	30.4	32.8	37.1
27.9	28.3	30.1	33.5	36.9
27.6	28.4	30.6	33.5	37.7
28.2	28.2	30.8	32.6	36.2
27.3	27.2	30.4	31.4	36.0
26.0	26.6	29.2	31.4	35.1
27.0	27.5	29.3	31.1	34.7
26.7	27.0	31.6	32.3	36.4
26.7	27.5	32.2	34.3	37.9
27.8	28.2	30.4	33.0	36.6
27.4	27.7	29.5	31.8	36.4
27.5	27.1	28.9	31.6	36.3
28.2	28.5	30.6	34.1	36.9
27.9	29.0	31.6	34.4	37.5
28.7	29.7	32.3	33.9	37.6
27.6	28.8	31.8	33.5	36.7
27.3	28.4	30.2	33.3	35.7
28.0	28.9	31.4	33.8	36.2
27.4	28.5	30.1	32.6	35.1
25.9	27.5	29.6	32.0	34.0
27.1	28.3	31.1	32.6	35.0
28.4	28.8	31.3	34.2	36.4
28.7	29.5	31.2	34.1	36.7
28.9	29.8	31.1	33.9	36.1
27.4	27.7	29.6	33.1	36.1
28.7	27.0	29.5	32.5	35.3
27.1	26.3	28.7	31.5	34.3
26.1	26.6	28.6	31.5	34.3
27.8	27.2	28.8	31.8	34.8
26.8	27.4	28.6	31.8	34.7
28.8	29.7	29.9	32.8	35.0
27.9	29.6	30.2	33.3	35.4
28.2	30.0	30.7	32.6	35.1
29.1	29.0	29.5	30.7	33.8
27.4	27.9	28.8	31.2	33.9

27.0	28.6	29.2	33.7	36.2
28.4	29.1	30.8	33.9	36.8
28.5	29.1	31.4	33.8	37.0
29.5	30.6	31.7	34.8	37.0
26.2	27.9	30.7	32.7	35.5
26.5	27.7	30.5	32.9	35.1
28.4	30.5	32.1	35.2	36.0
30.2	32.9	34.0	36.3	37.3
27.4	29.5	32.0	33.4	35.1
25.9	28.1	29.7	32.1	34.4
26.6	27.9	29.4	31.9	34.4
26.1	28.0	29.8	32.5	35.5
25.8	25.4	28.4	31.0	35.1
25.0	25.3	27.6	30.8	34.2
25.8	25.6	28.7	30.6	34.0
25.4	25.4	28.2	31.6	33.4
26.5	26.8	29.4	31.7	34.3
26.9	26.7	29.0	31.5	34.1
24.9	26.1	27.8	31.4	34.0
25.1	26.4	27.8	31.2	33.7
27.9	27.1	29.0	32.1	35.2
27.6	27.6	29.7	31.3	35.1
27.0	28.1	29.3	31.5	33.6
27.7	29.6	30.4	33.1	35.5
27.5	28.1	29.2	31.6	34.2
27.0	27.4	28.9	31.6	34.1
27.5	27.2	28.6	31.5	34.1
25.4	26.5	28.3	30.9	33.4
25.5	26.4	28.2	30.4	33.4
25.6	25.1	28.1	30.1	33.2
26.0	26.3	28.2	30.9	33.4
25.6	25.9	27.6	30.2	32.9
25.5	26.0	28.4	31.2	34.1
27.2	26.8	29.0	32.1	35.1
28.2	28.0	30.8	34.9	38.2
27.2	27.1	31.0	34.9	36.0
27.7	29.0	31.4	34.5	36.0
26.1	27.2	30.3	32.9	36.2
26.9	27.4	31.6	32.8	35.2
27.4	28.7	32.7	33.6	36.3
29.8	30.7	32.2	34.1	38.0
29.1	30.6	32.2	34.0	38.2
31.0	32.6	34.1	36.8	38.4
29.3	30.5	32.0	34.7	37.7
28.0	28.1	31.2	34.2	36.6
26.9	28.2	30.6	33.0	36.4
28.0	27.4	30.5	33.8	36.4
26.4	26.0	28.8	32.0	35.0

26.0	25.1	28.5	31.0	34.8
26.0	27.2	29.5	32.1	35.7
24.5	26.4	28.1	30.8	35.0
23.5	26.8	28.1	31.0	35.6
25.0	26.8	28.8	31.8	34.8
26.7	27.0	30.2	33.3	35.1
25.4	28.1	29.5	31.5	35.0
24.8	27.1	27.6	31.5	35.0
24.8	25.8	26.8	30.0	35.2
23.6	26.0	27.0	30.3	33.9
23.0	25.5	27.5	31.0	35.9
23.2	25.3	28.2	31.2	34.7
28.6	29.7	30.7	33.3	36.9
27.2	29.5	29.4	32.1	34.9
23.6	25.6	27.1	29.6	34.7
21.8	24.0	26.0	29.3	35.5
23.0	24.1	26.0	29.2	35.7
22.9	24.3	25.8	29.1	34.4
21.0	23.4	25.1	28.3	32.0
22.1	24.1	25.6	28.4	31.2
23.7	25.3	26.1	28.6	31.0
24.4	25.7	26.7	29.4	32.6
24.1	25.8	27.7	30.3	34.7
23.4	25.3	27.2	29.6	34.2
22.9	24.9	26.5	29.2	33.9
22.8	25.2	26.9	29.2	33.7
22.4	25.1	26.8	30.0	32.1

1/3 LASmin 630	1/3 LASmin 800	1/3 LASmin 1000	1/3 LASmin 1250	1/3 LASmin 1600
36.6	42.9	43.8	43.1	39.6
36.4	41.6	43.4	41.9	39.7
36.5	40.8	42.3	40.7	39.5
38.5	41.7	42.9	42.1	41.2
37.8	41.2	42.9	41.3	40.1
37.1	40.9	42.5	41.3	39.9
38.5	40.9	42.6	41.5	40.5
38.6	42.4	43.4	41.2	39.3
38.5	42.7	43.5	41.6	39.6
39.5	43.5	44.6	42.8	40.2
39.7	43.4	44.4	42.6	41.3
39.7	43.3	44.7	43.0	40.8
38.7	42.4	44.0	42.4	40.3
38.0	42.2	43.1	41.3	39.5
38.0	41.3	43.1	41.5	39.3
38.0	41.2	42.7	40.7	39.0
37.2	41.2	43.0	40.5	39.3
39.2	43.1	44.4	42.2	40.4
40.6	43.3	44.7	42.2	40.4
40.6	43.2	44.2	42.2	40.3
40.7	41.5	43.1	40.5	38.8
39.4	41.4	43.1	41.0	38.9
40.5	42.3	43.1	41.6	39.8
41.7	42.9	44.4	42.6	41.1
43.5	44.2	45.2	43.6	41.7
41.3	42.7	43.6	42.9	41.3
39.8	42.2	43.4	42.3	40.6
38.9	41.5	42.6	41.8	40.7
37.7	40.4	42.5	41.5	40.5
36.5	39.7	42.4	41.1	40.0
37.3	39.9	42.2	41.2	40.6
39.0	42.0	43.2	42.4	41.3
39.7	42.3	43.4	42.7	41.5
38.9	42.1	43.5	42.9	40.9
38.7	42.1	43.8	42.2	40.6
38.2	42.1	44.1	42.0	39.9
37.9	41.8	42.7	41.6	39.9
37.3	41.5	42.6	41.4	39.3
37.6	41.9	43.1	41.4	39.3
37.8	41.5	43.1	41.4	39.5
37.9	41.8	43.2	41.4	39.6
38.0	41.7	43.0	41.5	39.6
38.0	42.4	44.4	42.1	41.0
36.3	40.8	43.0	41.1	39.3
36.7	41.6	43.5	41.6	39.3

39.6	42.6	43.7	42.4	39.6
39.0	42.9	43.9	42.5	41.0
39.5	42.9	43.9	43.5	41.9
39.3	42.8	43.0	42.3	40.7
37.3	41.2	42.1	40.6	39.1
37.0	40.9	41.7	40.6	39.2
38.8	41.0	42.4	41.3	40.4
39.0	41.5	42.5	41.7	41.0
37.5	40.7	41.6	40.3	38.8
36.0	40.0	41.2	39.5	38.2
36.8	40.5	41.8	39.5	38.3
36.8	40.6	43.2	41.4	40.0
36.6	40.4	41.9	40.5	39.3
35.4	39.0	41.5	40.2	38.6
35.3	38.6	41.0	39.7	38.4
35.4	39.2	40.9	39.9	38.8
35.7	39.3	42.0	40.9	39.0
36.3	39.8	42.0	41.4	39.4
35.5	38.7	41.3	39.7	38.5
36.1	39.4	41.7	40.2	38.6
36.1	40.2	42.0	39.9	38.4
36.1	39.6	41.7	39.6	38.5
35.9	39.4	41.1	40.0	38.9
37.8	40.7	41.9	41.1	40.0
37.0	40.7	43.0	41.8	40.1
36.8	40.2	42.5	41.3	39.7
36.5	40.3	42.3	41.8	40.0
36.6	40.9	42.5	40.7	39.3
36.4	40.6	42.4	40.7	39.7
36.8	39.9	42.4	40.4	39.3
36.2	39.8	41.5	40.6	39.5
36.0	39.8	41.7	40.5	39.2
36.6	40.5	42.7	40.8	39.3
37.5	41.0	43.2	41.7	40.1
39.5	43.0	44.3	42.4	41.2
38.3	41.5	42.8	41.5	39.9
37.6	41.2	42.6	41.4	40.0
39.4	42.8	44.3	42.2	40.0
38.3	41.8	43.8	42.1	39.6
38.4	41.8	43.3	42.3	40.3
39.6	42.6	43.6	42.3	40.7
39.9	42.6	43.7	42.3	40.5
40.2	42.9	43.5	42.7	41.5
39.8	43.0	43.7	42.4	41.3
39.3	42.4	44.4	42.3	40.5
39.6	42.1	42.5	41.7	39.8
38.6	41.2	42.5	40.9	39.6
37.5	41.6	42.9	41.1	39.3

37.2	41.2	42.3	40.8	38.9
37.1	40.2	42.1	40.3	38.2
37.0	40.3	42.0	40.0	38.3
38.1	41.8	43.6	41.8	39.7
37.3	40.3	42.3	41.1	39.1
37.3	40.4	41.3	40.6	39.0
37.4	39.5	41.4	39.8	38.0
37.3	39.2	41.1	39.3	37.5
36.7	38.2	40.1	38.1	36.7
35.9	38.2	40.1	38.6	37.0
37.2	39.8	41.8	39.9	37.7
36.3	39.8	41.6	40.1	37.8
38.0	40.4	42.4	41.7	39.9
37.1	40.2	41.7	40.4	38.8
36.7	39.4	41.4	40.5	38.0
35.5	39.2	40.5	38.7	36.7
35.0	38.2	39.8	38.5	36.6
35.0	38.2	40.1	38.8	36.6
33.3	37.6	39.6	38.5	36.5
33.2	36.3	39.1	38.2	35.7
33.3	36.7	39.1	38.3	35.7
33.7	37.7	39.9	38.7	36.9
36.9	39.2	41.5	40.3	38.4
37.2	41.1	43.1	40.7	39.2
36.1	39.2	41.5	40.0	38.2
35.3	38.7	40.7	39.4	37.3
34.4	38.3	40.8	39.3	37.5

1/3 LASmin 2000	1/3 LASmin 2500	1/3 LASmin 3150	1/3 LASmin 4000	1/3 LASmin 5000
37.7	33.3	30.7	28.3	25.8
37.7	33.4	31.4	29.3	26.7
37.0	35.2	34.2	32.0	29.6
39.6	39.0	39.1	37.5	35.2
37.6	36.6	35.9	34.5	32.0
37.6	35.4	34.4	33.1	30.9
38.8	37.3	37.0	35.9	33.7
36.6	34.6	33.5	31.8	29.0
37.5	34.9	33.0	31.4	28.3
37.3	34.5	32.7	31.2	28.9
38.7	36.1	34.8	33.2	30.9
38.7	37.4	36.8	35.4	33.2
37.6	35.0	33.9	32.4	30.0
36.9	34.8	33.4	32.2	29.8
37.0	35.2	34.0	32.6	30.1
36.4	34.3	33.3	32.1	30.0
36.1	33.8	32.3	30.9	28.4
36.9	34.4	32.3	30.4	27.8
36.9	34.4	33.0	31.1	28.7
37.3	34.7	33.0	30.9	28.4
35.8	33.5	32.1	30.3	27.8
35.8	33.7	32.2	30.5	27.6
37.2	35.5	33.1	31.0	28.5
38.2	36.2	34.2	32.4	30.1
39.3	37.8	37.7	35.5	32.6
39.0	37.4	37.6	35.3	32.3
38.4	36.6	35.8	33.9	31.3
39.2	37.6	36.8	35.2	32.8
38.3	36.4	35.4	33.8	31.8
37.5	35.7	34.6	33.0	30.6
38.6	37.5	37.1	35.6	33.3
39.2	38.1	37.4	36.0	33.5
37.8	36.3	35.8	34.5	32.1
38.2	37.0	36.5	35.4	33.0
37.8	36.3	35.8	34.3	31.8
36.9	34.5	33.3	31.5	28.7
36.9	34.1	32.1	30.1	27.4
36.6	33.6	31.7	30.2	27.6
36.5	33.7	31.7	29.7	27.0
36.1	33.1	30.9	29.1	26.3
36.3	33.7	32.1	30.2	27.8
37.8	37.2	37.1	35.9	33.6
38.3	35.4	34.3	32.8	30.5
36.4	33.6	32.2	30.7	28.0
36.2	32.9	31.0	28.9	26.4

36.8	33.4	31.4	29.4	26.8
39.3	38.5	37.9	36.6	34.0
39.4	38.5	38.2	36.8	34.3
38.5	37.6	37.4	35.9	33.7
36.9	35.4	34.9	33.4	30.8
36.5	35.4	34.7	33.1	30.6
39.8	39.5	39.6	38.4	36.1
39.8	39.4	39.9	38.5	36.2
37.1	35.8	35.4	34.3	32.0
35.7	33.8	33.0	31.2	29.2
35.8	33.7	32.7	30.8	28.2
36.8	34.3	32.7	31.4	28.7
36.7	34.8	33.6	32.0	29.4
35.8	33.4	31.4	29.6	26.9
35.9	34.0	32.8	31.5	29.2
36.6	35.4	34.7	33.1	30.3
38.3	37.2	35.8	34.5	31.9
40.2	36.2	34.1	32.5	30.2
40.7	35.7	32.3	30.9	28.0
39.5	35.7	32.7	31.1	28.6
36.8	35.4	33.1	31.1	28.6
36.3	34.8	34.3	33.0	30.6
36.7	35.1	34.4	32.7	30.4
38.2	35.2	34.5	33.1	30.3
37.7	35.1	34.1	32.5	29.8
37.1	35.4	34.3	32.9	30.3
37.6	35.1	33.5	32.2	29.7
37.0	34.5	33.3	30.3	27.6
37.3	35.0	32.6	30.7	28.3
37.2	35.1	32.8	31.0	28.8
37.9	37.3	33.7	32.4	30.3
36.9	37.5	32.9	31.2	28.8
37.0	36.3	33.3	31.5	29.1
39.1	38.2	36.0	34.8	32.0
40.3	37.1	35.3	34.0	31.5
38.1	36.4	34.0	32.2	29.8
39.2	38.5	36.4	35.2	32.7
38.5	40.3	36.2	34.0	31.7
37.6	36.6	36.0	34.7	32.4
38.5	36.8	36.2	34.8	32.1
39.4	38.5	37.9	36.6	34.2
39.5	39.1	38.0	36.5	34.1
40.2	41.3	41.1	38.1	35.8
40.0	40.5	39.9	36.8	34.3
38.7	38.1	37.0	35.8	33.4
38.1	37.3	36.5	35.2	32.8
39.7	36.7	35.6	32.6	29.8
36.4	33.3	31.2	28.8	26.4

36.1	33.3	31.1	28.9	26.3
36.2	34.4	33.3	31.6	29.5
36.1	35.8	33.9	32.1	29.9
36.5	35.4	34.2	32.4	29.9
39.6	40.2	35.7	34.2	32.0
39.7	38.1	36.5	35.6	33.1
39.7	35.6	34.9	33.8	31.4
37.1	34.2	32.3	30.9	28.6
36.4	35.1	31.5	29.7	27.1
35.3	36.9	31.6	29.4	27.0
34.9	33.7	31.7	29.5	27.0
34.3	32.6	31.1	29.1	26.6
39.0	37.7	37.1	35.8	33.4
37.7	38.8	37.3	36.0	33.8
35.5	34.3	33.6	32.0	29.7
33.9	31.9	31.0	29.5	27.1
33.9	31.9	30.8	29.4	27.1
34.1	34.2	31.0	28.4	26.0
35.2	35.4	31.3	28.5	25.9
35.6	38.8	30.6	28.3	26.0
34.9	36.8	31.5	29.0	26.4
35.2	35.3	30.8	29.0	26.7
35.1	33.0	29.9	28.3	25.8
36.4	32.4	30.3	28.4	26.1
35.3	31.4	28.8	26.5	24.1
34.3	31.1	28.7	26.4	24.4
34.6	32.2	30.4	28.1	26.2

1/3 LASmin 6300	1/3 LASmin 8000	1/3 LASmin 10000	1/3 LASmin 12500	1/3 LASmin 16000
23.4	20.2	16.9	13.5	10.5
24.2	20.8	17.4	13.8	10.8
27.1	23.7	20.1	15.7	12.3
32.6	28.8	24.4	19.1	13.7
29.5	25.8	21.9	16.8	12.5
28.2	24.8	20.8	16.2	12.3
31.3	27.4	23.6	18.2	14.0
26.4	23.0	19.0	14.6	11.2
25.8	22.1	18.4	14.2	11.0
26.8	23.5	19.7	15.2	11.6
28.2	24.6	20.6	16.2	12.7
30.5	26.6	22.5	17.8	13.3
27.7	24.4	20.6	16.2	13.0
27.1	23.7	19.8	15.7	12.5
27.2	23.9	20.1	15.9	12.2
27.7	24.3	20.4	15.5	11.4
25.8	22.2	18.6	14.7	11.4
25.1	21.7	18.3	14.3	11.0
26.0	22.6	18.7	14.5	11.0
25.4	21.9	18.0	14.3	11.0
25.3	21.9	18.0	14.3	11.0
25.7	22.3	18.9	14.9	12.1
25.8	22.5	19.0	15.1	12.0
27.2	23.5	19.9	15.9	12.5
30.4	27.0	22.7	17.7	13.1
30.0	26.6	22.4	17.4	12.7
28.7	25.0	21.2	16.4	12.3
30.3	26.8	22.6	17.7	13.6
30.0	26.7	22.6	17.1	12.3
28.3	24.8	20.9	16.1	12.1
30.6	26.8	22.7	17.4	12.9
30.8	27.2	23.0	17.6	12.9
29.3	25.4	21.3	16.4	12.2
30.0	26.3	22.3	17.6	13.7
29.2	25.3	21.1	16.2	11.8
26.3	22.5	18.8	14.4	11.0
24.9	21.6	17.8	14.0	10.9
24.9	21.6	18.0	14.1	10.8
24.4	21.1	17.7	14.3	11.2
23.8	20.4	17.5	14.0	11.1
25.2	21.7	18.2	14.2	11.3
30.9	26.9	22.8	17.7	12.9
28.0	24.2	20.1	15.5	11.8
25.6	22.0	18.3	14.2	11.0
24.0	20.8	17.3	13.6	10.5

24.1	21.0	17.5	13.9	10.8
31.6	28.2	23.8	18.2	13.6
31.9	28.0	23.6	18.1	13.4
31.1	27.2	22.8	17.7	13.4
28.2	24.6	20.6	15.8	11.8
28.0	24.3	20.4	15.6	11.7
33.5	29.4	25.1	19.7	14.5
33.5	29.6	25.3	19.7	14.6
29.3	25.6	21.6	16.3	11.9
26.8	23.3	19.3	14.7	11.0
25.8	22.4	18.6	14.1	10.7
26.4	22.9	19.3	15.0	11.9
26.8	23.0	19.2	15.0	11.7
24.5	21.0	17.6	14.0	11.0
26.3	22.7	19.2	14.8	11.4
27.5	23.7	19.8	15.2	11.4
29.2	25.3	21.1	16.2	11.9
28.0	24.3	20.4	15.6	11.5
25.9	22.4	18.8	14.5	10.9
26.1	22.9	19.2	14.7	11.1
26.4	23.2	19.5	14.8	11.1
28.1	24.4	20.7	16.3	12.8
27.9	24.2	20.2	15.7	12.1
27.7	24.1	20.1	15.4	11.5
27.4	23.9	20.1	15.4	11.5
27.6	23.9	19.9	15.2	11.5
27.2	23.3	19.4	15.0	11.4
24.7	21.3	17.8	14.0	10.9
25.1	21.9	18.0	14.3	10.9
26.3	22.9	19.2	14.7	11.1
27.9	24.5	20.3	15.4	11.3
26.3	22.7	19.2	15.2	11.8
26.6	23.1	19.4	15.3	11.9
29.4	25.4	21.4	16.2	11.9
28.8	24.9	20.9	16.2	12.1
27.1	23.5	19.6	15.3	11.5
29.8	26.1	21.7	16.8	12.5
28.8	25.1	21.1	16.2	12.1
29.8	26.0	21.7	16.8	12.4
29.5	25.7	21.7	17.3	13.2
31.9	28.2	24.0	19.2	14.6
31.8	28.1	24.0	19.0	15.0
33.3	29.5	25.1	19.5	14.4
32.1	28.1	23.7	18.3	13.6
30.7	26.9	22.7	17.6	13.3
30.3	26.4	22.4	17.4	13.2
27.1	23.5	19.6	15.4	11.9
24.0	20.8	17.5	13.8	10.7

24.0	20.9	17.6	13.8	10.8
27.5	24.1	20.4	15.5	11.7
27.5	24.0	20.2	15.3	11.3
27.1	23.6	19.7	15.0	11.1
29.4	25.5	21.3	16.4	12.3
30.5	26.7	22.6	17.6	13.4
28.8	25.0	20.9	16.3	12.6
26.4	23.0	19.4	15.3	12.2
24.8	21.5	18.0	14.4	11.2
24.6	21.2	17.9	14.1	10.8
24.3	20.9	17.5	14.0	10.8
23.9	20.7	17.4	13.9	10.9
31.0	27.2	23.1	18.5	14.7
31.0	27.3	23.1	17.9	13.4
26.7	23.2	19.4	14.9	11.1
24.6	21.3	17.7	14.0	10.9
24.6	21.2	17.7	13.9	10.8
23.4	19.9	16.7	13.3	10.2
23.4	20.0	16.7	13.4	10.2
23.5	20.3	17.0	13.7	10.8
24.2	20.8	17.5	13.9	10.6
24.2	20.8	17.4	13.8	10.8
23.3	19.9	17.0	13.7	10.9
23.6	20.2	17.1	13.9	10.8
22.4	19.5	16.7	13.2	10.3
22.4	19.5	16.6	13.1	10.3
24.2	21.2	18.1	14.4	11.4

1/3 LASmin 20000	LAIeq-LAeq	OVLD	OBA OVLD	Marker
8.6	0.0	No	No	
8.8	0.9	No	No	
9.5	0.2	No	No	
9.9	3.1	No	No	
9.7	0.5	No	No	
9.7	2.0	No	No	
10.8	2.3	No	No	
9.2	1.6	No	No	
9.2	0.2	No	No	
9.4	0.7	No	No	
10.2	0.2	No	No	
10.2	0.8	No	No	
10.2	0.5	No	No	
10.0	1.2	No	No	
9.7	0.1	No	No	
9.0	0.6	No	No	
9.1	0.2	No	No	
8.7	0.4	No	No	
8.7	0.4	No	No	
8.7	0.9	No	No	
8.8	-0.1	No	No	
9.8	0.1	No	No	
9.5	0.5	No	No	
10.0	1.2	No	No	
9.7	0.3	No	No	
9.4	0.2	No	No	
9.4	1.1	No	No	
10.0	0.6	No	No	
9.3	0.0	No	No	
9.3	0.0	No	No	
9.8	0.9	No	No	
9.6	0.2	No	No	
9.3	0.2	No	No	
10.4	0.6	No	No	
9.0	0.2	No	No	
8.7	5.6	No	No	
8.8	0.6	No	No	
8.7	0.3	No	No	
9.0	0.5	No	No	
9.0	0.4	No	No	
9.2	0.5	No	No	
9.5	0.2	No	No	
9.4	0.3	No	No	
9.1	0.9	No	No	
8.6	0.6	No	No	

8.8	4.6	No	No
10.3	0.5	No	No
10.2	0.3	No	No
10.4	1.8	No	No
9.4	0.3	No	No
9.5	0.1	No	No
10.8	0.6	No	No
10.7	0.6	No	No
9.3	0.6	No	No
8.8	0.1	No	No
8.8	0.5	No	No
9.5	0.8	No	No
9.5	0.3	No	No
9.3	0.3	No	No
9.1	0.6	No	No
9.1	0.2	No	No
9.3	0.2	No	No
9.1	-0.3	No	No
9.0	0.7	No	No
9.0	0.9	No	No
9.0	1.1	No	No
10.1	1.0	No	No
9.7	0.8	No	No
9.3	0.3	No	No
9.2	0.7	No	No
9.3	0.6	No	No
9.3	0.4	No	No
9.1	0.6	No	No
9.1	-0.2	No	No
9.1	1.0	No	No
9.1	1.4	No	No
9.6	0.0	No	No
9.3	0.8	No	No
9.3	-0.1	No	No
9.8	2.7	No	No
9.4	1.2	No	No
9.9	0.5	No	No
9.6	0.6	No	No
9.6	0.2	No	No
10.4	0.4	No	No
11.3	0.3	No	No
11.5	0.5	No	No
11.0	0.6	No	No
10.3	0.3	No	No
10.4	0.4	No	No
10.2	0.2	No	No
9.8	0.8	No	No
9.2	1.1	No	No

9.2	0.7	No	No
9.6	0.0	No	No
9.4	1.2	No	No
9.4	1.6	No	No
9.9	0.5	No	No
10.4	1.3	No	No
9.9	1.2	No	No
10.2	0.6	No	No
9.6	1.0	No	No
9.4	1.0	No	No
9.3	0.3	No	No
9.4	4.9	No	No
11.9	0.0	No	No
10.5	0.8	No	No
9.5	0.8	No	No
9.3	0.1	No	No
9.5	0.4	No	No
9.2	0.4	No	No
9.2	2.0	No	No
9.3	1.1	No	No
9.1	1.2	No	No
9.1	0.0	No	No
9.3	0.7	No	No
9.4	1.1	No	No
9.1	0.3	No	No
9.0	0.2	No	No
9.6	1.2	No	No

Summary

File Name on Meter	EF_HS.052
File Name on PC	SLM_0003788_EF_HS_052.00.ldbin
Serial Number	0003788
Model	SoundExpert® LxT
Firmware Version	2.301
User	
Location	
Job Description	
Note	

Measurement

Description	EF Academy Project
Start	2017-06-27 16:46:29
Stop	2017-06-27 16:56:29
Duration	00:10:00.0
Run Time	00:10:00.0
Pause	00:00:00.0
Pre Calibration	2017-06-27 16:21:22
Post Calibration	None
Calibration Deviation	---

Overall Settings

RMS Weight	A Weighting	
Peak Weight	A Weighting	
Detector	Slow	
Preamp	PRMLxT1L	
Microphone Correction	Off	
Integration Method	Exponential	
OBA Range	Normal	
OBA Bandwidth	1/1 and 1/3	
OBA Freq. Weighting	A Weighting	
OBA Max Spectrum	At LMax	
Overload	120.3 dB	
	A	**C**
Under Range Peak	**76.6**	73.6
Under Range Limit	**25.3**	24.8
Noise Floor	15.9	15.7

Results

LASeq	59.6 dB	
LASE	87.4 dB	
EAS	60.752 µPa²h	
LASpeak (max)	2017-06-27 16:54:57	95.5
LASmax	2017-06-27 16:55:08	73.7
LASmin	2017-06-27 16:48:52	43.6
SEA	-99.9 dB	

LAS > 85.0 dB (Exceedance Counts / Duration)	0	0.0
LAS > 115.0 dB (Exceedance Counts / Duration)	0	0.0
LASpeak > 135.0 dB (Exceedance Counts / Duration)	0	0.0
LASpeak > 137.0 dB (Exceedance Counts / Duration)	0	0.0
LASpeak > 140.0 dB (Exceedance Counts / Duration)	0	0.0

Community Noise	**Ldn**	**LDay 07:00-23:00**
	59.6	59.6

LCSeq	68.7	dB
LASeq	59.6	dB
LCSeq - LASeq	9.1	dB
LAIeq	62.4	dB
LAeq	59.6	dB
LAIeq - LAeq	2.8	dB

	A	
	dB	**Time Stamp**
Leq	59.6	
LS(max)	73.7	2017/06/27 16:55:08
LS(min)	43.6	2017/06/27 16:48:52
LPeak(max)	95.5	2017/06/27 16:54:57

# Overloads	0	
Overload Duration	0.0	s
# OBA Overloads	0	
OBA Overload Duration	0.0	s

Statistics

LAS5.00	66.7	dB
LAS10.00	64.2	dB
LAS33.30	53.3	dB
LAS50.00	48.6	dB
LAS66.60	46.6	dB
LAS90.00	45.1	dB

Calibration History

Preamp	**Date**	**dB re. 1V/Pa**
Direct	2017-01-03 10:54:35	-27.0
Direct	2017-01-03 10:30:13	-26.0
Direct	2014-07-01 09:45:44	-27.0
PRMLxT1L	2017-06-27 16:21:22	-26.6
PRMLxT1L	2017-06-26 11:13:28	-26.6
PRMLxT1L	2017-06-20 10:09:05	-26.6
PRMLxT1L	2017-06-12 12:50:10	-26.6
PRMLxT1L	2017-06-06 15:05:30	-26.6
PRMLxT1L	2017-05-05 15:45:44	-26.6

PRMLxT1L	2017-04-29 09:09:14	-26.6
PRMLxT1L	2017-04-21 11:23:22	-26.5
PRMLxT1L	2017-03-31 13:13:53	-26.6
PRMLxT1L	2017-03-14 08:18:51	-26.6
PRMLxT1L	2017-03-10 10:18:04	-26.5

Z
78.6 dB
31.3 dB
21.4 dB

dB
dB
dB

s
s
s
s
s

LNight 23:00-07:00	Lden	LDay 07:00-19:00	LEvening 19:00-23:00	LNight 23:00-07:00
-99.9	59.6	59.6	-99.9	-99.9

C		Z	
dB	Time Stamp	dB	Time Stamp

6.3	**8.0**	**10.0**	**12.5**
2.5	1.9	3.3	7.7
61.7	59.8	59.2	54.2
64.6	55.5	59.0	60.8
61.3	59.9	62.9	60.0
61.9	63.5	53.7	67.2
48.3	50.2	49.4	58.8
48.5	42.2	44.8	43.0
51.3	59.2	56.0	47.6

39.5	40.2	49.9	42.2
37.9	45.8	40.7	31.9
48.6	50.1	57.0	56.7
42.4	46.2	50.2	47.7
39.5	42.0	44.7	43.1

dB

16.0	**20.0**	**25.0**	**31.5**	**40.0**	**50.0**	**63.0**	**80.0**	**100**	**125**	**160**	**200**	**250**	**315**	**400**	**500**
-1.0	2.3	0.5	3.1	2.3	0.9	2.9	4.5	6.7	17.0	7.3	3.9	12.5	9.3	7.1	3.6
61.0	44.5	36.3	44.2	35.5	41.3	42.1	33.4	39.3	37.9	29.0	27.5	26.0	24.1	19.7	20.0
56.7	50.3	53.1	46.7	42.7	47.4	40.0	41.2	44.2	46.7	45.4	44.6	39.9	34.1	34.7	33.9
65.2	53.8	52.2	50.6	50.7	52.6	45.8	44.1	41.8	44.0	42.5	41.5	38.5	35.7	32.7	29.0
67.9	53.0	49.2	51.6	57.3	49.4	45.7	39.6	47.2	42.3	41.2	46.7	48.5	50.6	52.0	52.6
56.7	47.6	39.9	34.8	38.1	45.6	39.2	37.3	40.3	35.3	35.2	42.1	40.0	45.1	45.4	46.2
58.8	54.4	33.4	42.3	46.2	55.6	46.5	32.9	42.4	39.2	36.9	40.1	40.7	33.7	38.1	29.8
45.2	40.7	49.8	45.0	52.4	46.9	41.8	43.5	35.1	39.5	37.8	37.0	35.6	32.8	30.4	25.8

45.9	36.9	38.3	43.8	40.7	37.6	37.8	33.8	31.5	32.4	25.3	25.4	27.3	21.4	22.2	16.4
36.8	39.9	42.4	45.7	48.9	45.8	39.0	52.1	54.6	47.0	39.7	35.5	37.4	33.6	27.9	20.6
53.2	49.6	43.0	43.6	51.3	49.2	46.0	36.2	40.9	37.3	40.1	37.5	41.7	38.4	36.1	31.9
43.3	32.8	41.8	42.5	43.5	40.8	40.8	37.3	31.2	30.3	22.9	15.8	17.3	15.7	15.4	15.3
44.6	36.6	31.4	30.2	38.4	45.3	53.3	44.1	43.4	43.7	42.7	49.0	55.1	45.6	51.4	53.3

630	800	1000	1250	1600	2000	2500	3150	4000	5000	6300	8000	10000	12500
8.0	9.0	7.3	10.0	9.2	9.8	11.6	12.5	13.2	40.2	17.7	16.3	18.1	20.4
17.4	28.0	113.0	48.1	19.6	62.7	18.7	56.6	25.5	27.7	20.7	22.0	23.6	25.3
21.4	29.3	114.0	49.1	19.8	66.0	18.7	57.5	29.4	28.0	21.3	22.9	24.6	26.4
17.4	28.6	114.0	49.1	19.1	65.8	18.9	57.4	29.4	27.8	21.7	22.9	24.2	26.2
43.9	30.1	114.0	49.1	20.9	65.8	19.0	57.4	29.5	27.9	21.5	22.7	24.6	26.3
32.4	30.2	114.0	49.2	19.3	65.9	19.4	57.4	29.6	28.0	21.5	22.9	24.4	26.2
22.0	28.8	114.0	49.1	19.1	66.0	19.0	57.5	29.5	27.8	21.4	22.7	24.5	26.4
20.4	28.5	113.9	49.0	19.0	66.0	19.2	57.4	29.7	27.7	21.7	22.8	24.6	26.3

16.8	28.8	113.9	49.0	18.9	65.7	19.4	57.2	29.4	27.9	21.1	22.5	24.3	26.0
18.1	28.8	114.1	49.2	19.2	65.9	19.0	56.7	28.8	27.3	21.5	23.0	24.6	26.4
20.9	28.6	114.0	49.1	19.4	65.9	19.3	57.5	29.5	27.9	21.5	22.6	24.3	26.5
18.2	29.5	113.9	49.1	19.3	65.7	19.4	57.2	29.6	28.1	21.7	22.8	24.3	26.0
45.3	30.8	114.1	49.2	21.1	66.1	19.5	57.6	29.8	28.3	21.9	22.9	24.6	26.3

16000	20000
20.2	21.5
28.1	30.6
28.8	31.4
28.8	31.5
28.9	31.5
28.8	31.9
28.8	31.6
28.7	31.2

28.7	31.2
28.9	31.6
28.7	31.3
28.7	31.3
28.8	31.6

1/1 Octave

Frequency (Hz)	8.0	16.0	31.5	63.0	125	250	500	1000	2000	4000	8000	16000
Overall 1/1 Spectra	5.9	9.9	27.0	37.3	48.1	50.0	52.1	56.6	49.9	42.5	33.3	28.0
Max 1/1 Spectra	5.9	17.9	34.3	49.6	60.2	63.3	67.3	71.0	63.1	54.1	44.1	31.3
Min 1/1 Spectra	5.9	3.2	13.2	21.4	26.2	30.0	34.6	39.8	35.8	30.6	22.8	14.9

1/3 Octave

Frequency (Hz)	6.3	8.0	10.0	12.5	16.0	20.0	25.0	31.5	40.0	50.0	63.0	80.0
Overall 1/3 Spectra	1.9	0.9	0.4	0.5	3.6	8.5	13.5	20.3	25.7	26.4	30.2	35.8
Max 1/3 Spectra	1.9	0.9	0.3	4.0	10.5	16.9	22.8	29.6	32.9	39.8	42.2	48.9
Min 1/3 Spectra	1.9	0.9	0.3	-0.8	-1.6	-2.4	3.0	5.9	11.0	12.9	15.3	17.3

1/1 OBA Ref. Spectra

Frequency (Hz)	8.0	16.0	31.5	63.0	125	250	500	1000	2000	4000	8000	16000
1	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
2	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
3	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
4	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

1/3 OBA Ref. Spectra

Frequency (Hz)	6.3	8.0	10.0	12.5	16.0	20.0	25.0	31.5	40.0	50.0	63.0	80.0
1	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
2	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
3	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
4	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

1/1 OBA Under Range

Frequency (Hz)	8.0	16.0	31.5	63.0	125	250	500	1000	2000	4000	8000	16000
Under Range Limit	20.3	17.6	15.7	13.9	12.3	13.0	14.3	16.5	19.1	22.3	24.9	28.1
Noise Floor	15.9	13.2	11.1	9.2	7.6	7.4	8.6	10.6	13.0	16.0	18.7	21.7

1/3 OBA Under Range

Frequency (Hz)	6.3	8.0	10.0	12.5	16.0	20.0	25.0	31.5	40.0	50.0	63.0	80.0
Under Range Limit	21.9	20.9	20.3	19.2	18.4	17.6	16.9	16.3	15.7	14.9	14.5	13.9
Noise Floor	11.9	10.9	10.3	9.2	8.4	7.6	6.9	6.3	5.7	4.9	4.5	3.9

100	125	160	200	250	315	400	500	630	800	1000	1250	1600	2000	2500	3150
38.9	45.6	43.1	45.2	45.9	44.3	45.1	47.3	48.9	51.7	53.1	50.4	47.4	44.4	41.8	39.8
50.2	53.3	58.2	58.6	58.7	58.3	60.4	61.8	64.2	66.8	67.4	64.3	61.0	57.3	54.1	51.8
19.6	21.9	21.2	22.5	24.5	25.9	27.4	29.0	31.4	34.4	35.8	34.1	32.2	30.6	28.8	27.3

100	125	160	200	250	315	400	500	630	800	1000	1250	1600	2000	2500	3150
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

100	125	160	200	250	315	400	500	630	800	1000	1250	1600	2000	2500	3150
13.3	12.7	12.3	12.4	12.5	13.0	13.4	13.8	14.3	15.1	15.7	16.5	17.3	18.2	19.1	20.1
3.3	2.7	2.3	2.4	2.5	3.0	3.4	3.8	4.3	5.1	5.7	6.5	7.3	8.2	9.1	10.1

4000	5000	6300	8000	10000	12500	16000	20000
37.5	34.3	30.9	27.1	25.7	28.2	12.9	10.3
48.7	45.5	42.2	38.4	34.2	29.8	24.3	17.4
25.6	23.3	20.4	17.1	14.2	11.4	9.2	8.6

4000	5000	6300	8000	10000	12500	16000	20000
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

4000	5000	6300	8000	10000	12500	16000	20000
21.0	22.3	22.8	23.8	24.9	25.8	26.7	28.1
11.0	12.3	12.8	13.8	14.9	15.8	16.7	18.1

Record #	Date	Time	Record Type	Cause	#	TH Record	Sound Record
1	2017-06-27	16:46:29	Run	Key	1	1	
2	2017-06-27	16:56:29	Stop	Timer	1	122	

Statistics		
Level (dB)	**Count**	**Percent**
Under	0	0.00
43.6	94	0.16
43.7	87	0.14
43.8	137	0.23
43.9	164	0.27
44.0	339	0.56
44.1	273	0.46
44.2	282	0.47
44.3	178	0.30
44.4	281	0.47
44.5	514	0.86
44.6	489	0.81
44.7	584	0.97
44.8	656	1.09
44.9	739	1.23
45.0	675	1.13
45.1	840	1.40
45.2	947	1.58
45.3	1066	1.78
45.4	783	1.31
45.5	558	0.93
45.6	684	1.14
45.7	867	1.44
45.8	689	1.15
45.9	995	1.66
46.0	991	1.65
46.1	1250	2.08
46.2	1246	2.08
46.3	1050	1.75
46.4	1008	1.68
46.5	1054	1.76
46.6	768	1.28
46.7	597	1.00
46.8	795	1.32
46.9	755	1.26
47.0	773	1.29
47.1	721	1.20
47.2	888	1.48
47.3	605	1.01
47.4	549	0.92
47.5	424	0.71
47.6	396	0.66
47.7	372	0.62
47.8	373	0.62
47.9	360	0.60
48.0	339	0.56

48.1	309	0.51
48.2	320	0.53
48.3	308	0.51
48.4	398	0.66
48.5	332	0.55
48.6	406	0.68
48.7	334	0.56
48.8	268	0.45
48.9	292	0.49
49.0	270	0.45
49.1	274	0.46
49.2	229	0.38
49.3	296	0.49
49.4	335	0.56
49.5	241	0.40
49.6	260	0.43
49.7	260	0.43
49.8	215	0.36
49.9	254	0.42
50.0	228	0.38
50.1	264	0.44
50.2	217	0.36
50.3	200	0.33
50.4	182	0.30
50.5	172	0.29
50.6	202	0.34
50.7	210	0.35
50.8	187	0.31
50.9	185	0.31
51.0	278	0.46
51.1	216	0.36
51.2	259	0.43
51.3	276	0.46
51.4	313	0.52
51.5	220	0.37
51.6	166	0.28
51.7	166	0.28
51.8	168	0.28
51.9	152	0.25
52.0	153	0.25
52.1	162	0.27
52.2	149	0.25
52.3	146	0.24
52.4	143	0.24
52.5	140	0.23
52.6	150	0.25
52.7	139	0.23
52.8	125	0.21

52.9	148	0.25
53.0	170	0.28
53.1	126	0.21
53.2	125	0.21
53.3	126	0.21
53.4	118	0.20
53.5	120	0.20
53.6	124	0.21
53.7	123	0.20
53.8	111	0.19
53.9	126	0.21
54.0	127	0.21
54.1	110	0.18
54.2	119	0.20
54.3	110	0.18
54.4	115	0.19
54.5	124	0.21
54.6	120	0.20
54.7	119	0.20
54.8	122	0.20
54.9	129	0.22
55.0	173	0.29
55.1	155	0.26
55.2	145	0.24
55.3	146	0.24
55.4	154	0.26
55.5	137	0.23
55.6	126	0.21
55.7	134	0.22
55.8	150	0.25
55.9	154	0.26
56.0	170	0.28
56.1	151	0.25
56.2	177	0.30
56.3	153	0.25
56.4	132	0.22
56.5	131	0.22
56.6	137	0.23
56.7	126	0.21
56.8	138	0.23
56.9	138	0.23
57.0	118	0.20
57.1	131	0.22
57.2	151	0.25
57.3	144	0.24
57.4	123	0.20
57.5	145	0.24
57.6	144	0.24

57.7	141	0.23
57.8	143	0.24
57.9	166	0.28
58.0	131	0.22
58.1	156	0.26
58.2	135	0.22
58.3	109	0.18
58.4	118	0.20
58.5	147	0.25
58.6	129	0.22
58.7	134	0.22
58.8	145	0.24
58.9	132	0.22
59.0	161	0.27
59.1	134	0.22
59.2	141	0.23
59.3	162	0.27
59.4	144	0.24
59.5	129	0.22
59.6	136	0.23
59.7	140	0.23
59.8	131	0.22
59.9	172	0.29
60.0	211	0.35
60.1	151	0.25
60.2	151	0.25
60.3	126	0.21
60.4	140	0.23
60.5	113	0.19
60.6	107	0.18
60.7	107	0.18
60.8	109	0.18
60.9	108	0.18
61.0	112	0.19
61.1	93	0.16
61.2	112	0.19
61.3	105	0.18
61.4	110	0.18
61.5	116	0.19
61.6	102	0.17
61.7	96	0.16
61.8	103	0.17
61.9	98	0.16
62.0	93	0.16
62.1	127	0.21
62.2	119	0.20
62.3	96	0.16
62.4	99	0.16

62.5	94	0.16
62.6	100	0.17
62.7	99	0.16
62.8	107	0.18
62.9	104	0.17
63.0	111	0.19
63.1	115	0.19
63.2	133	0.22
63.3	82	0.14
63.4	86	0.14
63.5	86	0.14
63.6	98	0.16
63.7	117	0.19
63.8	116	0.19
63.9	122	0.20
64.0	111	0.19
64.1	155	0.26
64.2	132	0.22
64.3	128	0.21
64.4	138	0.23
64.5	135	0.22
64.6	118	0.20
64.7	123	0.20
64.8	144	0.24
64.9	143	0.24
65.0	155	0.26
65.1	138	0.23
65.2	129	0.22
65.3	126	0.21
65.4	145	0.24
65.5	171	0.28
65.6	160	0.27
65.7	110	0.18
65.8	88	0.15
65.9	104	0.17
66.0	118	0.20
66.1	112	0.19
66.2	98	0.16
66.3	124	0.21
66.4	89	0.15
66.5	73	0.12
66.6	70	0.12
66.7	75	0.13
66.8	92	0.15
66.9	68	0.11
67.0	70	0.12
67.1	53	0.09
67.2	77	0.13

67.3	66	0.11
67.4	61	0.10
67.5	69	0.12
67.6	74	0.12
67.7	76	0.13
67.8	76	0.13
67.9	62	0.10
68.0	51	0.09
68.1	44	0.07
68.2	69	0.12
68.3	42	0.07
68.4	40	0.07
68.5	43	0.07
68.6	70	0.12
68.7	50	0.08
68.8	31	0.05
68.9	65	0.11
69.0	49	0.08
69.1	63	0.10
69.2	70	0.12
69.3	46	0.08
69.4	56	0.09
69.5	35	0.06
69.6	33	0.05
69.7	40	0.07
69.8	23	0.04
69.9	30	0.05
70.0	37	0.06
70.1	37	0.06
70.2	18	0.03
70.3	20	0.03
70.4	19	0.03
70.5	37	0.06
70.6	75	0.13
70.7	36	0.06
70.8	28	0.05
70.9	92	0.15
71.0	101	0.17
71.1	83	0.14
71.2	41	0.07
71.3	41	0.07
71.4	29	0.05
71.5	33	0.05
71.6	67	0.11
71.7	47	0.08
71.8	19	0.03
71.9	26	0.04
72.0	29	0.05

72.1	24	0.04
72.2	15	0.03
72.3	13	0.02
72.4	11	0.02
72.5	18	0.03
72.6	32	0.05
72.7	19	0.03
72.8	17	0.03
72.9	15	0.03
73.0	27	0.04
73.1	11	0.02
73.2	15	0.03
73.3	11	0.02
73.4	13	0.02
73.5	12	0.02
73.6	10	0.02
73.7	7	0.01
Over	0	0.00
Total Count	60000	

Record #	Date	Time	Run Duration	Run Time	Pause	LASeq	LASE	LASmin
1	2017-06-27	16:46:29	00:10:00.0	00:10:00.0	00:00:00.0	59.6	87.4	43.6

LASmin Time	LASmax	LASmax Time	LApeak (max)	LApeak (max) Time	SPL 1 Count
16:48:52	73.7	16:55:08	95.5	16:54:57	0

SPL 1 Duration	SPL 2 Count	SPL 2 Duration	Peak 1 Count	Peak 1 Duration	Peak 2 Count
0.0	0	0.0	0	0.0	0

Peak 2 Duration	Peak 3 Count	Peak 3 Duration	LAS5.00	LAS10.00	LAS33.30	LAS50.00
0.0	0	0.0	66.7	64.2	53.3	48.6

LAS66.60	LAS90.00	SEA	LCSeq	LASeq	LCSeq - LASeq	LAIeq	LAeq	LAIeq - LAeq
46.6	45.1	-99.9	68.7	59.6	9.1	62.4	59.6	2.8

# Overloads	Overloads Duration	# OBA Overloads	OBA Overloads Duration	1/1 LASeq 8.0
0	0.0	0	0.0	5.9

1/1 LASeq 16.0	1/1 LASeq 31.5	1/1 LASeq 63.0	1/1 LASeq 125	1/1 LASeq 250	1/1 LASeq 500
9.9	27.0	37.3	48.1	50.0	52.1

1/1 LASeq 1000	1/1 LASeq 2000	1/1 LASeq 4000	1/1 LASeq 8000	1/1 LASeq 16000
56.6	49.9	42.5	33.3	28.0

1/1 LASmax 8.0	1/1 LASmax 16.0	1/1 LASmax 31.5	1/1 LASmax 63.0	1/1 LASmax 125
5.9	17.9	34.3	49.6	60.2

1/1 LASmax 250	1/1 LASmax 500	1/1 LASmax 1000	1/1 LASmax 2000	1/1 LASmax 4000
63.3	67.3	71.0	63.1	54.1

1/1 LASmax 8000	1/1 LASmax 16000	1/1 LASmin 8.0	1/1 LASmin 16.0	1/1 LASmin 31.5
44.1	31.3	5.9	3.2	13.2

1/1 LASmin 63.0	1/1 LASmin 125	1/1 LASmin 250	1/1 LASmin 500	1/1 LASmin 1000
21.4	26.2	30.0	34.6	39.8

1/1 LASmin 2000	1/1 LASmin 4000	1/1 LASmin 8000	1/1 LASmin 16000	1/3 LASeq 6.3
35.8	30.6	22.8	14.9	1.9

1/3 LASeq 8.0	1/3 LASeq 10.0	1/3 LASeq 12.5	1/3 LASeq 16.0	1/3 LASeq 20.0	1/3 LASeq 25.0
0.9	0.4	0.5	3.6	8.5	13.5

1/3 LASeq 31.5	1/3 LASeq 40.0	1/3 LASeq 50.0	1/3 LASeq 63.0	1/3 LASeq 80.0	1/3 LASeq 100
20.3	25.7	26.4	30.2	35.8	38.9

1/3 LASeq 125	1/3 LASeq 160	1/3 LASeq 200	1/3 LASeq 250	1/3 LASeq 315	1/3 LASeq 400
45.6	43.1	45.2	45.9	44.3	45.1

1/3 LASeq 500	1/3 LASeq 630	1/3 LASeq 800	1/3 LASeq 1000	1/3 LASeq 1250	1/3 LASeq 1600
47.3	48.9	51.7	53.1	50.4	47.4

1/3 LASeq 2000	1/3 LASeq 2500	1/3 LASeq 3150	1/3 LASeq 4000	1/3 LASeq 5000
44.4	41.8	39.8	37.5	34.3

1/3 LASeq 6300	1/3 LASeq 8000	1/3 LASeq 10000	1/3 LASeq 12500	1/3 LASeq 16000
30.9	27.1	25.7	28.2	12.9

1/3 LASeq 20000	1/3 LASmax 6.3	1/3 LASmax 8.0	1/3 LASmax 10.0	1/3 LASmax 12.5
10.3	1.9	0.9	0.3	4.0

1/3 LASmax 16.0	1/3 LASmax 20.0	1/3 LASmax 25.0	1/3 LASmax 31.5	1/3 LASmax 40.0
10.5	16.9	22.8	29.6	32.9

1/3 LASmax 50.0	1/3 LASmax 63.0	1/3 LASmax 80.0	1/3 LASmax 100	1/3 LASmax 125
39.8	42.2	48.9	50.2	53.3

1/3 LASmax 160	1/3 LASmax 200	1/3 LASmax 250	1/3 LASmax 315	1/3 LASmax 400
58.2	58.6	58.7	58.3	60.4

1/3 LASmax 500	1/3 LASmax 630	1/3 LASmax 800	1/3 LASmax 1000	1/3 LASmax 1250
61.8	64.2	66.8	67.4	64.3

1/3 LASmax 1600	1/3 LASmax 2000	1/3 LASmax 2500	1/3 LASmax 3150	1/3 LASmax 4000
61.0	57.3	54.1	51.8	48.7

1/3 LASmax 5000	1/3 LASmax 6300	1/3 LASmax 8000	1/3 LASmax 10000	1/3 LASmax 12500
45.5	42.2	38.4	34.2	29.8

1/3 LASmax 16000	1/3 LASmax 20000	1/3 LASmin 6.3	1/3 LASmin 8.0	1/3 LASmin 10.0
24.3	17.4	1.9	0.9	0.3

1/3 LASmin 12.5	1/3 LASmin 16.0	1/3 LASmin 20.0	1/3 LASmin 25.0	1/3 LASmin 31.5
-0.8	-1.6	-2.4	3.0	5.9

1/3 LASmin 40.0	1/3 LASmin 50.0	1/3 LASmin 63.0	1/3 LASmin 80.0	1/3 LASmin 100
11.0	12.9	15.3	17.3	19.6

1/3 LASmin 125	1/3 LASmin 160	1/3 LASmin 200	1/3 LASmin 250	1/3 LASmin 315
21.9	21.2	22.5	24.5	25.9

1/3 LASmin 400	1/3 LASmin 500	1/3 LASmin 630	1/3 LASmin 800	1/3 LASmin 1000
27.4	29.0	31.4	34.4	35.8

1/3 LASmin 1250	1/3 LASmin 1600	1/3 LASmin 2000	1/3 LASmin 2500	1/3 LASmin 3150
34.1	32.2	30.6	28.8	27.3

1/3 LASmin 4000	1/3 LASmin 5000	1/3 LASmin 6300	1/3 LASmin 8000	1/3 LASmin 10000
25.6	23.3	20.4	17.1	14.2

1/3 LASmin 12500	1/3 LASmin 16000	1/3 LASmin 20000
11.4	9.2	8.6

Record #	Record Type	Date	Time	LASeq	LApeak	LASmax	LASmin	Battery
1	Run	2017-06-27	16:46:29					
2		2017-06-27	16:46:29	47.8	62.8	48.7	46.7	4.9
3		2017-06-27	16:46:34	47.4	81.4	52.8	45.9	4.9
4		2017-06-27	16:46:39	58.7	78.2	64.7	50.7	4.9
5		2017-06-27	16:46:44	62.3	80.1	65.7	54.5	4.9
6		2017-06-27	16:46:49	50.7	81.1	54.5	47.4	4.9
7		2017-06-27	16:46:54	55.3	89.0	60.4	48.4	4.9
8		2017-06-27	16:46:59	65.8	82.3	68.7	60.2	5.0
9		2017-06-27	16:47:04	54.5	64.5	60.2	48.0	5.0
10		2017-06-27	16:47:09	46.7	64.4	48.0	46.1	5.0
11		2017-06-27	16:47:14	46.1	67.8	46.6	45.7	5.0
12		2017-06-27	16:47:19	46.4	61.7	46.6	46.1	5.0
13		2017-06-27	16:47:24	47.3	71.6	48.3	46.6	5.0
14		2017-06-27	16:47:29	52.2	71.9	57.7	48.3	5.0
15		2017-06-27	16:47:34	67.0	88.8	70.1	57.7	5.0
16		2017-06-27	16:47:39	60.2	73.2	64.1	56.2	5.0
17		2017-06-27	16:47:44	52.5	64.3	56.1	48.7	4.9
18		2017-06-27	16:47:49	47.3	60.0	48.7	46.6	4.9
19		2017-06-27	16:47:54	46.9	68.3	47.5	46.2	4.9
20		2017-06-27	16:47:59	53.8	75.0	59.8	47.2	4.9
21		2017-06-27	16:48:04	63.4	78.7	65.6	58.3	4.9
22		2017-06-27	16:48:09	52.5	61.2	58.2	46.5	4.9
23		2017-06-27	16:48:14	45.5	57.8	46.5	44.5	4.9
24		2017-06-27	16:48:19	44.5	67.3	46.0	44.0	5.0
25		2017-06-27	16:48:24	45.3	58.1	45.9	45.1	5.0
26		2017-06-27	16:48:29	45.9	58.9	46.3	45.4	5.0
27		2017-06-27	16:48:34	45.9	58.6	46.1	45.6	5.0
28		2017-06-27	16:48:39	46.8	69.7	47.3	46.0	4.9
29		2017-06-27	16:48:44	45.6	59.0	46.8	44.4	5.0
30		2017-06-27	16:48:49	44.0	57.9	44.6	43.6	5.0
31		2017-06-27	16:48:54	46.3	60.0	47.3	44.6	5.0
32		2017-06-27	16:48:59	51.0	71.9	57.4	46.3	5.0
33		2017-06-27	16:49:04	65.2	86.0	67.8	57.5	4.9
34		2017-06-27	16:49:09	55.9	67.2	61.8	47.2	4.9
35		2017-06-27	16:49:14	45.3	59.2	47.2	44.1	4.9
36		2017-06-27	16:49:19	45.3	59.1	46.6	44.0	5.0
37		2017-06-27	16:49:24	46.5	60.0	47.0	46.0	4.9
38		2017-06-27	16:49:29	47.0	67.7	47.3	46.8	4.9
39		2017-06-27	16:49:34	46.5	64.1	47.2	45.9	4.9
40		2017-06-27	16:49:39	45.9	59.2	46.0	45.7	4.9
41		2017-06-27	16:49:44	46.2	58.3	46.4	45.9	4.9
42		2017-06-27	16:49:49	46.5	68.3	47.1	46.1	4.9
43		2017-06-27	16:49:54	49.1	68.0	54.0	46.4	4.9
44		2017-06-27	16:49:59	57.8	81.1	60.3	54.1	4.9
45		2017-06-27	16:50:04	50.3	63.9	54.2	46.2	4.9
46		2017-06-27	16:50:09	46.5	62.1	48.3	45.5	4.9
47		2017-06-27	16:50:14	59.1	79.1	63.2	48.4	4.9

48	2017-06-27	16:50:19	58.3	75.3	62.8	49.7	4.9
49	2017-06-27	16:50:24	46.7	59.8	49.7	45.2	4.9
50	2017-06-27	16:50:29	45.4	57.7	45.7	45.2	4.9
51	2017-06-27	16:50:34	45.0	58.0	45.3	44.7	4.9
52	2017-06-27	16:50:39	45.3	58.3	45.5	44.9	4.9
53	2017-06-27	16:50:44	45.2	59.1	45.8	44.8	4.9
54	2017-06-27	16:50:49	45.8	58.7	46.6	45.1	4.9
55	2017-06-27	16:50:54	45.9	58.2	46.5	45.5	4.9
56	2017-06-27	16:50:59	58.9	80.8	65.1	46.5	4.9
57	2017-06-27	16:51:04	64.1	82.8	67.3	55.4	4.9
58	2017-06-27	16:51:09	50.3	64.4	55.3	46.1	4.9
59	2017-06-27	16:51:14	46.4	70.9	47.1	46.0	4.9
60	2017-06-27	16:51:19	46.5	67.7	47.7	46.1	4.9
61	2017-06-27	16:51:24	52.1	69.0	56.0	47.7	4.9
62	2017-06-27	16:51:29	59.1	72.7	60.2	56.1	4.9
63	2017-06-27	16:51:34	57.1	71.6	58.9	55.8	4.9
64	2017-06-27	16:51:39	54.8	68.5	57.7	49.8	4.9
65	2017-06-27	16:51:44	47.4	60.0	49.8	45.8	4.9
66	2017-06-27	16:51:49	45.2	59.7	46.0	44.5	4.9
67	2017-06-27	16:51:54	44.9	59.4	45.4	44.4	4.9
68	2017-06-27	16:51:59	48.0	69.3	51.8	44.5	4.9
69	2017-06-27	16:52:04	48.2	66.1	50.8	46.3	4.9
70	2017-06-27	16:52:09	46.4	61.3	47.0	45.9	4.9
71	2017-06-27	16:52:14	50.3	69.8	54.5	46.9	4.9
72	2017-06-27	16:52:19	65.6	87.3	69.5	54.5	4.9
73	2017-06-27	16:52:24	63.7	77.1	66.9	57.2	4.9
74	2017-06-27	16:52:29	53.5	68.7	57.2	49.1	4.9
75	2017-06-27	16:52:34	47.5	60.9	49.1	46.8	4.9
76	2017-06-27	16:52:39	47.1	61.8	47.4	46.9	4.9
77	2017-06-27	16:52:44	48.1	66.2	48.7	47.3	4.9
78	2017-06-27	16:52:49	49.2	62.7	50.0	48.6	4.9
79	2017-06-27	16:52:54	50.1	68.8	53.0	49.3	4.9
80	2017-06-27	16:52:59	63.0	86.2	66.2	53.0	4.9
81	2017-06-27	16:53:04	65.6	94.1	69.8	60.0	4.9
82	2017-06-27	16:53:09	60.4	73.9	66.5	49.4	4.9
83	2017-06-27	16:53:14	45.8	64.7	49.4	43.8	4.9
84	2017-06-27	16:53:19	44.0	57.8	44.6	43.7	4.9
85	2017-06-27	16:53:24	44.9	61.7	45.8	44.3	4.9
86	2017-06-27	16:53:29	44.8	61.0	45.6	44.4	4.9
87	2017-06-27	16:53:34	50.2	78.7	57.9	45.1	4.9
88	2017-06-27	16:53:39	64.4	82.1	66.9	58.0	4.9
89	2017-06-27	16:53:44	54.8	67.2	60.6	47.1	4.9
90	2017-06-27	16:53:49	45.6	60.7	47.1	44.9	4.9
91	2017-06-27	16:53:54	45.5	59.0	46.4	45.0	4.9
92	2017-06-27	16:53:59	55.9	78.5	63.4	45.6	4.9
93	2017-06-27	16:54:04	63.6	82.4	66.4	56.3	4.9
94	2017-06-27	16:54:09	51.6	62.6	56.3	48.1	4.9
95	2017-06-27	16:54:14	47.6	61.2	48.5	47.3	4.9

96		2017-06-27	16:54:19	51.2	68.5	55.0	47.7	4.9
97		2017-06-27	16:54:24	67.2	88.5	71.7	54.9	4.9
98		2017-06-27	16:54:29	65.7	77.6	71.3	56.8	4.9
99		2017-06-27	16:54:34	52.5	62.5	56.8	49.3	4.9
100		2017-06-27	16:54:39	48.2	60.8	49.4	47.6	4.9
101		2017-06-27	16:54:44	50.6	65.1	51.6	47.7	4.9
102		2017-06-27	16:54:49	51.4	67.9	53.6	50.9	4.9
103		2017-06-27	16:54:54	69.0	95.5	73.3	53.7	4.9
104		2017-06-27	16:54:59	67.6	86.2	70.5	63.7	4.9
105		2017-06-27	16:55:04	71.6	93.1	73.7	66.2	4.9
106		2017-06-27	16:55:09	69.7	83.7	71.9	63.5	4.9
107		2017-06-27	16:55:14	57.7	68.4	63.5	50.2	4.9
108		2017-06-27	16:55:19	55.6	78.0	62.7	49.8	4.9
109		2017-06-27	16:55:24	62.9	86.0	66.1	55.1	4.9
110		2017-06-27	16:55:29	50.4	65.3	55.1	46.2	4.9
111		2017-06-27	16:55:34	45.9	73.7	48.8	44.3	4.9
112		2017-06-27	16:55:39	44.9	66.1	45.7	44.7	4.9
113		2017-06-27	16:55:44	45.2	71.8	45.8	44.7	4.9
114		2017-06-27	16:55:49	52.4	72.5	57.9	45.8	4.9
115		2017-06-27	16:55:54	59.8	81.3	62.2	55.4	4.9
116		2017-06-27	16:55:59	58.6	79.2	61.6	55.0	4.9
117		2017-06-27	16:56:04	65.6	90.6	68.3	61.0	4.9
118		2017-06-27	16:56:09	56.1	79.3	61.0	51.6	4.9
119		2017-06-27	16:56:14	63.4	81.2	66.3	55.0	4.9
120		2017-06-27	16:56:19	63.5	82.1	65.7	57.5	4.9
121		2017-06-27	16:56:24	52.7	69.4	57.5	48.1	4.9
122	Stop	2017-06-27	16:56:29					

Int. Temp (°F)	LCSeq-LASeq	1/1 LASeq 8.0	1/1 LASeq 16.0	1/1 LASeq 31.5	1/1 LASeq 63.0
98.4	10.1	5.9	5.9	16.8	25.0
98.6	9.3	5.9	4.3	15.4	23.9
98.6	7.2	5.9	9.4	18.5	30.5
98.6	6.3	5.9	12.7	23.7	36.3
99.0	8.5	5.9	4.9	19.2	28.0
99.1	6.3	5.9	6.6	17.6	27.6
99.1	4.9	5.9	4.9	28.1	36.5
99.2	6.9	5.9	3.2	22.8	30.0
99.2	11.3	5.9	4.2	16.2	26.6
99.6	12.4	5.9	5.4	18.0	23.9
99.6	12.4	5.9	4.6	16.8	26.9
99.6	15.0	5.9	7.9	18.3	30.3
99.6	11.3	5.9	10.0	18.4	31.9
99.6	7.7	5.9	14.5	25.7	44.1
99.9	13.3	5.9	9.9	24.7	45.3
100.0	16.1	5.9	3.7	21.2	42.9
100.0	13.9	5.9	4.5	17.8	33.5
100.0	12.3	5.9	3.9	19.6	29.6
100.0	7.9	5.9	4.7	18.5	29.0
100.3	7.0	5.9	9.8	32.4	38.2
100.5	10.5	5.9	5.6	28.8	32.4
100.5	11.6	5.9	3.2	16.7	31.8
100.5	13.9	5.9	5.4	17.3	24.9
100.5	14.7	5.9	6.9	17.6	23.2
100.5	13.0	5.9	9.5	17.7	23.6
100.5	13.3	5.9	6.6	18.6	24.0
100.9	13.1	5.9	7.6	21.6	24.8
101.0	11.2	5.9	3.3	17.1	26.7
101.0	12.6	5.9	3.2	16.3	25.0
101.0	12.5	5.9	3.4	17.1	27.3
101.0	9.2	5.9	5.5	17.0	26.6
101.1	5.8	5.9	9.1	29.2	37.3
101.1	8.6	5.9	8.6	27.1	32.6
101.5	14.2	5.9	4.6	20.6	29.1
101.5	12.1	5.9	4.9	16.7	26.6
101.5	11.4	5.9	3.2	16.2	26.8
101.5	12.2	5.9	3.2	16.7	29.1
101.5	12.4	5.9	3.2	16.1	29.6
101.5	14.0	5.9	4.3	19.4	29.4
101.6	13.4	5.9	4.2	19.9	28.4
101.6	12.9	5.9	3.6	18.6	27.9
101.6	10.6	5.9	3.3	19.0	28.8
101.9	11.8	5.9	7.4	33.3	39.6
101.9	11.8	5.9	8.3	25.7	32.4
101.9	12.1	5.9	3.3	19.5	29.2
101.9	6.2	5.9	5.6	21.0	34.4

101.9	7.0	5.9	5.3	24.3	36.5
101.9	16.7	5.9	12.5	21.2	29.6
101.9	15.3	5.9	9.2	19.1	28.4
101.9	15.5	5.9	8.6	20.1	26.8
102.2	13.3	5.9	7.4	18.3	24.8
102.3	11.9	5.9	4.3	16.4	24.1
102.4	10.4	5.9	3.5	16.1	23.4
102.4	9.5	5.9	3.2	15.3	24.3
102.4	5.4	5.9	3.2	18.1	31.4
102.4	7.1	5.9	11.6	30.5	39.8
102.4	11.2	5.9	8.7	20.5	28.5
102.4	13.3	5.9	4.5	22.1	27.3
102.4	12.9	5.9	3.2	23.5	28.0
102.4	13.3	5.9	3.2	26.6	33.1
102.4	14.6	5.9	7.0	36.3	39.5
102.7	18.2	5.9	8.1	41.2	40.8
102.5	12.7	5.9	5.4	31.8	36.0
102.9	13.2	5.9	3.8	22.2	31.7
102.9	12.9	5.9	3.7	18.1	27.5
102.9	12.9	5.9	5.3	18.0	26.3
102.9	11.0	5.9	6.0	17.4	25.1
102.9	10.4	5.9	5.7	17.3	25.2
102.9	14.9	5.9	9.5	20.0	28.0
102.9	12.1	5.9	8.3	20.0	32.3
102.9	10.0	5.9	20.3	31.8	41.9
102.9	9.5	6.6	22.0	33.7	41.2
102.9	10.5	5.9	9.2	24.3	33.2
102.9	12.4	5.9	7.7	18.3	26.5
103.0	11.0	5.9	5.8	16.2	27.9
103.4	22.4	6.0	19.7	28.5	35.3
103.4	19.9	6.1	18.7	28.8	33.6
103.4	14.4	5.9	14.8	23.3	31.2
103.4	6.5	5.9	9.7	26.4	35.9
103.4	7.4	5.9	9.5	35.1	39.1
103.4	8.3	5.9	8.1	34.4	35.6
103.4	13.0	5.9	5.9	23.0	27.5
103.4	13.7	5.9	6.8	17.7	25.7
103.4	11.8	5.9	6.0	14.7	25.4
103.4	11.8	5.9	5.4	14.6	23.4
103.5	9.9	5.9	7.0	15.6	26.8
103.4	5.3	5.9	8.9	23.4	36.3
103.7	8.0	5.9	6.4	24.1	31.6
103.7	12.0	5.9	5.4	17.4	25.8
103.8	10.5	5.9	3.9	15.9	24.2
103.8	6.8	5.9	4.9	15.5	27.5
103.8	6.8	5.9	5.2	31.4	36.6
103.8	11.4	5.9	4.2	24.3	27.8
103.8	14.8	5.9	4.9	18.0	28.0

103.8	14.0	5.9	6.4	20.9	31.8
103.8	14.3	5.9	4.5	31.2	47.5
103.8	12.9	5.9	7.4	33.3	45.3
103.8	13.4	5.9	4.0	19.2	32.7
104.0	15.2	5.9	7.1	19.8	26.7
103.8	18.4	5.9	17.1	25.9	33.1
103.8	13.9	5.9	13.6	21.0	34.7
103.8	5.4	5.9	8.1	25.0	39.7
104.1	6.2	5.9	11.9	29.1	42.2
104.2	7.8	5.9	13.1	31.1	52.4
104.3	6.4	5.9	15.1	31.9	44.5
104.3	10.2	5.9	13.6	24.8	34.6
104.3	9.6	5.9	12.5	21.5	32.2
104.3	6.5	5.9	10.1	25.6	38.4
104.3	8.8	5.9	5.7	19.4	27.1
104.3	10.2	5.9	4.3	15.5	23.8
104.3	12.5	5.9	4.2	17.3	24.3
104.3	14.6	5.9	4.5	21.4	25.9
104.3	8.9	5.9	3.6	20.1	28.6
104.3	7.5	5.9	6.2	24.4	37.5
104.3	11.4	5.9	3.7	30.6	36.0
104.4	6.0	5.9	8.5	29.7	41.9
104.4	7.0	5.9	4.6	21.1	34.2
104.7	5.3	5.9	4.2	22.3	37.4
104.7	4.9	5.9	4.9	23.3	36.6
104.8	7.7	5.9	3.2	18.3	29.7

1/1 LASeq 125	1/1 LASeq 250	1/1 LASeq 500	1/1 LASeq 1000	1/1 LASeq 2000	1/1 LASeq 4000
30.0	35.3	39.0	41.9	42.2	41.2
30.9	34.1	38.2	42.0	41.9	40.9
41.4	49.5	51.2	55.8	49.3	43.0
45.7	53.3	55.2	59.6	52.8	43.5
34.6	41.9	42.2	47.1	43.2	39.8
37.5	43.5	45.7	52.4	49.4	40.5
48.9	55.3	56.7	63.6	57.2	46.1
39.2	44.4	45.5	51.8	47.2	40.2
29.5	33.4	37.8	43.2	40.5	37.1
28.7	32.3	36.9	42.7	39.7	36.5
33.9	33.3	37.4	42.7	39.4	37.0
37.3	36.1	37.7	42.8	40.1	38.0
44.1	41.3	44.0	48.1	43.4	39.0
53.5	56.2	60.6	62.9	59.1	55.2
54.1	50.5	52.4	54.6	50.9	47.7
47.9	41.6	41.8	44.8	44.2	43.5
38.4	34.7	38.2	43.1	39.4	37.2
36.1	34.4	38.8	43.0	38.7	37.5
36.5	42.5	45.8	50.5	46.6	40.9
45.7	52.0	56.5	60.8	54.9	45.8
37.7	43.0	45.1	49.4	44.5	38.8
29.8	31.8	36.4	41.6	38.9	36.6
27.8	30.5	35.6	40.9	37.7	35.5
28.2	31.0	36.5	41.4	38.7	36.9
28.3	30.7	37.0	42.1	39.1	37.7
28.2	31.2	37.4	42.7	38.6	35.9
32.7	36.4	38.2	43.3	39.0	35.3
31.9	33.5	37.5	42.5	38.3	33.8
29.5	30.7	36.0	40.9	36.7	32.1
37.6	34.6	37.3	42.2	38.9	34.9
35.8	40.2	43.0	48.0	42.8	35.6
47.3	54.0	57.4	62.7	57.0	46.5
40.8	46.7	48.1	53.0	47.7	38.7
36.0	35.1	36.7	41.3	37.7	33.4
35.1	34.5	36.2	41.0	37.7	36.1
37.0	35.0	36.8	41.8	39.5	37.7
38.7	36.7	37.1	42.5	39.3	37.8
36.8	35.7	37.1	42.1	39.2	37.2
37.1	34.1	36.5	42.0	37.8	34.7
37.3	33.6	37.4	42.3	38.3	35.3
37.9	33.6	37.2	42.3	38.9	36.6
37.6	37.2	40.4	45.3	42.5	37.5
43.4	48.2	50.9	54.5	48.7	43.0
38.0	41.0	43.2	46.8	41.9	36.4
34.1	34.6	39.3	42.5	38.8	35.4
42.1	48.3	52.0	56.3	50.0	42.0

42.8	48.1	51.3	55.7	49.4	40.6
33.0	35.0	38.3	43.8	38.6	33.9
31.5	31.6	36.6	42.1	38.2	35.1
30.0	32.0	37.4	41.5	37.3	34.7
29.9	32.5	38.9	41.9	37.0	33.5
30.3	35.0	39.1	41.3	36.8	33.5
29.0	32.7	38.8	42.7	37.6	34.5
29.1	32.6	38.5	42.9	38.1	35.0
40.8	47.1	52.2	56.6	47.4	37.7
47.8	53.7	59.2	61.1	51.8	44.1
37.3	41.5	44.7	47.0	39.3	32.5
32.2	34.2	38.1	43.1	39.0	34.8
33.7	35.4	38.2	43.1	38.8	34.5
39.5	43.0	44.8	48.8	42.7	34.7
47.1	50.9	52.6	54.8	49.6	45.0
48.3	49.0	49.3	51.6	48.7	45.8
46.8	47.3	46.8	49.9	46.3	41.2
37.6	39.7	39.2	43.4	38.4	33.2
34.3	36.1	36.7	41.8	36.9	32.0
33.0	35.5	37.5	41.0	36.8	32.8
33.1	38.3	41.2	43.2	42.1	34.6
31.9	36.8	41.8	44.1	40.9	36.5
32.6	34.2	38.9	41.8	39.5	37.6
39.2	39.7	42.1	46.0	42.3	40.3
53.2	56.2	57.7	63.0	55.5	47.1
51.0	55.8	55.8	60.7	54.1	47.1
43.3	46.7	45.3	49.0	44.5	41.4
35.4	36.7	38.5	42.9	40.3	40.0
33.6	34.8	39.0	42.7	40.1	39.0
37.0	35.8	38.8	43.2	41.0	39.8
35.9	37.4	40.1	43.9	42.5	41.7
34.9	37.8	41.6	46.1	42.6	41.7
47.3	52.0	55.0	60.6	53.2	43.6
49.2	53.8	57.0	63.4	55.3	45.8
45.4	48.6	51.8	58.1	50.8	41.7
31.6	33.7	37.3	42.7	38.2	34.2
33.5	32.8	35.2	40.2	36.3	33.4
31.6	36.8	37.0	41.2	36.6	32.5
31.3	35.2	37.2	41.5	36.7	32.1
35.9	40.9	42.3	47.2	40.3	33.9
47.2	54.0	57.3	61.9	54.4	44.6
39.3	45.8	47.7	52.1	45.6	36.5
35.2	33.3	36.6	42.4	37.6	33.8
31.4	32.5	36.6	42.7	37.6	34.5
41.3	45.7	47.3	53.3	46.3	36.4
48.6	52.8	55.9	61.3	54.2	43.9
42.7	41.6	42.5	48.6	42.6	35.8
41.2	37.1	38.6	42.6	38.9	36.2

45.8	44.0	40.7	43.6	42.0	39.7
64.1	58.7	57.0	58.8	53.9	48.0
61.6	59.9	56.6	59.3	53.0	46.9
48.2	43.5	43.3	47.2	42.0	38.5
38.0	37.4	38.5	43.3	41.4	40.4
43.7	44.2	40.0	43.4	41.7	40.4
44.7	44.2	41.6	46.0	41.8	38.8
51.3	60.1	60.7	66.6	58.1	48.2
52.2	58.2	59.4	65.1	58.1	48.2
57.9	62.4	64.3	68.9	61.4	51.8
55.5	59.8	63.1	67.1	59.3	50.5
44.7	49.0	50.9	54.8	47.7	40.8
38.6	44.8	48.0	51.5	49.7	41.4
45.3	53.2	57.1	59.5	54.6	46.1
34.3	41.3	44.8	46.8	41.8	34.7
29.1	32.9	37.5	42.2	40.8	33.6
28.8	31.8	36.7	41.6	38.5	32.9
29.8	32.6	36.8	41.8	38.2	34.1
36.4	40.4	43.8	49.7	44.5	37.2
44.6	49.4	53.1	56.7	51.2	43.8
42.7	49.0	50.8	55.9	49.3	41.6
47.2	55.5	58.9	63.0	55.9	46.8
40.4	46.6	49.6	53.0	47.3	38.3
46.6	52.8	57.0	60.6	53.6	44.6
46.9	52.8	56.9	60.9	53.9	45.3
38.4	42.9	45.0	49.9	44.0	38.1

1/1 LASeq 8000	1/1 LASeq 16000	1/1 LASmax 8.0	1/1 LASmax 16.0	1/1 LASmax 31.5
32.2	17.4	5.9	10.6	19.3
31.1	16.6	5.9	5.9	16.3
32.4	17.8	5.9	12.5	21.3
32.4	18.2	5.9	15.9	26.3
31.6	17.8	5.9	7.9	21.4
35.9	20.4	5.9	9.3	20.0
35.3	21.0	5.9	7.3	31.4
29.9	16.3	5.9	3.6	27.9
28.9	16.3	5.9	7.3	19.5
29.3	17.4	5.9	7.7	19.5
30.1	17.4	5.9	6.7	18.3
30.7	17.9	5.9	14.2	22.0
31.3	17.7	5.9	14.1	21.3
44.2	27.6	5.9	17.9	28.8
36.5	19.6	5.9	15.1	26.6
29.7	16.5	5.9	5.1	22.9
28.9	16.4	5.9	6.4	19.6
27.2	16.2	5.9	5.0	21.0
33.0	18.7	5.9	8.1	19.2
36.1	22.0	5.9	13.7	37.6
30.4	17.3	5.9	10.0	34.6
28.4	16.1	5.9	3.2	19.9
29.2	17.1	5.9	8.3	20.5
31.1	18.2	5.9	9.9	20.0
31.4	18.1	5.9	14.3	19.9
29.2	16.8	5.9	8.2	21.7
31.8	21.9	5.9	9.4	22.9
26.3	16.2	5.9	4.3	20.7
24.3	15.1	5.9	3.4	17.9
26.2	15.3	5.9	4.3	19.0
27.7	16.2	5.9	8.7	18.5
36.6	23.9	5.9	13.0	34.5
29.5	17.6	5.9	11.4	33.0
25.6	15.7	5.9	6.5	22.0
30.7	18.0	5.9	7.6	18.8
31.3	18.1	5.9	3.2	17.4
29.7	17.0	5.9	3.2	19.0
28.8	16.3	5.9	3.5	17.5
26.7	15.6	5.9	6.3	21.1
28.3	15.9	5.9	5.8	21.0
29.8	17.1	5.9	5.1	20.3
29.9	17.2	5.9	4.1	19.6
34.8	23.3	5.9	10.6	37.8
28.6	17.0	5.9	11.5	31.2
27.3	15.8	5.9	4.3	21.1
33.1	19.2	5.9	8.3	25.7

30.7	17.6	5.9	6.7	27.5
25.6	15.4	5.9	15.6	22.8
26.6	15.5	5.9	10.9	19.9
26.7	15.6	5.9	10.8	22.2
25.5	15.3	5.9	9.6	21.0
26.1	15.6	5.9	5.7	17.5
28.0	16.3	5.9	4.6	17.2
27.9	16.2	5.9	3.4	17.1
28.4	16.2	5.9	3.5	24.1
33.9	20.6	5.9	14.9	34.4
24.2	15.3	5.9	12.1	24.5
26.3	15.7	5.9	7.3	25.2
26.8	16.1	5.9	3.2	25.7
26.6	15.9	5.9	3.2	31.6
35.3	23.4	5.9	9.3	38.2
35.9	24.0	5.9	9.0	44.0
32.0	19.8	5.9	7.7	37.8
26.9	16.1	5.9	6.2	24.5
24.4	15.2	5.9	5.0	19.2
25.6	15.5	5.9	6.8	19.2
25.8	15.5	5.9	8.0	19.4
27.6	16.1	5.9	7.8	19.7
30.1	17.0	5.9	12.8	21.3
32.3	18.3	5.9	11.0	21.4
38.5	26.0	5.9	28.0	37.7
39.7	24.0	8.0	26.8	37.9
32.6	18.7	5.9	14.2	28.8
30.0	17.1	5.9	10.9	20.1
29.7	16.6	5.9	9.0	17.9
31.7	18.2	7.7	24.9	33.7
33.5	19.2	7.9	20.5	31.6
32.2	17.9	5.9	18.2	26.6
38.7	46.9	5.9	11.7	34.3
42.7	42.2	5.9	10.6	39.4
31.5	23.3	5.9	9.7	38.3
27.0	16.4	5.9	7.4	27.7
26.5	16.1	5.9	7.6	20.4
24.8	15.7	5.9	6.8	15.9
25.0	15.6	5.9	6.5	15.6
25.7	15.7	5.9	9.1	17.0
33.5	19.4	5.9	11.0	29.8
26.8	15.9	5.9	8.1	29.6
26.7	16.1	5.9	7.3	20.1
26.8	16.1	5.9	5.2	18.5
26.9	16.0	5.9	6.4	17.2
32.2	19.0	5.9	6.6	33.7
28.4	16.7	5.9	6.5	28.3
28.1	16.2	5.9	7.8	20.3

30.9	17.4	5.9	9.7	26.7
38.9	24.9	5.9	6.3	35.7
38.4	25.2	5.9	10.4	37.9
29.0	16.4	5.9	5.2	22.8
30.9	17.1	5.9	12.3	24.7
32.3	18.4	5.9	19.5	27.7
31.2	18.1	5.9	17.9	23.5
37.1	23.6	5.9	12.2	29.7
37.0	23.2	5.9	13.3	31.5
41.2	27.4	5.9	17.5	33.9
39.7	26.4	5.9	17.9	34.3
31.1	18.0	5.9	16.9	27.2
31.3	17.3	5.9	14.6	23.0
36.0	21.9	5.9	12.1	27.7
25.5	15.8	5.9	8.5	23.9
24.1	15.2	5.9	5.5	16.5
25.2	15.6	5.9	5.3	19.3
27.9	16.7	5.9	6.2	22.8
29.2	17.1	5.9	5.2	22.2
34.7	23.5	5.9	7.8	26.9
32.9	20.1	5.9	6.9	35.4
36.8	22.4	5.9	11.2	34.1
30.1	17.7	5.9	7.5	24.5
34.9	22.5	5.9	7.0	25.6
35.9	21.0	5.9	7.0	24.6
30.3	17.2	5.9	3.2	20.8

1/1 LASmax 63.0	1/1 LASmax 125	1/1 LASmax 250	1/1 LASmax 500	1/1 LASmax 1000
27.7	32.6	36.9	40.5	42.5
25.5	33.6	36.7	39.9	44.5
36.2	47.4	55.5	57.2	62.0
39.5	48.8	55.7	58.7	63.1
29.8	38.5	46.3	46.7	51.2
29.8	42.9	50.0	51.8	57.6
40.4	51.9	58.3	60.1	66.7
34.1	44.4	50.2	51.3	57.8
29.9	31.7	35.8	38.8	44.4
25.5	29.9	33.5	37.4	43.2
28.6	36.8	34.4	37.9	42.9
31.4	40.8	38.1	38.4	43.5
33.6	46.6	46.9	50.8	54.8
47.8	57.1	59.4	64.1	66.0
48.2	56.1	54.4	57.6	59.6
47.6	53.2	46.9	45.7	47.2
36.5	41.8	36.4	39.1	43.5
30.6	37.7	36.6	39.0	43.6
30.9	41.9	47.3	51.6	57.1
40.9	47.8	54.1	59.2	63.0
35.3	42.7	48.7	51.1	55.4
33.7	32.9	33.9	37.3	42.6
26.5	28.8	31.0	36.5	41.5
25.2	29.1	31.8	36.9	41.8
24.7	29.3	31.6	37.8	43.0
25.1	30.4	32.1	38.1	43.2
25.8	34.1	38.6	39.3	43.8
27.5	33.5	36.4	38.7	43.4
26.1	31.0	31.5	36.4	41.8
29.5	40.4	36.6	38.4	43.4
30.4	39.6	46.5	49.6	55.0
39.8	50.4	56.7	60.3	65.4
36.0	45.4	52.1	54.3	59.1
31.3	36.9	37.7	39.3	43.6
28.2	36.2	36.0	37.1	41.9
28.1	40.7	35.9	37.2	42.3
30.6	40.7	37.4	37.4	42.7
30.9	37.5	37.2	37.5	42.7
30.6	37.8	35.4	37.0	42.3
29.3	38.1	34.5	38.6	42.6
29.0	38.5	34.3	37.7	43.0
31.4	39.2	41.7	46.4	50.5
43.0	45.4	51.0	53.0	57.6
36.9	41.1	45.2	47.4	50.7
30.2	35.8	37.3	41.7	44.3
40.4	47.3	53.0	56.5	60.5

41.0	46.9	52.8	56.1	60.1
30.4	36.0	39.0	41.7	46.9
29.3	32.5	32.5	37.2	42.6
27.7	31.1	33.4	38.4	42.1
25.3	31.3	33.4	39.5	42.3
24.8	31.4	38.0	40.0	41.6
24.2	29.8	33.9	40.6	43.9
25.6	31.3	34.8	40.5	43.5
37.1	47.5	54.0	59.0	62.6
43.2	50.2	56.6	62.9	64.3
32.0	41.8	46.5	50.0	52.2
29.4	33.4	35.4	39.0	43.7
29.2	35.9	36.9	39.7	44.6
36.9	43.4	48.0	49.6	52.1
40.8	48.5	52.5	53.9	55.9
44.3	52.8	51.7	51.9	54.4
40.6	51.7	50.2	48.9	51.8
33.8	40.6	42.9	42.1	45.4
29.1	35.8	37.8	37.3	42.8
27.7	34.9	37.8	38.4	41.5
26.2	34.8	42.5	44.1	47.2
26.9	34.7	40.1	43.8	47.6
31.2	33.8	35.6	40.0	42.3
36.0	42.6	45.5	46.5	50.8
45.7	56.8	59.8	61.4	67.0
45.1	55.1	58.1	59.4	64.1
37.5	45.6	50.5	49.2	53.2
28.4	38.8	40.8	40.2	44.4
30.5	34.9	36.1	40.0	43.2
39.9	38.5	37.9	39.7	43.5
36.0	36.9	38.1	41.8	44.6
33.1	36.8	42.0	44.6	50.2
40.9	50.6	55.8	58.4	63.6
42.0	52.9	56.8	60.6	67.7
40.0	50.9	54.4	57.7	64.2
30.7	35.8	38.0	40.7	46.5
27.2	36.4	36.1	35.8	40.7
26.3	33.7	39.8	38.0	41.6
24.4	32.9	37.0	39.2	42.1
33.1	43.4	48.2	49.2	55.1
38.6	49.5	56.7	60.4	64.4
36.0	44.6	51.5	53.9	58.0
27.6	37.2	36.9	38.5	44.0
25.5	33.5	33.7	37.1	44.2
32.7	45.9	52.5	53.8	61.1
39.6	50.2	55.6	59.4	64.2
31.0	45.3	46.4	47.5	53.8
29.3	43.3	38.6	39.3	43.7

38.8	48.7	50.4	45.3	47.1
52.5	69.5	65.8	61.7	63.3
50.8	67.8	65.8	61.6	63.4
36.6	53.4	48.8	47.9	50.7
29.2	40.9	38.9	39.7	45.2
36.4	46.5	46.4	41.1	44.2
35.9	46.1	45.6	43.9	50.8
45.0	55.8	65.0	64.9	70.9
47.0	55.0	61.8	62.4	68.1
56.9	60.2	64.0	67.3	71.0
48.0	59.1	61.8	65.5	69.1
39.0	49.5	54.6	57.0	60.6
36.7	45.6	51.3	55.8	59.1
42.2	48.3	56.3	59.7	63.1
30.8	38.5	45.8	49.9	51.3
25.3	30.3	35.4	39.1	43.3
25.7	29.4	32.3	37.4	41.8
28.1	31.2	33.7	37.6	42.3
32.9	42.9	46.3	50.4	55.1
39.2	47.2	51.9	56.0	59.3
38.7	44.8	53.4	53.1	58.6
45.3	49.8	58.2	61.9	65.7
39.1	43.8	51.8	54.7	58.1
41.7	49.3	55.4	60.4	63.7
38.5	48.9	54.5	59.5	63.1
31.8	42.3	47.3	50.1	54.9

1/1 LASmax 2000	1/1 LASmax 4000	1/1 LASmax 8000	1/1 LASmax 16000	1/1 LASmin 8.0
42.9	42.3	32.7	17.6	5.9
48.3	49.2	37.9	19.5	5.9
55.0	47.3	36.4	19.8	5.9
55.8	46.0	34.6	20.1	5.9
46.5	43.3	39.4	24.4	5.9
53.2	44.7	40.9	23.5	5.9
59.7	48.7	38.2	24.0	5.9
52.3	42.8	31.7	17.6	5.9
42.1	38.2	29.3	16.9	5.9
40.6	37.3	30.5	18.6	5.9
39.7	37.3	30.7	17.9	5.9
41.0	39.0	31.7	18.6	5.9
48.3	43.0	33.8	18.9	5.9
62.2	58.6	47.5	31.2	5.9
55.6	52.9	41.7	23.8	5.9
45.9	46.1	30.7	17.0	5.9
40.9	39.8	30.1	17.2	5.9
39.6	41.2	29.7	17.2	5.9
52.2	44.7	36.4	21.8	5.9
57.0	47.4	37.8	23.8	5.9
49.7	41.4	32.2	18.7	5.9
39.6	37.3	28.7	16.2	5.9
40.5	38.0	32.3	19.1	5.9
40.2	37.9	32.3	19.2	5.9
39.4	38.1	31.8	18.4	5.9
38.9	36.9	30.8	17.8	5.9
39.3	36.8	36.5	26.7	5.9
39.5	35.3	28.7	18.4	5.9
37.7	35.2	26.6	15.4	5.9
39.9	35.5	26.8	15.5	5.9
48.5	37.6	29.4	17.1	5.9
59.8	49.3	39.5	27.4	5.9
53.4	43.8	34.2	21.4	5.9
39.1	34.1	26.0	16.2	5.9
39.4	38.7	33.5	19.9	5.9
40.8	38.7	33.1	19.6	5.9
40.1	38.8	30.1	17.6	5.9
40.2	38.7	30.1	16.9	5.9
38.1	35.1	27.5	15.9	5.9
38.4	36.2	31.4	16.4	5.9
39.8	37.7	30.7	18.3	5.9
46.5	39.2	31.4	18.3	5.9
50.9	45.2	37.2	26.4	5.9
45.3	39.2	31.3	19.6	5.9
40.7	36.8	28.6	16.1	5.9
54.0	44.9	35.3	21.5	5.9

53.4	44.4	34.7	20.7	5.9
41.2	34.5	26.4	15.8	5.9
38.8	35.4	27.1	15.8	5.9
37.8	35.1	27.1	15.8	5.9
37.4	34.5	26.8	15.7	5.9
37.4	34.7	27.8	16.3	5.9
37.8	34.9	28.5	16.6	5.9
38.4	35.6	28.4	16.4	5.9
52.7	43.3	32.4	18.1	5.9
54.8	47.4	37.2	23.7	5.9
43.5	36.1	26.8	16.0	5.9
41.7	37.8	27.6	16.3	5.9
40.4	36.5	27.6	16.4	5.9
45.7	37.3	27.9	16.6	5.9
51.7	48.3	37.3	25.3	5.9
50.1	46.6	37.1	25.2	5.9
49.1	45.1	35.5	23.5	5.9
40.5	35.6	29.6	17.5	5.9
37.6	32.7	25.2	15.5	5.9
37.3	33.6	26.3	15.8	5.9
46.4	37.9	28.3	16.3	5.9
42.4	38.7	28.2	16.3	5.9
40.7	39.6	32.8	17.4	5.9
45.6	41.9	34.0	20.0	5.9
59.3	50.3	41.4	30.4	5.9
57.4	49.0	42.4	26.6	5.9
47.9	44.0	35.2	20.2	5.9
40.9	41.7	30.8	17.7	5.9
40.3	40.0	30.4	17.0	5.9
41.9	40.9	33.3	19.1	5.9
43.3	43.5	33.9	19.9	5.9
44.2	43.4	33.6	18.7	5.9
56.5	46.1	46.9	53.5	5.9
58.5	49.7	47.5	47.8	5.9
56.7	47.3	35.8	29.3	5.9
41.0	35.9	28.6	17.2	5.9
37.0	35.2	27.2	16.4	5.9
37.3	34.8	25.8	15.9	5.9
37.3	32.5	25.4	15.8	5.9
47.7	37.6	27.2	16.1	5.9
56.7	47.0	36.2	21.9	5.9
51.1	41.2	30.5	17.2	5.9
38.7	34.4	27.1	16.3	5.9
38.6	35.5	27.6	16.5	5.9
54.0	43.0	31.1	18.2	5.9
56.4	46.4	34.1	20.6	5.9
47.2	37.6	29.3	17.1	5.9
39.8	38.3	29.5	16.7	5.9

44.6	41.2	31.8	17.9	5.9
58.3	52.8	44.2	30.7	5.9
57.9	52.3	43.8	30.3	5.9
44.1	39.4	30.0	17.5	5.9
42.1	41.3	31.7	17.8	5.9
42.2	40.8	33.0	19.1	5.9
43.9	40.2	31.8	18.8	5.9
62.0	52.0	40.6	27.2	5.9
60.0	50.3	39.6	26.9	5.9
63.1	54.1	44.1	31.3	5.9
61.6	52.4	42.2	29.1	5.9
53.2	45.1	34.3	20.3	5.9
55.7	47.0	36.7	20.6	5.9
57.7	49.3	39.4	25.0	5.9
46.7	38.7	28.6	16.8	5.9
46.5	38.0	27.3	15.4	5.9
41.3	33.9	25.8	15.8	5.9
39.6	35.5	29.4	17.4	5.9
49.3	41.5	31.0	17.9	5.9
53.3	45.9	36.8	26.0	5.9
53.4	44.3	35.9	22.7	5.9
58.3	49.2	38.6	24.9	5.9
51.9	41.8	31.9	18.8	5.9
56.6	47.3	37.3	25.5	5.9
56.2	47.4	37.9	22.7	5.9
48.5	40.6	32.2	18.1	5.9

1/1 LASmin 16.0	1/1 LASmin 31.5	1/1 LASmin 63.0	1/1 LASmin 125	1/1 LASmin 250
3.2	14.5	22.2	28.5	33.3
3.2	14.6	22.0	28.2	31.8
3.2	15.6	25.2	33.5	36.7
7.9	19.5	29.7	38.6	46.4
3.2	16.9	26.5	31.8	35.4
3.2	15.6	24.8	32.1	35.5
3.2	16.1	29.4	43.0	50.0
3.2	16.5	26.9	31.8	35.2
3.2	14.2	23.6	27.5	32.0
3.2	16.5	22.8	27.6	31.6
3.2	15.4	25.3	29.2	32.7
3.2	15.2	28.6	34.9	34.4
3.2	16.7	28.0	40.7	37.9
3.6	17.2	33.1	43.4	46.9
5.2	22.4	41.4	49.4	46.9
3.2	17.6	35.7	41.8	36.4
3.2	15.8	29.8	36.0	33.7
3.2	17.6	28.8	34.5	33.0
3.2	17.4	27.3	33.3	36.6
3.2	18.6	30.8	41.9	47.3
3.2	20.0	29.0	32.8	34.0
3.2	14.8	26.6	27.6	30.6
3.2	15.1	23.5	27.1	30.0
3.6	15.8	21.8	27.3	30.1
3.5	15.5	22.7	26.7	30.1
4.4	16.1	22.0	26.2	30.3
4.3	20.7	24.2	30.3	32.1
3.2	15.3	25.9	30.1	30.8
3.2	15.1	24.2	28.7	30.1
3.2	16.1	24.6	31.1	31.5
3.2	15.5	25.0	32.7	34.6
5.3	18.6	30.5	39.5	46.5
3.2	19.4	29.9	35.4	37.8
3.2	18.7	26.4	34.9	33.2
3.2	15.1	25.7	33.9	33.0
3.2	15.2	25.4	35.4	34.2
3.2	14.9	26.9	37.4	35.3
3.2	14.3	28.5	36.1	34.8
3.2	17.2	28.1	36.6	32.4
3.2	18.4	27.4	36.2	32.4
3.2	16.6	26.9	37.1	33.0
3.2	18.0	27.2	36.3	33.7
3.2	19.3	30.8	39.2	41.9
4.3	20.6	28.7	34.2	35.5
3.2	17.9	28.4	33.0	32.9
3.2	18.0	29.0	34.8	37.2

3.6	20.4	29.9	36.1	39.1
4.9	19.4	28.6	30.5	31.1
6.6	17.6	26.6	30.3	30.7
5.7	18.1	25.4	29.4	31.0
3.6	16.7	23.9	28.7	32.0
3.2	14.9	23.2	29.0	32.5
3.2	14.8	22.3	28.4	32.0
3.2	13.6	22.3	28.1	31.6
3.2	14.1	24.7	31.1	34.7
3.2	23.9	32.0	41.7	46.5
4.5	17.6	26.0	33.4	34.6
3.2	17.3	25.5	30.9	33.2
3.2	21.1	26.7	32.1	34.6
3.2	22.6	29.1	35.8	36.8
3.2	31.5	36.3	43.4	47.9
6.8	37.8	36.8	44.0	46.2
3.2	23.6	30.9	40.7	42.9
3.2	18.6	28.8	35.0	36.4
3.2	17.1	26.5	32.6	34.6
3.2	16.0	25.2	31.4	33.0
4.5	16.0	24.3	31.1	33.8
4.1	16.0	23.9	30.1	33.3
5.0	18.5	26.2	31.1	32.9
5.2	17.9	27.9	33.6	35.6
8.0	19.7	36.0	42.7	45.7
14.2	28.9	36.5	44.7	50.5
4.6	19.9	28.5	38.8	40.9
5.1	16.9	24.7	33.0	34.1
3.7	14.3	25.3	32.7	33.9
3.7	15.8	28.2	35.0	34.0
15.7	23.8	31.5	34.6	36.8
11.5	21.0	29.3	33.3	36.5
7.6	20.1	28.7	36.8	42.0
8.1	31.2	35.8	45.4	50.2
6.7	27.7	30.4	35.8	38.1
4.1	17.1	24.1	28.5	31.2
5.2	15.0	24.2	31.0	31.5
5.2	13.2	23.7	29.9	34.0
4.3	13.9	21.4	29.3	33.9
4.6	14.2	24.3	30.6	34.5
5.2	16.5	33.2	43.0	48.2
4.4	17.8	25.8	33.7	36.9
3.2	14.0	23.9	32.1	31.4
3.2	13.7	22.5	30.3	31.9
3.2	13.7	22.5	33.3	33.6
3.4	16.8	31.0	45.3	46.4
3.2	20.2	26.1	41.1	38.0
3.2	15.7	26.0	40.1	36.5

3.2	16.8	27.3	40.8	36.2
3.2	23.6	36.9	48.2	50.0
4.2	22.9	36.6	53.4	48.8
3.2	16.5	26.8	40.9	38.6
3.6	17.0	25.2	36.0	36.2
12.5	23.1	28.9	36.7	36.8
6.6	19.1	33.1	41.6	42.8
5.1	19.4	33.7	41.4	44.7
9.7	26.1	39.6	48.3	53.5
8.5	25.7	47.0	52.3	55.4
12.0	27.2	38.8	49.5	54.6
7.6	22.0	29.3	36.2	40.5
7.9	19.5	29.1	34.8	39.2
6.4	20.4	30.8	38.4	45.8
3.3	16.1	22.8	30.3	35.4
3.4	14.1	23.0	27.9	31.2
3.2	14.3	23.1	28.4	31.0
3.2	18.6	23.9	29.0	32.1
3.2	17.3	25.1	31.3	33.7
3.7	21.3	33.0	41.0	45.6
3.2	19.8	31.8	40.1	44.9
4.8	24.5	37.6	43.8	51.8
3.2	18.2	29.9	38.3	42.3
3.2	17.2	30.2	39.9	44.2
3.2	20.4	31.7	42.3	47.4
3.2	15.8	27.8	36.3	38.2

1/1 LASmin 500	1/1 LASmin 1000	1/1 LASmin 2000	1/1 LASmin 4000	1/1 LASmin 8000
37.2	41.4	41.3	39.6	31.0
36.8	41.1	39.5	36.5	27.9
39.9	44.5	44.2	39.6	29.6
46.5	51.3	46.5	39.3	29.2
38.0	43.7	40.5	38.0	27.9
38.0	45.1	40.6	37.5	31.7
51.3	57.7	52.3	40.5	31.7
38.8	44.4	42.1	37.9	28.6
37.1	42.6	39.6	36.0	28.2
36.6	42.2	39.0	35.9	28.5
36.8	42.3	39.1	36.6	29.4
36.9	42.5	39.4	36.9	29.9
38.0	42.8	40.3	37.9	30.5
50.8	54.8	48.3	43.0	33.8
45.7	47.2	44.5	40.7	30.7
38.7	43.3	40.9	39.8	29.0
37.3	42.9	38.6	35.2	26.7
38.4	42.4	38.0	35.4	25.3
38.8	43.3	39.6	36.5	29.7
51.1	55.4	49.8	41.4	32.2
37.3	42.6	39.6	37.3	28.7
35.2	41.0	37.8	35.4	27.8
35.0	40.4	37.0	34.4	27.4
36.2	41.0	38.3	36.4	30.2
36.3	41.5	38.7	37.0	30.8
36.9	42.1	38.5	35.1	28.0
37.0	42.8	38.5	34.6	27.0
36.0	41.6	36.9	31.4	24.2
35.5	40.0	36.3	30.6	23.1
36.2	40.4	37.8	33.8	25.1
38.4	43.2	38.3	33.7	25.1
49.6	55.0	48.5	37.6	29.4
39.3	43.7	39.1	33.6	25.5
34.9	39.9	36.4	32.6	25.2
34.6	39.9	36.3	32.5	25.4
36.4	41.4	38.8	36.5	29.3
36.8	42.2	39.0	36.8	29.2
36.5	41.7	37.7	35.0	27.3
36.1	41.7	37.6	34.2	25.7
36.7	41.9	38.0	34.0	25.7
36.4	41.8	38.3	35.9	29.1
36.6	42.1	39.0	36.5	29.3
46.3	50.6	45.4	39.2	31.3
38.6	42.6	38.1	34.2	26.2
37.5	41.8	38.0	34.2	26.2
41.7	44.4	40.8	36.8	28.6

41.7	47.0	41.2	34.5	26.4
36.0	42.1	37.7	33.4	25.2
36.2	41.7	37.8	34.2	25.4
36.1	41.1	37.1	34.2	26.3
38.2	41.4	36.3	31.9	23.7
37.8	41.0	36.3	31.8	23.7
37.3	41.5	37.3	34.0	27.6
37.4	42.3	37.6	34.5	27.4
39.6	43.0	38.1	34.4	27.2
50.0	52.3	43.5	36.1	26.8
39.0	43.1	37.0	30.9	22.9
37.4	42.5	37.2	31.3	23.1
37.3	42.4	38.0	33.3	25.9
39.6	44.6	38.8	33.5	25.8
49.6	52.1	45.7	37.3	27.9
47.7	50.3	47.5	43.9	34.2
42.1	45.5	40.5	35.6	29.2
36.8	42.5	37.6	31.1	23.5
36.1	40.7	36.5	31.0	23.2
36.8	40.5	36.1	31.9	24.3
38.4	40.4	36.0	31.6	23.8
39.1	42.2	39.5	34.7	27.0
38.0	41.2	38.9	36.1	28.0
37.9	42.3	39.5	38.6	31.6
46.5	50.8	45.6	41.7	34.0
49.2	53.3	47.9	44.0	35.2
40.2	44.4	40.9	39.4	30.8
37.7	41.8	40.0	38.5	29.3
38.4	41.8	39.9	38.4	29.4
38.4	42.8	40.2	39.0	30.4
39.2	43.3	41.8	40.9	33.3
40.4	44.4	42.2	39.9	29.9
44.6	50.2	44.2	40.1	29.8
51.3	57.1	51.5	41.4	35.8
40.8	46.6	41.0	35.8	28.6
35.3	40.2	36.7	33.1	25.9
34.6	39.8	35.8	31.9	25.5
35.8	40.7	36.1	31.4	23.9
35.9	41.0	36.3	31.4	24.7
36.0	42.2	37.1	32.4	24.8
49.3	55.2	47.8	37.7	27.2
38.5	44.0	38.7	32.9	25.0
35.4	41.7	37.0	32.9	25.1
36.1	41.9	36.9	33.3	25.5
36.6	42.6	37.3	33.5	25.6
47.5	53.8	47.3	37.6	28.2
38.9	43.7	39.5	34.9	27.4
37.7	41.8	38.6	35.2	27.3

37.8	42.0	39.8	38.3	29.5
45.2	47.1	44.5	41.0	31.8
47.9	50.7	44.2	38.8	29.6
39.4	45.1	41.2	37.6	28.0
37.4	42.4	40.7	39.4	29.9
37.8	42.6	40.7	39.8	31.0
40.5	43.2	40.9	37.6	30.5
44.0	50.8	43.9	37.9	30.1
55.6	61.0	55.0	44.4	33.3
57.3	63.5	57.4	45.8	34.5
57.1	60.7	53.2	45.2	34.3
42.1	46.6	42.5	38.1	29.8
41.2	45.9	42.4	38.0	29.4
50.0	51.3	46.7	38.7	28.7
39.1	43.2	38.0	31.7	23.0
36.3	41.4	36.7	30.9	22.8
36.2	41.3	37.4	32.5	24.3
36.2	41.4	37.6	32.7	25.4
37.6	42.3	38.0	35.1	28.1
47.5	52.4	47.5	40.1	30.3
46.4	52.0	46.3	38.4	28.9
53.1	58.1	51.9	41.8	31.9
44.7	48.2	42.6	36.3	29.5
48.2	51.9	46.5	38.0	30.9
50.2	55.0	48.6	40.6	32.3
40.0	44.4	40.2	36.8	29.4

1/1 LASmin 16000	1/3 LASeq 6.3	1/3 LASeq 8.0	1/3 LASeq 10.0	1/3 LASeq 12.5
16.7	1.9	0.9	0.5	1.7
15.8	1.9	0.9	0.3	-0.8
16.6	1.9	0.9	0.3	1.3
16.1	1.9	0.9	0.8	3.1
15.6	1.9	0.9	0.3	-0.6
18.2	1.9	0.9	0.3	-0.8
17.6	1.9	0.9	0.3	-0.8
15.7	1.9	0.9	0.3	-0.8
16.2	1.9	0.9	0.3	-0.8
16.8	1.9	0.9	0.3	-0.4
17.1	1.9	0.9	0.3	-0.8
17.3	1.9	0.9	0.3	-0.8
17.3	1.9	0.9	0.3	2.4
18.9	1.9	0.9	0.3	2.1
17.0	1.9	0.9	1.1	3.8
16.1	1.9	0.9	0.3	-0.8
15.7	1.9	0.9	0.3	-0.8
15.5	1.9	0.9	0.3	-0.8
17.1	1.9	0.9	0.3	-0.8
18.5	1.9	0.9	0.3	-0.8
16.1	1.9	0.9	0.3	-0.8
16.0	1.9	0.9	0.3	-0.8
16.0	1.9	0.9	0.3	-0.8
17.6	1.9	0.9	0.3	-0.8
17.8	1.9	0.9	0.3	0.2
16.3	1.9	0.9	0.3	-0.4
15.9	1.9	0.9	0.3	-0.8
15.1	1.9	0.9	0.3	-0.8
14.9	1.9	0.9	0.3	-0.8
15.1	1.9	0.9	0.3	-0.8
15.1	1.9	0.9	0.3	-0.8
17.0	1.9	0.9	0.3	-0.6
15.8	1.9	0.9	0.3	0.0
15.5	1.9	0.9	0.3	-0.8
15.5	1.9	0.9	0.3	-0.8
16.9	1.9	0.9	0.3	-0.8
16.5	1.9	0.9	0.3	-0.8
15.8	1.9	0.9	0.3	-0.8
15.3	1.9	0.9	0.3	-0.8
15.3	1.9	0.9	0.3	-0.8
16.4	1.9	0.9	0.3	-0.8
16.9	1.9	0.9	0.3	-0.8
18.3	1.9	0.9	0.3	-0.8
15.5	1.9	0.9	0.3	-0.8
15.5	1.9	0.9	0.3	-0.8
16.1	1.9	0.9	0.3	-0.8

15.8	1.9	0.9	0.3	-0.8
15.2	1.9	0.9	0.3	-0.1
15.2	1.9	0.9	0.3	0.8
15.5	1.9	0.9	0.3	-0.2
14.9	1.9	0.9	0.3	-0.8
14.9	1.9	0.9	0.3	-0.8
16.1	1.9	0.9	0.3	-0.8
16.0	1.9	0.9	0.3	-0.8
15.8	1.9	0.9	0.3	-0.8
16.0	1.9	0.9	0.3	-0.5
15.1	1.9	0.9	0.3	0.4
15.1	1.9	0.9	0.3	-0.8
15.8	1.9	0.9	0.3	-0.8
15.6	1.9	0.9	0.3	-0.8
16.6	1.9	0.9	0.3	-0.8
22.8	1.9	0.9	0.3	-0.8
17.4	1.9	0.9	0.3	-0.8
15.2	1.9	0.9	0.3	-0.8
15.1	1.9	0.9	0.3	-0.8
15.2	1.9	0.9	0.3	-0.8
15.1	1.9	0.9	0.3	-0.8
15.8	1.9	0.9	0.3	-0.8
16.1	1.9	0.9	0.3	-0.6
17.2	1.9	0.9	0.3	-0.8
20.1	1.9	0.9	0.3	1.4
20.2	1.9	1.4	4.7	7.3
17.7	1.9	0.9	0.8	1.0
16.7	1.9	0.9	0.3	-0.8
16.4	1.9	0.9	0.3	-0.8
17.0	1.9	0.9	0.5	4.0
18.6	1.9	0.9	3.7	10.5
16.7	1.9	0.9	0.9	5.1
16.7	1.9	0.9	0.3	-0.1
29.4	1.9	0.9	0.3	-0.6
17.2	1.9	0.9	0.3	-0.8
15.9	1.9	0.9	0.3	-0.8
15.7	1.9	0.9	0.3	-0.8
15.5	1.9	0.9	0.3	-0.8
15.5	1.9	0.9	0.3	-0.8
15.5	1.9	0.9	0.3	-0.8
16.1	1.9	0.9	0.3	-0.8
15.5	1.9	0.9	0.3	-0.7
15.6	1.9	0.9	0.3	-0.8
15.6	1.9	0.9	0.3	-0.8
15.6	1.9	0.9	0.3	-0.8
16.7	1.9	0.9	0.3	-0.8
16.3	1.9	0.9	0.3	-0.8
15.8	1.9	0.9	0.3	-0.8

16.5	1.9	0.9	0.3	-0.3
17.9	1.9	0.9	0.3	-0.8
17.5	1.9	0.9	0.3	-0.6
16.1	1.9	0.9	0.3	-0.8
16.3	1.9	0.9	0.3	-0.8
17.6	1.9	0.9	0.4	4.6
17.4	1.9	0.9	0.4	3.3
17.4	1.9	0.9	0.3	-0.8
18.8	1.9	0.9	0.3	-0.8
19.4	1.9	0.9	0.3	-0.8
20.3	1.9	0.9	0.3	2.5
17.2	1.9	0.9	0.6	2.7
16.7	1.9	0.9	2.2	4.7
16.8	1.9	0.9	0.3	-0.7
15.2	1.9	0.9	0.3	-0.7
15.1	1.9	0.9	0.3	-0.8
15.3	1.9	0.9	0.3	-0.8
15.6	1.9	0.9	0.3	-0.8
16.5	1.9	0.9	0.3	-0.8
17.9	1.9	0.9	0.3	-0.8
17.1	1.9	0.9	0.3	-0.8
18.8	1.9	0.9	0.3	-0.8
17.2	1.9	0.9	0.3	-0.8
17.9	1.9	0.9	0.3	-0.8
18.1	1.9	0.9	0.3	-0.8
16.9	1.9	0.9	0.3	-0.8

1/3 LASeq 16.0	1/3 LASeq 20.0	1/3 LASeq 25.0	1/3 LASeq 31.5	1/3 LASeq 40.0	1/3 LASeq 50.0
5.2	3.5	8.7	11.4	15.0	18.2
-1.2	2.8	7.5	10.0	13.3	15.1
1.7	6.9	9.9	13.8	15.2	19.3
6.2	11.3	12.8	16.1	22.4	26.4
0.5	4.2	7.8	11.1	18.5	18.1
-1.5	5.3	9.5	12.5	15.8	17.0
-1.0	3.8	12.1	23.4	25.9	22.5
-1.3	0.0	11.1	21.1	19.3	19.4
-1.6	0.2	8.4	10.6	14.1	18.2
0.0	3.2	10.1	11.4	15.4	17.8
0.2	1.3	7.1	11.3	14.5	17.3
-1.5	4.2	11.1	12.2	14.8	18.5
3.8	9.2	13.7	12.6	15.6	21.4
9.1	11.2	14.6	18.4	24.5	32.0
7.2	8.9	13.5	17.1	23.5	33.7
-1.1	2.3	10.0	12.1	20.1	24.3
-1.2	3.1	9.1	10.2	16.2	23.6
-1.6	2.9	7.3	11.7	18.4	16.2
-1.3	3.2	6.4	9.7	17.6	18.3
-1.3	9.1	11.1	16.3	32.0	27.8
-1.2	5.9	9.6	20.7	28.6	23.8
-1.6	-1.3	7.0	10.6	14.9	17.0
-0.4	2.0	8.5	11.8	14.6	16.6
0.7	4.8	10.0	12.4	15.0	16.0
5.8	6.6	9.9	13.7	14.9	16.0
1.2	4.3	9.8	12.2	15.9	17.8
1.0	6.3	9.3	12.6	20.7	17.5
-1.3	0.4	6.6	9.0	15.9	19.1
-1.6	0.6	7.8	10.0	13.2	20.3
-1.6	0.0	8.7	12.4	14.5	17.7
-0.8	3.8	7.4	13.6	13.5	19.1
-0.2	7.6	13.2	17.9	28.6	31.5
1.5	8.0	12.2	19.7	26.9	26.1
-0.8	2.5	6.3	12.6	19.6	17.4
-0.4	3.3	6.4	11.3	14.6	16.2
-1.6	-0.2	6.5	10.0	14.3	15.9
-1.6	-0.3	5.6	10.1	15.1	17.2
-1.6	0.5	5.4	10.6	13.8	17.9
-1.5	2.6	7.4	11.6	18.5	17.6
-1.6	2.1	6.9	11.1	19.0	19.2
-1.5	1.3	7.4	12.4	17.1	17.9
-1.6	1.1	7.3	11.9	17.5	22.1
-1.1	6.0	10.9	16.1	33.0	29.3
3.4	6.8	10.9	14.8	25.7	21.6
-1.5	1.0	7.8	12.7	18.5	19.4
-0.7	2.8	8.4	12.9	19.7	21.8

0.1	3.8	9.2	15.5	23.6	23.7
5.9	10.6	14.2	16.3	18.4	21.0
4.4	7.6	10.8	14.4	17.4	19.4
1.7	6.7	9.0	14.6	18.1	19.6
2.2	6.3	9.9	13.6	16.2	18.0
-1.1	2.7	6.6	11.5	14.3	17.0
-0.1	0.8	7.6	10.6	13.6	15.0
-1.6	0.6	5.6	11.9	12.6	15.4
-1.6	0.8	6.8	12.2	15.5	19.2
1.5	10.9	19.3	24.8	29.2	29.4
2.4	7.0	11.1	15.5	18.9	19.6
-0.3	3.1	5.9	12.6	21.3	17.7
-1.6	0.2	5.9	12.1	23.3	18.0
-1.6	0.4	6.6	21.2	24.1	25.1
-0.9	5.8	19.7	33.0	32.9	31.1
0.6	7.1	20.7	32.1	40.7	35.0
-0.2	4.8	15.0	21.1	31.9	31.4
-1.6	2.9	10.3	12.1	21.8	21.0
-1.5	1.7	9.7	10.0	16.7	19.9
-1.3	4.2	9.6	9.9	16.7	18.0
-1.1	4.9	10.1	11.3	15.7	18.3
-1.1	4.7	10.3	11.6	15.0	17.2
4.4	7.1	10.7	16.3	16.1	19.0
1.3	7.2	10.0	14.5	17.6	19.1
7.7	16.6	21.3	25.0	28.9	31.8
16.8	22.0	24.6	26.5	32.6	32.5
6.0	8.8	14.2	17.5	23.2	23.6
-0.9	6.3	10.2	12.9	15.7	18.5
-0.3	5.5	9.0	10.9	13.0	17.0
11.5	17.2	20.8	23.4	25.2	27.7
14.4	17.2	21.5	23.2	25.3	28.0
10.1	14.0	17.6	18.2	20.1	22.2
4.3	8.7	11.2	19.9	23.3	22.9
3.0	8.4	12.9	29.2	33.7	30.1
1.4	7.0	11.6	18.1	34.6	27.9
-1.0	5.4	7.3	12.2	23.0	18.3
-1.3	6.5	10.5	12.0	15.2	19.1
-1.6	5.5	7.0	7.0	13.0	19.3
-1.2	4.7	5.9	8.6	12.4	18.7
0.5	6.0	6.6	9.9	13.5	19.1
1.1	7.6	14.0	15.4	21.1	26.0
-0.1	5.2	15.5	12.9	23.6	23.4
-0.3	4.8	6.1	8.5	16.6	21.4
-1.6	3.2	6.4	9.6	14.2	17.6
-1.6	4.3	7.2	8.8	13.8	16.8
-1.6	4.7	9.6	19.5	31.0	24.1
-1.6	3.8	9.1	18.0	23.3	21.0
-1.6	3.4	7.7	14.6	14.1	21.0

1.6	4.3	8.9	10.9	19.4	23.5
-1.6	2.7	9.3	11.4	30.9	29.3
1.3	5.6	13.2	30.9	29.9	29.5
-1.6	3.5	8.0	15.1	17.3	20.2
-0.3	4.8	10.6	15.0	15.7	18.1
9.9	15.3	21.7	20.6	21.8	25.9
9.6	12.5	15.0	14.6	19.2	27.0
-1.2	6.9	15.0	19.9	21.8	35.1
5.2	10.9	18.8	21.0	28.0	35.5
2.3	11.9	18.4	24.1	29.3	35.7
8.0	14.2	19.6	25.5	30.6	36.0
7.1	11.5	15.6	16.2	23.5	27.5
7.4	11.1	14.0	16.2	18.8	24.4
2.6	9.2	12.4	19.3	24.5	31.9
-0.5	5.7	9.0	11.9	18.6	23.4
-1.6	4.0	7.1	9.2	13.5	20.0
-1.6	4.2	8.1	13.2	13.8	20.7
-1.6	4.0	12.8	15.3	18.9	20.1
-1.5	1.3	13.0	13.2	17.9	20.9
-1.6	5.3	12.9	17.2	22.9	30.2
-1.6	1.8	12.9	29.4	20.1	24.8
-0.9	7.9	17.1	28.2	25.1	31.8
-1.5	3.9	12.0	17.3	18.3	21.8
-1.6	2.4	10.3	14.0	20.8	24.9
-1.5	3.9	11.3	15.2	22.3	25.5
-1.6	1.2	8.6	12.5	16.4	20.3

1/3 LASeq 63.0	1/3 LASeq 80.0	1/3 LASeq 100	1/3 LASeq 125	1/3 LASeq 160	1/3 LASeq 200
20.1	22.1	23.3	24.7	26.6	29.1
18.2	21.5	23.0	26.4	27.9	28.8
25.5	27.4	31.7	33.7	39.4	39.9
28.4	34.6	37.1	39.9	43.9	46.6
23.0	26.1	27.0	30.6	31.1	35.4
21.3	25.5	31.4	32.2	34.1	34.5
29.1	35.5	39.1	41.9	46.9	48.1
23.4	28.8	30.2	34.6	36.5	38.3
18.2	25.2	22.2	25.5	25.7	27.1
17.6	21.5	22.0	24.3	25.3	27.0
21.7	24.5	27.3	26.8	31.6	28.5
21.9	29.1	28.0	34.1	32.9	31.3
24.0	30.3	36.3	36.8	42.2	35.4
39.2	41.4	45.9	50.0	49.3	50.9
41.4	42.0	47.4	50.7	49.3	46.1
42.6	35.8	44.3	43.3	43.1	37.2
28.2	31.7	35.0	34.7	30.0	28.7
24.5	27.4	31.5	32.9	29.3	28.3
24.9	25.9	31.5	31.9	31.4	36.2
30.8	36.2	38.3	38.7	43.1	46.4
26.6	30.1	30.0	33.0	34.9	38.1
23.0	31.4	22.9	23.8	26.3	26.2
19.1	22.8	20.9	24.4	23.1	24.3
18.1	19.7	21.8	25.6	22.2	23.9
19.7	19.7	21.4	25.6	22.5	23.8
18.2	20.2	22.0	24.8	23.3	25.4
19.4	22.6	25.6	29.2	28.3	29.8
22.8	23.0	24.9	29.3	26.2	27.6
20.1	20.6	24.6	25.3	24.0	25.8
20.0	25.4	32.3	34.8	31.7	28.7
18.6	24.5	29.3	30.8	31.6	33.0
30.1	36.5	41.7	40.9	44.1	45.0
25.1	31.7	35.7	36.0	37.1	39.3
20.5	28.4	29.0	31.5	32.2	30.0
19.6	25.5	28.1	31.4	30.4	27.0
20.3	25.3	32.1	32.8	30.3	28.2
22.1	28.0	35.5	34.8	31.0	32.1
25.3	27.4	32.7	33.3	29.2	30.8
23.2	27.7	34.3	32.5	29.4	29.1
21.0	26.7	33.5	33.0	30.5	28.5
22.0	26.2	32.4	34.6	31.8	27.7
22.9	26.5	29.9	33.9	33.3	30.7
29.3	38.7	36.0	38.8	40.1	41.3
23.7	31.9	29.9	34.2	34.7	34.5
21.2	27.8	28.4	29.9	30.2	28.9
24.9	33.4	33.2	35.9	39.9	41.2

27.9	35.6	34.1	36.7	41.2	43.0
25.3	26.8	26.5	27.3	30.4	30.3
23.9	26.0	26.3	26.2	27.9	26.7
22.2	23.5	23.2	25.2	26.5	26.9
19.9	21.4	22.9	25.1	26.7	26.0
18.6	20.9	22.2	24.9	27.8	24.8
18.5	20.6	22.0	24.5	25.2	25.7
18.0	22.3	22.8	25.0	25.0	25.5
24.4	29.5	31.5	35.8	37.9	40.3
33.0	37.9	39.0	41.3	46.2	48.6
22.3	26.6	30.1	32.1	34.9	37.0
21.3	25.4	26.2	28.5	27.6	28.5
22.5	26.6	28.5	29.6	28.8	30.2
24.7	31.0	32.7	35.1	35.8	37.5
32.9	37.0	37.9	40.6	45.6	45.4
36.6	36.2	41.7	45.0	42.7	43.8
32.6	31.8	40.6	44.2	41.0	42.2
28.4	28.1	30.0	32.3	34.9	36.6
22.9	24.5	28.0	28.1	31.4	33.7
22.4	22.8	26.8	26.4	30.3	32.4
19.7	22.4	26.2	26.3	30.4	33.9
19.9	22.8	24.2	25.7	29.9	29.9
21.7	25.8	27.1	28.3	27.9	27.8
27.9	29.9	33.7	34.6	34.5	34.2
36.2	39.1	45.2	48.9	49.7	50.4
35.3	39.0	44.0	46.8	47.7	49.7
26.5	31.9	35.2	36.1	41.6	42.6
20.4	24.4	29.9	30.0	31.9	32.3
20.9	26.6	29.8	29.4	26.7	28.8
29.3	31.2	33.9	31.6	29.6	31.1
28.3	30.1	32.6	30.2	30.5	30.9
23.7	29.8	27.7	30.2	31.4	30.5
26.1	34.5	37.5	40.6	45.2	46.5
30.6	37.9	39.3	43.7	47.3	49.1
28.2	34.3	34.8	41.3	43.2	43.7
24.2	23.8	23.6	28.2	28.0	28.8
22.3	21.2	30.1	29.3	25.5	26.7
20.0	22.2	27.6	27.3	25.6	27.1
18.2	19.2	24.1	28.6	25.5	27.6
22.6	22.4	27.8	30.9	32.1	33.4
31.7	33.7	39.3	42.1	44.1	46.7
28.1	27.9	33.4	34.0	36.4	39.2
19.8	21.6	23.6	34.1	26.9	27.1
17.9	21.5	24.6	25.8	28.4	26.4
21.1	25.7	34.1	34.5	38.7	40.9
29.0	35.7	40.7	44.7	44.9	47.6
21.3	25.5	39.3	38.8	34.8	37.6
20.8	25.7	37.5	38.3	29.7	34.0

24.6	29.2	39.4	44.2	35.0	41.5
31.1	47.0	50.4	63.2	54.3	54.8
35.8	44.9	52.5	60.6	53.3	58.2
25.6	31.9	45.5	44.2	38.7	41.0
21.5	24.5	33.0	35.1	31.3	32.8
28.6	29.2	33.0	42.0	36.7	40.0
25.9	32.7	37.2	40.0	41.7	39.7
31.0	36.3	42.3	45.1	49.4	56.0
33.4	40.1	44.2	45.8	50.3	53.6
41.2	51.9	45.0	49.9	56.6	56.8
39.5	42.6	48.6	49.8	52.7	55.6
31.1	31.2	40.5	37.8	41.4	46.3
26.2	29.5	31.5	33.0	35.5	38.0
30.1	36.4	38.6	40.3	42.7	46.9
20.5	23.8	26.6	29.2	32.0	33.7
17.6	19.2	21.5	24.9	25.4	26.0
19.0	20.0	21.4	25.1	24.6	25.3
21.6	22.1	23.0	25.5	26.2	26.5
23.4	25.6	27.7	29.7	34.3	33.6
33.1	34.6	36.6	38.2	42.7	44.6
29.7	34.1	35.2	37.1	39.5	42.7
33.5	40.8	39.8	41.1	44.6	47.8
26.8	33.5	33.1	35.8	37.5	39.4
28.7	36.1	37.9	40.4	44.5	46.5
29.7	35.4	36.5	40.0	45.6	47.5
24.9	27.3	31.8	32.8	35.9	38.6

1/3 LASeq 250	1/3 LASeq 315	1/3 LASeq 400	1/3 LASeq 500	1/3 LASeq 630	1/3 LASeq 800
30.6	32.4	34.1	34.0	35.0	36.6
28.4	30.1	31.3	34.0	34.6	36.0
44.6	46.8	43.5	45.9	48.1	49.1
50.1	48.9	47.0	50.7	52.3	53.8
38.8	37.4	35.8	37.3	39.2	41.3
38.4	40.8	38.4	40.2	42.0	45.2
50.9	51.5	49.9	51.6	53.5	56.9
40.6	39.8	38.6	40.3	42.6	45.3
28.6	29.5	30.4	32.6	34.9	37.9
27.5	28.4	29.4	31.8	33.9	37.4
28.2	28.3	29.7	32.2	34.6	37.5
31.6	31.2	30.6	32.6	34.6	37.8
36.4	37.5	38.5	38.8	39.4	43.6
51.5	51.5	54.4	56.0	57.0	58.6
46.6	44.5	45.8	47.8	49.2	50.2
37.9	35.3	35.6	36.6	38.5	40.1
29.3	31.5	32.6	32.3	35.1	38.1
28.4	31.5	34.0	32.5	35.2	38.2
36.1	39.8	38.7	41.2	42.3	45.0
48.0	47.9	49.9	51.4	53.0	55.7
39.4	37.5	38.4	40.4	41.6	44.4
27.1	27.9	29.1	31.0	33.7	36.6
25.6	26.9	28.4	30.0	33.0	36.1
26.2	27.7	28.6	30.7	34.1	36.2
26.3	27.1	28.9	32.0	34.4	37.0
26.3	27.3	29.4	32.2	34.9	37.7
33.1	31.5	31.0	33.2	35.2	37.9
29.2	29.1	30.1	32.1	34.4	37.0
25.3	26.5	29.4	30.8	33.0	35.8
28.8	31.1	31.1	31.7	34.0	37.1
35.4	36.9	36.1	38.5	39.2	41.9
50.7	50.0	49.1	53.2	54.3	56.9
43.7	42.4	39.8	43.6	45.6	47.9
30.3	30.5	30.0	31.6	33.7	36.3
31.1	30.3	30.3	30.7	32.8	35.6
32.2	29.8	30.2	31.2	33.8	37.0
33.4	29.8	30.2	31.8	34.0	37.6
32.5	28.7	29.9	31.5	34.2	37.3
30.8	27.6	29.3	31.2	33.7	36.9
30.0	28.3	32.3	31.7	33.4	37.9
29.5	28.6	30.5	32.2	34.0	37.5
33.3	32.4	33.4	35.0	37.8	39.8
44.6	43.8	44.1	45.8	47.8	48.3
38.0	36.1	37.5	38.4	39.5	41.0
30.3	30.5	32.7	34.9	35.5	37.6
44.6	44.2	45.2	47.9	47.9	50.3

44.9	42.7	44.7	47.6	47.0	49.5
30.7	30.1	31.5	33.8	35.0	38.4
26.5	27.0	29.2	31.4	33.8	37.0
26.1	28.1	30.0	32.6	34.3	36.8
27.1	29.2	31.6	34.0	35.8	37.2
32.1	31.0	33.0	34.2	35.4	36.2
28.5	28.8	31.1	34.5	35.3	38.7
28.1	28.6	30.9	34.3	34.9	38.6
42.9	42.3	43.4	46.4	49.9	53.4
49.5	48.4	51.8	55.2	55.5	58.5
37.3	36.1	39.5	40.6	40.1	43.9
30.0	29.9	31.8	33.1	34.6	38.3
31.6	29.8	31.5	33.2	35.0	37.9
38.9	37.5	38.3	40.5	40.9	43.7
46.4	46.5	47.8	47.5	48.2	49.8
45.0	43.8	42.0	45.1	45.5	46.4
44.0	41.0	40.1	41.8	43.8	44.0
35.2	32.2	32.8	33.9	36.2	38.1
29.9	28.9	29.5	31.1	33.8	36.8
30.7	28.6	31.0	32.4	34.3	36.3
31.4	34.4	32.3	36.0	38.4	41.3
31.5	34.0	31.7	37.7	39.2	42.0
30.5	29.6	31.2	34.0	35.7	37.4
35.6	35.0	34.9	37.8	38.6	41.5
52.1	51.8	50.5	52.4	54.8	58.0
52.8	50.9	49.1	50.3	53.1	56.0
42.7	40.2	39.1	40.5	41.8	44.0
31.7	31.8	32.1	33.4	35.2	38.2
30.8	30.5	32.8	33.5	36.0	38.1
30.9	30.9	31.9	34.2	35.4	37.9
33.2	33.5	34.2	35.1	36.5	38.6
33.5	34.4	35.8	36.3	38.1	40.4
48.2	46.8	47.9	50.0	51.9	55.0
50.2	47.9	48.9	52.5	53.7	58.7
45.6	42.3	44.2	47.6	48.6	53.1
30.0	28.4	30.6	32.4	34.2	37.2
28.2	28.6	29.3	29.7	32.1	35.3
33.3	33.2	32.8	30.7	33.2	36.2
31.4	31.5	32.5	30.7	33.4	36.4
36.6	37.0	35.0	38.2	38.3	41.4
50.5	49.8	51.6	53.1	52.8	55.8
43.2	40.6	42.5	43.1	43.6	45.7
29.9	28.2	30.2	31.1	33.8	36.9
28.6	27.5	29.5	31.1	33.8	37.0
40.8	40.7	41.5	43.4	42.7	46.7
49.2	46.8	47.7	50.9	52.8	55.5
37.7	35.2	35.3	38.0	39.4	42.1
31.2	31.9	31.3	32.7	35.7	37.7

37.8	36.1	33.7	35.9	37.2	38.6
53.3	51.9	50.6	52.1	53.6	54.5
53.7	51.2	50.7	51.9	53.1	55.0
37.4	36.8	37.3	38.5	39.8	42.7
33.2	31.4	31.7	32.9	35.5	38.7
40.1	37.7	34.8	34.7	35.9	38.5
40.6	37.5	35.5	36.9	37.5	40.5
55.7	52.6	53.4	56.1	57.6	61.4
54.3	51.8	52.0	54.9	56.4	59.6
58.8	56.2	57.1	59.2	61.2	64.0
55.4	53.6	56.3	57.7	60.4	63.2
43.4	42.5	44.2	45.6	48.1	50.9
40.4	40.3	40.4	43.4	44.6	46.1
49.3	49.3	50.7	52.3	53.4	53.8
37.9	37.3	39.4	40.4	40.6	42.0
29.9	28.0	29.5	33.7	33.5	37.2
27.7	27.5	30.2	31.5	33.4	36.2
28.5	28.0	30.3	31.4	33.6	36.4
36.2	36.4	35.8	38.8	40.8	43.7
45.5	44.2	45.4	48.9	49.2	51.1
45.4	43.9	43.7	46.4	47.1	50.5
51.9	50.8	52.0	54.8	55.0	57.6
43.5	41.5	43.1	45.5	45.7	47.0
50.1	46.2	47.5	51.3	55.0	57.1
49.8	46.6	48.5	51.4	54.7	57.1
38.9	37.1	38.2	40.2	41.7	45.4

1/3 LASeq 1000	1/3 LASeq 1250	1/3 LASeq 1600	1/3 LASeq 2000	1/3 LASeq 2500
38.1	36.9	36.0	37.1	39.0
38.1	37.0	37.2	36.4	36.3
53.0	50.1	46.9	43.4	40.5
56.5	54.1	50.4	47.4	44.3
43.3	42.3	40.0	38.2	36.7
48.4	48.3	46.0	42.8	40.5
60.8	58.1	55.3	51.2	47.5
48.5	47.0	44.7	41.5	39.1
39.2	38.1	36.5	35.7	35.0
38.8	37.1	35.7	34.8	34.3
38.7	37.1	35.7	34.3	33.7
38.8	37.3	36.0	35.2	35.2
44.4	41.6	40.8	37.7	36.1
58.7	56.9	56.4	53.7	51.9
50.1	49.2	47.8	45.3	45.1
40.9	39.0	37.9	36.8	42.0
39.4	37.6	35.7	34.1	34.0
39.5	36.9	35.4	33.5	32.0
47.1	45.0	43.4	42.1	38.5
57.4	54.4	52.9	49.2	46.2
45.9	43.5	42.1	38.9	36.8
37.6	36.3	34.9	33.7	33.6
36.6	35.4	33.7	32.7	32.4
37.3	36.3	34.3	34.0	33.9
38.1	36.7	34.9	33.9	34.1
38.8	37.4	35.0	33.4	32.9
39.6	37.9	35.7	33.8	32.6
38.8	37.2	35.2	33.0	31.7
37.2	35.4	33.7	31.3	29.9
38.4	36.4	35.5	34.2	32.5
44.3	43.0	40.8	36.5	34.1
59.2	57.4	54.5	52.0	48.7
49.1	48.0	45.1	42.4	39.6
37.4	35.8	34.2	32.4	31.6
37.4	35.3	33.7	32.7	32.1
38.0	35.9	34.7	35.7	33.6
38.7	36.6	34.8	34.4	34.5
38.3	36.6	34.8	34.0	34.2
38.4	36.4	34.2	32.6	31.9
38.1	36.5	34.5	33.1	32.5
38.1	36.9	35.2	33.7	33.5
41.3	39.9	39.7	37.4	35.2
51.2	48.8	46.1	43.0	41.2
43.2	41.5	39.4	36.3	34.4
38.5	37.3	35.3	33.5	32.7
53.2	50.5	47.7	44.2	41.5

52.5	50.4	47.1	43.6	40.6
40.2	38.4	35.6	33.1	31.7
38.2	36.8	34.8	32.8	32.3
37.7	35.7	33.6	32.0	31.8
37.9	36.0	33.7	31.8	31.0
37.4	35.8	33.5	31.8	30.5
38.4	36.3	34.4	32.3	31.2
38.7	37.0	34.7	32.8	32.1
52.1	48.1	45.1	42.0	38.6
56.4	51.7	48.7	46.6	44.5
42.8	39.1	36.6	34.0	31.7
39.2	37.4	35.6	33.3	33.4
39.8	37.3	35.4	33.1	32.9
45.4	42.3	40.5	36.9	33.9
51.4	48.7	46.5	44.2	42.7
47.6	46.6	45.1	43.3	43.2
45.8	45.7	43.1	41.0	39.8
39.9	37.8	35.7	33.1	30.8
37.9	36.2	33.9	31.6	29.9
37.1	35.0	33.6	31.6	30.3
36.9	35.4	37.7	38.7	34.9
37.2	37.0	37.0	35.9	35.4
37.3	36.6	35.7	34.5	34.0
41.8	40.3	38.2	37.5	36.4
59.2	56.6	53.1	49.6	47.0
56.7	54.8	51.4	48.4	46.2
45.5	43.3	40.8	39.5	38.0
38.7	37.4	36.0	35.4	35.1
38.5	37.3	35.7	34.8	35.3
39.4	38.1	36.3	35.7	36.3
39.9	38.8	37.5	37.4	38.3
42.6	40.4	38.3	37.4	37.9
57.8	54.3	50.8	47.6	44.1
60.6	56.9	52.9	49.2	46.6
55.5	52.3	48.8	44.2	42.2
39.3	37.5	35.3	32.9	31.2
36.3	34.7	32.9	31.2	29.6
37.3	35.5	33.3	31.4	30.2
37.7	35.9	33.8	31.5	29.5
44.0	41.6	37.8	34.5	32.3
58.5	56.8	52.0	48.6	45.6
48.7	47.2	43.6	39.6	36.4
38.7	37.4	34.5	32.3	30.7
38.4	38.1	34.1	32.0	31.8
50.1	47.9	44.1	40.4	36.8
58.1	55.8	51.9	48.5	45.1
44.9	44.2	40.4	36.6	34.1
38.6	37.1	35.3	33.7	33.1

39.7	38.0	36.9	37.0	37.6
54.9	52.4	49.8	49.2	48.1
55.9	52.9	49.9	47.7	46.0
43.7	40.9	38.5	36.6	36.2
39.5	37.8	36.4	36.3	37.2
39.6	37.9	36.5	37.0	37.2
42.5	40.3	37.9	36.7	36.0
63.8	60.4	55.7	52.5	48.9
62.1	58.9	55.6	52.9	49.5
65.2	62.8	59.1	55.6	52.5
63.1	59.8	57.0	53.7	50.6
51.0	47.8	45.2	42.4	39.8
47.1	46.9	46.8	44.9	42.0
55.7	54.2	51.7	49.4	47.0
42.9	41.1	39.2	36.6	34.3
38.5	36.6	36.2	32.5	37.6
38.0	36.5	34.8	32.1	33.6
38.0	36.8	34.8	33.2	31.3
46.6	43.8	41.9	39.3	36.1
53.7	50.9	48.3	46.3	43.1
52.9	49.3	46.5	44.2	41.4
59.6	57.4	53.7	50.4	46.7
49.9	47.6	45.1	41.7	38.4
56.2	53.2	51.2	48.2	45.2
56.9	53.9	51.5	48.6	45.4
46.2	44.0	41.6	38.5	36.1

1/3 LASeq 3150	1/3 LASeq 4000	1/3 LASeq 5000	1/3 LASeq 6300	1/3 LASeq 8000
38.4	36.0	33.7	30.5	26.0
38.4	36.4	31.4	28.3	27.0
40.6	38.3	33.2	29.3	29.0
41.2	38.0	34.5	30.6	26.3
37.7	33.5	31.9	29.8	25.3
37.1	34.6	32.9	34.5	29.4
44.0	40.1	36.6	33.7	28.8
38.0	34.7	31.5	28.3	23.6
34.0	32.3	29.8	27.0	22.9
33.0	31.7	29.9	26.8	24.2
33.4	32.2	30.6	28.1	24.5
34.6	33.3	31.3	28.8	24.9
35.7	34.3	32.2	29.3	25.4
51.9	50.8	47.2	42.7	37.7
44.7	42.9	39.6	35.3	29.4
42.9	33.8	31.3	27.9	23.6
34.4	31.8	30.3	27.2	22.7
33.7	34.2	28.9	25.0	21.6
37.6	36.3	33.6	31.0	27.4
43.1	40.8	37.6	34.3	30.2
35.7	34.0	31.5	28.6	24.5
33.5	31.8	29.4	26.4	22.5
31.7	30.7	29.4	27.1	23.7
32.9	32.1	31.2	28.9	25.7
33.9	33.0	31.6	29.3	25.8
32.3	31.1	29.5	27.1	23.5
32.0	30.7	28.6	28.5	26.8
30.7	29.0	26.6	24.0	20.7
29.0	27.2	25.0	22.2	18.5
31.9	30.1	27.4	24.3	20.1
32.4	30.8	28.5	25.6	21.9
43.9	41.4	37.6	34.1	31.3
35.9	33.7	30.3	27.4	23.9
30.2	28.7	26.3	23.4	19.9
31.9	31.6	30.6	28.5	25.3
33.5	32.7	32.6	29.0	25.7
34.5	32.9	30.8	27.8	23.8
34.0	32.4	29.9	26.9	22.9
31.6	29.8	27.7	24.7	20.8
32.0	30.6	28.3	25.5	24.2
33.2	31.9	30.0	27.4	24.8
34.1	32.5	31.2	27.9	24.2
39.3	38.7	36.4	32.5	29.3
33.0	31.9	29.4	26.5	23.0
32.0	30.6	28.4	25.2	21.4
38.9	37.1	34.7	31.0	27.4

37.9	35.5	32.4	28.7	24.9
30.9	29.1	26.5	23.7	19.7
32.1	30.4	27.8	24.7	20.6
31.4	29.8	27.5	24.7	20.9
30.3	28.6	26.3	23.5	19.7
30.1	28.6	26.9	23.9	20.5
30.7	29.7	28.4	25.8	22.6
31.6	30.2	28.5	25.7	22.3
35.0	32.4	29.5	26.4	22.6
41.5	38.8	35.7	31.9	28.2
29.6	27.4	24.8	22.0	18.6
32.0	29.6	27.2	24.3	20.4
31.5	29.2	27.3	24.7	21.2
31.9	29.6	27.3	24.5	20.9
42.5	39.9	36.2	32.7	29.9
43.7	40.1	36.8	33.8	29.9
38.7	35.9	33.0	30.1	25.9
29.8	28.1	27.2	24.7	21.3
29.0	27.1	25.0	22.2	18.7
29.3	27.7	26.6	23.4	19.9
33.0	28.0	26.0	23.6	20.3
34.2	30.4	28.3	25.5	22.0
33.8	33.3	30.6	27.7	25.4
36.7	36.0	33.2	30.0	27.5
44.1	42.3	39.1	36.3	33.1
44.1	42.5	38.8	35.8	34.9
37.6	37.7	33.2	30.2	27.1
35.5	36.5	32.7	28.0	24.2
35.7	34.7	31.2	27.9	23.7
36.5	35.3	32.7	29.8	25.9
38.5	37.0	34.7	31.7	27.7
38.5	37.4	33.7	30.4	26.2
41.0	38.2	35.1	30.6	26.5
43.8	39.8	35.8	32.2	28.9
39.3	35.7	32.2	28.9	25.5
30.7	29.7	27.3	24.7	21.4
29.8	28.9	26.7	24.2	21.1
28.9	28.4	25.0	22.5	19.4
28.8	27.4	25.4	22.7	19.6
30.9	29.1	26.5	23.7	20.0
42.4	38.8	35.4	31.7	27.5
33.9	31.3	28.2	24.9	20.7
30.2	29.2	27.0	24.5	21.1
31.1	30.0	27.5	24.6	21.3
33.8	31.0	28.1	24.8	21.1
41.8	38.2	34.2	30.2	26.5
32.5	30.8	29.0	26.3	22.8
32.8	31.4	29.3	26.1	22.1

36.5	34.9	32.4	29.0	25.0
45.5	42.6	39.6	37.0	33.2
44.2	41.7	39.0	36.4	32.8
35.6	33.8	30.5	27.2	22.8
37.1	36.1	32.3	29.2	24.8
37.0	35.7	33.3	30.3	26.4
35.4	34.3	31.6	29.2	25.5
45.7	42.8	39.1	35.2	31.1
45.9	42.7	39.0	34.9	31.3
49.5	46.2	42.9	39.3	35.2
48.2	45.3	41.3	37.8	33.6
38.2	35.8	32.5	29.3	25.1
38.7	36.2	32.8	29.7	24.8
43.5	41.0	37.8	34.3	29.8
31.7	30.2	26.4	23.3	19.7
31.1	29.4	25.3	22.3	17.9
29.7	28.6	25.7	23.0	19.5
30.0	30.0	27.9	25.7	22.5
33.9	32.9	29.6	26.9	23.7
41.1	38.8	35.7	31.9	29.7
38.9	36.3	33.5	30.8	27.0
44.1	41.5	39.0	35.2	30.2
35.2	33.5	31.1	28.3	24.3
42.3	39.0	35.7	32.6	29.5
42.8	39.8	37.0	34.0	29.9
34.7	33.4	31.2	28.3	24.5

1/3 LASeq 10000	1/3 LASeq 12500	1/3 LASeq 16000	1/3 LASeq 20000	1/3 LASmax 6.3
21.0	15.2	10.6	8.8	1.9
18.9	14.1	10.2	8.8	1.9
20.1	15.4	11.4	9.4	1.9
21.3	16.1	11.6	9.3	1.9
19.5	15.9	11.2	9.9	1.9
22.7	18.6	13.6	10.7	1.9
24.2	19.2	14.0	10.4	1.9
18.6	13.7	10.0	9.1	1.9
18.6	13.7	10.1	9.1	1.9
19.9	15.1	11.1	9.4	1.9
20.3	15.1	10.9	9.3	1.9
20.6	15.6	11.5	9.5	1.9
20.7	15.5	11.1	9.4	1.9
31.6	26.4	20.1	13.2	1.9
23.3	17.8	12.5	9.6	1.9
18.9	13.9	10.1	9.1	1.9
18.5	13.8	10.1	9.2	1.9
17.7	13.4	10.2	9.2	1.9
22.6	16.6	11.8	9.6	1.9
25.8	20.2	15.2	10.5	1.9
20.1	14.9	10.8	9.4	1.9
18.0	13.3	9.9	9.3	1.9
19.7	14.6	10.7	9.4	1.9
21.4	16.1	11.4	9.5	1.9
21.4	16.0	11.3	9.5	1.9
19.3	14.4	10.4	9.4	1.9
25.0	20.4	14.0	10.2	1.9
17.5	13.4	9.9	9.3	1.9
15.0	11.7	9.3	9.2	1.9
16.0	12.1	9.4	9.2	1.9
17.7	13.4	10.1	9.4	1.9
27.4	22.4	17.0	11.8	1.9
19.9	15.4	11.3	9.6	1.9
16.3	12.7	9.8	9.3	1.9
21.0	15.9	11.2	9.4	1.9
21.4	16.0	11.3	9.5	1.9
19.3	14.5	10.6	9.5	1.9
18.5	13.6	10.0	9.4	1.9
16.7	12.5	9.6	9.4	1.9
17.4	13.0	9.8	9.4	1.9
19.7	14.7	10.5	9.4	1.9
19.9	14.9	10.6	9.4	1.9
25.4	21.6	16.8	11.6	1.9
18.9	14.5	10.7	9.5	1.9
17.3	12.9	9.7	9.4	1.9
23.2	17.3	12.3	9.9	1.9

20.6	15.2	11.0	9.6	1.9
15.8	12.2	9.6	9.4	1.9
16.4	12.4	9.6	9.4	1.9
16.8	12.6	9.6	9.3	1.9
15.8	12.1	9.4	9.3	1.9
16.7	12.6	9.7	9.3	1.9
18.4	13.6	10.0	9.3	1.9
18.1	13.4	10.0	9.4	1.9
18.1	13.5	9.9	9.4	1.9
23.6	18.9	13.7	10.5	1.9
15.3	12.0	9.4	9.5	1.9
16.4	12.5	9.6	9.7	1.9
17.3	13.1	9.8	9.8	1.9
17.1	12.8	9.6	10.0	1.9
26.8	21.5	17.1	12.4	1.9
26.8	22.1	17.7	12.5	1.9
22.2	17.7	13.4	10.5	1.9
17.4	13.2	9.9	9.8	1.9
15.1	11.8	9.3	9.7	1.9
16.1	12.3	9.5	9.7	1.9
16.3	12.3	9.5	9.7	1.9
17.8	13.1	9.8	9.7	1.9
19.5	14.4	10.4	9.9	1.9
21.7	16.1	11.3	10.0	1.9
29.0	24.3	19.4	13.5	1.9
33.8	22.2	17.3	12.5	1.9
23.5	16.6	11.8	10.2	1.9
19.7	14.5	10.5	9.9	1.9
18.9	13.9	10.1	9.8	1.9
21.2	15.9	11.4	10.4	1.9
22.9	17.2	12.1	10.6	1.9
21.1	15.5	10.8	10.6	1.9
36.2	47.6	12.6	10.9	1.9
42.5	42.0	14.9	12.2	1.9
24.7	22.4	12.1	11.0	1.9
17.6	13.4	9.9	10.5	1.9
17.2	12.9	9.7	10.4	1.9
15.9	12.3	9.7	10.2	1.9
15.9	12.2	9.5	10.1	1.9
16.2	12.4	9.6	10.1	1.9
23.1	17.4	12.4	10.5	1.9
16.8	12.7	9.7	10.2	1.9
17.1	13.0	9.8	10.2	1.9
17.3	13.0	9.8	10.1	1.9
17.1	13.0	9.8	10.0	1.9
22.1	16.8	12.1	10.4	1.9
18.7	14.0	10.2	10.1	1.9
17.9	13.2	9.9	9.9	1.9

20.2	15.0	10.6	9.9	1.9
28.2	23.3	17.5	12.1	1.9
28.1	23.2	18.7	13.2	1.9
18.1	13.5	10.1	9.9	1.9
19.7	14.5	10.5	10.1	1.9
21.6	16.1	11.6	10.2	1.9
21.1	15.9	11.3	10.0	1.9
26.8	22.0	16.7	11.6	1.9
26.7	21.7	16.0	11.1	1.9
30.9	25.9	20.3	14.0	1.9
29.5	24.8	19.8	14.0	1.9
20.6	15.6	11.5	10.3	1.9
19.8	14.9	10.6	10.1	1.9
24.7	20.3	14.9	11.1	1.9
16.0	12.6	9.7	10.0	1.9
14.6	11.7	9.3	9.9	1.9
15.9	12.3	9.6	9.9	1.9
18.6	14.1	10.3	10.0	1.9
19.5	14.5	10.5	10.2	1.9
26.4	21.8	16.7	12.2	1.9
23.2	18.4	12.7	10.6	1.9
25.7	20.9	15.1	11.4	1.9
20.3	15.2	11.0	10.0	1.9
25.6	20.6	16.5	11.1	1.9
24.8	19.2	14.0	10.7	1.9
20.0	14.7	10.4	10.1	1.9

1/3 LASmax 8.0	1/3 LASmax 10.0	1/3 LASmax 12.5	1/3 LASmax 16.0	1/3 LASmax 20.0
0.9	2.5	6.2	10.4	7.3
0.9	0.3	-0.8	0.6	4.4
0.9	0.5	5.3	6.1	10.7
0.9	2.8	4.5	9.8	14.5
0.9	0.3	1.0	5.0	7.5
0.9	0.3	-0.8	-0.7	8.5
0.9	0.3	-0.8	1.8	6.5
0.9	0.3	-0.8	0.5	2.9
0.9	0.3	-0.8	-1.0	5.5
0.9	0.3	1.3	2.4	4.9
0.9	0.3	-0.8	2.9	3.5
0.9	0.3	-0.8	-0.1	12.5
0.9	0.3	5.6	7.5	12.9
0.9	1.2	5.4	14.4	15.0
0.9	2.5	6.8	11.6	14.2
0.9	0.3	-0.8	0.8	4.3
0.9	0.3	-0.8	0.5	5.0
0.9	0.3	-0.8	-1.4	4.2
0.9	0.3	-0.2	0.9	5.7
0.9	0.3	-0.8	1.0	13.6
0.9	0.3	-0.8	0.5	11.2
0.9	0.3	-0.8	-1.6	-0.1
0.9	0.3	-0.8	2.2	6.9
0.9	0.3	-0.8	3.0	8.2
0.9	0.3	2.5	10.9	10.8
0.9	0.3	1.3	4.5	6.1
0.9	0.3	-0.7	2.9	8.9
0.9	0.3	-0.8	0.9	3.3
0.9	0.3	-0.8	-1.6	2.7
0.9	0.3	-0.8	-1.6	1.9
0.9	0.3	-0.8	2.4	6.4
0.9	0.3	1.1	1.5	12.5
0.9	0.3	1.9	3.8	11.7
0.9	0.3	-0.8	2.3	4.6
0.9	0.3	-0.8	1.5	5.8
0.9	0.3	-0.8	-1.6	0.7
0.9	0.3	-0.8	-1.6	1.5
0.9	0.3	-0.8	-1.6	2.2
0.9	0.3	-0.8	-0.3	5.3
0.9	0.3	-0.8	-1.3	4.3
0.9	0.3	-0.8	-0.6	3.3
0.9	0.3	-0.8	-1.6	3.4
0.9	0.3	-0.8	1.0	9.9
0.9	0.3	-0.8	6.8	10.1
0.9	0.3	-0.8	-0.7	3.3
0.9	0.3	-0.8	2.8	7.0

0.9	0.3	-0.8	2.1	5.3
0.9	0.3	2.0	9.5	14.5
0.9	0.3	4.1	7.5	10.5
0.9	0.3	2.2	3.1	9.4
0.9	0.3	-0.2	4.3	9.1
0.9	0.3	-0.8	1.0	4.5
0.9	0.3	-0.8	1.6	2.0
0.9	0.3	-0.8	-1.1	2.0
0.9	0.3	-0.8	-1.6	2.4
0.9	0.3	0.9	4.1	14.3
0.9	0.3	3.4	6.6	9.6
0.9	0.3	0.1	2.6	5.9
0.9	0.3	-0.8	-1.6	2.7
0.9	0.3	-0.8	-1.6	1.9
0.9	0.3	-0.8	1.3	8.5
0.9	0.3	-0.8	2.4	8.3
0.9	0.3	-0.8	2.3	7.6
0.9	0.3	-0.8	-1.6	5.7
0.9	0.3	-0.8	-0.7	3.9
0.9	0.3	-0.8	-0.1	5.8
0.9	0.3	-0.8	0.7	6.7
0.9	0.3	-0.8	0.9	7.4
0.9	0.3	1.3	9.0	9.8
0.9	0.3	-0.8	4.9	10.6
0.9	0.3	8.1	16.8	26.1
3.0	6.6	8.9	20.3	26.9
0.9	3.6	5.7	12.0	13.2
0.9	0.3	-0.8	0.6	9.8
0.9	0.3	-0.8	2.9	8.4
0.9	2.2	14.7	20.2	22.8
0.9	7.3	14.9	19.0	20.3
0.9	3.3	8.9	13.8	17.6
0.9	0.3	1.8	9.1	10.6
0.9	0.3	0.4	5.4	9.9
0.9	0.3	-0.6	3.2	9.0
0.9	0.3	-0.8	1.1	6.9
0.9	0.3	-0.8	-0.1	7.4
0.9	0.3	-0.8	-1.3	6.5
0.9	0.3	-0.8	0.5	6.3
0.9	0.3	-0.8	3.7	7.9
0.9	0.3	-0.7	3.6	10.0
0.9	0.3	-0.1	2.5	7.7
0.9	0.3	-0.8	1.8	6.9
0.9	0.3	-0.8	-1.6	4.7
0.9	0.3	-0.8	-1.6	5.9
0.9	0.3	-0.8	-1.6	6.3
0.9	0.3	-0.8	-1.6	6.4
0.9	0.3	-0.8	-0.5	5.2

0.9	0.3	1.9	5.4	6.6
0.9	0.3	-0.8	-1.6	4.5
0.9	0.3	0.1	5.1	8.2
0.9	0.3	-0.8	-1.4	4.8
0.9	0.3	-0.8	3.0	7.0
0.9	0.9	6.8	12.5	18.2
0.9	1.0	6.6	12.8	16.1
0.9	0.3	-0.8	1.5	10.1
0.9	0.3	-0.6	7.4	12.3
0.9	0.3	-0.8	4.8	16.1
0.9	1.1	4.5	10.5	16.9
0.9	5.3	7.4	10.4	15.4
0.9	5.6	7.7	9.5	13.2
0.9	0.3	0.9	4.6	11.6
0.9	0.3	1.0	2.7	8.5
0.9	0.3	-0.8	-1.6	5.4
0.9	0.3	-0.8	-1.6	5.3
0.9	0.3	-0.8	-0.7	6.4
0.9	0.3	-0.8	-0.8	4.1
0.9	0.3	-0.8	-1.2	6.9
0.9	0.3	-0.8	-1.6	3.9
0.9	0.3	-0.8	1.3	11.0
0.9	0.3	-0.8	-0.4	6.9
0.9	0.3	-0.8	-1.0	6.1
0.9	0.3	-0.8	-0.6	5.8
0.9	0.3	-0.8	-1.6	2.1

1/3 LASmax 25.0	1/3 LASmax 31.5	1/3 LASmax 40.0	1/3 LASmax 50.0	1/3 LASmax 63.0
12.5	15.7	17.1	21.0	23.4
9.4	11.7	14.4	16.4	20.2
13.1	16.9	17.7	23.2	27.4
15.7	17.9	25.2	29.4	31.7
10.4	14.2	21.3	20.4	25.1
13.1	15.8	19.7	19.4	22.7
17.2	28.1	29.6	24.9	32.8
16.8	26.8	23.9	22.9	27.0
11.6	12.7	16.1	19.4	20.4
12.9	12.6	16.7	19.1	19.4
8.5	12.7	16.5	18.1	24.7
18.8	16.0	17.9	21.7	25.4
19.0	15.3	18.1	23.7	26.7
18.2	22.1	28.2	37.9	44.0
18.1	19.5	25.2	37.3	47.5
12.4	14.7	21.8	28.7	47.2
11.3	12.4	18.9	26.0	34.2
9.1	14.2	19.9	17.7	26.0
7.7	11.8	19.0	22.8	26.3
14.8	21.0	37.4	31.9	33.6
14.1	24.2	34.8	26.7	29.2
8.4	13.4	19.2	20.5	25.9
11.8	14.3	18.5	18.6	20.4
12.7	14.6	17.2	18.2	20.3
12.2	16.0	17.5	18.6	22.1
11.4	14.0	20.7	20.4	19.9
11.0	15.6	21.9	19.0	20.6
9.1	11.0	20.2	22.8	25.2
10.3	11.7	15.2	22.6	20.8
9.9	15.9	15.6	18.5	21.4
9.3	15.9	16.1	22.2	20.3
16.6	21.2	34.4	36.2	33.8
14.8	23.4	33.1	31.4	27.6
7.7	16.1	21.5	20.6	23.7
8.6	14.6	16.5	17.5	22.0
9.3	12.6	15.4	16.9	21.4
6.8	12.7	17.9	19.2	24.4
7.0	12.1	15.5	19.3	27.4
10.0	13.4	20.5	19.0	24.4
8.5	13.6	20.4	20.5	22.8
8.6	13.7	18.8	19.4	24.3
8.5	14.1	18.7	25.1	25.1
15.2	19.6	37.6	32.1	32.8
12.0	16.7	31.6	25.8	27.3
9.2	14.8	20.2	21.5	22.2
10.7	16.0	23.9	25.0	28.5

10.8	17.0	26.9	25.1	29.3
17.5	19.2	19.8	21.9	27.2
13.9	15.7	18.7	20.6	25.5
10.5	16.8	20.6	20.7	23.3
12.5	15.4	19.2	19.7	21.3
9.6	12.3	15.7	19.0	21.0
8.8	12.3	14.7	16.0	19.4
7.2	14.6	13.4	17.1	19.6
9.3	15.8	21.2	21.9	30.1
24.0	28.9	33.5	32.8	36.3
15.5	20.2	23.4	22.3	26.1
8.0	15.2	24.9	18.5	22.3
7.9	13.7	25.6	20.1	23.8
7.7	29.6	26.2	28.2	27.8
25.6	34.8	36.2	33.7	35.3
24.5	34.7	43.8	39.3	41.0
18.6	24.9	38.2	36.3	37.9
12.0	14.7	24.2	23.4	31.5
10.7	12.0	18.3	21.6	25.3
10.8	12.0	18.9	19.6	23.6
14.0	13.9	17.2	19.3	21.0
11.7	13.7	16.5	18.6	21.9
12.1	18.1	17.4	20.2	23.6
12.2	16.7	19.6	21.0	31.8
28.8	31.4	34.8	36.6	40.3
28.7	30.8	36.4	36.9	38.7
18.7	22.1	27.7	26.8	30.4
12.5	14.6	18.1	20.2	22.0
12.5	12.3	15.2	17.5	22.5
25.7	28.5	30.2	33.4	33.7
23.7	26.8	28.3	31.8	31.0
21.0	21.4	23.2	24.1	25.9
14.2	31.8	29.5	28.3	28.6
15.6	32.8	39.3	35.4	35.1
15.6	23.3	38.7	33.4	33.2
9.7	14.8	28.1	20.0	27.7
14.9	15.8	16.8	20.5	25.3
8.5	7.8	14.3	20.8	20.9
8.2	9.7	13.4	19.8	20.7
7.8	11.6	15.1	20.8	30.8
22.1	19.4	28.9	29.9	34.7
21.5	17.7	28.8	27.4	32.5
7.4	10.0	20.1	24.7	21.0
8.0	11.7	16.3	19.7	19.0
9.6	10.3	16.2	18.8	24.4
12.1	23.6	33.3	26.8	32.5
11.3	19.9	28.4	23.4	23.7
10.2	18.3	16.4	24.1	22.3

11.5	14.2	26.5	26.9	28.9
11.7	18.8	35.6	32.2	37.5
16.6	35.8	34.8	33.3	39.3
9.9	20.8	20.1	23.6	29.2
17.3	20.4	19.6	21.7	25.4
24.9	22.5	24.1	29.0	31.4
19.8	17.4	20.9	30.0	28.6
22.7	25.0	26.1	40.9	35.7
22.7	24.0	31.0	39.5	35.2
21.9	28.2	32.0	38.9	43.3
22.8	29.6	32.9	39.8	41.9
18.3	18.2	27.0	31.5	35.5
15.7	18.6	20.0	26.2	29.4
14.6	23.7	26.4	35.1	33.7
11.0	15.3	23.6	26.7	23.5
9.2	10.4	14.7	22.4	18.9
9.6	16.8	15.0	23.4	20.3
15.9	16.5	21.2	21.2	24.2
15.3	14.9	21.0	24.8	27.3
14.9	19.5	25.8	32.7	34.9
19.5	34.8	25.5	29.8	32.5
19.8	34.4	27.1	34.4	36.6
16.5	21.5	21.9	26.6	30.5
12.9	15.7	24.1	29.1	32.9
13.2	16.8	23.9	28.3	31.8
10.9	14.5	19.7	22.1	26.3

1/3 LASmax 80.0	1/3 LASmax 100	1/3 LASmax 125	1/3 LASmax 160	1/3 LASmax 200
24.7	24.7	26.6	28.7	31.1
23.3	25.8	28.7	31.9	31.2
35.4	36.6	39.5	46.0	45.8
38.4	39.9	42.6	47.7	49.6
27.9	29.5	35.0	35.2	40.0
28.2	35.1	35.8	40.0	40.1
39.9	42.4	45.2	50.0	51.0
33.5	35.5	39.0	42.3	43.9
29.0	23.4	27.8	28.6	28.5
22.9	23.1	25.2	26.6	31.5
26.7	30.2	30.4	35.6	32.0
30.3	31.4	36.4	38.5	33.5
32.5	39.8	39.3	45.5	39.4
45.0	49.3	54.2	53.0	54.5
45.3	51.2	53.7	51.5	49.9
39.5	49.3	48.4	48.8	42.4
34.6	38.4	38.2	34.6	30.6
29.1	35.2	34.9	30.6	31.4
28.5	36.1	35.5	38.0	40.7
39.0	40.7	40.8	45.3	49.1
33.4	35.3	36.9	40.2	43.8
33.5	25.1	26.8	30.5	29.0
26.1	22.1	26.7	24.3	25.0
22.0	23.0	26.4	23.1	24.9
21.7	23.0	26.8	23.2	24.8
21.3	23.5	26.8	25.8	27.4
23.9	27.2	31.3	29.5	31.9
24.4	27.2	31.1	27.3	29.7
21.8	26.7	27.1	25.3	26.9
28.2	35.8	37.8	35.0	30.1
27.7	32.7	32.8	36.2	37.9
39.2	45.1	44.1	46.8	47.4
36.0	41.0	39.9	41.7	44.1
30.2	31.0	32.7	33.4	32.3
26.9	29.2	33.2	32.0	28.2
26.6	38.3	34.4	31.3	29.1
29.8	38.6	36.0	31.8	33.7
28.5	34.0	34.4	30.6	32.5
29.4	35.2	33.5	30.2	30.6
27.8	35.4	34.4	31.9	29.7
27.3	33.7	35.6	32.6	28.7
28.9	31.6	35.3	35.6	34.7
42.2	38.3	41.0	42.5	43.7
36.8	33.3	37.1	38.2	38.5
28.6	30.6	30.8	32.4	30.6
39.2	38.1	40.3	46.0	47.4

40.6	38.1	40.1	45.5	47.4
28.4	28.0	30.4	34.0	34.7
27.6	27.8	27.7	30.0	28.7
25.2	24.8	26.9	27.8	27.6
22.1	24.0	26.7	29.8	27.8
21.7	23.8	25.9	29.9	26.0
22.1	23.5	25.8	26.3	26.8
23.8	25.1	26.9	27.5	27.3
35.7	37.7	41.6	44.9	48.1
41.4	41.9	43.5	48.9	51.2
30.4	33.0	36.2	39.9	42.2
28.3	28.4	30.0	28.7	29.8
28.1	30.8	31.4	30.8	31.8
34.6	35.8	39.1	40.2	43.1
38.8	39.9	41.7	47.9	46.9
39.2	47.3	51.0	44.9	46.0
35.7	44.4	50.3	43.6	44.5
29.9	33.3	34.8	38.4	39.0
25.6	29.1	31.1	33.5	35.7
24.2	27.7	27.5	33.2	34.8
23.8	27.7	27.0	32.7	36.8
25.4	25.2	26.5	34.1	33.8
30.1	29.3	30.0	30.1	28.8
35.5	36.9	37.3	38.2	39.6
43.4	48.8	52.3	54.2	53.8
42.7	48.0	51.5	51.2	52.7
36.7	39.0	40.2	44.0	45.9
26.3	32.3	32.0	36.9	37.2
30.3	31.6	30.6	27.7	29.7
34.4	35.8	34.0	32.6	32.1
32.1	33.9	30.9	32.0	31.9
31.9	28.9	31.6	34.3	34.9
40.5	42.1	45.1	48.4	51.1
40.4	41.9	47.6	50.9	52.4
38.6	40.0	46.1	48.9	49.7
28.0	25.5	32.4	32.9	33.0
23.1	35.4	30.9	26.6	28.1
23.7	30.3	30.5	26.4	29.2
20.5	24.7	31.1	26.3	29.1
25.1	32.9	34.1	41.3	41.3
36.9	43.0	45.3	46.4	49.6
33.3	39.0	39.6	41.7	44.3
23.8	26.7	36.5	29.5	30.2
22.6	28.0	28.8	30.5	29.5
31.4	39.0	39.4	43.6	47.0
38.7	42.5	46.3	46.9	50.3
29.6	40.5	42.1	39.8	41.7
27.5	39.5	40.8	31.4	35.2

38.5	42.1	47.7	40.5	49.1
52.3	56.7	68.9	59.8	63.9
50.6	56.6	67.1	58.8	64.1
35.9	50.7	48.9	43.6	46.6
27.0	37.3	37.1	33.8	34.4
33.8	39.2	45.6	40.1	42.5
34.5	39.6	43.5	44.0	41.8
41.1	46.9	50.6	54.3	61.8
46.2	46.5	48.8	53.7	58.0
56.6	50.2	53.3	59.0	58.6
46.5	50.2	52.2	57.5	57.4
36.0	45.7	43.1	45.5	51.7
34.5	37.4	41.3	40.9	44.4
40.1	42.4	43.7	45.7	50.8
28.0	30.4	32.5	36.5	38.2
21.0	23.6	26.0	27.2	27.4
21.2	22.5	25.9	25.3	25.9
23.9	24.2	25.9	28.8	27.9
28.5	33.8	36.2	40.2	39.4
37.2	39.6	40.0	45.2	47.5
37.0	38.1	39.1	41.9	45.8
44.6	41.7	43.8	47.2	51.0
38.8	37.2	37.7	41.9	43.9
40.6	41.6	43.1	48.0	49.3
37.8	39.2	42.4	47.7	49.3
30.2	35.1	36.4	40.1	43.4

1/3 LASmax 250	1/3 LASmax 315	1/3 LASmax 400	1/3 LASmax 500	1/3 LASmax 630
32.6	34.5	36.5	35.3	35.9
30.8	33.7	33.8	35.3	35.9
51.4	52.4	49.1	51.8	54.4
52.5	52.3	50.3	54.2	55.7
43.3	42.0	40.2	42.1	43.6
45.0	47.4	45.0	46.8	48.4
53.8	54.5	53.5	54.9	57.0
46.3	45.6	44.6	46.1	48.3
30.9	32.1	31.7	33.5	36.1
28.5	29.2	29.8	32.4	34.4
29.1	28.7	30.6	32.7	35.1
34.0	34.2	32.3	33.3	35.3
42.8	43.3	45.3	45.4	46.3
55.4	54.5	57.7	59.8	60.7
50.5	48.9	51.3	53.3	54.2
43.5	40.1	40.0	40.4	42.5
30.6	33.8	35.7	33.6	36.3
29.4	34.2	35.0	33.3	35.8
42.1	44.8	44.4	47.0	48.8
50.4	50.0	53.0	54.0	55.6
45.4	43.2	44.7	46.5	47.6
29.8	29.5	30.1	32.3	34.6
26.4	27.8	29.1	30.8	34.0
27.3	28.5	29.3	31.6	34.4
27.2	27.7	30.0	33.1	34.9
27.3	28.2	30.1	33.6	35.4
35.8	33.8	32.1	34.1	36.3
33.3	31.5	31.5	33.6	35.5
26.0	27.3	30.7	31.3	33.6
31.2	33.6	32.6	32.4	35.3
41.9	43.3	42.1	45.3	45.6
53.8	52.5	51.9	55.9	57.4
49.3	47.7	45.9	49.9	51.8
34.0	33.2	32.1	34.4	36.7
33.5	31.3	31.8	31.8	33.6
33.5	31.2	31.5	32.1	34.3
34.1	30.2	31.0	32.3	34.6
34.2	29.5	30.8	31.9	34.6
32.4	28.4	30.3	31.8	34.4
31.4	29.0	35.2	32.6	33.9
30.5	29.2	31.3	32.8	34.9
37.6	37.3	37.6	39.2	44.7
47.2	47.1	46.5	48.0	50.3
42.2	40.6	41.7	42.8	43.5
32.2	34.2	35.2	37.5	37.3
49.9	48.4	49.9	52.6	52.4

49.9	47.5	49.5	52.3	51.6
34.8	34.1	35.1	38.0	37.9
27.0	27.9	30.7	32.0	34.3
26.9	30.7	31.1	34.0	34.9
28.4	30.7	32.6	34.5	36.5
36.0	33.4	35.7	35.9	36.7
30.3	29.8	31.9	37.1	36.7
31.5	29.9	33.2	37.0	36.3
50.2	48.9	49.4	54.3	57.0
52.8	51.5	55.0	58.7	59.1
42.5	40.7	44.7	46.1	45.4
31.3	30.9	32.8	34.3	35.3
33.1	31.0	32.6	35.1	36.3
43.8	42.4	45.2	44.5	44.6
47.5	48.6	51.3	49.5	49.6
47.7	47.1	44.9	47.7	48.0
47.0	43.5	42.7	44.0	45.7
38.9	35.8	35.1	37.0	39.0
31.8	30.9	30.9	31.6	34.8
33.1	30.4	32.2	34.2	35.0
35.6	40.8	33.5	38.3	42.2
34.4	38.4	33.8	40.7	41.2
32.0	31.8	32.0	35.4	37.0
40.5	39.3	37.0	40.2	44.6
56.0	55.8	54.9	56.5	58.5
54.5	53.6	52.5	54.5	56.4
47.2	44.6	43.3	44.2	45.7
36.2	34.6	33.8	35.5	36.5
33.1	31.6	34.1	34.5	37.7
34.5	33.1	33.1	34.8	36.2
34.9	35.3	37.3	36.0	37.7
38.8	36.9	38.0	39.1	41.6
51.8	50.6	51.3	53.3	55.7
53.5	51.1	52.2	56.3	57.4
51.4	48.0	49.9	53.5	54.4
35.1	32.0	33.6	36.2	37.7
32.4	32.3	29.9	30.5	33.1
36.6	36.1	35.2	31.5	33.8
32.9	34.4	36.1	31.3	34.5
43.8	44.3	41.1	45.5	45.1
53.1	53.1	55.6	56.3	55.4
48.9	46.4	48.8	49.4	49.7
34.2	31.4	33.0	33.3	35.4
29.9	29.1	30.9	31.8	34.8
47.4	47.0	47.9	50.0	50.3
52.3	49.7	51.0	54.1	56.3
43.1	39.7	40.0	43.2	44.3
32.8	33.9	32.6	33.6	36.3

44.4	40.6	38.0	41.2	41.5
59.6	56.2	55.6	56.4	58.3
59.5	56.2	55.4	56.6	58.0
42.5	41.8	42.1	43.3	44.0
35.1	32.8	33.1	34.3	37.2
42.3	40.2	36.8	35.9	37.2
42.0	39.6	37.2	39.5	39.7
60.2	57.2	58.0	60.5	62.1
57.4	54.7	55.3	57.8	59.2
61.0	58.3	60.4	61.8	64.2
57.4	56.0	58.6	60.2	62.4
49.1	48.3	50.4	51.6	54.4
46.8	46.9	47.3	51.0	53.3
52.6	51.9	53.0	54.9	57.0
41.8	42.7	45.0	45.6	45.1
33.0	30.7	31.8	35.7	35.1
28.4	28.5	31.5	32.5	34.0
29.9	29.4	31.4	32.6	35.0
41.5	42.3	41.6	45.2	47.7
48.1	46.4	48.3	51.8	52.4
48.3	51.0	46.4	48.8	48.9
55.0	52.5	54.9	58.0	58.1
48.8	47.0	48.6	50.7	50.4
53.0	49.1	51.8	55.5	57.8
52.1	48.6	51.0	54.2	57.1
43.8	41.0	42.9	45.3	47.1

1/3 LASmax 800	1/3 LASmax 1000	1/3 LASmax 1250	1/3 LASmax 1600	1/3 LASmax 2000
37.7	38.9	37.4	36.6	37.9
37.4	39.4	41.0	44.6	40.3
55.9	59.1	56.6	52.5	49.6
57.5	60.3	57.1	53.4	50.6
45.0	47.6	46.6	44.2	40.9
50.9	54.4	52.6	51.1	46.9
60.4	64.0	60.9	57.7	53.8
51.1	54.7	53.0	50.2	46.4
39.1	40.7	39.6	38.0	37.1
38.0	39.4	37.8	36.5	36.0
37.9	39.0	37.6	35.9	34.7
38.4	39.3	38.9	36.6	36.2
50.8	50.5	47.4	46.3	42.3
61.6	61.8	60.2	59.6	57.0
55.2	55.2	54.0	52.8	50.2
43.0	43.0	41.5	40.2	38.8
38.9	39.9	38.1	36.7	35.3
38.8	40.7	37.2	36.2	34.5
51.5	53.5	51.5	50.0	45.9
58.1	59.7	56.5	54.9	51.7
50.4	52.0	49.4	47.8	44.1
37.6	38.7	37.1	35.9	34.5
36.8	37.3	36.6	35.3	36.4
36.7	37.9	36.7	35.3	35.9
37.9	38.9	37.8	35.2	34.1
38.2	39.7	38.1	35.5	33.7
38.4	40.2	38.3	36.1	34.2
37.9	39.8	38.1	36.3	34.3
36.6	38.3	36.4	34.2	32.3
38.3	39.7	37.3	36.6	35.4
48.0	51.2	50.3	46.8	41.8
59.7	62.0	60.4	57.1	55.1
53.9	55.2	53.9	50.9	48.2
38.6	40.0	38.1	36.1	33.9
36.9	38.3	36.0	35.0	34.4
37.6	38.3	36.5	35.0	38.3
37.9	39.1	37.1	35.4	35.1
37.9	38.8	37.3	35.8	35.1
37.6	38.7	36.7	34.8	32.9
38.5	38.5	36.8	34.9	33.4
38.4	38.6	37.5	35.9	34.9
44.6	47.5	44.7	44.2	40.9
50.7	54.2	51.5	48.4	45.0
44.3	47.5	45.4	43.0	39.8
39.4	40.1	39.2	37.6	35.5
54.5	57.7	55.0	51.6	48.3

53.8	57.2	54.4	51.0	47.6
41.2	43.6	41.7	38.7	35.6
37.6	38.9	37.2	35.9	33.2
37.4	38.2	36.4	34.2	32.5
37.7	38.4	36.4	34.0	32.3
37.2	37.8	36.1	34.0	32.6
40.9	39.3	36.8	35.0	32.6
40.4	39.5	37.7	35.1	33.2
59.8	58.1	52.6	49.8	47.8
61.8	59.5	54.6	51.7	49.7
49.5	47.8	43.6	40.8	38.2
38.9	39.7	38.2	36.5	34.0
39.4	41.3	38.5	36.1	33.6
47.3	48.6	45.3	43.5	40.4
50.8	52.5	49.7	48.4	46.2
49.3	51.0	48.5	46.9	44.8
46.5	47.4	47.9	45.8	43.7
39.7	41.9	40.2	37.8	35.0
37.9	39.2	37.6	34.9	32.5
37.1	37.5	35.6	34.0	32.1
46.5	38.2	37.8	42.9	44.1
46.7	37.8	38.7	38.9	38.4
38.6	38.4	37.0	37.3	35.3
46.6	45.8	45.6	42.4	40.8
61.6	63.5	60.7	57.2	53.2
59.1	60.1	58.6	55.2	51.2
48.2	49.8	47.3	44.2	42.8
40.1	40.6	38.7	37.1	36.2
39.0	38.8	37.7	36.1	35.1
38.2	39.8	38.8	37.1	36.7
39.0	40.5	39.7	38.6	38.5
44.0	46.9	44.1	41.0	38.8
58.2	60.9	57.6	53.9	51.7
63.7	65.4	60.8	56.2	52.2
59.3	61.7	58.2	54.5	50.1
41.1	43.5	41.2	38.5	35.2
35.8	36.6	35.0	33.7	32.0
37.0	37.9	35.8	33.5	32.1
37.3	38.8	36.6	34.4	32.1
48.6	51.8	50.3	45.5	41.8
58.9	60.9	59.5	54.2	51.0
51.8	54.5	53.0	49.0	45.1
38.0	40.4	39.8	36.2	33.1
37.5	40.0	41.2	34.5	32.5
54.5	57.9	55.2	51.6	48.4
59.0	61.1	57.8	54.1	51.1
47.0	50.3	49.5	45.3	40.9
38.2	39.9	38.8	36.6	34.7

42.9	43.1	40.8	39.4	40.2
59.0	59.2	57.3	54.1	53.9
59.6	59.8	57.4	54.1	53.0
46.2	47.3	44.1	41.4	38.6
40.7	41.7	39.2	36.8	37.1
39.3	40.3	38.8	37.1	37.7
44.8	47.2	46.0	40.8	38.7
65.8	68.2	64.7	59.6	56.6
62.8	65.4	61.9	57.5	55.2
66.8	67.4	64.3	61.0	57.3
64.9	65.5	62.6	59.5	55.8
57.0	56.7	53.5	50.7	47.9
54.5	54.6	53.7	52.6	50.8
57.4	59.2	57.7	54.7	52.5
46.0	47.6	45.7	44.0	41.4
38.8	39.5	37.2	40.4	34.5
36.9	38.4	36.8	36.3	33.2
36.8	38.7	37.4	35.6	35.2
49.3	52.0	48.6	46.3	44.3
53.6	56.5	53.7	50.4	48.6
52.5	55.7	53.0	51.0	47.8
60.9	62.1	59.9	56.3	52.8
51.9	54.9	52.9	50.0	46.2
60.2	59.5	55.9	54.3	51.3
59.5	59.3	55.7	53.6	50.9
50.8	51.1	48.7	46.3	42.9

1/3 LASmax 2500	1/3 LASmax 3150	1/3 LASmax 4000	1/3 LASmax 5000	1/3 LASmax 6300
40.3	40.2	36.7	34.5	31.0
40.9	47.2	44.8	35.6	32.9
46.3	45.3	43.0	35.7	31.9
47.3	43.8	40.4	36.6	32.6
39.3	42.3	34.8	33.5	37.6
44.9	40.6	38.3	37.5	39.8
50.3	46.6	42.5	39.4	36.6
42.9	40.7	37.2	33.5	30.0
36.3	35.4	33.3	30.5	27.6
35.4	33.8	32.8	30.9	27.2
34.2	33.9	32.7	31.0	28.7
37.0	35.9	34.2	32.0	30.1
39.6	39.9	38.2	35.9	31.9
55.1	55.4	54.3	50.5	46.1
49.4	49.7	48.5	45.0	40.6
44.2	45.9	35.4	32.6	29.0
36.6	38.2	33.9	31.7	28.1
33.3	37.1	38.6	30.9	27.6
42.9	41.5	40.2	37.2	34.5
48.4	44.7	42.6	39.3	35.9
40.8	38.6	36.3	33.4	30.4
34.5	34.3	32.5	30.0	26.9
36.6	33.8	33.2	32.2	30.0
36.2	33.7	33.1	32.2	30.1
34.6	34.4	33.6	32.1	29.7
33.4	33.2	32.2	30.8	28.7
33.0	33.2	32.5	30.4	32.8
33.1	32.3	30.6	28.1	26.1
32.3	32.1	30.4	27.8	24.7
33.3	32.5	30.7	28.1	24.9
38.3	34.6	32.7	30.3	27.4
51.8	46.8	44.2	40.3	36.9
45.3	41.1	38.9	35.0	32.0
33.0	30.9	29.5	26.7	23.9
34.5	34.5	34.1	33.4	31.3
34.4	34.3	33.9	35.3	30.9
35.5	35.6	33.9	31.4	28.3
35.7	35.6	33.9	31.4	28.3
32.1	32.0	30.2	28.3	25.5
33.1	33.0	31.5	29.3	26.7
34.5	34.7	32.8	30.8	28.4
37.3	35.7	34.2	33.4	29.5
43.7	41.7	40.8	38.4	34.8
37.4	35.6	34.8	32.4	29.1
34.4	33.3	32.1	30.1	26.6
45.2	42.3	39.6	36.6	33.0

44.6	41.8	39.2	36.2	32.5
33.0	31.5	29.8	27.3	24.4
32.6	32.4	30.7	28.2	25.2
32.4	32.0	30.4	28.1	25.1
31.8	31.3	29.6	27.3	24.8
31.4	30.9	30.0	29.1	25.5
31.6	31.3	30.2	28.7	26.4
32.3	32.1	30.8	29.0	26.3
44.4	40.6	38.1	34.3	30.6
47.9	44.9	42.1	39.1	35.1
35.9	33.4	31.1	28.0	24.7
38.6	35.9	30.9	28.7	25.6
36.6	34.3	30.1	28.3	25.5
36.7	34.9	32.0	28.9	25.7
45.5	46.0	43.3	38.9	35.1
44.3	44.6	41.4	38.2	35.1
43.3	42.8	39.7	36.7	33.8
33.2	32.2	30.6	29.4	27.5
30.6	29.7	27.7	25.7	23.1
30.9	30.0	28.4	28.6	24.1
39.0	37.3	30.0	27.6	26.0
38.1	37.6	32.0	29.1	26.2
34.9	35.9	35.7	32.0	28.5
38.2	37.8	38.2	34.8	32.0
50.7	47.5	45.3	41.9	39.0
48.5	45.9	44.8	40.5	37.6
41.5	40.6	40.0	35.4	32.4
35.6	36.3	38.7	35.2	28.7
35.7	36.2	36.4	32.3	28.6
37.3	37.6	36.2	34.2	31.3
39.1	40.2	39.5	35.3	32.0
38.9	40.1	39.4	35.2	31.8
47.7	43.9	40.6	36.8	32.4
51.0	47.8	42.8	38.9	35.4
48.4	45.2	40.5	36.3	32.5
33.6	32.3	31.5	29.2	26.5
30.2	31.6	32.6	27.3	24.9
31.8	30.2	31.9	26.3	23.6
30.0	29.3	27.9	25.8	23.1
38.1	34.9	32.9	28.7	25.2
48.3	45.1	41.0	37.9	34.3
41.8	38.9	35.7	32.5	28.8
33.5	30.9	30.0	27.5	24.9
34.1	31.9	31.3	28.6	25.4
44.6	40.9	36.8	33.4	29.2
47.5	44.6	40.6	36.2	32.1
37.6	35.1	32.3	29.6	27.2
35.0	34.7	33.6	31.9	27.6

40.1	38.4	36.2	33.5	29.8
53.1	50.4	47.4	44.7	42.2
51.6	49.7	47.0	44.2	41.9
37.0	36.4	34.6	31.6	28.3
38.1	38.1	37.5	33.2	30.1
37.6	37.4	36.2	33.9	31.0
37.4	37.0	35.7	32.9	30.0
52.8	49.5	46.6	42.7	38.6
51.7	48.0	45.0	41.3	37.5
54.1	51.8	48.7	45.5	42.2
52.6	50.1	47.1	43.9	40.3
44.7	42.8	40.0	36.0	32.5
48.1	44.4	41.8	38.4	35.4
50.6	46.6	44.3	41.1	37.9
39.3	36.3	33.0	30.0	26.7
44.8	36.6	33.5	29.6	26.3
38.6	31.8	29.9	26.2	23.7
32.5	30.9	32.2	29.2	27.2
41.4	39.2	36.3	32.7	29.0
45.0	43.2	40.9	37.9	33.9
44.7	41.8	38.7	36.5	34.1
49.0	46.5	43.8	41.1	36.9
42.6	38.8	36.9	34.1	30.1
48.2	45.2	41.6	38.1	34.8
47.6	45.1	42.0	39.2	36.0
39.7	37.6	35.3	33.2	30.5

1/3 LASmax 8000	1/3 LASmax 10000	1/3 LASmax 12500	1/3 LASmax 16000	1/3 LASmax 20000
26.5	21.4	15.6	10.9	8.9
35.9	22.0	17.7	12.0	9.4
34.3	22.9	17.8	13.4	9.7
28.9	23.6	18.2	13.5	9.8
32.8	26.1	23.6	16.9	14.7
34.3	25.7	21.7	16.0	13.1
31.7	27.1	22.4	16.8	12.0
25.4	20.5	15.3	11.1	9.3
23.4	19.0	14.4	10.7	9.3
26.6	22.4	16.4	12.2	9.6
25.1	20.9	15.7	11.2	9.5
25.6	21.2	16.3	12.3	9.9
28.0	22.9	16.9	11.8	9.7
40.9	35.0	30.0	23.7	16.3
34.5	27.9	22.4	16.2	10.8
24.7	19.7	14.5	10.6	9.3
24.3	20.0	14.9	10.8	9.3
24.1	20.0	14.8	10.7	9.4
30.8	26.0	20.1	14.9	10.3
31.8	28.0	22.1	17.0	11.3
26.2	22.1	16.5	12.2	9.6
22.7	18.2	13.4	10.1	9.5
27.0	22.9	17.2	12.1	9.7
27.0	22.9	17.2	12.1	9.7
26.3	21.8	16.3	11.6	9.6
25.2	20.8	15.6	11.0	9.5
31.8	30.3	25.5	18.3	12.0
23.4	20.8	16.4	11.3	9.6
20.6	16.3	12.3	9.5	9.4
20.7	16.4	12.4	9.6	9.3
23.8	19.5	14.7	10.8	9.7
34.6	30.8	26.1	20.4	14.1
28.7	24.6	19.8	14.5	10.6
20.3	16.8	13.2	10.3	9.5
28.1	23.7	18.2	12.6	9.6
27.8	23.3	17.8	12.3	9.6
24.2	19.6	15.2	11.2	9.7
24.1	19.6	14.3	10.4	9.6
21.8	17.7	13.1	9.7	9.5
29.3	18.5	13.8	10.1	9.5
26.9	21.6	16.1	11.2	9.6
25.8	21.0	16.2	11.4	9.5
31.8	28.1	24.8	20.1	13.7
25.9	21.9	17.6	13.2	10.2
22.6	18.1	13.4	10.0	9.5
29.9	25.6	19.7	14.6	10.9

29.1	24.9	18.9	13.6	10.4
20.7	16.7	12.7	9.8	9.5
21.3	17.1	12.8	9.9	9.5
21.3	17.0	12.8	9.7	9.4
21.0	16.8	12.7	9.6	9.4
22.4	18.3	13.7	10.0	9.4
23.2	18.9	14.0	10.3	9.5
22.9	18.5	13.7	10.2	9.5
26.2	21.1	16.0	11.2	9.6
31.6	26.9	22.2	16.6	11.9
21.1	17.2	13.2	9.9	9.7
21.9	17.7	13.4	10.0	9.8
21.9	18.0	13.6	10.1	9.9
22.0	18.3	13.8	10.2	10.1
32.6	29.7	23.6	18.9	13.6
31.1	28.3	23.3	19.1	13.1
29.1	26.1	21.6	17.3	12.0
24.0	20.0	15.1	10.8	10.0
19.6	15.8	12.2	9.5	9.8
20.5	16.6	12.6	9.6	9.9
23.4	18.9	13.6	10.0	9.8
22.5	18.3	13.6	10.0	9.9
30.4	20.1	15.0	10.8	10.1
29.5	23.9	18.3	12.7	10.2
36.2	32.4	28.7	24.3	17.4
38.1	37.1	24.9	20.2	14.1
30.0	27.5	18.2	13.3	10.7
25.2	20.8	15.3	10.9	10.1
24.6	19.7	14.5	10.4	10.0
27.6	22.7	17.1	12.1	10.9
28.2	23.5	18.0	12.8	10.8
27.5	22.5	16.6	11.5	10.8
28.5	47.2	54.3	14.9	11.6
32.3	47.8	47.7	18.4	14.5
29.4	30.5	28.8	15.8	12.5
23.1	19.2	14.7	10.3	10.7
21.9	17.8	13.3	10.0	10.6
20.2	16.5	12.7	9.9	10.4
20.0	16.2	12.5	9.7	10.3
21.2	17.2	13.2	9.7	10.3
30.3	25.9	20.2	14.7	11.0
24.2	19.7	14.6	10.6	10.4
21.6	17.5	13.3	10.1	10.3
22.1	18.0	13.5	10.1	10.3
25.1	20.8	15.9	11.5	10.2
28.5	24.0	18.5	14.1	10.8
23.7	19.5	14.5	10.4	10.1
23.4	18.8	13.9	10.2	10.1

26.2	21.4	15.7	10.8	10.1
38.5	33.7	28.9	24.1	17.0
38.2	33.4	28.5	23.8	17.0
23.7	19.2	14.9	11.2	10.1
25.6	20.4	15.2	11.3	10.8
27.2	22.6	17.1	12.2	10.4
26.1	21.8	16.8	11.9	10.3
34.6	30.4	25.7	20.2	13.8
34.1	30.0	25.5	19.9	12.9
38.4	34.2	29.8	24.3	17.4
36.3	32.2	27.6	22.2	15.9
28.1	23.5	18.3	13.7	10.8
29.8	24.0	19.0	13.2	10.3
33.1	27.9	23.6	17.8	12.4
22.7	18.3	14.2	10.6	10.2
19.3	15.2	12.1	9.5	10.0
20.0	16.3	12.6	9.9	10.0
23.9	20.0	15.0	10.8	10.2
25.4	20.8	15.4	11.3	10.3
32.1	29.0	24.4	19.2	13.7
29.7	25.9	21.3	14.8	11.5
32.2	27.7	23.5	17.7	12.9
25.8	21.9	16.6	12.2	10.5
32.1	28.5	23.6	20.1	12.8
31.9	26.6	21.1	15.7	11.3
26.3	21.4	15.8	11.1	10.2

1/3 LASmin 6.3	1/3 LASmin 8.0	1/3 LASmin 10.0	1/3 LASmin 12.5	1/3 LASmin 16.0
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	1.0	1.8
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	0.8
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-0.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.5
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.2
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6

1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-0.5
1.9	0.9	0.3	-0.8	1.8
1.9	0.9	0.3	-0.8	0.2
1.9	0.9	0.3	-0.8	-0.3
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.0
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	1.2
1.9	0.9	0.3	5.1	12.0
1.9	0.9	0.3	-0.8	-0.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	6.1	9.5
1.9	0.9	0.3	0.4	7.1
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	0.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6

1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-0.5
1.9	0.9	0.3	-0.8	1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-0.4
1.9	0.9	0.3	-0.8	0.3
1.9	0.9	0.3	-0.8	2.2
1.9	0.9	0.3	-0.8	0.7
1.9	0.9	0.3	0.4	4.3
1.9	0.9	0.3	-0.8	-0.9
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6

1/3 LASmin 20.0	1/3 LASmin 25.0	1/3 LASmin 31.5	1/3 LASmin 40.0	1/3 LASmin 50.0
1.6	5.7	7.1	12.2	14.7
0.3	4.8	7.3	12.1	13.5
-0.3	6.9	9.1	13.1	14.3
7.5	10.4	14.1	17.8	20.4
1.5	5.4	8.8	15.8	15.0
0.2	5.3	8.5	12.2	14.5
1.2	7.5	11.4	12.5	17.5
-2.4	4.8	11.6	14.5	17.2
-2.4	4.9	8.6	12.5	17.4
0.9	6.5	10.1	14.0	16.6
-1.8	5.1	10.0	12.0	15.9
-2.2	5.9	9.0	12.0	15.8
1.1	6.7	10.0	14.0	18.1
1.2	5.7	11.8	15.7	22.4
4.0	9.1	14.5	21.6	28.7
0.7	7.6	9.7	15.5	21.5
1.3	7.0	8.6	13.8	17.7
1.4	4.7	8.0	16.4	15.4
1.1	4.3	6.5	16.6	16.2
-0.1	5.3	8.5	16.8	22.8
-0.7	6.6	13.5	19.3	19.6
-2.4	4.2	8.4	12.3	13.8
-2.4	5.9	9.7	11.6	13.6
1.3	6.8	10.3	13.4	13.2
1.1	6.8	11.6	12.8	12.9
2.5	7.7	9.9	12.7	13.6
2.8	7.7	9.5	19.0	16.0
-2.4	3.4	7.0	13.3	15.9
-1.6	3.4	8.1	11.3	17.7
-2.1	7.8	7.2	12.8	16.5
0.7	5.6	11.3	12.1	16.4
4.1	8.5	12.3	16.1	21.6
1.4	7.4	11.8	17.9	20.3
0.8	4.9	9.2	16.1	14.6
0.5	4.5	9.0	12.8	14.6
-1.0	4.7	8.4	13.1	14.8
-2.3	3.7	8.6	12.4	14.7
-2.4	3.7	9.1	12.0	15.9
-2.4	4.8	9.4	15.3	15.5
-0.9	4.0	9.4	17.5	17.7
-0.2	5.9	10.8	15.3	16.7
-1.6	5.8	10.3	16.6	18.3
1.4	6.4	12.6	17.2	24.8
3.2	9.2	12.8	19.8	18.5
-1.4	6.0	9.9	16.0	17.9
-2.0	5.9	10.9	17.1	19.4

1.7	7.9	13.7	18.7	21.1
1.6	8.1	13.6	17.0	20.1
5.2	8.4	13.3	15.0	17.2
3.7	5.4	13.0	15.7	18.4
1.9	7.5	11.3	14.7	15.3
1.3	4.0	10.5	12.4	15.5
-1.3	6.2	9.6	12.1	13.5
-0.8	3.0	9.3	11.8	13.7
-1.1	4.2	9.2	11.1	15.8
1.2	9.4	15.7	21.4	21.8
3.4	6.7	11.2	15.7	17.2
0.5	3.7	10.0	16.7	16.8
-2.4	3.8	11.1	20.7	15.9
-1.5	5.7	9.8	22.1	19.8
0.0	6.7	29.6	25.4	27.1
5.0	15.0	24.9	36.2	28.9
2.1	11.3	14.8	23.0	23.5
-0.4	8.2	10.9	18.3	18.4
-0.8	8.7	8.6	15.1	17.9
1.9	8.2	8.1	14.4	15.8
3.2	6.4	9.7	14.4	16.9
2.4	8.6	10.1	13.7	15.7
3.0	8.5	12.7	13.9	17.3
4.4	7.9	11.7	13.6	16.5
6.7	8.8	13.1	17.5	20.0
13.2	18.7	22.1	27.3	26.8
3.0	10.2	14.3	17.3	19.6
4.1	7.1	10.5	14.0	16.5
2.8	6.3	10.0	11.0	16.3
2.4	7.0	8.6	13.5	15.9
14.1	16.9	19.1	21.0	23.2
10.6	13.1	15.4	17.3	20.2
6.9	8.2	12.5	17.9	17.3
6.8	10.5	23.4	27.9	24.0
5.4	8.2	10.0	28.1	20.0
3.0	4.1	9.0	14.8	16.9
4.1	6.2	6.9	13.3	16.3
4.8	5.6	5.9	11.4	18.0
2.7	3.9	6.7	11.1	17.5
3.3	5.2	8.4	12.1	17.6
3.2	5.9	8.8	14.7	20.6
2.9	6.7	8.9	16.8	18.5
2.9	5.1	6.5	12.8	18.0
0.7	4.6	5.9	12.0	14.5
2.3	4.7	7.2	12.1	14.5
3.1	5.2	9.6	15.2	18.6
0.6	7.5	15.6	16.4	17.0
0.4	6.4	10.6	11.8	15.5

1.3	4.9	7.1	14.8	21.2
0.5	5.4	6.8	23.3	21.1
2.9	9.5	19.1	19.5	23.6
1.5	6.1	10.6	15.0	16.8
2.6	6.5	11.2	13.3	16.2
7.3	17.0	17.1	19.1	20.2
6.8	10.3	11.7	16.7	23.8
4.7	9.0	13.6	17.1	27.3
9.7	12.4	16.4	24.3	31.2
7.0	11.7	16.8	24.5	31.3
10.1	15.9	18.0	27.0	30.9
5.9	11.2	13.5	20.0	24.7
7.0	9.6	13.7	17.0	23.1
5.4	8.5	14.5	18.1	24.0
3.1	6.0	9.5	14.5	17.7
3.0	5.6	7.5	12.0	17.8
2.8	6.4	8.1	11.6	17.9
1.1	6.4	12.8	14.4	18.1
-1.2	8.9	11.5	14.9	17.4
2.3	8.8	14.6	18.0	24.8
0.1	8.7	13.8	15.7	20.3
1.6	12.4	21.6	21.9	26.6
0.4	9.7	13.0	15.5	16.1
0.7	8.2	11.8	14.3	17.1
1.4	9.0	13.0	19.7	22.0
-0.3	4.4	10.5	13.7	18.3

1/3 LASmin 63.0	1/3 LASmin 80.0	1/3 LASmin 100	1/3 LASmin 125	1/3 LASmin 160
17.2	19.2	22.0	23.0	24.8
16.7	18.8	20.4	23.7	25.0
20.0	22.3	25.7	26.9	31.6
25.1	27.6	29.5	35.0	35.3
21.3	23.5	24.7	26.6	27.2
19.2	22.3	25.0	28.1	27.3
22.8	27.4	35.1	35.2	39.8
20.1	24.5	23.4	27.8	28.4
16.3	20.6	20.8	23.4	23.3
15.3	20.6	20.8	23.3	23.8
18.0	21.4	20.4	24.1	25.8
19.2	24.1	25.7	30.4	28.9
20.7	25.8	31.5	32.0	38.6
23.7	31.8	34.5	39.4	39.5
34.6	38.9	39.7	46.6	44.5
34.2	30.7	38.5	38.2	34.6
22.0	28.7	32.6	32.8	27.2
22.1	25.2	28.5	30.2	28.0
23.0	24.1	28.0	29.2	27.0
24.7	27.4	35.3	35.4	37.8
22.3	25.1	23.7	26.9	29.7
18.1	26.1	20.3	22.1	23.1
17.1	19.3	19.6	23.2	21.6
16.6	18.1	20.8	24.6	21.2
17.2	18.3	20.2	23.3	21.4
16.1	18.1	20.5	21.9	22.0
18.4	21.0	23.3	26.4	25.8
19.7	21.1	22.2	27.2	24.9
19.1	19.3	22.6	24.3	23.2
18.7	20.0	24.3	25.4	24.8
17.0	21.9	26.9	27.9	28.6
20.0	27.9	32.6	32.8	36.0
22.3	27.4	28.2	31.4	31.9
18.2	25.2	26.6	30.2	31.1
17.3	24.1	27.0	29.8	28.7
18.9	24.0	28.2	31.7	29.3
20.4	24.8	33.0	33.7	29.9
22.3	26.1	31.2	32.0	28.4
22.3	25.6	33.5	31.6	28.6
19.2	25.7	31.8	31.1	29.1
19.8	25.4	30.5	34.0	31.1
21.0	23.5	28.6	32.5	31.6
23.1	28.6	31.6	35.1	35.9
20.9	27.4	27.2	30.8	29.6
19.8	26.9	26.7	28.8	28.5
21.4	27.9	28.4	29.7	31.5

24.4	28.0	27.9	30.4	34.0
23.7	24.8	24.8	25.6	26.1
21.7	23.6	24.9	25.0	25.3
20.8	21.4	22.2	23.5	25.2
18.2	20.5	21.7	23.9	24.4
16.5	19.5	21.0	24.0	25.5
17.3	19.1	21.2	23.6	24.5
16.2	20.7	20.6	23.2	23.1
18.2	22.6	24.2	26.6	27.2
26.1	30.4	33.0	36.2	40.0
20.1	23.3	27.4	28.4	28.7
20.1	22.6	24.2	26.4	26.7
21.1	24.2	24.8	28.0	26.8
21.9	27.7	29.6	31.4	30.8
27.1	33.9	35.5	39.0	40.1
30.5	33.0	36.1	38.2	40.3
24.7	27.3	33.3	34.9	37.8
23.1	25.3	26.9	31.1	31.1
21.4	22.9	26.7	26.4	29.2
20.4	21.5	25.8	25.2	26.7
16.9	21.3	23.8	25.4	26.3
18.1	19.9	23.1	24.9	25.9
19.8	23.5	24.6	25.4	25.7
20.6	24.5	28.1	27.4	29.7
30.3	32.7	35.6	37.4	38.2
30.4	34.2	39.0	40.2	41.9
22.0	26.4	30.8	31.6	36.9
18.2	22.6	28.1	28.1	26.7
18.8	22.9	27.7	28.1	26.1
20.3	25.8	31.7	28.1	25.7
25.7	28.4	28.9	29.5	28.8
22.5	27.4	26.9	28.5	29.3
22.3	26.7	27.6	31.1	34.3
25.2	34.6	35.9	39.6	42.8
22.0	28.1	25.6	32.5	33.0
18.7	20.2	22.3	24.7	24.4
17.9	19.9	23.1	26.7	23.7
18.1	20.3	24.3	24.5	23.6
15.4	17.3	23.1	24.7	24.8
19.7	19.5	23.3	27.6	24.8
27.1	24.9	32.5	33.8	41.3
20.0	22.5	26.7	28.4	29.3
17.8	18.9	20.9	28.9	24.6
16.9	19.8	21.9	23.9	27.2
16.3	20.4	26.9	26.6	30.2
23.7	29.7	38.6	39.4	39.8
19.2	23.0	38.6	36.0	29.6
19.5	23.8	36.2	35.6	28.6

19.3	23.0	36.8	37.7	28.8
25.8	34.9	38.3	45.3	40.5
29.2	35.9	49.4	49.0	43.6
20.1	26.0	37.3	37.0	33.1
18.9	22.1	28.8	33.5	29.3
24.8	25.2	28.6	34.2	29.1
23.0	29.7	34.4	36.9	38.0
24.4	30.6	34.2	36.3	37.6
31.0	37.8	38.7	42.3	46.3
30.6	46.3	38.9	44.7	50.2
34.5	36.0	45.7	43.1	45.5
24.1	25.6	31.1	30.2	33.2
23.1	25.4	28.0	27.6	32.7
23.5	28.1	30.4	32.5	36.3
16.6	19.8	23.3	26.0	26.9
15.7	17.3	20.3	23.8	23.7
17.1	18.3	20.3	24.2	23.5
19.1	19.9	21.2	24.9	24.9
19.4	22.0	23.4	25.0	28.6
26.9	28.1	32.1	35.7	38.7
26.4	29.8	31.7	34.9	37.0
30.2	35.1	37.2	37.3	40.8
23.3	28.6	30.0	34.5	33.5
23.9	28.6	31.2	36.0	35.8
26.4	30.2	34.6	36.2	40.1
22.3	24.5	28.3	30.4	32.8

1/3 LASmin 200	1/3 LASmin 250	1/3 LASmin 315	1/3 LASmin 400	1/3 LASmin 500
27.9	27.9	29.1	31.6	32.5
26.6	26.0	27.7	29.9	32.2
31.2	30.9	33.8	33.8	34.7
40.0	43.4	41.3	38.5	41.9
28.2	31.4	31.2	31.0	32.7
27.5	31.0	31.3	31.1	32.7
40.2	45.0	45.7	44.7	46.2
28.5	30.9	31.3	31.3	33.5
25.7	27.0	27.7	29.1	32.1
24.5	26.6	27.7	29.0	31.1
27.0	27.1	27.8	28.9	31.4
29.8	27.7	27.6	29.4	31.5
30.8	34.0	33.7	32.0	33.1
39.3	42.8	43.2	45.4	45.4
42.4	43.5	40.1	40.1	40.5
30.7	30.6	32.1	31.8	33.3
27.5	28.5	29.8	30.4	31.3
26.2	27.4	29.9	33.1	31.5
30.4	29.1	34.1	33.2	33.1
40.7	42.1	43.2	44.4	46.5
29.0	29.8	29.5	30.1	32.2
24.5	25.2	27.0	28.3	29.6
23.6	24.5	26.2	27.5	29.2
22.9	25.2	26.8	27.9	29.9
22.5	25.3	26.3	28.0	31.1
23.5	25.3	26.4	28.9	31.1
27.3	26.8	27.5	29.3	31.9
25.3	25.4	26.6	28.0	30.3
24.9	24.7	25.9	27.6	30.1
26.7	25.9	26.9	30.0	30.6
28.4	28.8	31.3	31.9	32.2
37.8	41.9	43.3	42.1	45.3
31.8	34.0	33.2	32.1	34.4
28.2	27.9	28.3	27.4	29.6
26.0	28.5	28.2	27.5	29.5
27.2	30.8	28.6	29.3	30.5
28.2	32.5	29.2	29.6	31.1
29.3	31.5	27.8	28.7	31.0
27.9	28.3	26.7	28.5	30.6
27.0	28.2	27.1	29.7	31.0
26.9	28.4	27.9	29.4	31.4
28.2	28.8	28.7	30.0	31.9
34.7	37.4	37.2	37.7	39.2
29.7	31.6	31.0	32.3	33.4
27.0	28.6	27.7	30.5	32.8
30.4	31.9	34.1	35.1	37.4

34.7	34.8	34.1	35.1	38.0
24.8	26.7	26.7	28.6	30.9
24.1	25.9	26.3	28.2	30.7
26.3	24.9	26.4	29.1	31.1
24.5	26.0	28.2	30.7	33.2
23.7	27.6	29.0	30.9	32.3
24.6	27.3	28.1	30.4	32.5
24.6	26.4	27.4	29.4	32.2
27.5	31.0	29.7	33.1	35.2
42.2	42.5	40.8	44.7	46.1
29.1	29.9	30.9	32.9	34.2
27.6	28.6	29.2	30.8	32.0
28.7	30.7	29.0	30.8	32.0
31.1	33.0	30.8	31.7	35.1
42.8	43.9	42.2	44.9	44.5
41.0	41.8	41.0	39.8	43.0
38.9	38.9	35.9	35.1	37.0
32.3	31.7	29.5	30.3	31.0
30.9	28.4	28.0	28.4	30.8
29.4	27.6	26.7	30.0	30.8
28.5	29.3	28.0	30.3	33.9
26.5	29.2	29.0	29.8	33.7
26.7	29.1	28.2	29.9	33.0
28.2	30.5	31.7	30.9	32.9
39.8	40.5	39.5	37.0	40.2
45.9	47.3	44.5	43.3	44.2
37.2	36.2	34.6	33.8	35.6
28.2	28.9	30.5	30.9	32.3
27.9	28.8	29.1	32.0	32.6
29.4	28.4	28.5	31.1	33.7
30.0	31.8	32.4	32.4	34.1
28.7	30.7	33.2	33.7	34.9
35.0	38.9	36.9	37.9	39.1
45.4	46.0	44.3	44.2	46.8
33.1	35.1	32.0	33.7	36.3
26.2	26.2	25.9	28.5	30.1
25.3	26.5	26.5	28.7	29.0
25.6	30.4	29.9	29.6	29.7
26.0	30.2	29.7	28.9	30.0
27.8	30.6	29.8	28.5	31.2
41.1	43.8	44.2	41.1	45.6
30.2	34.2	31.5	33.0	33.3
24.7	27.2	26.2	28.7	29.9
25.1	27.3	26.2	28.8	30.5
28.9	29.8	27.8	29.0	31.1
41.7	43.1	39.8	40.0	43.3
34.7	31.6	31.9	31.0	33.5
33.3	29.2	31.1	30.0	31.8

31.5	30.9	30.6	30.9	32.3
46.7	44.4	39.0	37.8	41.1
46.6	42.6	41.7	42.1	43.3
34.3	33.8	31.7	32.6	34.1
31.4	31.4	30.4	30.7	31.9
31.7	32.0	31.1	31.4	32.4
36.1	39.5	35.7	34.6	35.2
36.2	42.1	38.1	37.3	39.6
48.2	49.9	46.9	48.0	51.3
50.0	51.8	49.1	49.3	53.0
51.7	49.1	48.4	50.5	51.7
37.0	36.0	33.6	35.0	37.7
32.8	35.4	32.8	34.0	36.7
38.3	41.8	42.8	45.1	45.6
26.4	32.9	30.6	31.8	34.7
24.8	26.7	26.3	28.5	31.7
24.8	26.8	26.4	29.1	30.8
25.4	27.6	27.1	29.5	30.9
27.5	29.8	29.3	30.9	32.6
39.3	41.6	39.5	40.4	43.1
38.9	41.4	39.3	39.2	41.9
43.1	46.5	47.0	46.1	48.7
36.0	39.4	36.6	35.8	40.2
38.1	41.2	37.6	36.0	42.1
43.4	43.9	41.0	42.9	45.3
32.7	33.5	34.0	34.4	35.6

1/3 LASmin 630	1/3 LASmin 800	1/3 LASmin 1000	1/3 LASmin 1250	1/3 LASmin 1600
33.5	35.8	37.5	36.2	35.3
33.4	35.4	37.4	35.8	34.6
36.0	37.4	39.4	40.3	40.7
43.6	45.0	47.6	46.7	44.3
35.1	38.3	39.7	38.5	36.4
35.0	38.8	41.8	39.4	36.5
48.3	50.9	54.4	52.7	50.2
36.1	39.2	40.7	39.5	38.0
34.1	37.2	38.5	37.1	35.9
33.5	36.9	38.3	36.2	34.9
33.8	37.0	38.2	36.8	35.4
33.8	37.5	38.4	36.5	35.4
34.4	38.1	38.8	36.9	35.9
46.3	50.8	50.5	47.4	46.3
42.5	43.1	43.0	41.6	40.2
35.9	38.3	39.3	37.8	36.5
34.4	37.6	39.1	37.0	35.0
34.4	37.5	38.5	36.5	34.8
35.2	38.3	39.8	37.1	36.1
47.7	50.4	52.0	49.4	47.8
34.5	37.5	38.7	37.1	35.8
32.8	36.0	36.6	35.5	33.7
31.7	35.4	36.0	34.9	33.0
33.8	35.5	36.8	36.0	34.0
33.8	36.0	37.5	35.9	34.3
34.4	37.3	38.1	36.8	34.5
34.2	37.3	39.0	37.6	35.3
33.2	36.1	37.9	36.2	33.8
32.5	34.9	36.1	34.7	33.0
32.8	35.3	36.3	35.3	34.0
35.2	37.7	39.2	37.1	35.2
45.6	48.1	51.2	50.3	46.9
36.7	38.6	40.1	38.2	36.0
32.1	34.8	35.8	34.4	32.7
31.9	34.6	36.2	34.4	32.7
33.3	36.4	37.6	35.4	34.4
33.6	37.3	38.3	36.2	34.3
33.8	36.8	37.8	35.9	34.0
33.3	36.3	38.1	35.9	33.8
32.8	37.3	37.6	36.1	34.2
32.9	36.8	37.6	36.2	34.5
33.6	37.1	38.0	36.7	35.0
43.5	44.3	47.5	44.7	43.0
35.2	37.6	38.6	37.2	35.0
33.8	36.7	37.6	36.5	34.5
37.4	39.5	40.1	39.2	37.6

37.9	41.2	43.6	41.7	38.7
33.0	36.6	38.4	36.6	34.0
33.3	36.5	37.8	36.3	34.1
33.1	36.3	37.1	35.3	33.2
34.8	36.4	37.4	35.6	33.3
34.3	35.7	37.0	35.5	33.1
33.7	37.1	37.5	35.8	34.0
34.2	37.7	38.1	36.1	34.1
35.9	38.3	39.1	37.2	34.7
45.4	49.5	47.8	43.6	40.8
35.3	38.8	39.2	36.5	34.3
34.1	37.5	38.4	36.8	34.3
34.0	37.2	38.5	36.6	34.9
36.2	39.3	41.2	38.4	36.0
44.4	47.3	48.5	45.3	43.5
44.4	44.4	45.8	45.6	43.8
39.1	39.7	42.0	40.3	37.8
33.9	37.0	38.6	37.0	34.8
33.2	35.6	36.9	34.9	33.2
33.4	35.5	36.5	34.3	33.0
34.5	35.9	36.0	34.1	32.8
36.4	38.1	36.6	35.7	35.3
34.7	36.4	36.7	36.0	34.8
34.4	37.4	38.4	36.4	35.4
44.6	46.6	45.8	45.6	42.3
45.7	48.2	49.8	47.4	44.3
36.5	40.2	40.5	38.7	37.0
34.4	36.6	37.3	36.6	35.2
34.9	36.6	37.8	36.6	35.3
35.0	37.5	38.7	37.3	35.8
35.8	37.8	39.4	38.3	36.7
37.1	38.7	40.3	39.2	37.7
41.6	44.2	47.0	44.2	41.1
48.1	51.0	54.1	51.4	49.2
37.7	41.1	43.6	41.2	38.4
32.3	34.9	36.4	34.9	33.5
31.4	34.4	35.9	34.3	32.2
32.7	35.6	36.3	34.8	32.3
32.4	35.9	37.1	35.3	33.3
32.7	36.4	38.8	36.6	33.8
45.0	48.8	51.9	50.3	45.5
35.4	38.0	40.4	39.2	36.3
32.5	36.0	37.9	36.5	33.6
33.1	36.4	37.4	36.8	33.7
33.5	36.8	39.0	37.3	34.4
44.4	47.1	50.3	49.5	45.4
35.6	38.0	39.8	38.7	36.6
34.8	36.8	38.0	36.0	34.6

34.2	36.9	38.3	36.4	35.0
41.5	42.9	43.0	40.7	39.4
44.1	46.2	47.4	44.1	41.4
35.9	40.6	40.9	39.0	36.6
34.0	37.8	38.1	36.6	35.7
34.3	37.8	38.5	36.8	35.6
36.2	38.2	39.1	37.7	36.2
39.7	44.8	47.4	45.9	40.8
52.0	54.8	57.6	55.5	52.6
53.3	56.9	60.0	58.7	55.4
54.4	57.0	56.7	53.5	50.8
39.1	41.5	42.9	40.9	38.9
38.2	40.5	42.2	40.7	38.8
45.2	46.1	47.6	45.8	44.0
35.2	38.7	38.9	37.1	35.6
32.4	35.9	37.7	35.7	33.9
32.7	35.6	37.7	36.1	34.1
32.8	35.8	37.6	36.3	34.3
34.1	36.5	38.7	36.6	34.6
43.5	46.8	49.2	46.5	44.6
43.2	46.3	49.0	46.2	43.7
48.9	52.0	55.0	53.0	50.0
41.4	42.6	45.1	42.2	40.2
46.6	46.4	48.8	45.9	44.8
47.1	50.8	51.1	48.7	46.4
35.9	39.4	40.5	39.0	36.9

1/3 LASmin 2000	1/3 LASmin 2500	1/3 LASmin 3150	1/3 LASmin 4000	1/3 LASmin 5000
36.5	37.5	36.5	34.9	32.4
34.8	34.0	33.3	31.7	29.2
37.9	36.2	36.8	34.8	31.6
40.9	38.1	36.3	34.3	31.6
35.3	35.2	34.5	32.6	30.5
35.4	35.0	34.4	32.5	29.8
46.4	42.3	38.1	34.3	31.7
36.8	36.4	35.3	32.6	29.7
34.7	33.6	32.7	31.2	29.1
34.1	33.5	32.5	31.2	29.2
34.0	33.4	32.9	31.9	30.2
34.2	33.7	33.5	32.0	30.5
35.3	35.0	34.4	33.3	31.2
42.4	39.7	39.9	38.2	36.0
38.8	40.1	38.1	35.4	32.4
35.3	36.6	37.9	32.7	30.0
33.4	32.3	31.8	30.1	28.7
32.8	30.9	31.7	31.1	27.1
34.5	33.2	32.9	32.0	30.1
44.1	40.9	38.6	36.3	33.4
34.4	34.3	34.2	32.5	30.0
32.7	32.5	32.2	30.6	28.5
31.8	31.4	30.9	29.5	27.9
33.4	33.1	32.3	31.5	30.5
33.4	33.5	33.2	32.2	30.8
33.0	32.3	31.6	30.2	28.5
33.2	32.2	31.1	29.7	27.7
31.5	29.4	28.2	26.5	24.4
30.8	28.9	27.3	25.6	23.6
32.3	31.8	30.8	28.9	26.2
32.9	31.5	30.7	28.8	26.2
41.8	38.3	34.6	32.7	30.3
33.8	32.5	30.7	28.5	26.1
31.1	30.2	29.4	27.9	25.8
31.0	29.7	29.0	27.8	25.7
33.9	33.1	32.8	31.5	30.4
34.0	33.5	33.2	31.8	30.2
32.4	31.8	31.6	30.2	28.3
32.3	31.6	31.1	29.2	26.8
32.8	31.7	31.0	29.1	26.7
33.0	32.8	32.4	31.2	29.3
33.8	33.4	33.0	31.6	30.0
39.7	37.3	35.6	34.1	32.4
32.6	31.6	30.9	29.5	27.0
32.5	31.4	30.8	29.4	26.9
35.5	34.5	33.3	32.1	30.1

35.6	33.0	31.5	29.5	27.3
32.3	30.8	30.3	28.5	26.0
32.4	32.0	31.5	29.3	26.5
31.8	31.3	30.9	29.4	27.0
30.9	29.5	28.8	27.1	24.3
30.8	29.5	28.7	27.0	24.3
32.0	30.9	30.3	29.2	28.0
32.3	31.4	30.9	29.7	28.0
33.0	31.8	31.0	29.6	28.0
38.2	36.0	33.5	31.1	28.0
31.7	29.4	27.9	25.8	23.5
31.8	29.8	28.3	26.2	23.8
32.6	30.8	29.9	28.5	26.4
33.4	31.2	30.3	28.5	26.4
40.4	36.8	35.0	32.1	28.9
42.4	41.4	41.7	38.6	35.0
35.0	33.2	32.2	30.6	29.4
32.5	29.4	28.0	26.1	24.2
31.3	29.1	28.0	26.0	23.8
30.8	29.4	28.6	26.6	25.1
30.9	29.0	28.4	26.4	24.6
34.3	33.5	32.3	28.9	27.0
33.9	33.0	32.4	32.0	28.8
34.4	34.4	34.7	34.5	31.8
40.7	38.0	37.5	37.6	34.8
42.8	41.5	40.7	39.7	35.4
36.2	35.1	35.6	35.5	31.9
34.9	34.7	34.7	34.5	30.7
34.4	35.0	35.3	33.7	30.7
35.2	35.4	35.6	34.2	31.6
36.6	37.4	37.6	36.1	34.1
36.7	36.5	36.8	35.1	31.7
38.9	37.5	37.0	35.1	32.3
45.8	42.3	39.1	35.8	31.9
35.2	33.6	32.2	31.1	29.2
31.5	30.1	29.6	28.3	26.3
30.6	29.0	28.3	27.0	25.7
31.1	29.2	28.1	26.5	24.1
31.1	28.8	28.1	26.6	24.8
32.1	29.9	29.2	27.4	25.3
41.9	38.2	34.9	32.9	28.7
33.1	31.2	29.8	28.1	25.5
31.7	30.3	29.6	28.0	25.7
31.5	30.4	29.9	28.5	26.0
31.9	30.5	30.3	29.0	26.1
40.9	37.6	35.1	32.3	29.3
34.3	32.6	31.4	29.9	28.1
33.2	32.4	32.0	30.4	28.3

34.6	35.0	34.7	33.6	31.9
40.1	39.9	38.0	36.0	33.4
38.6	37.0	35.9	33.9	31.0
36.0	35.5	34.6	32.6	29.7
35.5	36.3	36.2	34.6	31.4
35.6	36.4	36.2	35.4	32.2
35.7	35.0	33.8	32.7	30.5
38.7	36.0	33.9	33.6	30.5
49.8	46.0	42.2	38.7	35.2
51.4	46.8	43.5	40.0	36.5
47.9	44.8	42.9	40.0	36.0
37.6	36.3	35.0	33.3	30.7
37.5	36.3	34.8	33.3	30.5
41.5	39.4	36.4	33.1	30.0
32.7	29.8	28.1	27.0	23.7
31.3	28.9	27.5	26.2	23.3
31.6	30.5	29.0	27.9	24.9
32.5	30.7	29.3	28.0	26.0
32.9	31.4	30.8	30.9	28.4
42.7	39.6	37.5	35.2	31.4
41.1	38.0	35.6	33.3	30.0
46.2	41.9	38.8	37.0	34.1
37.0	34.8	32.8	31.6	29.9
39.9	36.8	34.9	33.3	31.0
42.9	39.7	37.6	35.4	33.2
35.0	33.5	33.2	32.1	30.0

1/3 LASmin 6300	1/3 LASmin 8000	1/3 LASmin 10000	1/3 LASmin 12500	1/3 LASmin 16000
29.3	24.6	19.8	14.3	10.2
26.0	21.9	17.5	12.9	9.8
27.1	24.8	18.6	14.0	10.4
27.4	23.0	18.3	13.4	9.9
26.3	21.5	17.0	12.6	9.6
29.2	25.7	20.0	15.9	11.7
30.1	25.4	20.1	15.3	11.1
26.8	22.3	17.4	12.8	9.5
26.2	22.5	18.2	13.5	9.9
26.4	23.0	18.7	14.4	10.4
27.1	24.0	19.7	14.7	10.6
27.7	24.3	19.9	14.9	11.0
28.5	24.7	20.1	15.0	10.7
32.0	28.0	23.0	16.9	11.8
29.0	24.7	19.6	14.5	10.5
27.2	23.0	18.5	13.5	9.9
24.7	20.7	16.6	12.7	9.6
23.1	19.7	16.1	12.4	9.7
27.6	24.1	19.9	14.7	10.6
30.4	26.2	21.7	16.4	11.8
26.9	22.6	18.2	13.3	9.8
25.8	22.1	17.8	13.2	9.8
25.2	21.7	17.5	13.1	9.9
28.1	24.9	20.4	15.3	11.0
28.7	25.2	20.8	15.6	11.1
25.9	22.4	18.1	13.5	10.0
25.0	21.3	17.1	13.0	9.7
21.8	18.3	15.2	11.8	9.3
20.8	17.4	14.4	11.4	9.2
23.2	19.0	15.1	11.7	9.3
23.2	19.0	15.1	11.7	9.3
27.3	23.8	19.4	14.6	10.6
23.3	19.7	16.4	12.8	9.9
23.1	19.5	16.0	12.4	9.5
23.2	19.7	16.1	12.4	9.5
27.2	23.5	19.3	14.3	10.4
27.2	23.4	18.6	13.9	10.2
25.3	21.5	17.5	13.0	9.7
23.7	19.9	15.9	12.0	9.4
23.6	19.9	15.8	12.1	9.4
26.6	24.0	18.4	13.7	10.1
27.2	23.7	19.4	14.4	10.2
29.1	25.8	21.1	16.2	11.4
24.2	20.3	16.4	12.5	9.5
24.1	20.3	16.4	12.4	9.4
26.5	22.7	18.1	13.3	9.8

24.4	20.7	16.7	12.7	9.8
23.3	19.3	15.4	11.8	9.4
23.5	19.3	15.4	11.9	9.4
24.3	20.5	16.5	12.4	9.4
21.5	18.0	14.6	11.5	9.2
21.6	17.8	14.6	11.5	9.3
25.5	22.1	17.9	13.3	9.9
25.2	21.8	17.7	13.1	9.8
25.2	21.4	17.2	12.8	9.6
24.7	21.1	17.3	13.2	9.9
20.6	17.2	14.2	11.5	9.3
20.8	17.3	14.3	11.6	9.2
23.7	20.4	16.6	12.7	9.5
23.6	20.1	16.4	12.4	9.4
25.8	22.0	18.3	13.8	10.2
32.0	28.3	25.3	21.0	16.4
27.3	23.4	19.3	14.9	10.8
21.2	17.7	14.6	11.7	9.3
20.9	17.5	14.4	11.5	9.2
22.1	18.7	15.0	11.8	9.3
21.6	18.1	14.7	11.6	9.2
24.8	21.5	17.3	12.8	9.7
25.9	22.2	18.0	13.3	9.9
28.1	26.4	19.9	14.8	10.5
32.0	28.5	23.9	18.3	12.7
32.5	30.0	27.6	18.2	13.3
28.7	25.2	20.8	15.3	11.0
27.5	23.5	19.1	13.9	10.1
27.5	23.3	18.6	13.6	9.9
28.5	24.5	19.7	14.5	10.4
31.3	27.3	22.3	16.4	11.4
28.2	23.7	18.8	13.8	10.0
28.1	23.7	18.8	13.8	10.0
28.4	24.7	30.6	28.8	10.6
26.5	23.1	19.2	14.7	10.1
23.6	20.3	16.6	12.6	9.7
23.2	20.0	16.2	12.4	9.5
21.5	18.6	15.2	12.0	9.4
22.4	19.2	15.5	12.0	9.4
22.6	19.2	15.5	12.0	9.4
25.2	21.3	17.2	13.2	9.6
22.8	19.3	15.7	12.0	9.4
23.0	19.5	15.9	12.2	9.6
23.2	20.0	16.2	12.2	9.4
23.4	19.9	16.0	12.4	9.4
26.1	22.6	18.5	13.9	10.2
25.3	21.9	17.9	13.4	9.9
25.3	21.4	17.1	12.7	9.6

27.6	23.4	18.8	13.7	10.2
29.8	26.2	21.3	15.7	10.8
27.7	23.7	19.2	14.9	11.2
26.2	21.9	17.3	13.1	9.8
28.1	23.7	18.6	13.5	9.9
29.1	25.0	20.3	15.1	10.8
28.4	24.3	20.4	15.1	10.7
28.4	23.9	20.1	14.9	10.8
31.4	27.3	22.5	16.7	11.8
32.7	28.5	23.2	17.4	12.0
32.6	28.1	23.5	18.3	13.8
27.9	23.8	19.5	14.6	10.7
27.6	23.2	18.8	14.0	10.1
26.8	22.7	18.3	14.2	10.6
20.6	17.6	14.5	11.6	9.2
20.4	17.1	14.2	11.4	9.2
22.2	18.5	15.1	11.9	9.4
23.2	19.9	16.1	12.3	9.6
25.9	22.6	18.3	13.6	10.1
28.1	24.5	20.8	15.5	11.3
26.9	22.9	19.2	14.5	10.4
30.1	25.8	21.4	16.6	12.2
27.5	23.4	19.7	14.7	10.5
28.7	25.4	21.0	15.6	11.0
30.5	26.3	21.4	15.9	11.1
27.3	23.7	19.4	14.3	10.2

1/3 LASmin 20000	LAIeq-LAeq	OVLD	OBA OVLD	Marker
8.6	0.0	No	No	
8.7	12.5	No	No	
9.1	0.4	No	No	
8.9	1.4	No	No	
8.7	3.1	No	No	
9.6	0.1	No	No	
9.3	9.5	No	No	
8.9	1.4	No	No	
9.0	0.5	No	No	
9.1	3.1	No	No	
9.1	0.5	No	No	
9.3	0.2	No	No	
9.2	0.2	No	No	
9.5	7.2	No	No	
9.1	3.0	No	No	
9.0	0.3	No	No	
9.1	1.7	No	No	
9.0	0.6	No	No	
9.2	0.2	No	No	
9.5	7.7	No	No	
9.2	0.3	No	No	
9.2	0.1	No	No	
9.3	5.8	No	No	
9.4	0.9	No	No	
9.3	0.9	No	No	
9.2	0.2	No	No	
9.2	0.3	No	No	
9.1	0.2	No	No	
9.1	0.6	No	No	
9.1	0.5	No	No	
9.1	0.7	No	No	
9.4	8.2	No	No	
9.3	2.1	No	No	
9.2	0.7	No	No	
9.2	0.3	No	No	
9.3	1.1	No	No	
9.4	0.3	No	No	
9.3	0.4	No	No	
9.2	0.0	No	No	
9.2	0.4	No	No	
9.3	0.4	No	No	
9.2	0.2	No	No	
9.5	6.1	No	No	
9.3	0.1	No	No	
9.3	-0.1	No	No	
9.3	3.0	No	No	

9.2	3.1	No	No
9.3	0.6	No	No
9.2	0.4	No	No
9.2	0.5	No	No
9.2	0.6	No	No
9.1	0.7	No	No
9.2	0.4	No	No
9.3	0.4	No	No
9.3	2.4	No	No
9.3	8.5	No	No
9.4	0.0	No	No
9.6	5.2	No	No
9.7	1.2	No	No
9.8	0.4	No	No
10.0	1.3	No	No
11.9	0.6	No	No
9.7	0.9	No	No
9.6	1.0	No	No
9.6	0.1	No	No
9.5	0.2	No	No
9.6	11.0	No	No
9.6	1.2	No	No
9.7	0.8	No	No
9.7	1.8	No	No
10.1	7.0	No	No
10.7	4.1	No	No
9.8	0.9	No	No
9.8	0.0	No	No
9.7	0.2	No	No
9.8	1.1	No	No
10.3	2.2	No	No
10.4	0.4	No	No
10.5	7.4	No	No
10.5	6.9	No	No
10.5	13.5	No	No
10.2	1.9	No	No
10.3	2.0	No	No
10.0	0.3	No	No
10.0	0.4	No	No
10.0	0.3	No	No
10.1	7.1	No	No
10.1	1.1	No	No
10.0	-0.1	No	No
10.0	0.6	No	No
9.8	0.1	No	No
10.0	5.0	No	No
9.9	0.7	No	No
9.7	0.1	No	No

9.8	2.8	No	No
9.9	1.7	No	No
10.1	5.6	No	No
9.7	0.4	No	No
9.8	0.9	No	No
9.8	0.6	No	No
9.7	1.0	No	No
9.9	5.0	No	No
10.1	0.2	No	No
10.3	6.7	No	No
10.8	6.8	No	No
9.9	-0.2	No	No
9.9	0.6	No	No
10.0	9.8	No	No
9.8	0.5	No	No
9.7	11.2	No	No
9.7	2.6	No	No
9.8	0.2	No	No
10.0	0.0	No	No
10.2	0.8	No	No
10.0	1.0	No	No
10.4	7.1	No	No
9.8	1.0	No	No
9.9	-0.4	No	No
10.2	6.6	No	No
9.9	0.2	No	No

Summary

File Name on Meter	EF_HS.053
File Name on PC	SLM_0003788_EF_HS_053.00.ldbin
Serial Number	0003788
Model	SoundExpert® LxT
Firmware Version	2.301
User	
Location	
Job Description	
Note	

Measurement

Description	EF Academy Project
Start	2017-06-27 17:01:37
Stop	2017-06-27 17:11:37
Duration	00:10:00.0
Run Time	00:10:00.0
Pause	00:00:00.0
Pre Calibration	2017-06-27 16:21:22
Post Calibration	None
Calibration Deviation	---

Overall Settings

RMS Weight	A Weighting	
Peak Weight	A Weighting	
Detector	Slow	
Preamp	PRMLxT1L	
Microphone Correction	Off	
Integration Method	Exponential	
OBA Range	Normal	
OBA Bandwidth	1/1 and 1/3	
OBA Freq. Weighting	A Weighting	
OBA Max Spectrum	At LMax	
Overload	120.3 dB	
	A	**C**
Under Range Peak	**76.6**	73.6
Under Range Limit	**25.3**	24.8
Noise Floor	15.9	15.7

Results

LASeq	62.4 dB	
LASE	90.2 dB	
EAS	115.377 µPa²h	
LASpeak (max)	2017-06-27 17:09:17	93.6
LASmax	2017-06-27 17:03:37	75.7
LASmin	2017-06-27 17:01:49	47.6
SEA	-99.9 dB	

LAS > 85.0 dB (Exceedance Counts / Duration)	0	0.0
LAS > 115.0 dB (Exceedance Counts / Duration)	0	0.0
LA_{Speak} > 135.0 dB (Exceedance Counts / Duration)	0	0.0
LA_{Speak} > 137.0 dB (Exceedance Counts / Duration)	0	0.0
LA_{Speak} > 140.0 dB (Exceedance Counts / Duration)	0	0.0

Community Noise	**Ldn**	**LDay 07:00-23:00**
	62.4	62.4

LC_{Seq}	70.1	dB
LA_{Seq}	62.4	dB
LCS_{eq} - LA_{Seq}	7.7	dB
LAI_{eq}	64.9	dB
LA_{eq}	62.4	dB
LAI_{eq} - LA_{eq}	2.5	dB

	A	
	dB	**Time Stamp**
L_{eq}	62.4	
$L_{S(max)}$	75.7	2017/06/27 17:03:37
$L_{S(min)}$	47.6	2017/06/27 17:01:49
$L_{Peak(max)}$	93.6	2017/06/27 17:09:17

# Overloads	0	
Overload Duration	0.0	s
# OBA Overloads	0	
OBA Overload Duration	0.0	s

Statistics

LAS5.00	69.0	dB
LAS10.00	67.0	dB
LAS33.30	58.8	dB
LAS50.00	56.4	dB
LAS66.60	54.8	dB
LAS90.00	52.2	dB

Calibration History

Preamp	**Date**	**dB re. 1V/Pa**
Direct	2017-01-03 10:54:35	-27.0
Direct	2017-01-03 10:30:13	-26.0
Direct	2014-07-01 09:45:44	-27.0
PRMLxT1L	2017-06-27 16:21:22	-26.6
PRMLxT1L	2017-06-26 11:13:28	-26.6
PRMLxT1L	2017-06-20 10:09:05	-26.6
PRMLxT1L	2017-06-12 12:50:10	-26.6
PRMLxT1L	2017-06-06 15:05:30	-26.6
PRMLxT1L	2017-05-05 15:45:44	-26.6

PRMLxT1L	2017-04-29 09:09:14	-26.6
PRMLxT1L	2017-04-21 11:23:22	-26.5
PRMLxT1L	2017-03-31 13:13:53	-26.6
PRMLxT1L	2017-03-14 08:18:51	-26.6
PRMLxT1L	2017-03-10 10:18:04	-26.5

Z
78.6 dB
31.3 dB
21.4 dB

dB
dB
dB

s
s
s
s
s

LNight 23:00-07:00	Lden	LDay 07:00-19:00	LEvening 19:00-23:00	LNight 23:00-07:00
-99.9	62.4	62.4	-99.9	-99.9

C		Z	
dB	Time Stamp	dB	Time Stamp

6.3	**8.0**	**10.0**	**12.5**
2.5	1.9	3.3	7.7
61.7	59.8	59.2	54.2
64.6	55.5	59.0	60.8
61.3	59.9	62.9	60.0
61.9	63.5	53.7	67.2
48.3	50.2	49.4	58.8
48.5	42.2	44.8	43.0
51.3	59.2	56.0	47.6

39.5	40.2	49.9	42.2
37.9	45.8	40.7	31.9
48.6	50.1	57.0	56.7
42.4	46.2	50.2	47.7
39.5	42.0	44.7	43.1

dB

16.0	**20.0**	**25.0**	**31.5**	**40.0**	**50.0**	**63.0**	**80.0**	**100**	**125**	**160**	**200**	**250**	**315**	**400**	**500**
-1.0	2.3	0.5	3.1	2.3	0.9	2.9	4.5	6.7	17.0	7.3	3.9	12.5	9.3	7.1	3.6
61.0	44.5	36.3	44.2	35.5	41.3	42.1	33.4	39.3	37.9	29.0	27.5	26.0	24.1	19.7	20.0
56.7	50.3	53.1	46.7	42.7	47.4	40.0	41.2	44.2	46.7	45.4	44.6	39.9	34.1	34.7	33.9
65.2	53.8	52.2	50.6	50.7	52.6	45.8	44.1	41.8	44.0	42.5	41.5	38.5	35.7	32.7	29.0
67.9	53.0	49.2	51.6	57.3	49.4	45.7	39.6	47.2	42.3	41.2	46.7	48.5	50.6	52.0	52.6
56.7	47.6	39.9	34.8	38.1	45.6	39.2	37.3	40.3	35.3	35.2	42.1	40.0	45.1	45.4	46.2
58.8	54.4	33.4	42.3	46.2	55.6	46.5	32.9	42.4	39.2	36.9	40.1	40.7	33.7	38.1	29.8
45.2	40.7	49.8	45.0	52.4	46.9	41.8	43.5	35.1	39.5	37.8	37.0	35.6	32.8	30.4	25.8

45.9	36.9	38.3	43.8	40.7	37.6	37.8	33.8	31.5	32.4	25.3	25.4	27.3	21.4	22.2	16.4
36.8	39.9	42.4	45.7	48.9	45.8	39.0	52.1	54.6	47.0	39.7	35.5	37.4	33.6	27.9	20.6
53.2	49.6	43.0	43.6	51.3	49.2	46.0	36.2	40.9	37.3	40.1	37.5	41.7	38.4	36.1	31.9
43.3	32.8	41.8	42.5	43.5	40.8	40.8	37.3	31.2	30.3	22.9	15.8	17.3	15.7	15.4	15.3
44.6	36.6	31.4	30.2	38.4	45.3	53.3	44.1	43.4	43.7	42.7	49.0	55.1	45.6	51.4	53.3

630	800	1000	1250	1600	2000	2500	3150	4000	5000	6300	8000	10000	12500
8.0	9.0	7.3	10.0	9.2	9.8	11.6	12.5	13.2	40.2	17.7	16.3	18.1	20.4
17.4	28.0	113.0	48.1	19.6	62.7	18.7	56.6	25.5	27.7	20.7	22.0	23.6	25.3
21.4	29.3	114.0	49.1	19.8	66.0	18.7	57.5	29.4	28.0	21.3	22.9	24.6	26.4
17.4	28.6	114.0	49.1	19.1	65.8	18.9	57.4	29.4	27.8	21.7	22.9	24.2	26.2
43.9	30.1	114.0	49.1	20.9	65.8	19.0	57.4	29.5	27.9	21.5	22.7	24.6	26.3
32.4	30.2	114.0	49.2	19.3	65.9	19.4	57.4	29.6	28.0	21.5	22.9	24.4	26.2
22.0	28.8	114.0	49.1	19.1	66.0	19.0	57.5	29.5	27.8	21.4	22.7	24.5	26.4
20.4	28.5	113.9	49.0	19.0	66.0	19.2	57.4	29.7	27.7	21.7	22.8	24.6	26.3

16.8	28.8	113.9	49.0	18.9	65.7	19.4	57.2	29.4	27.9	21.1	22.5	24.3	26.0
18.1	28.8	114.1	49.2	19.2	65.9	19.0	56.7	28.8	27.3	21.5	23.0	24.6	26.4
20.9	28.6	114.0	49.1	19.4	65.9	19.3	57.5	29.5	27.9	21.5	22.6	24.3	26.5
18.2	29.5	113.9	49.1	19.3	65.7	19.4	57.2	29.6	28.1	21.7	22.8	24.3	26.0
45.3	30.8	114.1	49.2	21.1	66.1	19.5	57.6	29.8	28.3	21.9	22.9	24.6	26.3

16000	20000
20.2	21.5
28.1	30.6
28.8	31.4
28.8	31.5
28.9	31.5
28.8	31.9
28.8	31.6
28.7	31.2

28.7	31.2
28.9	31.6
28.7	31.3
28.7	31.3
28.8	31.6

1/1 Octave

Frequency (Hz)	8.0	16.0	31.5	63.0	125	250	500	1000	2000	4000	8000	16000
Overall 1/1 Spectra	5.9	14.6	27.6	37.4	46.8	51.1	55.0	59.8	53.9	43.9	32.9	20.2
Max 1/1 Spectra	5.9	14.1	29.3	48.3	56.7	65.2	67.8	73.3	67.3	57.3	48.7	35.0
Min 1/1 Spectra	5.9	3.2	18.4	24.9	30.8	34.3	39.1	44.3	38.4	28.9	19.8	14.9

1/3 Octave

Frequency (Hz)	6.3	8.0	10.0	12.5	16.0	20.0	25.0	31.5	40.0	50.0	63.0	80.0
Overall 1/3 Spectra	1.9	0.9	0.9	3.7	8.6	12.9	17.1	21.8	25.8	31.1	31.8	34.2
Max 1/3 Spectra	1.9	0.9	0.3	-0.8	4.5	13.6	21.9	25.6	26.8	36.5	46.3	44.1
Min 1/3 Spectra	1.9	0.9	0.3	-0.8	-1.6	-1.6	7.2	11.4	15.3	17.3	18.5	20.5

1/1 OBA Ref. Spectra

Frequency (Hz)	8.0	16.0	31.5	63.0	125	250	500	1000	2000	4000	8000	16000
1	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
2	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
3	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
4	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

1/3 OBA Ref. Spectra

Frequency (Hz)	6.3	8.0	10.0	12.5	16.0	20.0	25.0	31.5	40.0	50.0	63.0	80.0
1	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
2	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
3	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
4	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

1/1 OBA Under Range

Frequency (Hz)	8.0	16.0	31.5	63.0	125	250	500	1000	2000	4000	8000	16000
Under Range Limit	20.3	17.6	15.7	13.9	12.3	13.0	14.3	16.5	19.1	22.3	24.9	28.1
Noise Floor	15.9	13.2	11.1	9.2	7.6	7.4	8.6	10.6	13.0	16.0	18.7	21.7

1/3 OBA Under Range

Frequency (Hz)	6.3	8.0	10.0	12.5	16.0	20.0	25.0	31.5	40.0	50.0	63.0	80.0
Under Range Limit	21.9	20.9	20.3	19.2	18.4	17.6	16.9	16.3	15.7	14.9	14.5	13.9
Noise Floor	11.9	10.9	10.3	9.2	8.4	7.6	6.9	6.3	5.7	4.9	4.5	3.9

100	125	160	200	250	315	400	500	630	800	1000	1250	1600	2000	2500	3150
38.4	42.0	44.1	45.7	47.0	46.3	47.4	50.0	52.1	54.6	56.2	54.0	51.7	48.3	44.7	41.4
47.1	53.7	52.7	56.7	62.2	61.4	61.3	61.0	65.2	67.6	69.7	68.3	65.2	62.0	58.0	54.6
22.8	25.3	27.1	27.9	29.1	29.7	30.0	33.1	35.7	39.7	39.8	38.3	35.8	32.8	30.0	27.0

100	125	160	200	250	315	400	500	630	800	1000	1250	1600	2000	2500	3150
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

100	125	160	200	250	315	400	500	630	800	1000	1250	1600	2000	2500	3150
13.3	12.7	12.3	12.4	12.5	13.0	13.4	13.8	14.3	15.1	15.7	16.5	17.3	18.2	19.1	20.1
3.3	2.7	2.3	2.4	2.5	3.0	3.4	3.8	4.3	5.1	5.7	6.5	7.3	8.2	9.1	10.1

4000	5000	6300	8000	10000	12500	16000	20000
38.8	34.3	31.0	26.9	22.8	18.3	13.5	10.4
52.2	49.2	46.6	42.9	39.3	33.6	27.6	19.3
22.8	19.1	16.4	14.3	13.3	11.3	9.1	9.0

4000	5000	6300	8000	10000	12500	16000	20000
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

4000	5000	6300	8000	10000	12500	16000	20000
21.0	22.3	22.8	23.8	24.9	25.8	26.7	28.1
11.0	12.3	12.8	13.8	14.9	15.8	16.7	18.1

Record #	Date	Time	Record Type	Cause	#	TH Record	Sound Record
1	2017-06-27	17:01:37	Run	Key	1	1	
2	2017-06-27	17:11:37	Stop	Timer	1	122	

Statistics		
Level (dB)	**Count**	**Percent**
Under	0	0.00
47.6	41	0.07
47.7	46	0.08
47.8	78	0.13
47.9	70	0.12
48.0	76	0.13
48.1	115	0.19
48.2	166	0.28
48.3	162	0.27
48.4	137	0.23
48.5	121	0.20
48.6	106	0.18
48.7	125	0.21
48.8	43	0.07
48.9	51	0.09
49.0	69	0.12
49.1	44	0.07
49.2	81	0.14
49.3	89	0.15
49.4	40	0.07
49.5	43	0.07
49.6	59	0.10
49.7	74	0.12
49.8	33	0.05
49.9	35	0.06
50.0	46	0.08
50.1	62	0.10
50.2	99	0.16
50.3	76	0.13
50.4	101	0.17
50.5	115	0.19
50.6	128	0.21
50.7	121	0.20
50.8	130	0.22
50.9	118	0.20
51.0	59	0.10
51.1	100	0.17
51.2	152	0.25
51.3	214	0.36
51.4	199	0.33
51.5	312	0.52
51.6	224	0.37
51.7	293	0.49
51.8	368	0.61
51.9	479	0.80
52.0	330	0.55

52.1	295	0.49
52.2	383	0.64
52.3	428	0.71
52.4	496	0.83
52.5	479	0.80
52.6	511	0.85
52.7	590	0.98
52.8	635	1.06
52.9	554	0.92
53.0	493	0.82
53.1	510	0.85
53.2	374	0.62
53.3	497	0.83
53.4	408	0.68
53.5	411	0.69
53.6	418	0.70
53.7	524	0.87
53.8	583	0.97
53.9	644	1.07
54.0	563	0.94
54.1	649	1.08
54.2	564	0.94
54.3	599	1.00
54.4	703	1.17
54.5	710	1.18
54.6	621	1.03
54.7	719	1.20
54.8	833	1.39
54.9	788	1.31
55.0	793	1.32
55.1	790	1.32
55.2	720	1.20
55.3	702	1.17
55.4	697	1.16
55.5	630	1.05
55.6	504	0.84
55.7	490	0.82
55.8	426	0.71
55.9	457	0.76
56.0	440	0.73
56.1	426	0.71
56.2	432	0.72
56.3	445	0.74
56.4	469	0.78
56.5	567	0.94
56.6	562	0.94
56.7	437	0.73
56.8	464	0.77

56.9	545	0.91
57.0	573	0.95
57.1	552	0.92
57.2	390	0.65
57.3	350	0.58
57.4	369	0.62
57.5	487	0.81
57.6	454	0.76
57.7	463	0.77
57.8	485	0.81
57.9	440	0.73
58.0	356	0.59
58.1	378	0.63
58.2	363	0.61
58.3	389	0.65
58.4	293	0.49
58.5	273	0.46
58.6	319	0.53
58.7	351	0.58
58.8	427	0.71
58.9	343	0.57
59.0	269	0.45
59.1	229	0.38
59.2	249	0.41
59.3	194	0.32
59.4	177	0.30
59.5	211	0.35
59.6	213	0.35
59.7	228	0.38
59.8	239	0.40
59.9	246	0.41
60.0	238	0.40
60.1	202	0.34
60.2	189	0.31
60.3	223	0.37
60.4	236	0.39
60.5	201	0.33
60.6	167	0.28
60.7	176	0.29
60.8	195	0.33
60.9	196	0.33
61.0	165	0.28
61.1	135	0.22
61.2	122	0.20
61.3	134	0.22
61.4	132	0.22
61.5	148	0.25
61.6	165	0.28

61.7	191	0.32
61.8	194	0.32
61.9	234	0.39
62.0	238	0.40
62.1	248	0.41
62.2	184	0.31
62.3	169	0.28
62.4	161	0.27
62.5	173	0.29
62.6	174	0.29
62.7	234	0.39
62.8	142	0.24
62.9	118	0.20
63.0	148	0.25
63.1	120	0.20
63.2	122	0.20
63.3	118	0.20
63.4	115	0.19
63.5	123	0.20
63.6	119	0.20
63.7	144	0.24
63.8	113	0.19
63.9	131	0.22
64.0	120	0.20
64.1	131	0.22
64.2	137	0.23
64.3	135	0.22
64.4	144	0.24
64.5	127	0.21
64.6	122	0.20
64.7	110	0.18
64.8	115	0.19
64.9	131	0.22
65.0	158	0.26
65.1	144	0.24
65.2	125	0.21
65.3	143	0.24
65.4	160	0.27
65.5	158	0.26
65.6	137	0.23
65.7	140	0.23
65.8	143	0.24
65.9	170	0.28
66.0	148	0.25
66.1	142	0.24
66.2	149	0.25
66.3	159	0.26
66.4	171	0.28

66.5	166	0.28
66.6	136	0.23
66.7	125	0.21
66.8	146	0.24
66.9	141	0.23
67.0	193	0.32
67.1	285	0.47
67.2	273	0.46
67.3	219	0.37
67.4	159	0.26
67.5	154	0.26
67.6	178	0.30
67.7	156	0.26
67.8	156	0.26
67.9	156	0.26
68.0	162	0.27
68.1	141	0.23
68.2	118	0.20
68.3	119	0.20
68.4	119	0.20
68.5	108	0.18
68.6	173	0.29
68.7	83	0.14
68.8	68	0.11
68.9	73	0.12
69.0	85	0.14
69.1	67	0.11
69.2	69	0.12
69.3	76	0.13
69.4	161	0.27
69.5	157	0.26
69.6	64	0.11
69.7	64	0.11
69.8	78	0.13
69.9	69	0.12
70.0	70	0.12
70.1	79	0.13
70.2	104	0.17
70.3	82	0.14
70.4	79	0.13
70.5	50	0.08
70.6	51	0.09
70.7	73	0.12
70.8	82	0.14
70.9	55	0.09
71.0	33	0.05
71.1	33	0.05
71.2	35	0.06

71.3	34	0.06
71.4	40	0.07
71.5	33	0.05
71.6	39	0.06
71.7	42	0.07
71.8	48	0.08
71.9	41	0.07
72.0	53	0.09
72.1	73	0.12
72.2	40	0.07
72.3	54	0.09
72.4	52	0.09
72.5	77	0.13
72.6	44	0.07
72.7	45	0.08
72.8	31	0.05
72.9	24	0.04
73.0	23	0.04
73.1	20	0.03
73.2	18	0.03
73.3	25	0.04
73.4	26	0.04
73.5	31	0.05
73.6	58	0.10
73.7	39	0.06
73.8	35	0.06
73.9	12	0.02
74.0	13	0.02
74.1	13	0.02
74.2	21	0.04
74.3	19	0.03
74.4	17	0.03
74.5	30	0.05
74.6	16	0.03
74.7	7	0.01
74.8	8	0.01
74.9	6	0.01
75.0	6	0.01
75.1	9	0.02
75.2	7	0.01
75.3	9	0.02
75.4	10	0.02
75.5	11	0.02
75.6	26	0.04
75.7	18	0.03
Over	0	0.00
Total Count	60000	

Record #	Date	Time	Run Duration	Run Time	Pause	LASeq	LASE	LASmin
1	2017-06-27	17:01:37	00:10:00.0	00:10:00.0	00:00:00.0	62.4	90.2	47.6

LASmin Time	LASmax	LASmax Time	LApeak (max)	LApeak (max) Time	SPL 1 Count
17:01:49	75.7	17:03:37	93.6	17:09:17	0

SPL 1 Duration	SPL 2 Count	SPL 2 Duration	Peak 1 Count	Peak 1 Duration	Peak 2 Count
0.0	0	0.0	0	0.0	0

Peak 2 Duration	Peak 3 Count	Peak 3 Duration	LAS5.00	LAS10.00	LAS33.30	LAS50.00
0.0	0	0.0	69.0	67.0	58.8	56.4

LAS66.60	LAS90.00	SEA	LCSeq	LASeq	LCSeq - LASeq	LAIeq	LAeq	LAIeq - LAeq
54.8	52.2	-99.9	70.1	62.4	7.7	64.9	62.4	2.5

# Overloads	Overloads Duration	# OBA Overloads	OBA Overloads Duration	1/1 LASeq 8.0
0	0.0	0	0.0	5.9

1/1 LASeq 16.0	1/1 LASeq 31.5	1/1 LASeq 63.0	1/1 LASeq 125	1/1 LASeq 250	1/1 LASeq 500
14.6	27.6	37.4	46.8	51.1	55.0

1/1 LASeq 1000	1/1 LASeq 2000	1/1 LASeq 4000	1/1 LASeq 8000	1/1 LASeq 16000
59.8	53.9	43.9	32.9	20.2

1/1 LASmax 8.0	1/1 LASmax 16.0	1/1 LASmax 31.5	1/1 LASmax 63.0	1/1 LASmax 125
5.9	14.1	29.3	48.3	56.7

1/1 LASmax 250	1/1 LASmax 500	1/1 LASmax 1000	1/1 LASmax 2000	1/1 LASmax 4000
65.2	67.8	73.3	67.3	57.3

1/1 LASmax 8000	1/1 LASmax 16000	1/1 LASmin 8.0	1/1 LASmin 16.0	1/1 LASmin 31.5
48.7	35.0	5.9	3.2	18.4

1/1 LASmin 63.0	1/1 LASmin 125	1/1 LASmin 250	1/1 LASmin 500	1/1 LASmin 1000
24.9	30.8	34.3	39.1	44.3

1/1 LASmin 2000	1/1 LASmin 4000	1/1 LASmin 8000	1/1 LASmin 16000	1/3 LASeq 6.3
38.4	28.9	19.8	14.9	1.9

1/3 LASeq 8.0	1/3 LASeq 10.0	1/3 LASeq 12.5	1/3 LASeq 16.0	1/3 LASeq 20.0	1/3 LASeq 25.0
0.9	0.9	3.7	8.6	12.9	17.1

1/3 LASeq 31.5	1/3 LASeq 40.0	1/3 LASeq 50.0	1/3 LASeq 63.0	1/3 LASeq 80.0	1/3 LASeq 100
21.8	25.8	31.1	31.8	34.2	38.4

1/3 LASeq 125	1/3 LASeq 160	1/3 LASeq 200	1/3 LASeq 250	1/3 LASeq 315	1/3 LASeq 400
42.0	44.1	45.7	47.0	46.3	47.4

1/3 LASeq 500	1/3 LASeq 630	1/3 LASeq 800	1/3 LASeq 1000	1/3 LASeq 1250	1/3 LASeq 1600
50.0	52.1	54.6	56.2	54.0	51.7

1/3 LASeq 2000	1/3 LASeq 2500	1/3 LASeq 3150	1/3 LASeq 4000	1/3 LASeq 5000
48.3	44.7	41.4	38.8	34.3

1/3 LASeq 6300	1/3 LASeq 8000	1/3 LASeq 10000	1/3 LASeq 12500	1/3 LASeq 16000
31.0	26.9	22.8	18.3	13.5

1/3 LASeq 20000	1/3 LASmax 6.3	1/3 LASmax 8.0	1/3 LASmax 10.0	1/3 LASmax 12.5
10.4	1.9	0.9	0.3	-0.8

1/3 LASmax 16.0	1/3 LASmax 20.0	1/3 LASmax 25.0	1/3 LASmax 31.5	1/3 LASmax 40.0
4.5	13.6	21.9	25.6	26.8

1/3 LASmax 50.0	1/3 LASmax 63.0	1/3 LASmax 80.0	1/3 LASmax 100	1/3 LASmax 125
36.5	46.3	44.1	47.1	53.7

1/3 LASmax 160	1/3 LASmax 200	1/3 LASmax 250	1/3 LASmax 315	1/3 LASmax 400
52.7	56.7	62.2	61.4	61.3

1/3 LASmax 500	1/3 LASmax 630	1/3 LASmax 800	1/3 LASmax 1000	1/3 LASmax 1250
61.0	65.2	67.6	69.7	68.3

1/3 LASmax 1600	1/3 LASmax 2000	1/3 LASmax 2500	1/3 LASmax 3150	1/3 LASmax 4000
65.2	62.0	58.0	54.6	52.2

1/3 LASmax 5000	1/3 LASmax 6300	1/3 LASmax 8000	1/3 LASmax 10000	1/3 LASmax 12500
49.2	46.6	42.9	39.3	33.6

1/3 LASmax 16000	1/3 LASmax 20000	1/3 LASmin 6.3	1/3 LASmin 8.0	1/3 LASmin 10.0
27.6	19.3	1.9	0.9	0.3

1/3 LASmin 12.5	1/3 LASmin 16.0	1/3 LASmin 20.0	1/3 LASmin 25.0	1/3 LASmin 31.5
-0.8	-1.6	-1.6	7.2	11.4

1/3 LASmin 40.0	1/3 LASmin 50.0	1/3 LASmin 63.0	1/3 LASmin 80.0	1/3 LASmin 100
15.3	17.3	18.5	20.5	22.8

1/3 LASmin 125	1/3 LASmin 160	1/3 LASmin 200	1/3 LASmin 250	1/3 LASmin 315
25.3	27.1	27.9	29.1	29.7

1/3 LASmin 400	1/3 LASmin 500	1/3 LASmin 630	1/3 LASmin 800	1/3 LASmin 1000
30.0	33.1	35.7	39.7	39.8

1/3 LASmin 1250	1/3 LASmin 1600	1/3 LASmin 2000	1/3 LASmin 2500	1/3 LASmin 3150
38.3	35.8	32.8	30.0	27.0

1/3 LASmin 4000	1/3 LASmin 5000	1/3 LASmin 6300	1/3 LASmin 8000	1/3 LASmin 10000
22.8	19.1	16.4	14.3	13.3

1/3 LASmin 12500	1/3 LASmin 16000	1/3 LASmin 20000
11.3	9.1	9.0

Record #	Record Type	Date	Time	LASeq	LApeak	LASmax	LASmin	Battery
1	Run	2017-06-27	17:01:37					
2		2017-06-27	17:01:37	49.7	68.5	51.6	47.8	4.9
3		2017-06-27	17:01:42	48.7	67.7	50.5	47.9	4.9
4		2017-06-27	17:01:47	48.2	71.3	51.4	47.6	4.9
5		2017-06-27	17:01:52	51.0	64.5	52.1	50.0	4.9
6		2017-06-27	17:01:57	56.3	73.3	58.9	52.1	4.9
7		2017-06-27	17:02:02	56.3	70.2	58.8	54.8	4.9
8		2017-06-27	17:02:07	54.6	67.5	55.0	54.3	4.9
9		2017-06-27	17:02:12	54.7	70.6	55.7	53.2	4.9
10		2017-06-27	17:02:17	51.9	68.6	53.5	51.0	4.9
11		2017-06-27	17:02:22	52.1	69.0	53.1	51.7	4.9
12		2017-06-27	17:02:27	58.6	85.5	68.0	52.4	4.9
13		2017-06-27	17:02:32	71.2	91.5	74.6	64.2	4.9
14		2017-06-27	17:02:37	68.3	84.9	70.5	64.3	4.9
15		2017-06-27	17:02:42	62.6	74.2	67.8	55.7	4.9
16		2017-06-27	17:02:47	53.3	71.3	55.7	51.6	4.9
17		2017-06-27	17:02:52	53.4	75.1	55.1	51.0	4.9
18		2017-06-27	17:02:57	60.3	79.1	65.5	55.0	4.9
19		2017-06-27	17:03:02	63.8	80.2	66.5	58.0	4.9
20		2017-06-27	17:03:07	57.2	72.5	59.6	56.3	4.9
21		2017-06-27	17:03:12	69.3	88.2	72.8	59.6	4.9
22		2017-06-27	17:03:17	67.9	92.8	73.8	62.0	4.9
23		2017-06-27	17:03:22	68.4	86.5	73.8	58.5	4.9
24		2017-06-27	17:03:27	55.2	67.0	58.5	52.8	4.9
25		2017-06-27	17:03:32	68.2	91.9	75.7	52.9	4.9
26		2017-06-27	17:03:37	70.8	86.0	75.7	60.9	4.9
27		2017-06-27	17:03:42	56.1	66.9	60.8	52.8	4.9
28		2017-06-27	17:03:47	52.7	71.9	53.1	52.3	4.9
29		2017-06-27	17:03:52	53.9	67.7	54.6	53.0	4.9
30		2017-06-27	17:03:57	54.0	66.9	55.1	53.1	4.9
31		2017-06-27	17:04:02	53.2	65.5	53.9	52.7	4.9
32		2017-06-27	17:04:07	53.7	67.2	54.4	52.8	4.9
33		2017-06-27	17:04:12	60.3	82.1	66.4	53.0	4.9
34		2017-06-27	17:04:17	68.5	84.3	69.5	64.2	4.9
35		2017-06-27	17:04:22	65.1	92.4	73.4	58.6	4.9
36		2017-06-27	17:04:27	69.8	84.8	73.7	64.9	4.9
37		2017-06-27	17:04:32	64.1	79.7	67.1	58.2	4.9
38		2017-06-27	17:04:37	56.8	69.9	58.2	56.2	4.9
39		2017-06-27	17:04:42	56.5	70.7	57.0	56.0	4.9
40		2017-06-27	17:04:47	54.9	70.0	56.6	53.8	4.9
41		2017-06-27	17:04:52	68.8	92.1	72.6	56.6	4.9
42		2017-06-27	17:04:57	62.1	71.9	68.2	52.9	4.9
43		2017-06-27	17:05:02	51.0	72.5	52.9	49.4	4.9
44		2017-06-27	17:05:07	49.0	66.9	49.6	48.3	4.9
45		2017-06-27	17:05:12	51.8	71.0	56.0	49.6	4.9
46		2017-06-27	17:05:17	56.6	72.1	59.0	53.7	4.9
47		2017-06-27	17:05:22	54.0	68.0	55.1	52.9	4.9

48	2017-06-27	17:05:27	59.3	80.1	64.6	54.1	4.9
49	2017-06-27	17:05:32	66.3	81.8	67.6	64.1	4.9
50	2017-06-27	17:05:37	61.9	75.6	64.1	58.6	4.9
51	2017-06-27	17:05:42	56.1	68.2	58.6	54.7	4.9
52	2017-06-27	17:05:47	54.6	71.9	55.4	53.6	4.9
53	2017-06-27	17:05:52	55.0	67.9	55.7	54.5	4.9
54	2017-06-27	17:05:57	57.8	72.3	59.0	55.4	4.9
55	2017-06-27	17:06:02	58.6	72.3	59.7	57.4	4.9
56	2017-06-27	17:06:07	56.9	70.6	58.2	55.4	4.9
57	2017-06-27	17:06:12	55.8	68.1	57.4	54.7	4.9
58	2017-06-27	17:06:17	56.2	73.0	58.4	54.3	4.9
59	2017-06-27	17:06:22	56.2	71.8	57.7	55.5	4.9
60	2017-06-27	17:06:27	60.5	75.4	62.0	57.8	4.9
61	2017-06-27	17:06:32	62.2	75.1	62.8	61.2	4.9
62	2017-06-27	17:06:37	59.8	74.5	61.2	58.3	4.9
63	2017-06-27	17:06:42	62.7	81.4	67.7	59.6	4.9
64	2017-06-27	17:06:47	65.2	82.4	68.6	58.0	4.9
65	2017-06-27	17:06:52	57.8	72.6	59.2	56.8	4.9
66	2017-06-27	17:06:57	58.9	72.4	60.0	57.2	4.9
67	2017-06-27	17:07:02	56.9	71.1	59.3	55.2	4.9
68	2017-06-27	17:07:07	60.7	76.4	62.8	57.3	4.9
69	2017-06-27	17:07:12	58.9	74.0	60.4	57.3	4.9
70	2017-06-27	17:07:17	54.7	67.8	57.3	51.6	4.9
71	2017-06-27	17:07:22	52.1	64.6	53.7	51.3	4.9
72	2017-06-27	17:07:27	52.7	65.2	53.6	52.1	4.9
73	2017-06-27	17:07:32	53.2	70.5	54.9	52.3	4.9
74	2017-06-27	17:07:37	56.7	72.0	58.8	54.9	4.9
75	2017-06-27	17:07:42	58.1	71.8	59.1	57.5	4.9
76	2017-06-27	17:07:47	63.0	83.3	67.9	57.7	4.9
77	2017-06-27	17:07:52	64.0	79.0	67.9	57.9	4.9
78	2017-06-27	17:07:57	56.1	69.8	57.9	55.1	4.9
79	2017-06-27	17:08:02	54.8	76.7	55.5	53.1	4.9
80	2017-06-27	17:08:07	52.3	67.8	53.1	51.9	4.9
81	2017-06-27	17:08:12	59.7	79.2	65.5	52.3	4.9
82	2017-06-27	17:08:17	62.7	77.6	66.0	54.7	4.9
83	2017-06-27	17:08:22	52.9	67.3	54.7	52.2	4.9
84	2017-06-27	17:08:27	53.8	68.4	55.4	52.3	4.9
85	2017-06-27	17:08:32	56.7	71.0	57.4	55.4	4.9
86	2017-06-27	17:08:37	57.3	71.5	57.9	56.9	4.9
87	2017-06-27	17:08:42	58.0	71.7	59.4	57.0	4.9
88	2017-06-27	17:08:47	59.1	83.0	63.7	56.9	4.9
89	2017-06-27	17:08:52	68.6	90.6	72.1	60.7	4.9
90	2017-06-27	17:08:57	57.0	70.0	60.6	53.8	4.9
91	2017-06-27	17:09:02	52.2	65.8	53.8	50.4	4.9
92	2017-06-27	17:09:07	52.7	67.3	54.2	50.6	4.9
93	2017-06-27	17:09:12	62.8	93.6	70.9	53.8	4.9
94	2017-06-27	17:09:17	65.8	80.3	70.9	56.6	4.9
95	2017-06-27	17:09:22	54.8	67.6	56.6	54.1	4.9

96		2017-06-27	17:09:27	55.0	67.6	55.8	54.3	4.9
97		2017-06-27	17:09:32	54.4	70.0	55.1	53.9	4.9
98		2017-06-27	17:09:37	54.6	70.3	55.6	54.0	4.9
99		2017-06-27	17:09:42	52.8	72.1	54.0	51.4	4.9
100		2017-06-27	17:09:47	52.8	66.1	53.8	51.5	4.9
101		2017-06-27	17:09:52	59.1	78.1	64.4	53.8	4.9
102		2017-06-27	17:09:57	68.6	84.6	70.3	64.5	4.9
103		2017-06-27	17:10:02	65.0	80.0	67.4	60.9	4.9
104		2017-06-27	17:10:07	64.2	81.0	66.6	58.0	4.9
105		2017-06-27	17:10:12	56.9	69.0	57.9	56.5	4.9
106		2017-06-27	17:10:17	56.3	68.8	56.7	56.0	4.9
107		2017-06-27	17:10:22	55.6	68.3	56.5	54.9	4.9
108		2017-06-27	17:10:27	55.5	68.7	56.0	54.8	4.9
109		2017-06-27	17:10:32	54.4	67.6	55.5	52.8	4.9
110		2017-06-27	17:10:37	53.9	75.0	59.9	51.4	4.9
111		2017-06-27	17:10:42	59.8	82.2	62.0	55.4	4.9
112		2017-06-27	17:10:47	66.0	90.3	72.5	54.9	4.9
113		2017-06-27	17:10:52	66.8	80.3	72.0	61.9	4.9
114		2017-06-27	17:10:57	68.7	87.9	70.8	64.7	4.9
115		2017-06-27	17:11:02	66.3	82.5	68.4	63.5	4.9
116		2017-06-27	17:11:07	67.3	86.1	68.3	65.3	4.9
117		2017-06-27	17:11:12	61.6	73.7	66.8	54.5	4.9
118		2017-06-27	17:11:17	53.2	70.5	54.5	52.6	4.9
119		2017-06-27	17:11:22	54.7	68.8	55.4	53.1	4.9
120		2017-06-27	17:11:27	56.7	75.6	60.9	54.2	4.9
121		2017-06-27	17:11:32	66.6	88.0	69.1	60.8	4.9
122	Stop	2017-06-27	17:11:37					

Int. Temp (°F)	LCSeq-LASeq	1/1 LASeq 8.0	1/1 LASeq 16.0	1/1 LASeq 31.5	1/1 LASeq 63.0
104.3	15.6	5.9	13.7	25.0	29.1
104.3	16.4	5.9	14.1	24.5	29.2
104.6	13.9	5.9	9.9	22.8	28.3
104.7	11.6	5.9	6.8	23.0	29.5
104.8	8.3	5.9	7.3	23.5	30.0
104.8	12.9	6.0	15.1	26.4	34.9
104.8	13.2	6.3	17.2	26.5	34.4
104.8	13.4	5.9	16.3	27.5	32.2
104.8	15.2	5.9	13.4	27.0	36.0
104.8	14.8	5.9	10.0	26.4	36.0
104.8	13.4	5.9	14.1	28.7	41.7
104.8	4.7	5.9	17.2	31.7	42.5
104.8	6.9	5.9	17.4	31.2	44.0
104.8	9.6	6.0	20.6	31.1	39.0
104.8	16.4	6.1	17.1	29.1	37.1
104.8	15.6	5.9	16.4	28.0	36.9
104.8	10.1	5.9	14.7	27.0	40.3
104.8	8.8	5.9	15.1	28.5	41.3
104.8	17.0	5.9	18.2	29.3	43.9
104.8	6.2	5.9	17.9	32.4	42.6
104.8	5.5	5.9	12.6	28.8	40.9
104.8	5.3	5.9	13.8	26.9	41.7
104.8	14.4	5.9	11.7	28.0	40.2
104.8	4.7	5.9	8.6	26.1	39.4
104.8	4.0	5.9	11.6	26.1	43.0
104.8	7.3	5.9	9.4	23.5	28.4
104.8	10.8	5.9	9.4	23.2	30.0
104.8	12.3	5.9	11.8	25.2	30.1
104.8	13.9	5.9	16.4	27.8	34.3
104.8	10.8	5.9	10.9	24.0	31.4
104.8	12.2	5.9	13.5	24.0	30.2
104.8	7.5	5.9	14.3	25.5	32.2
104.8	5.3	5.9	14.3	27.1	41.5
104.8	5.9	5.9	11.5	24.8	37.8
104.8	5.4	5.9	17.1	28.2	42.5
104.7	6.2	5.9	14.6	26.4	37.3
104.8	8.7	5.9	11.9	24.1	33.7
104.7	9.2	5.9	11.8	23.5	33.9
104.7	9.2	5.9	5.1	21.8	33.5
104.3	3.6	5.9	10.7	26.5	38.6
104.6	4.5	5.9	8.9	22.9	33.4
104.3	8.7	5.9	3.6	19.9	27.3
104.4	17.4	5.9	15.7	23.4	29.2
104.3	11.3	5.9	13.8	22.2	26.8
104.4	8.3	5.9	10.4	22.1	27.7
104.3	12.9	5.9	15.3	24.8	30.4

104.3	9.1	5.9	14.5	25.7	32.8
104.3	6.2	5.9	18.1	29.2	39.5
104.3	10.0	5.9	18.3	29.2	41.9
104.6	14.9	6.6	18.2	28.8	37.1
104.3	15.6	6.6	19.7	29.3	35.2
104.3	9.9	5.9	13.9	24.3	31.0
104.3	7.8	5.9	11.7	24.7	30.7
104.3	10.2	5.9	15.2	27.9	33.5
104.3	12.2	5.9	18.3	27.6	33.6
104.3	12.7	5.9	18.1	26.8	32.1
104.3	13.3	5.9	18.4	28.1	34.0
104.3	9.0	5.9	14.2	24.8	34.3
104.3	5.3	5.9	11.1	21.5	29.7
104.3	5.8	5.9	14.9	24.1	30.4
104.4	4.6	5.9	10.7	21.1	28.1
104.3	4.9	5.9	11.6	22.6	31.2
104.3	4.5	5.9	11.0	24.8	36.9
104.3	5.4	5.9	6.2	20.5	29.7
104.3	5.1	5.9	5.4	20.7	30.0
104.3	6.3	5.9	6.7	20.7	30.3
104.3	4.0	5.9	5.1	21.2	29.5
104.3	5.2	5.9	6.1	19.8	29.2
104.3	11.6	5.9	11.5	22.2	31.5
104.3	17.1	5.9	18.2	27.3	34.8
104.3	14.3	5.9	12.4	21.4	34.8
104.3	11.5	5.9	12.7	22.0	31.8
104.3	6.8	5.9	10.3	21.3	31.0
104.3	7.0	5.9	7.9	21.7	31.0
104.3	7.9	5.9	15.8	25.1	36.5
104.3	8.0	6.2	17.8	27.7	39.5
104.3	14.4	5.9	19.3	29.6	34.0
104.3	13.0	5.9	15.2	27.2	31.3
104.3	13.7	5.9	14.7	25.5	33.4
104.3	6.6	5.9	9.6	23.9	32.7
104.3	5.4	5.9	8.6	24.5	38.4
104.3	9.8	5.9	4.6	22.2	33.1
104.3	14.2	5.9	15.9	25.9	33.8
104.3	10.5	5.9	15.5	25.5	36.6
104.3	8.8	5.9	8.5	22.6	35.2
104.3	10.0	5.9	9.0	23.3	33.7
104.3	10.0	5.9	13.2	24.3	34.4
104.3	6.2	5.9	13.8	29.8	42.6
104.3	7.8	5.9	8.6	23.4	33.6
104.3	10.6	5.9	4.2	22.1	31.6
104.3	13.8	5.9	12.2	27.3	34.9
104.3	6.5	5.9	9.7	27.2	35.8
104.3	5.8	5.9	9.9	33.8	39.1
104.3	12.1	5.9	12.3	25.0	32.7

104.3	12.3	5.9	16.4	26.2	30.9
104.3	11.0	5.9	12.1	24.4	30.0
104.3	9.8	5.9	11.2	24.1	30.4
104.3	11.6	5.9	10.6	24.2	29.4
104.3	16.9	5.9	14.6	26.8	34.2
104.3	14.7	6.3	22.3	33.4	37.6
104.3	7.0	6.4	20.0	32.0	43.7
104.3	7.9	5.9	17.7	32.8	42.3
104.3	7.2	5.9	15.9	27.3	41.4
104.3	12.6	5.9	17.0	27.1	35.1
104.3	14.2	5.9	20.0	28.2	36.2
104.3	13.2	5.9	18.1	28.5	33.6
104.3	11.2	5.9	12.8	24.0	32.8
104.3	11.8	5.9	14.7	24.2	32.3
104.3	9.9	5.9	7.0	22.7	31.4
104.3	9.6	5.9	9.2	28.3	40.4
104.3	7.7	5.9	11.9	27.3	40.9
104.3	7.5	5.9	11.0	34.9	42.9
104.3	4.5	5.9	6.7	26.1	37.2
104.3	7.8	5.9	10.1	31.2	40.8
104.3	11.7	5.9	15.2	39.1	45.8
104.3	7.8	5.9	12.5	29.5	38.5
104.3	11.0	5.9	10.3	25.3	31.9
104.3	9.1	5.9	8.8	23.9	31.7
104.2	9.7	5.9	10.4	24.7	31.9
104.2	6.0	5.9	13.2	26.3	40.1

1/1 LASeq 125	1/1 LASeq 250	1/1 LASeq 500	1/1 LASeq 1000	1/1 LASeq 2000	1/1 LASeq 4000
33.9	35.7	42.5	47.4	41.0	30.2
33.6	34.8	40.6	45.6	40.5	39.1
33.5	36.9	39.5	45.1	39.3	37.8
37.8	41.0	42.6	47.6	40.9	42.1
42.0	42.7	51.5	52.8	45.9	41.5
43.8	43.4	51.3	53.0	46.1	38.8
43.6	42.9	45.6	52.4	45.0	35.7
38.9	41.7	45.8	52.6	45.5	42.2
36.3	38.3	42.8	49.4	43.6	40.0
33.9	37.8	43.1	49.4	43.0	43.1
39.9	47.2	49.9	55.8	51.2	41.2
50.6	59.4	61.9	69.2	63.5	50.9
52.2	57.6	60.8	66.0	58.9	49.3
47.6	51.3	53.7	60.6	53.9	43.7
38.6	41.3	43.9	51.1	44.0	38.5
37.9	42.2	45.7	49.9	45.7	41.7
45.8	48.7	53.0	57.3	52.2	42.9
50.1	52.7	58.0	60.5	55.0	45.9
47.1	48.9	48.5	53.7	47.3	39.0
53.2	59.0	61.4	66.5	61.0	49.2
49.8	56.6	60.8	65.3	59.2	47.1
50.8	57.7	61.8	65.9	58.7	47.8
38.3	43.9	48.0	52.7	45.9	35.1
48.6	57.5	59.9	65.5	60.1	49.4
51.2	60.3	62.3	68.5	62.5	51.8
36.8	44.6	47.1	54.0	48.2	37.2
34.1	40.9	44.7	50.5	44.1	34.3
37.1	43.0	45.8	51.5	44.8	37.5
38.2	41.3	45.7	51.7	45.7	35.3
36.4	39.8	44.2	51.3	44.2	32.9
39.9	44.3	45.6	51.2	43.7	34.1
42.2	49.0	51.5	57.9	52.4	39.8
51.2	57.5	59.9	66.3	59.5	49.9
47.4	53.9	57.7	62.3	56.8	45.6
52.8	58.5	63.2	67.0	61.3	50.8
49.3	52.4	55.9	61.6	56.5	47.8
38.8	44.9	49.2	54.4	48.7	37.3
42.1	46.6	48.8	53.9	46.8	36.2
40.8	45.8	47.9	52.0	45.4	35.4
48.6	56.2	60.2	66.6	61.4	48.9
43.7	50.2	54.0	59.9	54.1	41.9
33.6	38.8	43.4	48.6	42.9	33.7
32.5	37.1	41.5	46.4	40.7	30.6
34.0	41.7	44.2	49.3	42.9	31.0
36.1	47.9	50.6	53.7	45.9	33.1
39.7	44.5	46.6	51.2	45.6	34.6

40.7	49.0	52.2	56.9	49.2	37.9
48.9	54.3	59.6	63.9	56.4	46.3
48.0	51.2	55.4	58.8	53.6	44.9
42.1	45.5	49.0	53.1	47.2	38.4
38.6	41.4	45.1	52.7	46.4	35.2
38.0	41.4	47.1	52.5	47.8	38.7
38.1	44.1	51.1	54.4	51.4	43.0
40.6	46.2	52.1	55.3	51.6	42.7
39.1	43.9	50.3	53.3	50.5	41.9
36.8	42.8	49.8	51.9	49.4	40.8
38.2	43.2	49.2	52.8	49.8	40.6
39.0	43.7	49.1	53.0	48.9	40.7
40.2	46.8	55.0	56.3	54.1	45.2
38.3	46.7	57.2	58.3	55.8	46.8
37.2	44.9	53.8	56.3	53.4	44.9
41.3	48.4	55.9	59.9	55.3	46.6
46.7	51.6	59.7	62.7	55.1	47.1
39.2	44.5	50.6	54.7	51.4	43.4
39.3	46.3	53.1	55.3	51.8	44.2
38.9	44.4	50.7	53.6	49.9	41.0
40.4	47.0	55.9	56.4	54.0	45.0
39.7	45.5	53.5	54.4	53.0	43.9
39.9	42.7	47.9	51.2	48.0	39.4
43.5	41.6	43.8	48.7	42.7	32.6
45.6	41.3	44.0	49.2	43.9	32.8
36.9	39.8	44.0	51.0	45.9	34.1
37.0	42.5	47.9	54.7	48.8	39.2
39.7	45.9	51.1	55.8	49.4	38.2
46.5	53.0	55.8	60.6	52.0	41.6
49.9	54.6	57.1	61.5	53.4	43.1
41.5	43.5	48.4	53.8	47.1	35.9
38.3	40.8	45.4	52.9	46.7	35.0
38.9	41.1	44.0	49.7	44.1	34.1
42.5	45.6	53.2	57.2	50.8	38.1
44.3	48.9	56.6	60.3	53.5	42.3
38.5	41.4	45.2	50.2	44.9	36.0
39.8	41.4	45.5	51.4	45.5	36.0
43.8	46.6	48.0	54.2	47.9	37.6
43.7	46.3	48.8	55.0	48.5	36.8
47.0	49.5	50.8	54.4	48.2	36.8
48.6	51.3	52.9	55.1	47.3	36.1
53.9	57.3	63.7	65.6	56.2	46.6
43.2	45.6	50.5	54.4	47.4	37.5
40.1	41.5	43.7	49.2	44.4	34.9
42.0	43.9	44.7	48.5	45.2	37.4
45.8	51.4	56.2	59.7	53.9	42.3
47.3	53.5	58.8	63.2	57.7	45.7
39.1	41.7	46.4	52.6	46.7	36.2

38.7	40.7	46.9	53.1	46.1	35.4
38.4	41.5	46.1	52.1	46.4	34.5
38.1	42.6	46.3	52.1	47.1	35.3
36.8	40.6	44.7	50.4	44.8	33.7
43.4	45.0	45.3	48.6	43.2	35.2
45.1	49.6	50.8	55.8	51.1	43.3
50.1	56.8	59.8	66.1	61.4	52.4
48.7	54.2	57.5	62.6	56.4	46.6
47.5	52.2	56.7	61.2	57.4	49.1
41.2	44.2	48.9	54.6	48.4	39.1
40.0	42.6	48.3	54.0	48.1	37.9
42.1	44.8	47.7	52.9	47.5	38.4
42.5	44.8	47.9	52.5	47.0	37.9
39.3	43.7	47.9	51.4	45.5	35.9
38.8	42.6	45.6	50.5	47.2	37.3
45.8	50.0	52.8	56.1	52.7	42.8
50.7	56.2	58.6	63.3	55.5	45.3
53.5	56.3	58.9	64.4	57.3	47.1
52.0	57.8	60.4	66.4	59.9	51.0
51.6	55.3	58.7	63.8	57.1	48.7
61.0	56.7	60.0	63.0	57.1	47.6
50.0	48.4	55.3	58.7	53.5	43.5
36.6	39.0	44.6	51.0	45.2	37.1
41.2	39.9	45.6	52.3	47.3	37.7
39.8	44.0	48.4	54.0	49.7	38.4
51.9	55.1	59.3	63.6	58.9	48.1

1/1 LASeq 8000	1/1 LASeq 16000	1/1 LASmax 8.0	1/1 LASmax 16.0	1/1 LASmax 31.5
20.4	15.3	5.9	16.5	27.5
21.0	15.5	5.9	16.0	26.2
24.4	16.1	5.9	14.1	23.5
27.1	16.7	5.9	8.1	24.2
22.9	15.4	5.9	9.3	24.1
22.8	15.8	8.4	19.9	29.2
22.2	15.3	8.9	20.3	28.7
23.5	15.7	5.9	18.1	29.1
23.0	15.3	5.9	15.9	29.1
24.0	15.6	5.9	11.3	30.6
27.4	15.5	5.9	17.0	30.6
38.6	24.3	5.9	20.2	34.0
38.0	25.8	5.9	24.1	33.9
32.0	20.0	6.9	23.6	33.9
27.0	15.5	7.7	19.1	31.2
27.1	15.3	5.9	18.8	29.6
30.5	17.2	5.9	17.6	28.8
34.9	19.8	5.9	21.6	29.9
26.5	15.4	6.5	20.7	32.1
37.4	24.1	6.5	20.4	35.0
34.9	21.3	5.9	14.7	33.2
36.8	28.4	5.9	16.3	29.4
22.5	17.2	5.9	12.8	31.5
40.6	26.3	5.9	11.3	30.4
42.3	28.6	5.9	14.1	29.3
24.4	15.7	5.9	12.7	24.9
22.3	15.1	5.9	13.8	25.1
22.5	15.3	5.9	17.4	28.9
23.5	15.3	5.9	17.2	29.2
20.3	15.0	5.9	15.9	27.6
21.3	15.4	5.9	17.0	27.2
29.1	18.5	5.9	16.4	27.3
39.0	25.7	5.9	16.2	28.7
37.1	20.7	5.9	13.2	27.3
42.8	27.7	5.9	22.2	30.3
38.8	28.0	5.9	18.9	30.1
24.2	16.0	5.9	14.4	26.2
22.8	15.2	5.9	13.8	24.4
23.0	15.4	5.9	7.9	23.3
37.7	24.3	5.9	14.0	28.7
30.8	19.0	5.9	13.7	26.7
23.6	15.3	5.9	5.6	21.7
21.6	15.6	5.9	22.0	28.0
20.9	15.3	5.9	19.0	25.4
21.7	15.4	5.9	12.2	23.5
22.4	15.7	5.9	17.8	26.5

26.8	16.8	5.9	17.3	27.5
34.8	21.7	5.9	21.0	30.9
34.1	21.6	7.0	23.7	30.7
27.5	17.2	9.4	22.5	32.5
22.8	16.1	8.2	22.4	31.4
24.5	15.4	6.7	19.2	28.0
27.3	15.6	5.9	14.4	25.8
27.4	15.7	5.9	18.1	31.5
26.9	16.5	5.9	20.6	29.8
26.4	15.6	5.9	21.0	28.8
25.7	15.6	5.9	20.3	31.1
25.8	15.4	5.9	18.7	29.7
29.6	15.2	5.9	14.2	23.1
30.6	15.2	5.9	17.9	26.4
29.4	15.2	5.9	14.8	23.7
35.2	22.4	5.9	16.5	26.3
37.1	24.3	5.9	14.8	26.2
28.2	15.4	5.9	9.3	22.6
28.0	15.1	5.9	7.9	22.2
25.8	15.1	5.9	8.9	22.1
29.6	15.1	5.9	7.4	22.1
27.9	15.7	5.9	9.1	20.7
24.8	15.9	5.9	17.7	27.7
21.4	15.7	5.9	19.5	29.5
21.2	15.4	5.9	16.7	23.8
21.7	15.3	5.9	15.8	23.6
27.6	15.1	5.9	12.9	23.1
25.0	15.1	5.9	14.1	24.0
30.7	18.5	5.9	21.1	29.1
33.1	22.0	7.5	20.4	30.1
23.0	16.1	5.9	21.8	31.7
22.3	15.6	5.9	17.1	28.5
23.2	15.7	5.9	17.8	26.8
27.2	16.7	5.9	12.6	25.3
30.1	18.3	5.9	10.4	25.3
23.7	15.2	5.9	7.1	23.6
23.1	15.7	5.9	22.6	30.2
23.2	15.2	5.9	20.7	29.0
22.5	15.1	5.9	11.6	23.4
22.3	15.2	5.9	14.2	24.8
22.3	15.2	5.9	15.8	26.2
36.0	21.7	5.9	15.6	33.6
24.3	15.5	5.9	12.9	25.0
22.1	15.1	5.9	5.9	25.0
23.3	15.1	5.9	15.3	29.1
30.8	19.7	5.9	11.6	29.8
35.1	24.3	5.9	11.9	37.6
23.1	15.5	5.9	16.7	29.4

21.8	15.2	5.9	18.6	29.0
21.3	15.1	5.9	13.8	26.0
22.2	15.3	5.9	13.8	26.1
22.0	15.3	5.9	13.3	25.6
23.1	15.7	5.9	23.6	35.1
30.2	17.2	7.8	24.6	34.9
41.2	24.9	8.3	23.2	35.7
36.8	21.0	5.9	20.4	37.0
39.7	26.1	5.9	18.0	28.4
26.7	16.4	5.9	23.4	29.4
25.3	16.0	5.9	23.1	31.5
25.2	15.8	6.4	20.5	31.2
24.4	15.2	5.9	16.2	26.7
23.4	15.3	5.9	16.8	26.0
26.0	15.9	5.9	10.4	25.6
31.9	19.8	5.9	14.1	31.3
34.9	22.6	5.9	13.8	36.0
37.3	24.9	5.9	15.4	38.8
40.5	27.4	5.9	9.7	27.9
37.3	24.2	5.9	12.1	38.2
38.2	23.7	5.9	18.1	42.3
34.3	22.2	5.9	16.3	34.1
24.3	15.4	5.9	13.4	26.6
24.1	15.0	5.9	10.8	25.2
27.1	15.8	5.9	15.1	27.0
37.9	23.3	5.9	15.7	28.6

1/1 LASmax 63.0	1/1 LASmax 125	1/1 LASmax 250	1/1 LASmax 500	1/1 LASmax 1000
30.3	35.4	37.1	44.7	49.2
30.5	34.6	36.3	41.2	46.3
30.6	36.7	37.9	40.1	46.1
30.4	40.1	43.8	44.7	49.7
34.8	46.2	44.5	55.7	54.9
37.4	46.2	44.9	55.7	54.2
36.0	44.8	43.4	46.3	52.8
34.1	40.0	43.4	47.0	53.4
38.3	38.4	39.6	44.2	51.1
37.6	34.6	38.6	43.7	49.9
44.0	45.7	54.6	58.0	65.7
45.3	54.5	63.3	65.2	72.6
46.5	55.2	59.4	62.4	68.3
43.8	52.7	56.7	59.1	65.7
38.5	41.9	43.7	45.9	53.8
38.4	40.2	44.4	48.8	51.6
43.5	50.2	53.3	59.1	62.4
42.7	52.3	54.8	61.0	63.3
46.2	50.1	53.7	50.8	55.4
44.8	55.6	61.8	65.5	70.2
45.2	54.6	62.8	67.7	71.3
45.5	54.9	62.8	67.3	71.3
42.4	42.3	48.0	51.2	56.1
47.6	56.7	65.2	67.8	73.3
48.3	56.6	65.2	67.7	73.2
32.6	40.7	49.8	51.7	58.8
32.3	35.3	41.3	45.2	51.1
34.3	39.1	44.3	46.7	52.2
35.1	40.2	43.5	47.0	52.8
33.1	39.6	43.3	44.9	51.9
31.7	40.8	45.2	46.2	52.3
35.6	47.1	54.4	56.3	64.1
43.7	52.8	58.9	61.2	67.4
43.3	55.3	61.2	67.1	70.7
46.8	56.6	62.4	67.5	70.9
40.5	53.0	55.6	58.9	64.5
35.1	41.7	45.9	50.5	55.7
35.3	45.2	49.5	49.4	54.9
35.0	44.6	49.1	49.9	54.1
43.0	52.7	60.1	64.1	70.4
38.9	49.4	56.2	60.1	66.0
29.2	35.3	40.4	44.8	50.7
31.9	33.6	38.4	42.6	47.3
29.6	36.1	48.3	50.4	52.3
29.1	37.3	51.1	54.1	55.8
32.9	41.3	47.1	48.2	52.0

37.0	45.1	51.9	57.1	62.5
41.3	50.1	55.6	61.7	65.4
44.5	49.3	52.8	56.7	61.6
39.4	45.2	49.3	52.3	54.8
37.4	40.3	42.4	46.1	53.6
32.7	39.0	42.9	48.8	53.3
33.8	39.2	45.6	52.3	55.5
34.5	41.7	47.3	53.7	56.7
36.2	40.8	45.5	51.4	54.9
33.7	38.1	44.7	50.9	53.8
36.8	38.8	44.6	51.0	55.2
36.6	39.7	45.2	51.0	53.9
30.8	41.3	47.9	56.6	58.5
32.4	39.4	47.5	58.0	58.9
29.2	38.2	45.8	55.6	57.8
36.4	46.6	52.7	61.5	65.1
40.2	49.4	54.1	63.2	66.2
30.6	40.7	46.1	52.0	56.0
31.2	40.1	47.3	54.7	56.4
31.0	39.9	46.2	53.9	55.9
31.4	42.5	48.1	58.0	58.6
30.9	40.8	46.1	54.7	56.1
34.4	42.0	45.8	51.1	52.9
36.4	49.1	42.6	45.1	49.2
35.7	49.1	42.6	44.8	50.6
33.9	39.0	41.0	44.9	52.9
33.4	39.0	45.2	50.7	56.9
32.5	40.8	47.6	52.2	57.1
43.6	52.9	58.6	61.5	65.3
43.9	53.4	58.6	61.5	65.3
35.7	44.1	46.4	50.6	55.7
32.5	39.9	41.5	46.6	53.7
34.6	39.7	42.0	45.0	50.8
35.0	45.5	49.8	59.1	62.9
41.0	46.5	51.6	59.7	63.7
35.2	40.0	42.7	47.6	52.0
35.5	41.9	43.6	47.4	52.8
38.7	44.8	47.9	48.5	55.0
38.3	45.7	48.0	49.3	55.7
35.8	51.5	52.9	54.1	55.3
36.0	51.2	55.3	57.5	60.5
46.5	56.8	60.1	68.0	69.1
36.3	47.9	50.1	55.0	57.9
32.9	42.0	42.8	46.6	50.9
36.9	43.6	46.7	46.9	49.8
42.1	51.7	58.0	65.1	68.2
43.1	51.7	58.1	64.6	68.1
36.0	40.5	44.6	48.6	54.2

33.8	39.3	41.3	48.2	54.0
31.4	40.1	43.3	46.8	52.9
31.4	40.0	43.6	47.3	52.9
32.3	38.8	41.3	45.7	51.8
38.4	45.7	47.1	46.3	49.3
39.5	46.0	53.4	55.0	62.0
46.6	52.9	58.2	61.6	68.0
45.9	50.3	56.2	60.1	64.9
44.1	50.1	54.1	59.3	63.8
37.5	43.0	47.1	50.3	55.1
36.9	41.1	43.7	49.1	54.7
35.8	43.8	45.9	49.2	53.9
34.0	43.4	46.6	49.3	53.0
33.9	41.7	45.7	49.6	52.4
34.6	45.0	48.9	51.1	56.1
43.9	48.9	51.6	55.6	58.3
49.3	58.6	62.3	65.1	70.1
49.0	58.5	61.7	64.6	69.6
39.4	53.7	59.6	62.7	68.8
46.4	53.2	57.8	60.6	66.2
48.5	64.2	58.7	62.9	65.6
43.4	56.4	53.5	61.0	63.7
33.0	39.2	40.7	46.6	52.3
32.8	43.7	40.6	46.8	53.4
37.2	43.8	48.4	52.2	57.9
43.1	55.0	59.4	62.0	66.2

1/1 LASmax 2000	1/1 LASmax 4000	1/1 LASmax 8000	1/1 LASmax 16000	1/1 LASmin 8.0
42.8	31.7	21.1	15.9	5.9
41.3	47.0	22.4	17.4	5.9
40.0	48.8	32.6	20.4	5.9
43.2	48.6	31.6	19.2	5.9
47.4	47.4	24.9	16.1	5.9
47.6	43.8	25.2	16.3	5.9
45.5	36.8	22.7	15.5	5.9
46.2	48.1	25.4	16.5	5.9
44.8	47.6	24.6	16.0	5.9
43.5	48.1	26.3	16.4	5.9
61.8	47.6	33.1	17.6	5.9
66.5	53.9	42.0	28.1	5.9
61.1	52.4	40.2	28.7	5.9
59.0	49.4	37.3	25.4	5.9
47.0	43.8	28.1	15.8	5.9
46.8	47.8	28.4	15.6	5.9
57.3	48.5	37.2	22.6	5.9
57.7	48.8	38.0	22.8	5.9
48.3	42.6	28.4	15.8	5.9
64.5	53.1	41.3	28.3	5.9
64.4	52.7	41.4	28.2	5.9
64.0	52.7	41.6	31.7	5.9
48.7	37.9	25.8	21.3	5.9
67.3	57.1	48.7	35.0	5.9
67.3	57.3	48.4	34.8	5.9
53.1	40.2	29.3	17.7	5.9
44.7	37.4	25.7	15.2	5.9
45.6	41.0	23.1	15.8	5.9
47.0	37.3	26.1	15.6	5.9
44.8	34.0	21.0	15.1	5.9
44.4	36.7	22.8	15.7	5.9
58.4	46.7	36.7	24.3	5.9
61.0	51.3	40.5	27.3	5.9
64.8	53.4	46.4	29.6	5.9
64.9	54.1	46.9	31.8	5.9
59.4	51.8	43.3	32.6	5.9
50.6	39.3	27.6	18.0	5.9
47.5	37.2	24.0	15.3	5.9
46.3	36.4	24.5	16.1	5.9
64.9	52.8	42.2	28.8	5.9
60.2	48.1	37.2	24.3	5.9
44.7	37.6	27.9	15.8	5.9
41.7	32.3	23.6	16.8	5.9
44.7	33.0	21.2	15.4	5.9
47.4	34.0	23.8	15.9	5.9
46.8	35.4	23.2	15.9	5.9

54.5	44.4	34.0	21.2	5.9
56.9	47.0	36.1	22.9	5.9
55.8	45.8	35.5	22.8	5.9
49.9	42.5	32.3	19.0	5.9
47.3	36.8	23.8	16.6	5.9
48.5	39.8	25.7	15.6	5.9
53.2	45.1	28.3	16.1	5.9
53.5	44.6	28.9	16.1	5.9
52.6	43.7	28.6	18.2	5.9
52.3	42.5	27.2	15.8	5.9
52.6	42.2	26.6	15.7	5.9
51.5	43.0	28.0	15.6	5.9
55.0	47.4	30.3	15.3	5.9
57.2	47.8	31.7	15.3	5.9
54.4	45.8	30.5	15.3	5.9
58.5	50.6	41.4	29.4	5.9
58.5	50.6	41.4	29.3	5.9
53.4	44.8	30.0	16.4	5.9
53.2	46.6	29.5	15.2	5.9
52.4	43.8	28.4	15.2	5.9
56.4	46.8	30.8	15.2	5.9
55.2	45.5	29.1	16.8	5.9
51.6	43.1	27.6	16.5	5.9
43.5	34.2	22.3	15.9	5.9
44.9	33.5	22.3	15.6	5.9
48.2	35.2	22.8	15.5	5.9
50.0	40.9	31.2	15.2	5.9
50.1	38.7	29.5	15.2	5.9
56.3	47.1	37.7	25.4	5.9
56.6	47.1	37.7	25.8	5.9
48.1	36.7	24.4	16.4	5.9
48.0	35.9	22.9	15.9	5.9
45.2	36.4	26.0	16.0	5.9
57.0	44.6	32.0	19.6	5.9
57.2	45.6	33.2	20.7	5.9
46.6	37.7	25.6	15.5	5.9
46.6	36.7	25.3	16.6	5.9
48.7	38.2	23.9	15.4	5.9
49.0	37.7	23.0	15.2	5.9
48.7	37.3	22.6	15.2	5.9
50.5	37.5	25.9	15.6	5.9
59.5	50.3	39.7	25.2	5.9
49.4	39.4	27.9	16.7	5.9
46.0	36.8	23.0	15.2	5.9
46.8	39.4	24.4	15.3	5.9
61.9	50.3	40.0	29.2	5.9
61.9	50.4	40.0	29.3	5.9
48.7	36.9	24.8	16.5	5.9

46.4	36.7	22.7	15.4	5.9
47.5	34.8	21.6	15.3	5.9
48.5	35.9	22.7	15.6	5.9
46.3	34.6	22.6	15.5	5.9
43.6	36.2	23.7	16.0	5.9
57.2	48.6	35.7	20.6	5.9
63.5	54.2	44.1	26.7	5.9
59.4	50.0	40.8	24.6	5.9
60.0	52.1	43.1	29.8	5.9
50.2	41.5	30.6	18.2	5.9
48.5	39.1	26.7	16.3	5.9
48.4	39.2	26.3	16.6	5.9
47.7	38.4	25.0	15.4	5.9
47.4	37.5	24.5	15.7	5.9
53.6	43.0	32.7	19.6	5.9
54.8	44.9	34.7	22.2	5.9
62.1	52.6	42.8	30.5	5.9
62.1	52.3	42.7	30.4	5.9
61.4	53.0	42.9	29.8	5.9
59.7	51.8	40.3	28.3	5.9
58.9	49.2	40.4	28.0	5.9
58.3	48.6	39.8	27.4	5.9
46.2	39.1	26.0	16.0	5.9
49.0	40.0	26.1	15.2	5.9
54.1	42.9	32.0	18.3	5.9
61.0	50.1	40.5	25.8	5.9

1/1 LASmin 16.0	1/1 LASmin 31.5	1/1 LASmin 63.0	1/1 LASmin 125	1/1 LASmin 250
10.7	22.3	28.0	32.7	34.3
11.2	22.6	27.7	32.6	34.3
6.7	21.9	24.9	30.8	35.9
5.6	21.7	28.3	35.2	37.4
4.6	22.4	27.4	36.3	40.6
5.6	22.7	32.9	41.5	42.0
13.1	22.4	30.1	40.0	42.1
11.8	23.2	29.9	37.1	39.2
8.2	24.3	32.9	34.2	37.0
8.7	24.7	34.1	33.0	36.9
9.4	26.5	34.9	34.6	38.0
14.6	29.6	39.8	44.9	52.7
13.7	28.7	40.0	45.2	52.7
17.7	28.8	36.0	41.8	43.7
13.8	27.1	35.6	36.1	39.7
14.2	26.7	35.9	35.9	40.2
10.8	25.5	35.9	39.5	44.1
9.9	26.2	39.1	47.5	49.4
14.1	26.0	39.3	45.3	47.0
14.8	29.3	40.7	49.8	53.8
9.2	25.2	38.7	46.7	51.4
9.4	23.9	37.6	42.4	48.0
10.3	23.8	35.9	35.1	40.8
6.1	22.6	33.6	34.7	41.4
6.0	22.6	32.6	40.7	49.8
6.9	22.3	25.6	34.0	40.4
6.2	21.0	26.5	33.4	40.3
7.7	22.9	26.9	35.2	41.1
15.4	25.7	33.0	35.2	38.6
4.8	21.6	29.9	34.1	37.5
7.9	20.9	28.6	38.9	43.2
10.5	23.6	30.2	38.8	43.4
12.2	25.8	35.6	47.1	54.2
10.2	22.9	34.0	43.6	49.3
9.3	23.3	36.4	47.8	53.2
8.6	22.8	32.4	41.7	45.9
9.2	22.5	31.6	36.6	44.2
8.0	22.3	31.8	36.7	44.0
3.2	20.3	32.1	37.8	42.5
4.6	22.5	32.6	39.4	46.0
5.1	19.9	29.0	35.2	40.5
3.2	18.4	26.1	31.9	38.0
5.0	19.3	24.9	31.2	35.9
6.6	19.6	25.1	33.0	37.4
7.6	20.1	25.0	34.7	43.6
11.5	22.1	28.9	36.0	42.2

10.4	22.6	30.6	37.6	42.8
12.6	27.3	36.3	45.0	52.0
11.4	26.3	39.4	45.2	49.3
8.9	22.4	35.5	40.3	41.7
17.5	26.0	32.6	37.3	39.9
7.2	22.2	30.1	37.2	40.3
7.1	23.1	29.6	37.1	42.9
9.5	24.0	32.2	38.9	45.3
14.3	26.0	32.0	37.0	42.5
14.4	24.0	30.1	35.7	41.6
16.1	23.4	31.0	37.2	41.9
8.2	20.9	30.1	38.2	41.7
7.2	19.2	27.7	38.5	44.9
9.2	20.3	28.2	37.7	45.8
6.4	19.6	27.2	36.2	44.2
4.7	18.9	28.0	37.1	45.1
8.3	22.7	30.2	40.7	46.1
4.1	19.1	28.8	38.4	43.5
3.3	19.7	29.1	37.7	44.3
4.6	19.4	29.3	37.9	42.9
3.2	19.3	27.5	38.3	44.7
3.2	18.6	27.6	38.3	44.5
7.2	18.8	29.8	38.0	39.1
16.7	23.8	33.7	38.1	39.0
9.7	20.1	33.6	38.9	40.6
10.1	20.9	30.1	35.2	39.1
5.0	19.6	28.6	35.1	39.2
3.2	18.5	29.5	38.3	43.4
12.0	22.1	31.9	39.7	47.0
14.7	25.5	34.1	44.1	46.5
13.9	26.2	31.0	37.2	41.1
13.1	25.6	30.4	36.3	40.1
9.8	23.8	31.5	38.3	40.1
6.8	22.6	30.8	38.9	40.0
6.7	23.5	34.3	39.4	42.4
3.2	21.0	31.5	36.7	39.9
3.7	20.8	31.6	38.6	40.1
11.4	23.2	33.8	41.9	43.6
4.7	21.4	31.2	41.9	45.4
4.1	21.8	31.8	43.3	46.9
9.6	22.8	33.1	46.3	49.4
11.8	25.0	36.0	47.9	50.2
4.0	21.7	31.3	39.2	41.9
3.2	19.5	30.3	37.4	39.7
4.4	22.2	31.9	38.5	39.8
7.2	24.6	33.5	42.1	45.2
7.7	27.5	34.3	40.5	44.6
8.8	21.6	29.3	38.1	40.0

13.6	22.1	27.9	37.8	39.8
10.2	22.2	28.1	37.0	39.3
8.0	22.1	28.9	36.5	41.3
6.9	22.3	27.9	36.1	39.9
6.2	21.5	30.9	38.7	40.9
20.0	32.1	36.2	44.3	46.9
17.4	29.6	38.4	45.8	53.3
13.4	26.2	38.2	45.5	50.0
13.4	26.1	37.5	43.0	47.2
12.6	24.2	33.0	40.0	42.7
18.1	27.2	35.2	38.5	42.1
14.6	23.9	31.2	39.7	43.4
9.4	21.9	31.1	41.7	43.4
10.5	22.7	29.2	37.1	40.4
4.3	20.8	28.9	35.3	38.9
6.5	25.0	34.7	41.5	46.5
9.4	23.0	33.3	40.6	45.5
5.8	26.0	33.8	45.4	51.4
4.8	24.5	33.6	45.3	53.8
9.2	26.8	35.7	49.0	53.7
12.0	32.0	42.7	51.0	53.5
7.7	25.2	32.0	39.2	40.8
8.2	24.0	30.6	34.9	38.1
7.1	22.8	30.4	38.2	38.8
6.5	22.3	29.3	37.9	40.4
9.8	25.2	37.1	43.8	48.4

1/1 LASmin 500	1/1 LASmin 1000	1/1 LASmin 2000	1/1 LASmin 4000	1/1 LASmin 8000
40.4	45.1	39.8	28.9	19.8
39.7	44.6	39.5	29.8	19.8
39.1	44.3	38.4	31.9	20.6
39.2	45.1	38.5	34.6	23.3
43.5	49.8	43.2	34.3	21.5
45.9	52.4	44.6	35.2	21.4
44.7	51.7	44.6	34.7	21.6
44.2	51.1	44.7	34.6	22.2
41.9	48.6	42.5	34.3	21.7
42.5	48.7	42.5	36.3	22.3
43.0	49.6	42.6	37.7	24.6
55.6	61.8	55.8	46.4	33.1
56.0	62.0	55.7	46.4	33.3
46.0	53.9	47.0	36.5	27.3
42.7	49.0	41.8	35.0	25.1
42.6	47.9	42.2	36.4	24.9
48.6	51.4	46.1	37.7	27.5
50.1	54.2	48.4	39.4	28.4
46.9	53.1	46.4	37.0	25.4
50.8	55.4	47.0	37.0	26.3
54.8	59.3	52.3	39.8	28.4
51.3	56.1	48.7	38.0	25.8
44.6	50.3	43.9	32.7	20.6
44.7	50.5	44.0	33.8	20.4
51.7	58.8	53.1	40.2	29.3
44.0	50.6	44.2	33.3	20.9
44.1	50.0	43.6	32.3	20.6
44.5	51.0	43.9	34.7	21.4
44.2	50.9	44.8	33.8	21.0
43.9	50.8	43.6	32.2	20.1
44.7	49.7	43.2	32.8	20.3
45.7	50.2	43.6	35.5	22.6
56.2	62.0	55.2	46.7	35.3
51.4	55.7	49.4	39.5	27.7
57.5	62.2	57.0	46.5	36.8
50.5	55.6	50.6	39.4	27.6
48.1	53.9	47.4	36.4	22.7
47.5	52.5	46.0	35.1	22.2
46.6	50.8	44.9	34.6	22.3
49.8	54.1	46.2	35.2	22.4
44.9	50.7	44.7	33.3	21.8
42.4	46.8	40.8	31.3	21.1
40.5	45.6	39.8	29.9	20.5
41.7	47.2	41.1	29.9	20.7
45.8	51.3	44.3	32.4	21.1
45.3	50.1	44.8	33.7	21.8

46.4	51.5	44.9	34.4	21.8
56.4	61.5	54.6	44.6	33.2
52.3	54.8	50.0	42.5	32.4
45.8	52.5	46.1	36.0	23.7
44.2	51.4	45.5	33.9	21.9
45.0	51.5	46.5	35.0	22.2
48.8	52.2	48.3	39.5	25.7
50.8	53.8	50.0	40.8	25.6
49.2	51.7	48.1	39.6	25.5
48.7	50.5	47.4	39.7	25.6
46.9	50.7	47.4	39.0	24.7
47.6	52.2	47.4	39.7	24.9
51.1	53.9	51.5	42.8	28.1
55.6	57.9	54.3	45.8	29.7
52.7	54.5	51.5	43.0	28.2
52.8	56.4	53.1	44.2	28.9
52.0	55.0	48.8	40.7	28.8
49.3	53.8	49.4	41.3	25.9
50.0	54.0	49.8	41.9	26.1
48.1	51.8	48.0	38.8	24.2
52.1	52.8	50.0	42.6	27.9
51.0	52.9	51.0	42.8	27.2
43.0	49.0	43.5	34.2	22.2
42.8	48.2	42.2	31.9	21.1
43.5	47.9	42.5	32.0	20.7
43.4	49.7	44.8	33.3	20.9
44.9	52.9	48.1	35.0	20.9
49.8	54.8	48.3	37.1	21.8
51.3	54.9	48.1	37.0	21.8
50.6	55.7	48.1	36.7	24.4
46.5	52.6	46.1	35.6	22.1
44.3	50.8	45.2	33.8	22.1
43.1	49.0	43.5	32.6	22.0
44.9	49.3	43.9	33.5	21.6
47.7	52.1	46.6	36.6	24.6
43.6	49.4	43.8	35.0	22.8
43.8	49.6	44.2	35.5	22.0
47.1	52.8	46.5	36.6	22.2
48.1	54.6	48.1	36.3	21.8
48.3	52.8	47.2	36.3	21.8
49.9	52.5	46.1	35.2	21.7
55.1	57.9	49.4	37.6	26.1
46.3	50.8	46.0	36.3	22.7
41.6	47.1	42.5	33.0	21.4
41.3	47.1	43.8	34.3	21.9
46.9	49.5	44.2	34.1	22.2
48.7	54.2	48.7	36.8	24.8
45.4	51.9	46.0	35.8	22.3

46.0	52.2	45.7	34.5	21.0
45.5	51.4	45.8	34.1	20.8
45.6	51.4	46.3	34.3	21.4
43.6	48.3	43.0	32.9	21.6
43.7	48.1	42.6	33.2	21.8
46.2	48.6	43.2	35.9	23.7
55.0	62.0	57.2	48.7	35.7
53.2	58.2	52.5	41.7	31.0
50.4	55.1	50.2	41.5	30.6
48.3	54.2	47.7	37.3	24.3
47.6	53.7	47.5	36.7	23.9
46.6	52.2	46.8	37.6	24.4
46.6	51.8	46.5	37.4	23.9
45.7	50.1	44.1	34.1	22.5
43.2	48.5	44.2	33.8	22.7
47.7	52.0	47.9	37.4	25.1
47.1	51.8	46.6	34.8	21.5
53.7	59.5	52.8	42.4	32.0
55.3	62.4	56.5	45.5	35.3
55.7	60.7	54.1	44.7	32.2
57.0	59.8	53.8	43.7	33.4
46.6	52.1	46.3	36.7	24.8
43.4	50.5	44.3	35.7	23.2
43.9	50.5	46.1	35.2	22.2
45.5	52.0	46.5	35.2	22.5
52.2	57.9	54.1	42.9	31.8

1/1 LASmin 16000	1/3 LASeq 6.3	1/3 LASeq 8.0	1/3 LASeq 10.0	1/3 LASeq 12.5
15.0	1.9	0.9	0.3	1.5
14.9	1.9	0.9	0.6	2.8
15.0	1.9	0.9	0.9	1.9
15.4	1.9	0.9	0.3	-0.6
15.1	1.9	0.9	0.3	-0.6
15.4	1.9	0.9	0.5	1.3
15.2	1.9	1.3	3.4	5.8
15.2	1.9	0.9	0.3	7.1
15.0	1.9	0.9	0.3	5.0
15.2	1.9	0.9	0.3	0.6
15.2	1.9	0.9	0.3	2.2
17.6	1.9	0.9	0.3	5.7
19.2	1.9	0.9	0.3	4.4
15.8	1.9	1.4	1.6	6.1
15.2	1.9	0.9	3.3	9.2
15.0	1.9	0.9	0.7	4.8
15.2	1.9	0.9	0.8	4.0
15.8	1.9	0.9	0.3	1.3
15.1	1.9	0.9	0.3	4.6
15.2	1.9	0.9	3.1	8.0
16.5	1.9	0.9	0.5	1.4
21.3	1.9	0.9	0.3	1.7
15.0	1.9	0.9	0.3	2.4
14.9	1.9	0.9	0.3	-0.2
17.7	1.9	0.9	0.3	-0.8
15.0	1.9	0.9	0.3	-0.8
15.0	1.9	0.9	0.3	-0.8
14.9	1.9	0.9	0.3	0.9
15.1	1.9	0.9	0.3	4.2
14.9	1.9	0.9	0.6	3.4
15.0	1.9	0.9	0.3	0.3
15.4	1.9	0.9	0.5	4.2
20.9	1.9	0.9	0.3	4.2
15.8	1.9	0.9	0.3	0.8
21.8	1.9	0.9	0.3	1.8
18.0	1.9	0.9	0.3	5.1
15.2	1.9	0.9	0.3	0.6
15.1	1.9	0.9	0.3	0.5
15.2	1.9	0.9	0.3	-0.8
15.2	1.9	0.9	0.3	1.3
15.1	1.9	0.9	0.3	0.8
15.0	1.9	0.9	0.3	-0.8
15.1	1.9	0.9	0.3	-0.6
15.2	1.9	0.9	1.0	6.4
15.1	1.9	0.9	0.3	-0.8
15.6	1.9	0.9	0.3	3.4

15.6	1.9	0.9	0.3	1.8
20.8	1.9	0.9	1.3	5.1
19.0	1.9	0.9	0.5	3.6
16.4	1.9	0.9	2.9	7.3
15.5	1.9	1.2	5.7	10.2
15.3	1.9	1.1	2.3	6.6
15.4	1.9	0.9	0.3	1.2
15.4	1.9	0.9	1.2	4.4
15.5	1.9	0.9	1.4	2.4
15.5	1.9	0.9	0.8	5.7
15.5	1.9	0.9	0.4	5.6
15.2	1.9	0.9	1.2	5.6
15.1	1.9	0.9	0.3	0.3
15.1	1.9	0.9	0.5	1.7
15.2	1.9	0.9	0.7	0.6
15.2	1.9	0.9	0.3	-0.8
16.4	1.9	0.9	0.3	2.7
15.1	1.9	0.9	0.3	-0.8
15.0	1.9	0.9	0.3	-0.8
15.1	1.9	0.9	0.3	-0.8
15.0	1.9	0.9	0.3	-0.8
15.1	1.9	0.9	0.3	-0.8
15.6	1.9	0.9	0.4	-0.7
15.5	1.9	0.9	1.3	6.8
15.3	1.9	0.9	1.0	5.4
15.0	1.9	0.9	0.3	3.1
15.0	1.9	0.9	0.3	1.0
14.9	1.9	0.9	0.3	-0.6
15.1	1.9	0.9	0.3	4.0
16.4	1.9	0.9	4.6	7.4
15.6	1.9	0.9	1.4	7.2
15.5	1.9	0.9	1.7	7.5
15.2	1.9	0.9	1.9	5.0
15.1	1.9	0.9	0.3	-0.5
15.5	1.9	0.9	0.3	-0.8
15.0	1.9	0.9	0.3	-0.8
15.2	1.9	0.9	0.3	-0.8
15.1	1.9	0.9	0.3	7.4
15.1	1.9	0.9	0.3	0.2
15.0	1.9	0.9	0.3	-0.8
15.1	1.9	0.9	0.3	0.6
15.6	1.9	0.9	0.3	2.6
15.1	1.9	0.9	0.3	0.2
15.0	1.9	0.9	0.3	-0.8
15.0	1.9	0.9	0.3	3.0
15.3	1.9	0.9	0.3	-0.1
16.5	1.9	0.9	0.3	-0.3
15.2	1.9	0.9	0.3	1.7

15.0	1.9	0.9	1.8	6.0
15.0	1.9	0.9	0.3	0.6
15.1	1.9	0.9	0.3	2.3
15.2	1.9	0.9	0.3	-0.1
15.3	1.9	0.9	0.3	-0.3
15.9	1.9	0.9	4.1	8.8
20.7	1.9	2.2	3.7	10.0
17.3	1.9	0.9	2.1	6.7
18.2	1.9	0.9	0.3	5.2
15.7	1.9	0.9	0.3	4.0
15.7	1.9	0.9	1.6	8.6
15.3	1.9	0.9	3.2	9.8
15.1	1.9	0.9	0.6	2.9
15.1	1.9	0.9	0.3	3.9
15.1	1.9	0.9	0.3	0.2
16.0	1.9	0.9	0.3	-0.8
15.0	1.9	0.9	0.3	2.3
19.3	1.9	0.9	0.3	-0.4
22.9	1.9	0.9	0.3	-0.8
19.1	1.9	0.9	0.3	-0.7
18.1	1.9	0.9	0.3	1.1
16.1	1.9	0.9	0.5	2.8
15.1	1.9	0.9	0.3	0.3
15.0	1.9	0.9	0.3	-0.7
15.0	1.9	0.9	0.3	-0.7
18.3	1.9	0.9	1.1	4.6

1/3 LASeq 16.0	1/3 LASeq 20.0	1/3 LASeq 25.0	1/3 LASeq 31.5	1/3 LASeq 40.0	1/3 LASeq 50.0
7.7	12.2	15.9	19.5	22.8	23.3
5.7	13.2	15.8	19.6	21.5	24.0
4.9	8.9	12.3	18.3	20.2	22.1
2.2	4.1	10.1	19.3	20.1	22.9
1.6	5.2	11.5	19.5	20.7	22.3
7.3	12.5	17.1	20.5	23.9	25.6
10.6	16.3	19.7	21.1	24.2	25.1
9.3	14.4	16.6	22.4	24.8	27.2
9.2	11.7	16.7	19.8	24.8	33.8
3.5	8.2	14.8	19.0	24.4	34.5
5.6	11.8	16.9	20.0	27.8	40.8
11.6	15.6	20.4	25.1	30.1	38.8
10.1	14.5	20.2	23.5	30.0	34.3
14.3	19.4	23.8	26.3	28.9	31.7
12.5	15.0	20.9	22.8	26.9	34.4
9.4	14.8	19.6	21.8	26.3	34.5
9.0	13.8	18.1	20.2	25.0	34.1
5.9	10.0	17.3	23.3	25.9	35.3
15.3	15.3	20.7	24.0	27.5	42.5
12.2	16.9	19.8	24.8	31.2	37.6
6.6	11.9	16.3	19.6	28.3	37.1
6.4	12.2	17.3	21.4	25.3	35.7
6.2	9.7	13.7	18.8	27.2	38.6
2.8	8.0	11.8	18.7	25.4	29.9
3.6	10.4	17.4	21.6	23.7	33.1
4.6	7.9	13.9	17.1	21.2	24.4
1.7	7.2	13.3	17.2	21.5	23.7
4.8	9.1	14.2	18.3	23.5	23.9
10.2	14.8	18.6	22.9	25.2	26.8
4.5	10.8	15.0	20.1	21.3	28.7
5.0	11.6	15.6	19.2	20.5	24.5
7.4	12.8	17.2	19.5	22.7	23.9
8.3	12.7	17.0	22.2	24.7	28.3
6.0	10.3	17.5	20.4	22.3	27.7
9.9	14.7	19.7	21.9	25.2	33.8
11.4	13.8	18.0	21.4	23.8	30.8
5.1	10.3	14.0	17.5	22.6	24.6
5.8	10.3	14.5	17.9	21.6	24.0
1.3	3.8	13.0	16.5	20.0	25.4
2.5	7.9	14.1	18.0	24.9	27.3
3.5	8.5	13.6	17.7	21.1	25.9
-1.5	1.7	12.2	14.7	17.7	22.3
4.6	13.0	14.8	16.6	20.8	21.3
11.0	13.2	15.6	17.6	18.8	19.3
4.5	8.2	12.6	16.8	19.3	21.9
9.1	13.5	17.5	18.7	21.0	23.5

6.9	13.2	16.9	21.4	22.0	25.7
12.4	16.3	21.4	22.3	27.3	32.2
11.3	16.2	20.5	24.1	27.0	29.0
11.9	16.0	19.3	24.6	25.6	27.6
12.7	18.5	20.7	24.1	27.2	28.9
9.1	13.7	15.4	18.1	22.9	23.4
4.9	9.9	13.4	18.8	23.1	22.9
9.1	13.2	15.1	23.2	24.8	24.1
11.8	16.6	19.5	22.5	23.8	27.6
12.0	16.8	19.1	22.7	23.6	25.5
11.6	16.6	18.1	22.6	25.7	27.6
10.8	13.5	16.8	20.0	22.7	24.2
3.0	9.8	13.6	15.9	18.3	22.9
7.5	13.3	16.4	20.4	21.7	24.4
5.8	9.9	13.5	16.4	19.3	21.2
2.4	9.0	13.4	16.6	19.7	23.5
7.5	9.6	14.6	18.9	22.8	29.7
0.9	5.1	11.4	15.3	18.5	21.4
-1.2	3.6	10.8	15.6	18.6	21.0
0.4	5.0	10.1	14.8	18.6	22.5
-1.1	4.2	10.2	14.9	19.2	21.3
-0.4	3.7	11.2	15.1	17.5	20.5
2.7	9.7	14.7	16.7	18.9	25.1
10.0	16.7	18.4	22.6	25.2	31.8
6.9	11.9	14.4	17.6	19.0	28.5
7.5	10.3	14.6	17.5	19.1	22.5
5.4	8.7	13.4	16.8	19.4	23.3
-0.3	5.0	12.7	16.4	19.4	23.3
7.0	13.4	16.2	19.9	22.6	27.6
11.4	16.8	19.3	23.4	25.2	29.1
12.8	17.3	22.1	24.9	27.0	28.4
10.5	13.3	19.2	22.6	24.8	25.3
10.9	12.5	17.5	19.4	23.3	24.3
4.2	7.8	13.1	18.4	22.1	23.9
3.1	7.6	12.8	20.6	22.3	24.4
-1.0	3.8	11.3	17.8	20.3	23.7
-0.4	13.2	16.1	21.6	22.5	26.5
10.9	15.1	16.5	21.3	23.1	25.8
4.7	7.3	12.6	17.3	20.5	24.6
0.5	6.6	12.3	15.7	21.8	25.1
6.0	11.7	15.2	17.8	22.2	24.5
8.1	12.1	19.3	25.5	27.2	32.0
3.6	8.0	13.7	17.4	21.8	25.0
-1.6	2.6	10.5	15.1	21.3	25.3
6.3	9.6	13.2	18.0	27.2	27.7
4.0	8.1	12.3	17.5	26.6	26.6
1.4	8.2	13.8	20.4	33.8	31.2
6.1	10.0	14.9	18.9	22.9	25.1

12.0	13.8	19.0	22.7	23.2	27.0
8.7	9.8	14.4	18.9	22.0	25.3
6.9	8.7	16.0	18.3	22.0	25.1
5.1	8.4	15.4	18.9	22.0	23.4
3.9	9.5	16.4	20.5	23.6	26.7
15.9	20.8	23.9	29.1	30.5	32.2
14.3	18.3	22.2	26.6	29.9	36.6
12.7	16.4	21.1	23.5	32.0	37.8
10.8	13.6	18.2	23.5	24.7	28.5
10.5	14.2	17.8	20.3	24.8	28.1
15.3	18.0	19.8	23.1	25.8	27.8
12.1	16.5	21.2	24.4	25.3	26.6
7.6	10.6	15.7	19.2	21.1	25.8
9.3	13.2	18.0	19.3	20.7	24.8
4.1	5.5	13.1	16.4	20.6	24.5
1.9	6.4	16.3	21.3	27.1	29.8
5.7	10.5	14.6	20.1	24.9	27.0
2.8	10.2	19.2	33.9	28.6	29.8
0.2	4.4	13.4	20.5	24.1	28.0
2.5	8.5	14.4	20.8	29.9	33.1
7.4	13.4	17.2	29.1	38.6	41.1
6.8	11.8	16.4	22.2	28.4	31.0
5.4	8.8	14.1	18.5	24.0	25.6
1.5	7.9	11.7	16.5	22.8	23.0
1.6	8.6	12.8	18.6	22.6	23.8
6.7	11.7	15.8	21.8	23.3	28.4

1/3 LASeq 63.0	1/3 LASeq 80.0	1/3 LASeq 100	1/3 LASeq 125	1/3 LASeq 160	1/3 LASeq 200
23.0	25.9	28.0	29.2	30.1	30.9
23.4	25.6	27.8	28.9	29.7	29.4
24.5	24.0	26.0	27.9	30.3	32.2
26.9	23.4	26.5	35.9	33.2	35.3
26.8	24.2	28.2	41.1	32.5	36.2
33.1	28.2	28.6	41.7	39.8	38.8
28.2	32.5	30.1	34.2	42.8	37.9
26.5	27.8	33.6	34.7	34.6	35.5
29.6	26.4	32.8	31.0	30.3	31.1
29.9	26.4	30.4	28.2	29.0	29.7
32.7	28.8	33.8	36.1	34.2	38.5
35.8	39.1	42.5	46.6	47.9	52.8
37.2	42.3	43.6	45.1	50.2	52.0
33.5	36.6	38.7	41.3	46.0	46.3
31.0	29.9	32.8	33.2	35.4	36.2
30.9	29.5	33.2	32.2	33.1	36.1
30.7	37.6	43.7	37.8	40.1	41.7
34.6	38.0	44.5	43.8	47.5	46.1
34.2	35.6	37.2	43.1	44.2	44.3
37.1	39.1	42.7	49.8	49.7	54.1
33.7	35.5	40.3	44.4	47.3	51.5
35.8	37.2	41.9	44.5	48.8	54.4
34.2	29.7	29.0	33.5	35.8	39.7
36.3	33.6	37.7	44.5	44.9	47.7
41.0	38.5	41.7	47.5	48.1	52.7
24.4	23.8	27.9	32.2	34.5	39.5
26.9	23.4	24.9	29.3	31.5	36.7
25.6	26.1	28.5	31.7	34.5	36.5
29.3	31.3	30.0	33.0	35.2	35.4
24.8	26.0	29.4	33.6	30.3	34.2
24.8	27.0	29.9	35.9	36.8	40.9
26.6	29.1	33.4	36.7	39.5	43.2
37.9	37.9	44.7	45.2	48.8	52.5
34.2	34.6	39.9	42.3	44.1	48.4
37.8	38.7	47.4	45.8	50.1	53.0
32.2	34.1	39.4	44.6	47.5	46.9
27.8	31.4	29.3	34.6	36.1	38.9
30.2	30.9	31.7	36.8	40.0	38.5
30.5	30.1	32.1	35.2	38.6	38.4
32.2	36.0	40.4	43.1	45.4	49.7
27.1	31.5	34.6	38.6	41.3	45.0
20.6	24.1	25.1	29.3	30.7	32.3
23.4	26.5	24.8	27.9	29.0	30.3
22.5	24.4	25.2	30.8	29.9	31.8
22.3	25.1	29.1	32.0	32.2	34.8
25.6	27.0	37.9	32.1	32.5	34.1

26.8	29.3	33.5	35.4	38.1	40.3
32.7	37.2	40.7	43.7	46.1	48.2
34.5	40.7	42.2	41.8	44.7	47.2
30.5	35.3	37.3	37.0	38.1	42.8
29.9	32.6	32.8	34.1	35.0	36.1
26.9	27.5	29.4	33.9	34.6	36.4
25.2	27.7	29.3	33.0	35.3	39.9
27.2	31.5	36.0	33.9	36.6	42.7
29.4	28.8	35.1	33.6	34.7	39.3
27.7	27.9	29.3	32.2	33.9	38.0
30.2	29.5	30.1	33.3	35.2	38.6
31.1	31.4	30.6	34.6	35.7	38.6
24.3	27.7	30.5	35.0	37.6	42.7
25.6	26.4	28.2	33.3	36.1	41.9
23.1	24.6	27.6	32.5	35.2	38.9
25.9	27.4	32.0	35.9	38.9	41.8
28.7	34.3	39.5	41.2	44.2	46.7
23.2	27.7	31.1	34.9	36.1	39.5
24.9	27.7	31.0	34.6	36.4	42.3
24.9	27.6	30.5	34.4	36.0	40.9
24.8	27.3	28.4	34.0	39.1	42.3
24.3	26.5	27.0	34.4	38.0	41.3
25.0	28.7	28.2	33.0	38.4	38.7
29.0	28.8	38.7	40.3	33.0	33.9
32.9	25.6	40.4	43.7	32.9	35.3
30.1	25.3	29.4	34.4	31.0	33.7
26.5	28.2	30.3	32.5	33.5	34.7
25.7	28.4	31.4	34.6	37.5	37.0
30.5	33.6	36.1	43.4	42.2	48.2
35.2	36.7	39.3	46.8	46.3	51.4
30.8	29.6	31.0	39.6	36.2	39.0
25.9	28.3	32.0	33.5	34.7	34.2
24.9	32.0	33.7	33.3	35.0	34.1
26.4	30.8	36.1	36.5	39.3	40.0
31.4	37.1	37.6	39.8	41.0	44.7
27.4	31.4	32.9	34.0	34.2	39.0
27.4	31.4	34.3	37.2	31.7	37.0
29.2	35.3	39.2	41.1	34.8	41.0
24.8	34.6	41.0	36.4	38.7	41.0
27.4	30.9	43.7	38.1	42.7	45.0
28.5	32.8	43.0	41.6	46.2	46.1
33.4	41.2	45.2	49.5	50.9	52.9
27.0	31.8	36.6	39.0	39.8	41.2
25.8	29.0	34.1	33.1	37.7	35.1
27.1	32.4	34.5	35.5	39.4	39.6
28.6	33.9	37.0	39.3	43.5	44.0
32.9	37.2	40.2	43.1	44.7	46.8
24.3	30.7	35.8	32.8	34.0	35.7

25.8	26.2	35.7	30.4	33.8	34.3
23.2	26.8	32.5	33.6	34.6	34.5
24.0	27.4	30.5	32.9	35.7	35.4
23.2	25.4	30.0	32.2	32.9	34.5
27.1	31.5	35.7	38.9	39.7	40.4
33.5	33.1	37.4	41.8	40.7	43.3
39.1	40.2	41.1	45.4	46.9	50.6
38.0	38.7	39.8	44.1	46.1	49.5
29.8	40.5	41.7	39.4	44.9	47.3
28.8	32.5	33.7	36.2	38.5	38.3
29.7	34.1	32.9	35.9	36.1	36.1
30.0	30.5	38.8	34.2	37.9	41.6
26.9	29.4	39.1	35.3	37.9	41.0
28.1	28.8	35.4	33.3	35.2	39.7
25.4	28.6	31.3	34.0	34.4	35.5
34.3	39.0	40.5	41.7	40.6	42.4
32.4	38.9	42.8	43.9	48.5	51.8
36.8	42.2	43.3	47.2	52.4	53.3
32.5	35.2	42.3	47.5	49.6	50.8
36.9	36.0	44.5	43.7	49.6	50.0
41.3	40.8	47.7	56.7	58.6	52.6
34.0	35.9	38.6	46.0	47.6	42.7
27.6	27.9	28.8	33.3	31.9	32.3
26.0	30.1	37.1	36.6	34.5	31.9
25.2	28.8	37.0	34.5	32.4	37.7
34.2	38.0	41.2	46.7	49.3	48.2

1/3 LASeq 250	1/3 LASeq 315	1/3 LASeq 400	1/3 LASeq 500	1/3 LASeq 630	1/3 LASeq 800
30.9	30.9	33.3	37.2	40.1	42.7
30.0	30.6	31.6	34.3	38.7	40.7
31.7	32.4	32.6	33.8	36.5	40.5
37.9	34.8	35.0	37.1	40.0	42.6
39.0	37.4	41.9	45.7	49.4	47.7
39.1	38.8	41.0	45.7	49.3	48.4
39.3	36.9	37.4	40.0	43.1	46.9
39.0	36.0	38.0	40.5	43.0	47.5
34.6	34.5	35.6	37.5	39.9	44.3
34.0	34.1	36.0	37.6	40.4	44.2
43.6	42.7	42.3	45.9	45.8	49.1
56.0	54.1	54.3	57.2	58.5	61.7
53.7	52.6	53.2	55.9	57.6	60.3
47.6	45.8	46.4	49.2	50.4	53.9
37.0	36.5	36.9	38.6	41.0	45.1
38.0	38.3	38.7	41.0	42.4	45.1
45.7	43.2	46.7	47.6	49.5	52.7
49.3	47.3	51.0	53.3	54.2	55.7
45.1	42.1	42.5	43.1	45.2	48.8
54.9	53.6	54.0	56.8	58.3	61.3
52.3	51.0	53.0	55.7	57.9	60.3
52.2	51.8	53.8	56.7	59.1	61.4
38.6	39.4	40.5	42.7	45.2	48.0
53.5	54.2	52.3	53.6	57.1	59.6
57.0	56.4	55.6	55.9	59.7	62.0
40.2	40.5	39.7	41.9	44.2	48.1
36.0	35.7	37.0	39.7	42.0	45.3
38.9	38.5	40.1	40.3	42.8	46.6
37.2	36.8	38.6	40.1	42.9	46.4
34.9	36.1	36.2	38.4	41.7	46.0
38.5	38.7	39.8	39.7	42.3	46.3
44.2	45.2	44.1	46.2	48.5	51.7
54.0	51.7	51.9	55.3	57.2	60.0
50.3	47.8	49.9	52.5	54.7	56.6
54.9	53.5	55.9	58.1	60.7	61.8
48.5	47.5	50.0	51.0	52.2	55.3
41.1	40.4	42.0	43.8	46.4	49.4
43.5	42.4	41.8	43.4	45.9	48.9
42.1	42.2	41.0	43.5	44.2	47.2
52.1	52.3	52.3	55.2	57.9	60.7
46.9	44.9	47.1	49.3	51.2	53.9
35.7	33.4	36.6	38.6	39.8	43.6
33.6	32.3	34.7	36.3	38.2	41.7
38.2	37.8	37.0	38.8	40.9	44.3
42.6	46.0	43.2	45.7	47.7	48.4
38.5	42.6	39.2	40.4	43.8	46.3

42.4	47.0	44.6	47.1	49.3	53.1
50.1	50.0	51.4	54.3	57.0	60.3
47.0	45.4	48.2	51.1	51.9	53.8
40.7	39.2	42.2	44.7	45.1	48.5
37.8	35.9	37.0	40.3	42.2	46.5
36.5	37.1	39.4	43.3	43.2	47.0
39.0	39.5	42.8	48.3	46.3	49.1
40.3	41.0	44.1	48.6	48.0	50.0
39.2	39.4	42.6	46.9	46.1	48.6
37.9	38.5	42.5	46.7	45.2	47.3
38.0	38.6	41.0	45.9	45.0	47.8
39.2	39.1	40.6	45.3	45.6	48.7
40.9	42.6	46.7	51.8	51.0	51.7
41.0	42.7	48.0	54.1	53.1	53.8
39.7	41.3	45.6	50.7	49.2	52.0
44.1	44.2	47.3	51.5	52.8	55.8
47.2	46.7	51.0	54.5	57.3	59.8
40.0	39.6	42.8	46.3	47.3	50.2
40.8	41.8	45.6	49.5	48.6	51.1
38.2	39.4	43.1	47.1	46.2	48.8
40.7	43.4	48.0	53.2	50.6	51.7
39.1	41.7	46.2	50.7	48.5	49.6
36.0	38.2	40.9	44.6	43.9	46.0
39.3	35.3	36.3	38.9	40.9	43.8
37.8	36.8	37.4	38.6	40.9	43.8
35.3	35.7	35.8	38.5	41.4	44.9
38.6	38.3	38.3	41.9	45.9	48.7
41.1	43.1	42.5	45.2	49.1	50.3
47.9	48.0	47.7	50.0	53.2	56.5
49.2	48.4	49.6	51.4	54.5	57.9
38.6	39.2	40.7	42.8	45.8	49.5
36.8	37.3	37.8	39.7	43.0	47.9
37.9	36.1	36.5	38.7	41.6	44.8
42.3	39.0	43.7	48.7	50.4	52.3
44.7	43.2	46.6	50.8	54.7	56.7
35.0	34.9	38.4	40.7	41.7	45.5
37.1	36.2	38.8	40.0	42.6	46.2
44.0	39.0	42.0	42.5	45.0	48.8
43.1	39.9	42.4	43.5	45.7	49.3
43.3	45.7	47.4	45.1	45.4	48.9
46.2	46.8	48.8	46.5	49.3	51.4
52.7	51.4	55.3	57.2	61.5	62.6
40.9	40.5	43.5	44.9	47.7	50.5
38.3	36.6	38.2	38.4	40.5	43.8
39.7	38.3	39.5	39.2	40.7	43.0
48.2	46.6	47.8	50.4	52.8	55.3
50.4	48.4	50.9	53.5	55.8	58.5
37.6	37.6	38.8	40.9	43.7	47.4

35.6	37.6	39.1	41.5	44.4	48.5
38.1	36.7	38.8	40.4	43.5	47.1
39.5	37.5	38.7	41.2	43.6	47.0
36.3	36.6	37.5	39.4	42.0	45.3
39.5	40.8	39.2	40.0	41.7	44.3
43.2	46.8	44.4	46.7	46.6	50.3
52.8	52.6	52.4	55.3	56.2	59.5
50.7	48.0	50.8	52.8	53.6	57.3
47.3	47.6	50.7	52.0	52.6	54.6
39.8	40.1	41.8	43.5	46.1	49.6
37.8	38.9	40.3	43.0	45.7	48.8
38.1	39.9	39.9	43.5	44.4	47.6
38.7	39.9	39.7	42.4	45.7	48.3
38.0	39.2	39.7	42.8	45.3	47.4
38.0	39.0	38.5	40.5	42.8	45.5
46.8	45.4	45.4	47.0	49.3	51.2
51.4	49.7	50.8	53.2	55.9	59.3
51.1	49.5	51.2	53.8	56.4	59.8
53.8	53.7	52.1	55.4	57.8	61.2
51.0	50.5	51.4	53.3	55.9	59.7
51.4	52.2	53.5	54.2	57.3	58.5
44.4	44.1	45.8	50.2	53.1	53.1
35.3	34.8	36.3	39.1	42.2	45.5
35.4	36.5	37.2	40.4	43.2	47.6
39.3	40.1	40.8	43.6	45.5	48.5
51.1	50.8	51.7	54.2	56.5	58.6

1/3 LASeq 1000	1/3 LASeq 1250	1/3 LASeq 1600	1/3 LASeq 2000	1/3 LASeq 2500
42.9	42.3	38.8	35.3	31.4
41.3	40.4	38.2	34.7	31.7
41.6	39.0	36.9	33.6	31.3
44.1	41.6	38.6	35.0	32.5
48.9	47.2	43.8	39.9	36.7
49.4	46.8	43.9	40.2	36.9
49.2	46.2	42.9	39.0	36.3
49.0	46.7	43.5	39.6	36.3
45.7	43.8	41.3	37.8	35.2
46.0	43.3	40.7	37.5	34.1
52.0	50.9	49.4	46.3	40.5
65.8	65.0	61.7	57.5	52.6
62.6	60.6	56.9	52.8	49.6
57.5	55.7	52.3	47.4	43.4
48.0	45.2	41.8	38.3	35.6
46.1	44.0	43.7	39.5	38.0
53.7	50.9	50.3	46.0	43.0
56.6	55.0	52.5	49.4	46.7
50.0	48.0	45.2	41.5	37.9
63.3	60.6	59.1	55.1	51.1
61.4	59.5	57.6	52.9	48.3
62.3	60.0	57.0	52.2	48.7
49.0	46.5	44.1	39.7	36.4
61.7	60.3	57.9	55.2	50.0
65.2	63.7	60.6	56.7	52.7
50.6	48.8	46.4	41.9	37.9
47.1	44.4	42.1	38.3	35.1
47.8	45.3	42.8	38.8	35.5
48.3	46.0	43.3	40.1	37.0
48.0	45.2	41.9	38.6	35.1
48.1	44.4	41.5	37.8	34.9
54.9	52.4	50.4	46.3	41.9
63.3	60.6	57.1	54.1	50.9
58.3	57.1	54.9	50.9	46.6
63.1	61.9	59.5	55.2	51.0
58.1	56.5	54.1	50.6	47.9
50.6	48.7	46.7	42.6	39.3
50.3	47.8	44.6	40.9	38.0
48.3	45.8	42.9	39.8	37.2
62.7	61.4	59.6	55.7	50.8
56.4	54.9	52.4	48.0	43.6
44.7	43.2	40.8	37.0	34.1
42.6	40.5	38.4	35.2	32.0
45.6	43.6	41.3	36.3	32.7
49.8	48.6	44.1	38.7	35.3
47.1	46.0	43.5	39.7	36.9

52.5	49.8	47.4	42.5	39.7
60.0	56.8	54.1	50.5	47.9
55.1	53.1	51.1	48.2	45.4
49.3	47.5	44.9	41.4	38.4
49.1	47.8	44.3	40.8	36.6
48.9	47.3	44.9	42.7	39.7
50.6	49.3	48.4	46.7	43.8
51.4	50.1	48.7	46.7	43.8
49.4	47.4	47.1	46.1	43.3
47.9	45.8	46.1	44.9	41.7
49.0	47.1	47.0	44.9	41.7
49.2	46.9	45.7	44.3	41.5
52.4	50.3	51.5	49.2	45.9
53.8	52.7	53.1	50.6	48.0
52.5	50.0	50.6	48.4	45.4
56.0	52.7	52.2	50.8	47.4
58.1	54.0	52.3	50.1	47.5
50.5	48.7	48.5	46.4	43.9
51.2	49.2	48.5	46.9	44.9
49.6	48.2	46.9	44.9	42.3
52.2	50.6	51.1	49.3	46.5
50.4	49.0	49.7	48.7	45.7
47.4	45.6	44.8	43.4	40.5
45.1	42.6	40.3	37.2	34.3
45.7	43.6	41.7	38.0	34.4
47.0	46.6	43.8	40.4	36.6
51.1	49.5	46.7	43.3	39.1
52.2	50.1	47.0	44.2	40.5
56.7	53.6	49.8	46.4	42.5
57.4	54.3	51.5	47.2	44.2
50.0	47.7	44.7	41.6	38.1
49.2	47.4	44.2	41.5	37.5
45.9	44.0	41.8	38.7	35.2
54.1	49.4	49.4	43.9	39.9
56.0	53.0	51.6	47.6	43.9
46.2	44.5	42.4	39.6	36.5
47.6	45.8	43.1	40.1	37.0
50.7	48.5	45.6	42.2	39.2
51.5	49.6	46.5	42.7	38.8
50.8	49.1	46.0	42.4	39.0
50.3	49.1	45.2	41.3	38.0
61.0	57.3	54.1	50.3	47.3
50.4	47.6	45.0	41.8	38.9
45.5	44.2	41.8	39.2	35.9
44.7	43.5	42.4	40.5	37.5
55.2	54.2	51.5	48.2	43.8
59.2	57.9	55.7	52.0	47.4
48.8	47.3	44.5	41.1	37.7

49.2	47.1	43.9	40.2	36.8
48.5	46.3	44.3	40.9	36.8
48.4	46.8	45.1	41.4	37.4
46.8	44.7	42.9	38.7	35.1
44.6	42.4	40.4	37.9	35.7
52.6	49.6	48.6	45.4	43.3
63.1	60.5	58.5	56.3	53.8
59.3	56.4	53.8	51.2	47.9
57.8	56.6	54.6	52.3	49.3
50.8	48.7	46.1	42.8	39.7
50.5	48.2	45.5	42.8	39.4
49.1	47.4	44.9	42.3	39.3
48.6	46.1	44.4	41.7	39.0
47.5	44.8	42.9	40.3	37.2
46.8	45.1	44.3	42.4	38.7
52.1	51.4	50.3	47.3	43.9
59.5	55.9	53.4	49.3	46.2
61.1	57.4	55.5	50.9	47.9
63.4	59.1	57.6	54.3	51.2
60.7	55.6	55.0	51.0	48.9
59.4	56.5	54.3	52.4	48.4
54.8	53.7	51.5	47.8	43.8
47.9	45.0	42.6	39.7	37.4
48.7	46.1	44.5	42.5	39.0
50.2	49.1	47.4	44.2	39.9
60.2	57.5	56.8	53.2	49.3

1/3 LASeq 3150	1/3 LASeq 4000	1/3 LASeq 5000	1/3 LASeq 6300	1/3 LASeq 8000
28.1	24.5	20.1	17.3	15.1
28.9	38.6	22.0	18.1	15.7
28.9	37.0	22.3	20.7	20.7
30.9	41.7	24.4	24.1	23.0
33.7	40.5	24.5	20.1	17.8
33.9	36.9	24.8	20.1	16.9
33.7	30.3	25.2	19.9	15.8
33.6	41.4	25.8	20.9	17.9
33.7	38.5	26.1	20.7	16.6
33.8	42.4	27.0	22.2	16.8
35.7	39.1	30.2	26.4	18.5
48.3	46.2	40.8	37.0	32.2
46.3	45.1	39.3	36.2	31.9
40.3	40.1	33.7	30.4	25.5
32.7	36.7	28.3	26.4	17.9
34.5	40.4	28.6	26.4	18.0
39.2	39.6	32.0	29.2	23.5
43.7	40.5	36.8	33.4	27.9
35.0	36.0	28.7	25.6	17.6
47.1	43.6	39.4	35.5	31.5
44.4	42.7	36.8	33.0	28.8
45.2	42.8	39.0	34.8	31.0
32.9	29.8	24.7	20.2	16.3
46.8	43.8	41.1	38.6	34.5
49.2	46.5	43.2	40.1	36.5
34.4	33.0	26.0	22.1	18.5
30.9	30.8	22.9	20.3	16.0
31.4	36.0	23.3	19.9	17.1
33.0	29.9	25.0	21.4	17.3
31.2	26.6	21.1	17.4	14.6
32.1	28.3	23.4	18.8	15.3
37.5	33.9	30.4	26.8	23.3
47.8	44.0	40.3	37.0	33.3
43.4	39.6	36.4	35.2	31.9
48.0	45.6	42.6	41.2	36.5
45.1	42.7	39.3	35.8	33.4
35.2	31.5	26.6	21.7	18.3
34.1	30.8	25.8	20.9	16.1
33.4	29.7	25.7	21.0	16.4
46.8	43.0	38.8	35.5	32.4
39.9	36.1	32.0	28.6	25.3
31.4	28.7	24.9	21.6	16.9
28.4	25.0	21.7	18.8	15.8
29.0	25.2	20.8	17.9	15.4
31.2	27.0	22.3	19.0	15.9
32.7	28.6	23.7	19.9	16.6

35.8	32.0	28.0	24.6	20.9
44.2	40.5	36.5	32.8	29.0
42.8	39.1	35.6	32.4	27.5
36.2	32.9	29.3	25.7	20.9
33.5	28.7	24.4	20.2	16.9
36.6	33.1	28.5	22.7	17.5
40.8	37.4	32.8	26.2	18.6
40.6	37.2	32.4	26.3	18.9
39.8	36.3	31.7	25.5	19.1
38.4	35.6	31.3	25.2	18.1
38.5	35.1	30.6	24.2	17.7
38.5	35.3	30.6	24.4	17.8
43.1	39.6	35.2	28.8	20.0
44.6	41.4	36.8	29.8	20.8
42.7	39.6	34.8	28.6	19.8
44.2	41.3	37.3	33.6	28.7
44.9	41.3	37.9	35.2	31.3
41.2	37.9	33.6	27.2	19.3
42.1	38.6	33.6	27.0	18.4
38.9	35.4	30.9	24.5	17.1
42.7	39.6	35.2	28.8	19.6
41.9	38.1	33.4	26.8	18.9
37.3	33.7	29.1	23.2	17.3
30.7	26.8	22.5	18.6	15.7
31.0	26.6	22.2	18.4	15.5
32.4	27.8	22.9	19.1	15.7
36.2	35.6	25.1	22.1	25.7
36.6	32.1	25.9	21.3	21.8
39.6	35.8	31.5	28.8	24.8
41.1	37.5	33.6	31.0	27.4
34.2	29.7	24.8	20.5	17.1
33.2	28.6	24.1	19.8	16.5
32.3	27.7	24.8	20.9	17.6
36.1	32.0	28.9	24.7	22.0
40.5	36.2	31.8	27.9	24.6
34.1	30.2	25.7	21.6	17.5
34.2	30.0	25.3	20.9	17.1
35.7	31.4	27.1	21.3	16.4
35.0	30.6	25.7	20.3	16.0
34.9	30.8	25.5	20.1	15.7
34.3	30.1	25.0	20.0	15.8
44.4	40.9	37.5	34.2	29.8
35.7	31.6	27.1	22.4	17.7
32.6	29.6	25.2	20.0	15.4
34.9	32.4	27.8	21.5	16.0
40.3	36.3	32.3	28.3	25.2
43.8	39.8	36.2	32.3	29.8
34.1	30.6	25.9	21.1	16.4

33.5	29.5	24.5	19.5	15.2
32.7	28.5	23.5	18.9	15.0
33.4	29.3	24.4	19.9	15.9
31.4	28.3	23.4	19.6	16.0
32.9	30.1	25.4	20.9	17.0
40.1	39.1	34.2	28.8	22.9
50.2	46.8	42.6	39.5	35.2
44.3	41.3	37.4	35.2	30.8
46.5	43.9	40.4	37.7	33.9
36.8	33.8	29.3	24.9	20.4
35.8	32.1	28.0	23.7	18.1
36.2	32.8	28.3	23.7	17.7
35.8	32.2	27.7	22.9	17.0
33.9	30.1	26.0	21.4	16.7
35.0	31.5	28.4	23.9	20.0
39.9	37.8	35.1	29.8	25.9
43.0	39.8	36.1	32.9	29.2
44.6	41.9	38.4	35.4	31.6
48.7	45.4	41.5	38.5	34.8
46.9	42.3	39.5	34.9	31.7
45.2	41.9	38.9	36.1	32.6
41.0	38.3	35.3	32.3	28.4
35.4	30.5	27.2	22.4	17.1
35.8	31.7	27.5	22.7	16.4
36.3	32.6	28.7	25.5	20.1
46.0	42.3	39.0	36.2	31.8

1/3 LASeq 10000	1/3 LASeq 12500	1/3 LASeq 16000	1/3 LASeq 20000	1/3 LASmax 6.3
13.9	11.8	9.8	9.3	1.9
13.9	12.6	9.5	9.3	1.9
16.4	13.3	10.2	9.2	1.9
17.9	14.0	10.8	9.4	1.9
14.8	12.2	9.6	9.2	1.9
15.1	12.6	10.1	9.6	1.9
14.5	11.9	9.7	9.5	1.9
15.1	12.5	9.9	9.6	1.9
14.7	12.1	9.5	9.4	1.9
15.3	12.4	9.7	9.3	1.9
15.6	12.2	9.7	9.5	1.9
27.5	22.5	17.7	12.4	1.9
28.1	24.0	19.7	14.0	1.9
21.7	17.8	14.2	11.0	1.9
14.5	12.1	9.9	9.5	1.9
14.5	11.8	9.6	9.5	1.9
18.9	14.7	10.8	9.6	1.9
24.3	17.9	12.5	10.0	1.9
14.6	11.9	9.8	9.5	1.9
27.0	22.4	17.4	12.1	1.9
24.3	19.4	14.6	10.9	1.9
26.7	27.7	18.0	12.5	1.9
14.4	15.3	9.7	9.5	1.9
30.8	24.9	18.6	12.1	1.9
32.8	27.1	21.4	14.2	1.9
15.9	12.6	9.9	9.5	1.9
14.3	11.6	9.3	9.5	1.9
14.3	11.9	9.6	9.6	1.9
14.6	11.9	9.6	9.6	1.9
13.5	11.4	9.3	9.5	1.9
13.9	11.8	9.8	9.8	1.9
20.6	16.3	11.8	10.1	1.9
28.9	24.1	18.7	13.0	1.9
24.3	19.1	13.2	10.2	1.9
32.5	26.6	19.4	13.2	1.9
31.4	26.4	21.4	15.0	1.9
16.1	12.9	10.1	9.7	1.9
14.1	11.7	9.5	9.6	1.9
14.5	12.1	9.6	9.5	1.9
27.6	22.4	18.2	13.0	1.9
21.1	16.7	13.1	10.5	1.9
15.0	12.0	9.4	9.4	1.9
14.8	12.3	9.9	9.7	1.9
14.2	11.9	9.6	9.6	1.9
14.4	12.0	9.7	9.5	1.9
15.0	12.4	10.1	9.8	1.9

18.0	14.1	10.7	9.8	1.9
24.9	19.9	15.0	10.9	1.9
23.9	19.8	15.0	10.7	1.9
17.7	14.3	11.3	10.2	1.9
15.2	12.8	10.5	10.0	1.9
14.9	12.1	9.7	9.5	1.9
15.0	12.3	9.9	9.7	1.9
15.1	12.3	10.0	9.8	1.9
16.1	13.6	10.7	9.9	1.9
14.9	12.3	9.9	9.7	1.9
14.9	12.3	9.9	9.7	1.9
14.7	12.1	9.7	9.5	1.9
14.6	11.8	9.5	9.5	1.9
14.5	11.8	9.5	9.5	1.9
14.5	11.8	9.5	9.5	1.9
24.2	20.2	16.8	11.6	1.9
26.6	22.4	18.4	12.3	1.9
15.0	12.1	9.7	9.4	1.9
14.3	11.6	9.4	9.5	1.9
14.2	11.7	9.5	9.5	1.9
14.3	11.6	9.4	9.6	1.9
15.3	12.4	10.1	9.8	1.9
15.1	12.6	10.3	10.0	1.9
14.6	12.3	9.9	10.0	1.9
14.3	12.0	9.7	9.8	1.9
14.2	11.9	9.5	9.6	1.9
13.8	11.6	9.4	9.5	1.9
13.8	11.6	9.3	9.6	1.9
20.1	16.2	12.5	10.1	1.9
23.3	19.8	16.2	12.1	1.9
15.3	12.9	10.5	9.9	1.9
14.8	12.3	10.0	9.7	1.9
15.1	12.4	9.9	9.6	1.9
17.5	13.9	10.7	9.8	1.9
20.3	16.1	12.1	10.0	1.9
14.7	11.9	9.5	9.4	1.9
14.8	12.4	10.1	9.7	1.9
14.2	11.7	9.5	9.6	1.9
14.2	11.7	9.4	9.5	1.9
14.2	11.7	9.4	9.5	1.9
14.1	11.8	9.5	9.6	1.9
24.9	19.8	15.1	11.7	1.9
15.2	12.2	9.7	9.6	1.9
14.0	11.6	9.3	9.6	1.9
13.9	11.6	9.4	9.7	1.9
22.4	17.8	12.6	10.6	1.9
27.2	22.7	17.1	13.0	1.9
14.7	12.1	9.6	9.8	1.9

14.0	11.7	9.4	9.7	1.9
13.9	11.6	9.3	9.7	1.9
14.4	11.9	9.6	9.6	1.9
14.5	11.9	9.6	9.6	1.9
14.9	12.4	9.9	9.8	1.9
18.0	14.3	11.3	10.3	1.9
28.9	23.4	17.6	12.0	1.9
24.4	19.3	14.0	10.5	1.9
29.0	24.4	19.6	12.8	1.9
16.8	13.4	10.6	9.8	1.9
15.3	12.7	10.3	9.9	1.9
15.3	12.6	10.1	9.7	1.9
14.4	11.8	9.5	9.4	1.9
14.8	12.0	9.6	9.4	1.9
16.7	13.0	9.8	9.5	1.9
22.2	17.7	13.3	10.4	1.9
25.1	20.8	16.3	11.4	1.9
27.6	23.3	18.4	12.2	1.9
30.9	26.0	20.2	12.4	1.9
28.7	22.8	16.3	11.0	1.9
28.1	22.2	16.1	11.1	1.9
24.6	20.5	15.8	11.2	1.9
14.9	12.1	9.6	9.5	1.9
14.1	11.6	9.3	9.4	1.9
17.3	13.0	9.6	9.5	1.9
26.9	21.7	16.1	11.2	1.9

1/3 LASmax 8.0	1/3 LASmax 10.0	1/3 LASmax 12.5	1/3 LASmax 16.0	1/3 LASmax 20.0
0.9	0.3	4.2	12.0	15.7
0.9	2.4	4.6	8.2	15.8
0.9	2.8	3.7	8.0	13.0
0.9	0.3	0.3	3.7	6.0
0.9	0.3	0.6	4.5	7.4
0.9	5.1	7.8	13.5	19.0
3.3	6.8	7.8	12.5	19.1
0.9	0.3	11.5	11.6	16.3
0.9	0.3	8.4	11.7	15.4
0.9	0.3	3.2	4.9	10.4
0.9	0.3	5.6	11.1	14.9
0.9	0.7	7.7	13.4	18.8
0.9	0.4	6.2	12.1	20.6
3.7	3.9	8.7	17.0	22.8
0.9	6.7	12.1	15.0	17.5
0.9	2.0	7.2	11.2	17.6
0.9	2.3	6.6	10.8	16.6
0.9	0.3	3.2	8.4	14.8
0.9	0.3	10.3	20.2	18.6
0.9	4.6	10.9	14.8	19.5
0.9	2.4	3.3	9.7	14.5
0.9	0.3	4.6	9.4	15.2
0.9	0.3	5.4	7.7	11.3
0.9	0.3	1.6	7.0	10.7
0.9	0.3	-0.8	8.0	13.6
0.9	0.3	-0.3	7.4	10.5
0.9	0.3	-0.4	7.8	11.6
0.9	0.3	4.6	8.0	16.0
0.9	0.9	6.4	12.1	15.7
0.9	2.7	7.8	8.9	15.2
0.9	0.3	3.4	7.8	15.5
0.9	1.6	6.2	9.8	15.2
0.9	0.3	6.4	11.0	14.6
0.9	0.3	2.9	8.3	12.9
0.9	0.3	7.6	16.6	20.4
0.9	1.1	8.5	16.1	18.1
0.9	0.3	3.0	7.4	13.5
0.9	0.3	2.4	9.4	12.8
0.9	0.3	-0.8	6.2	7.2
0.9	0.3	4.5	7.9	12.3
0.9	0.3	3.6	7.7	12.8
0.9	0.3	-0.8	0.2	5.1
0.9	0.3	4.3	15.3	20.4
0.9	3.9	10.9	15.9	18.7
0.9	0.3	-0.6	7.2	10.5
0.9	0.3	7.0	11.8	16.1

0.9	0.3	4.7	9.7	16.1
0.9	2.9	8.0	15.8	19.4
0.9	4.0	11.3	18.1	21.8
0.9	7.7	12.0	16.7	20.9
3.1	7.3	12.9	15.7	21.6
2.6	5.3	8.9	13.5	19.1
0.9	0.3	4.1	7.2	12.9
0.9	4.1	7.4	12.7	16.2
0.9	3.9	4.6	14.0	19.8
0.9	2.3	8.5	14.4	19.7
0.9	1.5	8.9	15.5	18.7
0.9	3.0	8.8	15.5	17.9
0.9	0.3	2.9	6.0	13.6
0.9	1.8	4.4	11.1	16.8
0.9	2.6	2.6	9.5	14.2
0.9	0.3	0.5	6.9	14.1
0.9	0.3	7.0	11.5	12.9
0.9	0.3	-0.8	3.9	7.8
0.9	0.3	-0.8	-0.2	4.9
0.9	0.3	-0.5	3.5	6.8
0.9	0.3	-0.8	1.1	5.9
0.9	0.3	-0.8	2.4	7.8
0.9	2.1	0.3	5.7	14.6
0.9	3.4	10.4	12.0	18.0
0.9	2.7	10.7	11.8	16.6
0.9	0.3	5.5	11.4	13.0
0.9	0.3	2.8	8.2	10.9
0.9	0.3	1.5	3.2	10.1
0.9	0.8	6.2	8.8	20.2
0.9	7.3	8.9	13.9	20.2
0.9	3.7	10.3	15.2	20.6
0.9	4.9	10.0	14.4	15.9
0.9	4.1	8.4	12.8	15.4
0.9	0.3	1.9	7.1	11.7
0.9	0.3	-0.8	5.7	9.7
0.9	0.3	-0.8	1.7	6.4
0.9	0.3	-0.8	9.2	21.3
0.9	0.8	11.4	15.2	20.4
0.9	0.3	2.6	8.1	10.6
0.9	0.3	-0.8	3.0	12.7
0.9	0.3	3.7	10.4	14.7
0.9	0.3	3.8	10.3	14.3
0.9	0.3	1.8	8.4	11.7
0.9	0.3	-0.8	-0.9	4.7
0.9	0.3	7.5	9.1	13.4
0.9	0.3	1.9	6.7	10.4
0.9	0.3	1.6	3.7	10.1
0.9	0.3	4.6	9.2	13.2

0.9	4.3	9.2	15.3	15.8
0.9	0.8	3.2	11.3	12.5
0.9	0.5	4.8	9.9	11.2
0.9	0.3	2.4	8.4	11.3
0.9	0.3	1.7	6.9	18.8
1.3	6.7	10.9	18.1	23.2
5.0	5.1	12.0	17.3	21.2
0.9	4.8	8.4	15.0	18.6
0.9	0.6	7.6	13.2	15.6
0.9	0.3	8.4	12.4	17.6
0.9	3.9	11.0	19.3	21.2
0.9	5.5	12.8	13.9	18.6
0.9	2.2	5.4	10.1	14.4
0.9	0.3	7.6	11.4	15.0
0.9	0.3	3.6	8.7	9.9
0.9	0.3	-0.8	4.7	9.5
0.9	0.3	4.4	8.7	12.5
0.9	0.3	0.9	5.2	14.6
0.9	0.3	-0.8	1.5	5.9
0.9	0.3	0.1	4.7	10.0
0.9	0.9	4.0	11.7	16.5
0.9	1.9	6.7	10.6	15.9
0.9	0.3	2.3	8.1	11.9
0.9	0.3	0.0	3.3	10.0
0.9	0.3	1.5	6.8	10.8
0.9	3.8	8.0	8.6	14.1

1/3 LASmax 25.0	1/3 LASmax 31.5	1/3 LASmax 40.0	1/3 LASmax 50.0	1/3 LASmax 63.0
18.0	21.8	25.4	25.4	24.3
17.1	21.7	23.1	25.7	25.6
14.5	19.2	21.5	23.4	28.4
12.3	20.6	21.3	24.9	28.0
13.6	20.6	21.6	25.7	32.7
21.4	23.0	27.1	27.5	36.9
22.6	23.7	26.6	26.9	30.2
18.7	24.4	27.3	28.7	30.4
19.2	22.2	26.2	37.1	31.1
17.2	20.1	29.9	37.0	32.0
20.5	24.1	30.1	43.7	34.0
22.7	27.7	33.3	41.7	39.1
22.8	29.7	32.8	36.1	39.5
26.8	30.2	31.3	35.5	38.4
23.0	24.8	29.7	36.6	32.6
21.9	23.5	27.7	36.5	32.5
20.4	23.1	26.5	35.5	32.6
22.6	26.5	27.6	37.6	36.2
23.9	26.0	31.3	45.6	36.0
22.7	26.9	34.5	40.8	40.2
19.4	23.3	33.0	38.6	37.9
20.2	24.0	28.3	38.1	40.1
16.4	20.6	31.2	41.2	36.2
13.3	21.0	30.1	33.1	42.4
21.9	25.6	26.8	36.5	46.3
15.6	18.6	22.8	28.1	28.7
17.0	18.7	23.9	26.4	30.5
18.9	22.3	25.9	28.5	31.2
20.7	25.4	27.4	29.7	31.4
18.2	23.7	24.7	30.2	28.7
19.0	22.6	24.0	25.8	26.9
18.4	22.0	24.5	26.0	29.6
19.1	23.4	26.8	30.7	41.3
19.3	22.1	25.8	29.9	38.5
22.4	24.9	27.1	37.9	42.7
21.0	25.4	26.6	33.9	35.1
15.3	19.4	24.4	26.3	29.4
17.4	19.6	22.8	26.5	31.4
14.4	17.3	22.8	27.5	32.0
17.0	21.5	27.0	31.1	35.4
16.6	20.4	25.3	28.9	32.4
13.8	16.8	19.5	26.5	22.1
19.4	19.7	25.2	24.0	27.0
18.7	20.5	22.2	21.6	25.1
15.4	18.0	21.0	24.1	24.5
20.1	22.0	22.4	27.5	28.8

19.0	23.6	24.4	30.3	29.7
25.1	24.1	28.3	36.7	36.7
25.4	26.8	29.2	31.0	36.6
23.5	27.6	29.7	31.8	32.8
22.0	25.6	29.9	32.0	31.6
19.7	22.6	26.3	26.3	28.7
15.9	20.7	24.5	23.8	25.9
18.0	26.9	27.6	26.2	30.3
21.1	24.7	25.7	30.9	31.6
21.3	25.2	26.2	27.2	29.6
20.8	24.7	30.0	31.6	35.3
21.6	24.2	27.7	27.4	35.3
15.6	17.5	19.7	24.8	25.2
19.4	23.3	24.3	27.8	27.7
16.8	20.5	22.0	23.2	24.2
17.0	21.1	23.7	26.5	30.5
16.7	20.2	24.2	33.6	32.0
13.4	17.6	20.7	22.7	25.7
12.4	17.1	20.4	22.4	27.2
11.3	16.3	20.2	23.7	26.6
11.9	16.9	20.8	22.5	28.0
12.3	16.3	18.6	21.9	26.1
18.6	19.6	22.3	31.3	28.4
20.8	24.2	27.8	33.4	30.6
16.4	20.8	22.0	30.3	34.5
16.1	18.8	21.8	23.9	32.7
15.1	19.1	20.9	25.1	28.2
15.6	19.1	23.0	24.7	26.8
21.8	24.4	26.5	30.8	35.7
21.9	26.2	28.1	30.6	37.9
24.9	28.7	28.8	30.9	32.5
21.7	24.5	26.5	27.0	27.5
19.2	21.3	24.4	25.4	26.2
16.1	19.8	23.9	25.0	27.9
14.1	22.4	23.1	26.5	34.1
12.6	20.5	22.3	26.4	29.0
21.5	26.8	27.3	29.5	30.3
21.0	25.4	26.7	27.5	32.4
14.7	19.2	22.0	25.9	26.2
14.0	17.8	23.2	26.6	29.8
18.5	20.0	23.8	26.5	30.8
22.4	29.7	30.4	36.2	37.4
16.6	20.9	23.2	26.7	30.0
12.5	17.2	25.0	26.6	27.2
14.7	20.6	29.3	28.9	28.4
13.9	19.7	28.2	32.3	33.5
15.3	23.4	37.7	35.7	37.7
20.1	25.5	26.5	29.9	28.4

22.3	25.8	26.5	29.4	29.5
15.7	21.5	23.5	26.6	24.3
18.9	19.9	23.6	27.4	25.4
18.1	21.2	23.7	24.8	25.3
21.8	28.7	32.2	33.4	34.3
25.2	30.7	32.1	34.8	35.4
24.8	30.4	34.8	43.3	44.2
23.4	27.2	36.2	43.3	42.3
20.0	25.1	26.1	29.5	32.1
20.3	23.9	27.4	30.8	32.9
21.2	24.6	28.1	29.3	31.2
24.0	27.3	28.3	28.4	32.9
19.0	21.0	23.3	28.9	28.6
20.2	21.0	23.1	27.8	29.6
16.3	19.1	24.2	26.2	26.8
18.7	23.5	30.4	33.0	38.2
18.1	28.1	30.1	34.4	41.2
23.2	37.9	32.4	34.5	41.7
14.8	24.9	26.5	31.1	36.4
15.9	22.6	37.3	40.3	44.4
19.4	32.9	41.9	43.4	44.3
19.0	24.6	33.2	36.6	38.7
16.8	19.7	25.4	27.2	29.6
13.4	19.0	24.6	24.5	29.3
15.4	22.6	24.1	26.6	30.1
18.2	23.3	26.7	33.3	38.8

1/3 LASmax 80.0	1/3 LASmax 100	1/3 LASmax 125	1/3 LASmax 160	1/3 LASmax 200
27.8	29.7	30.8	32.5	32.5
27.6	29.1	30.9	31.9	32.3
25.4	27.3	31.7	34.0	33.5
24.5	28.1	38.8	35.2	37.7
25.2	30.5	45.8	34.7	40.9
30.0	31.5	45.9	42.5	41.9
34.0	32.1	37.1	44.2	39.5
28.5	34.8	37.0	38.2	37.2
27.9	35.1	33.2	31.6	32.8
28.2	31.1	30.7	30.4	31.0
33.2	37.4	42.8	40.1	46.3
42.7	47.0	50.9	51.7	56.4
45.4	45.8	47.4	53.7	54.2
41.9	43.4	45.8	51.3	51.8
32.3	34.2	36.6	38.8	38.8
31.0	35.3	34.8	35.0	37.4
42.5	49.2	44.4	44.0	46.6
40.3	47.7	45.4	51.1	47.8
37.5	40.0	48.1	48.8	51.2
41.7	47.1	52.1	53.5	57.0
40.1	46.4	47.5	52.7	58.1
41.3	46.7	48.3	52.9	58.9
33.1	32.3	37.1	40.1	44.4
43.1	46.4	53.7	52.6	56.0
44.1	47.1	53.7	52.7	56.7
27.6	31.8	36.2	38.8	44.3
24.9	26.3	30.5	32.2	37.3
29.8	31.1	33.9	36.5	37.4
33.1	31.7	35.0	37.9	37.6
28.9	31.5	38.1	33.6	39.4
29.0	31.1	38.1	39.1	42.3
33.4	38.1	39.8	44.5	49.4
39.2	47.4	46.9	50.7	54.1
40.3	49.9	47.3	52.5	54.4
41.6	51.1	48.9	53.5	57.1
38.1	43.4	48.6	51.3	50.0
33.5	31.5	37.6	39.7	40.4
33.4	33.7	40.0	43.9	40.9
33.2	32.9	38.3	43.3	41.7
41.0	44.9	47.4	49.4	54.0
37.4	40.6	44.0	46.8	50.6
26.1	27.0	32.0	31.9	35.2
28.5	26.1	30.0	29.6	31.5
27.2	26.6	32.7	32.9	35.1
26.7	31.2	33.4	34.2	36.8
28.7	40.2	33.4	35.0	35.2

33.1	36.2	40.8	42.4	44.5
38.5	42.7	45.7	48.0	49.6
43.6	43.4	43.7	46.9	48.8
38.6	41.3	39.3	41.0	47.5
34.4	34.3	35.4	37.4	36.9
29.4	30.4	34.6	35.8	38.6
30.8	31.9	33.6	36.8	42.0
33.5	38.7	36.4	37.8	43.9
30.4	37.3	35.8	36.2	41.1
29.2	31.0	33.2	35.5	40.6
31.1	30.9	35.2	36.1	40.3
33.4	31.5	36.4	36.9	40.0
29.6	32.6	36.7	38.9	44.1
28.2	29.4	34.1	37.2	43.3
25.9	28.5	34.3	37.0	40.9
31.1	36.8	40.0	43.9	46.7
37.5	42.2	43.6	46.8	49.5
28.9	33.2	35.9	38.4	41.2
28.9	32.2	35.6	37.9	43.6
28.7	31.3	35.5	37.1	42.9
28.8	30.4	36.0	42.0	43.0
29.1	28.4	35.9	39.0	42.4
30.7	30.9	35.2	41.4	42.1
31.2	44.4	46.6	34.9	35.4
26.5	44.5	46.7	33.8	36.1
26.5	31.3	36.8	32.4	35.0
33.0	32.3	34.1	36.6	37.6
30.6	32.7	36.1	39.4	38.6
40.1	42.5	50.3	48.7	55.9
41.9	42.9	50.4	49.6	56.0
31.7	32.4	42.4	38.6	42.0
31.5	37.0	34.7	36.7	35.2
33.5	35.9	34.0	35.6	36.2
33.1	38.5	39.3	43.0	45.0
40.2	40.2	42.0	43.5	46.8
33.1	34.1	38.0	36.2	41.4
32.8	36.9	38.8	34.4	39.7
38.4	41.9	42.0	36.4	42.2
38.4	44.4	40.2	40.1	43.9
33.6	48.7	41.0	48.1	48.0
34.1	48.6	43.2	48.0	49.7
45.0	48.6	52.7	53.8	55.5
34.7	40.3	44.0	44.7	46.5
32.0	36.2	34.3	40.0	37.2
35.6	37.6	37.5	41.5	43.6
38.8	43.5	46.3	49.3	50.9
40.9	44.8	46.8	49.3	51.1
35.7	36.7	36.4	36.1	38.0

28.6	36.3	31.5	34.9	35.5
28.7	35.1	35.4	37.5	36.5
28.5	32.9	34.4	37.4	36.7
29.3	31.8	33.5	35.5	35.2
33.4	38.1	43.5	41.9	42.2
35.3	38.5	43.6	42.3	44.8
42.1	43.2	49.2	48.9	52.8
40.6	41.6	46.6	48.0	51.6
43.4	45.3	40.8	47.1	49.3
36.4	34.9	38.6	41.0	42.0
35.3	36.0	38.6	37.6	38.1
32.6	41.3	36.0	39.6	43.5
31.0	41.1	37.2	39.1	44.0
30.9	38.2	34.7	38.4	43.0
32.3	38.7	38.3	40.6	41.1
42.5	43.2	45.3	42.9	44.5
48.7	49.7	51.9	57.6	58.8
48.5	49.2	51.5	57.5	58.5
37.5	44.1	50.7	51.5	53.8
40.7	46.1	46.6	51.7	53.9
43.3	52.2	61.6	62.6	55.3
40.5	42.2	52.4	54.2	48.4
29.2	32.0	35.5	35.5	33.7
32.0	40.2	39.2	36.3	33.1
35.4	39.8	38.0	36.6	41.5
39.8	42.5	51.4	53.7	53.8

1/3 LASmax 250	1/3 LASmax 315	1/3 LASmax 400	1/3 LASmax 500	1/3 LASmax 630
32.0	32.1	36.6	39.7	41.8
30.9	31.9	32.9	34.8	39.9
33.6	34.1	33.4	34.7	37.4
41.4	37.1	37.6	39.3	42.0
41.8	38.7	44.6	49.8	54.2
40.1	39.8	43.1	49.7	54.2
40.4	38.1	38.3	40.8	44.1
41.1	37.1	39.7	41.6	44.0
36.1	35.6	36.3	38.9	41.5
35.2	34.7	37.2	38.5	41.3
51.0	50.1	49.7	54.0	53.2
60.0	57.9	57.9	60.7	62.0
55.6	54.3	55.1	58.2	59.0
52.8	51.5	51.7	54.8	55.9
39.8	38.5	39.0	41.1	42.8
39.9	40.7	42.1	44.0	45.2
49.9	48.3	52.3	53.4	55.5
51.5	49.5	53.8	56.9	57.2
47.1	46.4	45.1	45.4	47.6
57.9	56.5	57.2	61.1	62.6
57.5	57.3	59.1	62.4	65.2
57.4	57.3	59.0	62.1	64.8
43.0	42.2	44.2	46.0	48.4
62.0	61.4	61.3	60.9	65.2
62.2	61.4	61.2	61.0	65.2
45.5	46.1	44.7	45.8	48.9
37.6	36.3	37.8	40.3	42.6
40.2	39.7	42.9	41.2	43.6
39.9	38.8	40.4	41.6	44.2
36.7	38.6	37.4	39.1	42.4
39.5	40.1	41.4	40.5	42.8
50.3	50.2	48.5	51.0	52.8
55.7	52.9	53.4	56.8	58.5
58.0	55.6	58.5	62.1	65.0
58.9	56.6	59.7	62.4	65.2
52.0	50.3	52.8	54.0	55.4
42.3	41.4	44.0	45.3	47.5
46.9	46.1	43.2	44.4	46.8
45.5	45.8	43.2	45.1	46.6
56.2	56.2	56.2	59.5	62.1
52.8	51.1	53.0	55.4	57.4
37.3	35.0	38.3	40.2	41.8
35.4	33.5	36.1	37.7	39.0
45.5	44.1	42.0	44.9	47.2
45.8	49.8	46.7	49.2	51.2
39.6	46.0	41.4	41.5	45.4

46.3	49.0	49.3	52.6	54.4
51.7	51.8	53.5	56.1	59.0
49.4	47.9	49.3	52.2	53.8
44.3	41.8	45.6	48.1	48.2
39.3	37.0	38.3	41.4	43.2
37.8	38.9	41.3	45.9	44.6
40.1	40.4	44.6	49.6	47.2
41.0	41.9	45.5	50.5	49.4
41.0	40.9	43.5	48.3	47.3
40.0	39.3	43.4	47.9	46.8
39.7	39.8	42.9	47.7	46.9
40.8	41.7	43.7	47.4	47.5
41.6	43.2	48.0	53.4	53.1
42.0	43.5	48.7	55.4	53.8
40.8	42.4	47.0	52.5	51.4
47.7	48.4	51.9	55.1	59.7
49.6	49.7	54.8	58.0	60.9
41.6	41.1	43.9	48.1	48.8
42.1	43.0	47.4	51.3	50.0
39.7	41.4	45.6	50.5	49.4
41.9	44.9	50.0	55.3	52.8
40.8	43.0	47.7	52.4	50.0
38.1	41.6	44.5	48.1	46.2
41.0	36.8	37.9	40.4	41.8
40.2	37.6	38.7	39.8	41.5
36.9	36.7	36.2	39.1	43.0
41.4	42.4	42.5	44.3	48.9
42.6	45.2	44.5	46.7	50.6
52.6	51.8	53.0	55.2	59.5
52.4	52.0	53.3	55.2	59.4
42.0	41.6	43.1	44.9	48.1
38.1	38.1	38.5	41.0	44.1
39.1	37.8	37.8	40.7	42.4
46.3	43.2	47.2	53.0	57.5
47.8	46.2	50.0	53.8	58.4
37.5	36.2	39.7	43.0	44.8
38.9	36.9	40.7	42.4	44.1
45.7	40.1	42.7	42.9	46.0
44.4	41.2	43.7	44.7	46.4
44.7	50.6	52.9	47.3	46.5
51.4	49.8	52.3	51.4	55.3
55.5	54.6	58.9	61.0	66.1
45.3	44.4	47.3	49.0	52.5
40.0	37.9	40.8	41.5	43.4
41.7	41.5	42.0	41.5	43.3
55.2	52.8	56.1	59.5	61.8
55.0	53.2	56.1	59.4	61.5
41.5	39.9	41.2	43.3	45.7

36.9	38.4	40.3	43.2	45.4
40.7	37.7	39.9	41.4	44.0
40.7	38.4	40.0	42.4	44.8
38.4	37.3	38.3	40.5	42.9
42.3	43.1	41.7	41.9	42.7
45.5	51.6	48.4	51.0	51.0
54.9	53.8	54.2	57.2	58.0
53.5	50.6	53.6	55.3	56.2
49.6	50.0	53.8	54.3	55.0
43.0	42.2	44.5	45.4	46.6
38.6	39.7	41.5	43.8	46.6
39.1	40.4	40.9	45.8	45.5
39.7	40.8	40.7	43.6	47.3
39.9	40.4	41.1	44.9	46.7
44.4	45.7	44.2	46.1	47.7
48.5	47.2	47.7	49.7	52.3
57.3	55.9	57.0	60.0	63.0
56.7	54.7	56.7	59.0	62.4
56.3	56.3	54.9	57.6	60.4
53.7	53.4	53.3	55.4	58.2
53.6	54.1	55.3	57.6	61.1
48.8	49.1	50.9	55.7	59.1
37.4	36.7	37.8	41.7	44.3
36.2	37.5	38.9	41.5	44.8
43.8	44.2	44.3	47.4	49.4
56.0	53.3	54.8	56.5	59.6

1/3 LASmax 800	1/3 LASmax 1000	1/3 LASmax 1250	1/3 LASmax 1600	1/3 LASmax 2000
44.7	44.6	44.5	40.5	37.1
41.5	42.0	41.1	39.0	35.4
41.0	43.5	39.5	37.8	34.3
44.0	46.0	44.5	41.2	37.3
50.1	51.1	49.3	45.5	41.2
49.5	50.4	48.3	45.6	41.7
47.6	49.9	47.1	43.6	39.4
48.4	49.8	47.5	44.5	40.4
46.0	47.5	45.5	43.0	38.6
44.7	46.6	43.8	41.4	37.9
56.8	61.4	61.6	60.1	56.8
65.3	69.4	68.2	64.7	60.9
62.1	65.2	63.3	59.3	55.1
58.5	62.8	61.0	57.4	52.7
46.9	50.5	48.9	45.4	40.4
47.6	47.7	45.7	44.8	41.2
57.5	58.8	56.8	54.8	51.5
58.6	59.4	57.9	55.2	52.2
50.9	51.8	49.0	46.1	43.0
65.1	67.2	64.1	62.6	59.0
67.0	67.3	65.4	63.0	58.0
66.9	67.5	65.4	62.5	57.6
51.5	52.5	49.8	47.0	42.4
67.6	69.4	68.3	65.2	62.0
67.4	69.7	68.3	65.1	61.9
52.2	55.5	54.1	51.5	46.6
46.1	47.6	45.1	42.6	39.0
47.1	48.5	46.5	43.8	40.0
47.7	49.3	46.9	44.7	41.5
47.1	48.8	45.7	42.6	39.5
47.2	49.5	45.7	42.6	38.3
56.9	61.6	58.9	56.7	51.8
61.3	64.4	62.3	58.6	55.7
65.5	66.2	65.3	63.0	58.8
66.0	66.8	65.7	63.2	58.8
58.5	61.0	59.6	56.9	53.9
50.3	52.1	50.4	48.6	44.6
50.4	51.6	48.7	45.5	41.7
50.1	50.3	46.8	44.7	40.5
64.8	66.8	64.9	63.2	59.3
60.0	62.5	60.8	58.5	54.2
45.1	47.1	45.2	42.7	38.8
42.8	43.6	41.4	39.6	36.0
47.8	47.8	46.5	42.9	37.4
50.7	51.8	50.9	45.5	39.7
47.1	47.8	46.8	44.9	41.1

59.0	57.9	54.1	52.5	48.1
62.5	61.4	57.7	54.7	51.2
56.1	58.1	55.8	53.6	49.9
50.7	50.9	48.8	47.4	44.7
47.7	50.2	49.0	45.1	41.7
48.0	49.9	48.2	45.7	43.3
50.5	51.7	50.8	50.2	48.5
51.1	52.5	52.0	50.7	48.4
50.0	51.2	49.0	49.5	48.2
48.9	49.9	48.1	49.2	48.0
50.3	51.4	49.6	50.1	47.4
49.5	50.1	48.0	48.0	47.0
53.0	54.6	52.9	52.5	50.2
54.8	54.6	53.6	54.5	52.2
54.1	53.6	51.6	51.8	50.0
61.3	61.2	57.0	55.5	53.5
63.5	61.3	57.2	55.6	53.5
51.7	51.6	50.1	50.7	48.3
52.0	52.5	50.7	50.1	48.3
51.4	51.8	50.5	49.3	47.6
54.0	54.6	52.9	53.6	51.7
51.3	52.1	51.0	51.9	51.1
47.7	48.7	48.1	48.4	47.1
44.4	45.7	43.1	40.8	38.3
45.0	47.4	44.8	42.7	39.4
46.5	48.7	48.8	46.2	42.6
50.9	53.4	51.4	48.0	44.4
51.3	53.7	51.5	48.1	44.7
61.9	61.4	57.7	54.1	50.9
61.8	61.2	57.8	54.6	50.8
51.8	51.4	49.4	46.1	42.1
48.8	49.9	48.3	45.2	43.4
45.7	47.2	45.2	43.1	39.8
58.5	59.4	55.8	55.5	50.5
60.0	59.5	56.2	55.6	51.2
47.9	48.0	46.0	44.2	41.3
48.1	49.3	47.3	44.4	41.1
49.7	51.7	49.2	46.3	43.1
49.7	52.0	50.9	47.1	43.2
50.1	51.8	50.4	46.7	43.1
57.2	55.0	53.3	48.9	43.9
66.4	64.4	60.5	57.3	53.7
54.6	53.5	50.3	47.3	43.3
46.1	47.0	45.9	43.5	40.9
44.6	46.0	44.7	44.2	42.1
64.3	63.7	62.1	59.6	56.5
64.2	63.8	62.0	59.6	56.5
48.6	50.4	49.4	46.7	42.7

49.9	50.1	47.9	44.4	40.9
47.7	49.7	47.3	45.5	41.8
48.3	49.5	47.9	46.4	43.0
46.3	48.3	46.2	44.7	40.0
45.6	45.1	42.9	41.2	38.5
56.0	58.9	55.8	54.9	51.1
61.2	64.9	62.7	60.7	58.5
59.8	61.9	59.1	56.6	54.2
56.8	60.5	59.4	57.1	55.0
50.2	51.4	50.0	47.6	45.0
49.6	51.2	48.9	46.2	43.5
48.8	50.4	48.3	45.6	43.5
49.2	49.0	46.5	45.6	42.1
48.4	48.3	46.2	45.1	41.9
50.6	52.1	51.8	50.7	48.8
54.0	54.1	53.6	52.4	49.5
66.4	66.5	62.6	60.2	56.1
65.4	66.2	62.3	60.3	55.8
63.9	65.7	61.4	59.0	56.2
61.7	63.9	57.6	57.7	53.1
60.9	63.0	59.3	56.6	54.2
58.2	59.7	58.7	56.1	52.9
47.1	49.0	46.7	44.2	41.2
49.5	49.9	46.9	46.0	44.6
52.2	54.6	52.8	51.9	48.8
61.4	62.8	59.9	59.0	55.5

1/3 LASmax 2500	1/3 LASmax 3150	1/3 LASmax 4000	1/3 LASmax 5000	1/3 LASmax 6300
33.2	29.5	26.7	21.0	18.1
33.1	30.6	47.0	24.3	19.9
31.9	32.4	48.7	26.7	28.4
33.8	32.2	48.5	25.9	28.6
37.7	34.4	47.1	25.7	21.0
38.8	36.6	43.1	28.1	23.0
36.8	34.7	31.6	26.5	20.7
37.3	34.9	47.9	27.4	22.6
36.3	36.7	47.2	27.4	22.1
34.6	36.5	47.8	30.2	25.1
49.4	43.3	44.9	36.4	31.8
55.8	51.7	48.6	44.1	40.2
51.7	48.5	49.6	41.5	38.2
48.8	45.7	46.2	39.0	35.4
36.8	33.6	43.5	29.5	27.6
39.7	36.6	47.3	30.0	27.7
49.2	46.1	44.2	38.9	35.6
49.5	46.6	43.5	39.8	36.5
39.6	37.1	41.3	30.7	27.5
54.9	51.0	47.6	43.2	39.3
53.8	50.2	47.5	43.0	39.2
53.7	50.2	47.6	43.5	39.5
39.0	35.6	34.4	28.6	23.7
58.0	54.4	51.8	49.2	46.6
58.0	54.6	52.2	49.1	46.2
42.0	37.9	37.9	30.6	27.2
36.2	31.5	36.0	26.7	24.6
36.2	32.8	40.5	25.0	21.3
38.7	34.5	32.4	28.0	24.5
36.1	32.4	27.5	22.1	18.3
36.6	34.5	31.5	26.5	20.7
48.0	44.5	40.8	37.9	34.3
52.4	49.3	45.7	41.7	38.2
54.1	51.0	47.6	44.7	44.6
54.5	51.4	48.8	45.8	45.4
51.5	48.9	46.9	43.7	40.4
41.1	37.1	34.0	29.4	24.9
38.8	34.9	33.0	27.1	22.8
37.9	34.5	30.6	27.1	22.9
54.9	50.7	46.9	42.8	39.9
49.7	46.1	42.3	38.2	35.0
36.8	35.0	33.4	29.6	26.3
33.3	29.9	27.0	24.0	21.3
34.6	31.6	26.3	21.3	18.5
36.5	32.3	27.9	24.0	22.1
38.0	33.6	29.3	24.4	21.2

45.9	42.2	38.6	35.0	31.9
48.9	44.8	41.5	37.4	33.9
46.9	43.6	40.2	36.6	33.9
41.8	40.0	37.3	34.0	30.8
37.6	35.3	29.8	25.8	21.5
40.7	37.8	34.3	29.9	24.2
45.3	43.1	39.5	34.4	27.1
45.7	42.7	39.3	34.0	27.9
45.4	41.7	38.2	33.3	27.1
44.1	40.4	37.0	32.3	26.1
43.9	40.3	36.6	31.9	25.4
43.9	41.0	37.1	33.0	27.1
47.6	45.5	41.8	36.5	29.6
49.3	45.5	42.6	38.1	31.1
46.6	44.0	40.8	35.8	29.7
51.0	48.3	45.0	41.8	39.4
51.1	48.4	45.0	41.8	39.4
45.6	42.6	39.5	34.8	29.0
46.7	44.6	40.9	35.4	28.6
45.0	41.7	38.1	33.6	27.5
49.1	44.5	41.5	37.0	30.1
47.8	43.8	39.2	34.8	28.1
44.5	41.1	37.3	32.9	26.3
35.6	32.3	28.4	24.0	19.8
35.8	31.9	27.4	23.0	19.5
38.4	33.8	28.2	23.4	20.3
40.6	37.1	38.5	26.6	25.1
41.0	37.0	32.7	26.9	24.2
47.5	44.8	41.7	37.7	35.7
47.9	45.0	41.7	37.8	35.7
38.5	35.0	30.6	25.9	22.1
38.6	34.2	29.4	24.5	20.5
36.5	35.0	29.5	29.5	24.2
46.5	42.8	38.5	34.0	29.8
47.4	43.9	39.4	35.0	30.9
38.2	36.0	31.5	27.4	23.6
38.3	34.9	30.7	26.6	23.1
40.1	36.4	31.9	27.9	22.1
39.5	35.8	31.4	26.9	21.1
39.7	35.3	31.4	25.8	20.4
39.6	35.4	31.5	27.8	23.9
50.8	48.1	44.6	41.1	38.0
40.3	37.4	33.7	29.9	26.1
37.7	34.6	31.4	26.9	21.3
39.5	37.2	34.1	29.8	22.9
51.7	48.4	44.3	41.0	37.2
51.9	48.4	44.3	41.0	37.2
38.6	34.8	31.6	26.8	22.4

37.8	34.5	31.3	26.3	20.9
37.8	33.0	28.9	23.8	19.2
38.5	34.1	30.2	25.2	20.5
36.5	32.4	29.7	24.5	20.4
36.9	34.0	31.2	26.3	21.6
49.1	45.5	44.6	39.3	34.3
55.7	52.2	48.6	44.8	42.3
51.2	47.7	44.7	40.9	39.3
52.3	49.5	46.9	43.6	41.0
41.8	39.0	36.4	32.4	28.7
40.0	36.9	33.3	29.4	25.5
40.1	37.0	33.7	29.4	24.7
39.5	36.5	32.7	28.2	23.6
38.9	35.3	31.8	27.6	22.6
45.0	40.8	37.0	34.3	30.6
45.9	42.4	41.0	38.6	32.5
53.3	50.2	47.4	44.0	40.8
52.9	49.8	47.2	43.8	40.7
53.0	50.6	47.9	43.1	41.0
51.7	49.9	44.8	43.1	38.0
50.3	46.8	43.7	41.0	38.5
48.9	46.1	43.1	40.5	37.8
38.5	37.6	32.1	29.1	25.0
41.2	38.0	34.2	30.0	25.2
43.5	40.6	37.0	33.6	30.6
51.6	48.0	44.4	41.4	39.1

1/3 LASmax 8000	1/3 LASmax 10000	1/3 LASmax 12500	1/3 LASmax 16000	1/3 LASmax 20000
15.7	14.5	12.5	10.7	9.5
18.4	15.0	16.1	9.8	9.5
29.6	23.3	18.3	14.3	9.7
28.2	21.5	17.0	13.1	9.6
21.6	15.9	13.3	9.9	9.5
18.7	15.7	13.4	10.4	9.9
16.3	14.7	12.1	9.8	9.7
20.8	15.9	14.0	10.2	9.8
19.4	16.2	13.0	9.7	9.5
17.8	16.8	13.5	10.5	9.4
25.6	20.7	15.2	10.9	9.7
35.8	31.2	26.4	21.7	15.3
34.4	30.5	26.8	23.1	16.9
31.5	27.6	23.5	19.4	13.9
19.1	15.2	12.5	10.2	9.8
19.5	15.2	12.2	9.9	9.7
30.7	26.9	21.0	15.0	10.9
31.4	27.9	21.3	15.1	10.9
19.5	16.2	12.5	10.1	9.7
35.7	31.1	26.8	21.7	15.1
35.8	31.4	26.5	21.7	15.9
35.9	31.7	31.3	22.1	16.1
19.6	16.6	20.4	11.0	9.7
42.9	39.3	33.6	27.6	19.3
42.6	39.1	33.3	27.4	19.2
23.4	20.0	15.3	11.4	9.7
17.6	15.8	11.8	9.6	9.7
18.9	15.0	12.4	10.3	10.1
19.5	15.5	12.3	9.8	9.8
15.3	14.1	11.6	9.5	9.6
16.2	14.5	12.2	10.3	10.3
31.1	27.8	22.4	17.9	12.6
35.1	30.4	25.9	20.4	14.1
40.8	34.2	28.4	21.2	14.3
40.7	36.7	30.8	24.3	17.4
37.9	36.0	31.0	26.1	18.9
22.1	19.8	15.6	11.8	10.0
16.6	14.4	11.9	9.6	9.7
17.0	15.5	13.1	10.1	9.7
37.2	32.1	26.9	22.9	16.7
31.7	27.2	22.3	18.3	13.2
20.2	17.4	12.9	9.6	9.5
17.4	16.0	13.7	11.1	10.0
15.6	14.4	12.1	9.8	9.8
17.1	15.1	12.5	10.1	10.0
16.9	15.3	12.7	10.3	10.0

28.0	24.5	19.5	14.2	10.5
30.5	26.6	21.2	15.9	11.6
28.7	25.1	21.2	16.2	11.3
25.3	21.1	16.9	12.5	10.7
18.0	16.0	13.6	11.0	10.2
18.1	15.3	12.3	9.9	9.7
20.1	15.6	12.8	10.4	10.1
20.1	15.5	12.7	10.5	10.3
21.3	18.3	15.8	12.0	10.2
18.6	15.1	12.5	10.2	9.8
18.3	15.0	12.6	10.0	9.9
19.0	14.9	12.4	9.9	9.6
20.3	14.7	12.0	9.7	9.6
21.4	14.7	11.9	9.6	9.7
20.6	14.7	11.9	9.6	9.6
35.8	31.2	27.4	23.9	16.4
35.9	31.2	27.4	23.8	16.3
21.9	17.0	13.5	10.7	9.6
19.5	14.5	11.8	9.6	9.6
18.7	14.4	11.9	9.6	9.7
20.4	14.6	11.7	9.5	9.7
20.2	17.3	14.1	11.7	10.0
19.3	16.5	13.5	11.1	10.2
16.1	14.8	12.5	10.3	10.2
17.1	14.8	12.3	9.9	9.9
16.8	14.7	12.2	9.8	9.8
29.9	13.9	11.9	9.5	9.6
27.5	13.9	11.8	9.5	9.9
32.0	27.2	23.5	19.5	13.2
32.1	27.5	23.9	20.1	14.7
18.4	16.0	13.3	10.9	10.1
17.3	15.0	12.6	10.2	9.8
20.8	15.8	12.9	10.2	9.8
26.7	21.9	17.5	13.4	10.5
28.0	23.3	18.8	14.3	10.8
19.6	16.0	12.4	9.7	9.5
19.4	16.5	13.7	10.9	10.3
17.1	14.6	11.9	9.7	9.8
16.4	14.5	11.8	9.5	9.6
16.0	14.5	11.8	9.6	9.7
19.5	16.1	12.4	9.8	9.8
33.6	28.6	23.4	18.5	14.0
21.7	17.9	13.9	10.7	9.8
16.0	14.4	11.8	9.4	9.8
16.8	14.6	11.7	9.5	9.9
34.8	32.3	27.7	21.7	16.6
34.8	32.4	27.8	21.8	16.8
19.0	16.9	13.6	10.4	10.1

15.7	14.2	11.9	9.7	10.0
15.5	14.3	11.8	9.5	9.8
16.2	14.6	12.2	9.8	9.7
16.5	14.7	12.1	9.7	9.8
17.6	15.3	12.7	10.4	10.1
28.2	23.4	18.5	14.1	10.8
38.5	31.1	25.3	19.4	13.2
35.0	27.6	23.0	17.9	12.1
37.5	32.6	28.1	23.3	15.4
24.5	19.9	15.8	12.0	10.1
18.7	15.7	13.0	10.7	10.1
19.0	16.5	13.3	10.8	10.2
17.5	14.6	12.1	9.8	9.5
17.8	15.4	12.5	10.0	9.7
27.0	22.5	17.5	12.8	10.2
28.8	25.0	20.4	15.6	11.2
37.2	33.2	28.9	24.0	16.6
37.1	33.1	28.9	23.9	16.4
37.3	33.2	28.3	22.7	13.8
35.1	32.3	26.9	20.7	13.5
35.1	31.1	26.4	21.5	14.4
34.1	30.1	25.8	20.9	14.1
18.7	16.0	13.0	10.3	9.6
17.6	14.5	11.8	9.4	9.5
25.1	22.0	16.4	10.6	9.7
34.5	29.3	24.3	19.0	12.6

1/3 LASmin 6.3	1/3 LASmin 8.0	1/3 LASmin 10.0	1/3 LASmin 12.5	1/3 LASmin 16.0
1.9	0.9	0.3	-0.8	3.5
1.9	0.9	0.3	-0.1	3.4
1.9	0.9	0.3	-0.8	0.8
1.9	0.9	0.3	-0.8	0.4
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	3.5	8.6
1.9	0.9	0.3	-0.4	4.8
1.9	0.9	0.3	0.3	4.7
1.9	0.9	0.3	-0.8	2.2
1.9	0.9	0.3	-0.8	-0.4
1.9	0.9	0.3	2.6	8.7
1.9	0.9	0.3	0.0	8.2
1.9	0.9	0.3	-0.7	8.8
1.9	0.9	0.3	5.5	8.6
1.9	0.9	0.3	2.3	7.8
1.9	0.9	0.3	1.4	4.9
1.9	0.9	0.3	-0.8	2.2
1.9	0.9	0.3	-0.8	6.4
1.9	0.9	0.3	3.2	7.6
1.9	0.9	0.3	-0.8	2.4
1.9	0.9	0.3	-0.8	1.4
1.9	0.9	0.3	-0.8	3.8
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	1.2
1.9	0.9	0.3	-0.8	-1.1
1.9	0.9	0.3	-0.8	0.9
1.9	0.9	0.3	-0.5	5.3
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	2.2	4.7
1.9	0.9	0.3	1.7	4.7
1.9	0.9	0.3	-0.8	3.1
1.9	0.9	0.3	-0.8	3.1
1.9	0.9	0.3	1.9	4.5
1.9	0.9	0.3	-0.8	3.1
1.9	0.9	0.3	-0.8	2.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-0.7
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	0.5
1.9	0.9	0.3	-0.8	0.3
1.9	0.9	0.3	-0.8	4.7

1.9	0.9	0.3	-0.8	4.1
1.9	0.9	0.3	-0.8	4.4
1.9	0.9	0.3	-0.8	5.1
1.9	0.9	0.3	-0.7	4.2
1.9	0.9	4.1	7.2	10.1
1.9	0.9	0.3	1.2	2.6
1.9	0.9	0.3	-0.8	1.2
1.9	0.9	0.3	-0.8	2.5
1.9	0.9	0.3	0.2	5.3
1.9	0.9	0.3	2.7	9.2
1.9	0.9	0.3	0.9	8.0
1.9	0.9	0.3	1.0	3.7
1.9	0.9	0.3	-0.8	-0.8
1.9	0.9	0.3	-0.8	3.7
1.9	0.9	0.3	-0.8	0.9
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	2.1
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	0.1
1.9	0.9	0.3	-0.8	2.8
1.9	0.9	0.3	-0.8	2.6
1.9	0.9	0.3	-0.8	2.7
1.9	0.9	0.3	-0.8	0.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	0.6	2.4
1.9	0.9	0.3	3.0	7.5
1.9	0.9	0.3	4.9	7.8
1.9	0.9	0.3	4.8	6.4
1.9	0.9	0.3	1.6	6.2
1.9	0.9	0.3	-0.8	1.9
1.9	0.9	0.3	-0.8	0.2
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	7.0
1.9	0.9	0.3	-0.8	-0.3
1.9	0.9	0.3	-0.8	-1.3
1.9	0.9	0.3	-0.8	3.1
1.9	0.9	0.3	-0.8	5.3
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	2.0
1.9	0.9	0.3	-0.8	-0.7
1.9	0.9	0.3	-0.8	2.0

1.9	0.9	0.3	-0.8	4.8
1.9	0.9	0.3	-0.8	4.3
1.9	0.9	0.3	-0.8	2.6
1.9	0.9	0.3	-0.8	0.9
1.9	0.9	0.3	-0.8	-0.7
1.9	0.9	0.3	-0.8	5.5
1.9	0.9	1.3	6.4	11.7
1.9	0.9	0.3	3.7	10.3
1.9	0.9	0.3	2.1	8.0
1.9	0.9	0.3	0.1	6.5
1.9	0.9	0.3	5.4	11.5
1.9	0.9	0.4	4.6	9.2
1.9	0.9	0.3	0.0	4.1
1.9	0.9	0.3	0.3	6.3
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	2.1
1.9	0.9	0.3	-0.8	-1.0
1.9	0.9	0.3	-0.8	-0.9
1.9	0.9	0.3	-0.8	-0.2
1.9	0.9	0.3	-0.8	3.4
1.9	0.9	0.3	-0.8	1.0
1.9	0.9	0.3	-0.8	2.4
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	0.0	3.7

1/3 LASmin 20.0	1/3 LASmin 25.0	1/3 LASmin 31.5	1/3 LASmin 40.0	1/3 LASmin 50.0
8.7	13.7	17.5	20.1	21.8
10.0	13.0	17.3	19.2	22.8
4.4	10.4	17.2	18.7	19.6
2.7	7.2	18.2	19.1	20.8
2.3	9.2	18.4	19.1	19.4
3.8	11.3	16.1	20.5	23.3
12.6	14.7	17.2	20.0	22.7
10.4	13.1	16.7	20.3	23.2
6.8	13.4	17.4	22.3	27.8
6.5	12.2	16.6	22.2	31.5
9.0	13.8	16.9	25.9	31.6
12.0	17.7	22.6	27.2	33.8
11.1	18.9	19.7	27.2	31.9
15.5	21.0	23.3	26.1	28.9
10.6	17.7	20.4	24.4	29.5
12.3	16.9	19.5	24.8	32.7
10.7	14.8	17.6	24.1	32.9
8.0	13.9	17.9	24.3	33.3
12.1	16.6	21.2	23.1	35.2
14.5	16.5	22.9	27.7	34.4
8.1	12.8	16.4	24.6	35.4
7.7	13.1	18.1	23.1	32.1
8.6	11.4	17.2	22.6	33.1
5.7	10.2	16.2	21.6	27.0
5.2	11.6	16.2	20.1	28.0
5.5	11.9	15.7	19.9	21.4
4.7	9.1	15.4	19.1	19.9
5.8	10.6	15.7	21.2	18.5
13.6	17.1	20.0	22.8	24.7
3.9	13.1	18.1	18.3	25.6
4.1	12.1	16.9	16.8	22.4
8.6	14.7	17.5	21.5	21.3
10.3	15.3	21.1	22.8	24.3
8.2	15.5	17.5	20.0	25.9
6.8	17.5	17.0	20.0	29.2
6.2	12.8	16.3	20.6	25.9
6.6	12.1	15.7	20.8	22.8
7.2	11.7	16.0	19.9	21.3
1.5	11.5	15.0	17.5	21.9
3.0	11.6	15.5	20.0	23.6
4.8	12.0	15.9	16.6	22.8
-1.6	10.2	13.0	16.1	18.4
0.2	9.3	13.0	16.9	17.7
4.9	11.9	14.2	16.4	17.3
5.3	10.4	15.1	16.4	18.4
7.8	11.1	16.4	18.1	20.1

8.2	13.3	18.2	19.1	22.6
12.4	15.9	19.7	24.1	28.2
9.4	15.4	19.7	22.3	25.8
6.3	13.1	19.1	18.7	23.0
16.1	19.4	21.1	23.4	25.3
6.2	10.4	15.3	20.7	21.5
4.9	11.4	15.4	21.4	21.0
8.0	11.2	16.8	22.3	21.6
11.2	14.1	20.7	22.2	24.7
13.2	17.3	19.2	21.3	22.5
13.7	15.2	19.6	19.5	24.1
7.3	11.7	15.1	18.7	20.7
5.8	10.2	14.4	15.8	20.2
7.4	11.6	15.8	16.6	20.5
4.3	9.7	12.3	17.9	19.3
3.1	10.1	11.4	15.3	21.2
7.0	12.5	17.4	20.6	22.7
2.6	9.7	13.2	17.2	19.8
1.4	8.2	14.1	16.6	19.3
3.2	8.0	12.9	17.2	20.1
1.8	8.8	12.7	16.3	19.8
1.7	10.0	13.4	15.7	18.3
5.9	10.6	13.0	15.7	19.5
9.6	14.3	19.3	22.0	29.9
8.1	12.7	14.6	17.0	23.9
8.5	12.4	16.1	17.1	20.9
4.5	10.7	14.2	17.0	21.6
-1.2	9.1	13.6	17.4	21.7
9.7	11.5	17.8	19.9	24.0
13.3	16.1	20.6	22.2	26.4
11.2	17.5	20.2	23.4	25.4
11.3	16.6	20.9	23.2	23.1
9.0	14.1	17.9	22.2	22.7
4.0	10.6	16.8	19.9	22.5
5.7	11.6	18.8	20.5	22.6
2.1	10.0	16.1	18.0	21.0
1.8	11.0	16.9	18.1	24.2
9.4	12.6	18.3	20.8	24.6
2.9	10.1	15.4	18.7	22.4
1.8	9.7	13.4	19.8	22.5
7.7	11.1	16.1	21.1	23.4
10.2	16.6	19.0	23.0	25.2
3.0	10.2	13.9	19.9	22.0
1.4	9.3	13.4	17.3	21.9
1.4	11.2	14.4	21.1	25.1
4.9	9.7	14.5	23.7	23.5
5.9	11.6	17.0	26.3	24.9
7.3	12.2	15.2	19.6	22.4

9.3	14.9	16.9	19.8	24.0
8.4	13.1	16.7	19.3	24.0
5.4	12.7	16.3	20.0	23.7
4.0	12.7	15.9	20.2	21.6
4.6	13.4	15.8	19.4	21.4
18.2	21.7	27.3	28.8	30.3
15.3	20.0	23.4	27.7	31.9
11.9	17.2	19.1	25.3	28.4
11.4	16.1	19.2	23.1	27.7
10.8	14.6	17.2	22.0	24.9
15.1	18.1	21.2	24.5	26.3
12.6	17.2	20.9	22.0	24.2
5.7	13.0	17.1	18.7	23.1
9.9	16.4	17.4	18.0	22.3
2.3	11.3	14.1	18.3	22.7
4.4	12.1	17.0	22.9	26.0
7.6	11.5	17.4	21.5	24.8
3.9	14.2	24.9	21.4	23.8
2.4	12.3	17.5	21.0	24.2
5.9	12.5	16.6	24.3	26.9
8.3	13.7	22.1	31.0	36.5
6.1	12.4	18.6	23.0	25.0
6.1	11.9	16.6	22.8	24.3
6.1	10.1	14.5	21.0	21.1
6.3	9.9	15.6	21.0	21.1
8.5	12.5	20.3	21.6	25.1

1/3 LASmin 63.0	1/3 LASmin 80.0	1/3 LASmin 100	1/3 LASmin 125	1/3 LASmin 160
21.7	22.9	26.6	27.1	27.4
20.9	22.6	25.9	27.7	27.8
20.7	22.0	24.7	25.3	27.1
25.5	22.0	24.2	31.8	31.2
23.6	23.4	25.6	32.7	30.8
28.3	24.1	25.5	36.3	34.5
24.0	28.1	28.3	32.8	38.2
23.5	27.0	30.0	32.1	31.6
27.8	24.1	30.2	27.4	29.2
27.8	24.0	29.1	26.6	28.1
30.8	25.1	30.6	30.1	28.5
32.1	33.0	36.5	40.3	39.8
33.5	36.6	36.8	40.2	42.9
30.4	32.3	34.2	36.6	38.8
29.5	27.6	31.3	30.2	32.2
29.6	27.9	31.1	29.6	31.5
29.1	28.0	33.4	33.4	34.6
32.3	34.1	40.0	41.3	42.6
32.1	34.0	34.0	40.2	42.3
34.6	37.0	34.8	46.0	42.8
31.3	31.9	36.5	42.8	43.3
31.2	31.6	32.4	37.0	40.1
30.6	24.5	26.7	30.5	31.9
31.1	23.4	26.1	30.4	31.6
28.8	27.6	31.8	36.2	38.8
20.2	20.5	25.4	29.0	31.5
20.0	21.8	24.2	28.3	30.5
22.3	24.0	26.2	30.4	31.1
25.8	28.2	28.0	30.8	30.3
22.5	23.2	27.4	28.8	29.2
21.1	23.5	28.4	32.8	33.4
25.2	26.7	30.4	33.2	35.5
29.2	33.2	38.0	39.7	44.6
29.9	30.4	35.8	39.5	40.1
30.1	33.5	41.2	41.3	45.5
27.6	29.2	31.6	37.5	39.7
25.5	28.6	27.1	32.2	32.9
26.0	27.5	27.2	33.0	32.9
27.1	27.5	31.5	33.5	33.5
29.2	27.7	32.6	35.0	36.0
20.9	23.6	26.9	31.9	31.8
18.7	22.3	23.4	27.2	29.4
18.5	22.7	22.8	26.2	28.1
19.8	22.0	23.4	29.5	28.1
18.7	23.1	25.9	30.9	30.4
22.8	24.4	28.7	30.8	30.8

24.4	26.5	32.4	31.9	34.3
28.9	33.0	35.7	40.7	42.3
32.0	38.3	41.1	39.0	41.0
27.2	31.7	32.7	35.1	35.9
27.8	29.3	30.2	32.6	33.4
25.6	26.1	28.5	32.6	33.1
23.8	26.4	27.4	32.4	33.9
25.2	29.2	30.2	31.9	35.3
27.6	26.1	30.9	31.8	33.5
25.2	26.8	28.4	31.4	32.4
24.7	28.0	29.1	31.7	34.3
23.7	28.6	29.5	32.6	34.7
23.1	24.5	27.7	33.9	35.3
22.8	24.5	26.9	31.6	34.8
22.1	23.7	26.9	30.8	33.9
21.9	24.7	28.2	33.8	34.4
23.5	27.8	33.2	35.6	38.4
21.0	26.8	29.6	33.3	35.0
22.6	26.4	30.1	32.9	34.3
22.9	26.6	29.6	32.9	34.7
22.4	24.9	26.4	32.3	36.5
22.6	24.1	26.1	32.9	36.0
21.5	26.2	25.6	30.9	34.1
27.3	25.4	30.6	33.3	31.5
30.6	24.6	31.2	36.6	31.7
27.5	23.4	28.0	31.6	29.5
24.8	22.9	28.4	30.8	30.2
24.8	25.3	30.1	32.6	35.9
24.7	30.0	31.0	33.7	36.6
31.3	28.7	32.3	41.8	38.7
27.4	27.6	28.5	33.0	34.5
23.9	26.1	27.1	32.4	33.1
23.2	29.8	31.7	32.6	34.2
24.4	28.6	34.1	33.0	34.5
26.4	31.2	33.1	35.6	35.5
25.4	28.9	31.7	31.3	31.1
25.3	29.2	32.6	34.9	29.9
26.0	31.0	34.8	37.6	33.7
23.2	28.5	34.5	33.4	36.2
24.5	28.8	39.1	33.9	36.1
26.3	29.6	38.9	40.0	43.8
27.0	33.7	40.3	43.1	44.6
24.6	29.1	34.1	33.1	34.9
23.9	26.2	29.4	31.8	34.6
25.5	28.0	29.6	33.1	35.0
24.3	31.4	33.0	35.3	39.2
24.8	33.0	32.5	36.4	36.1
20.6	25.5	33.1	30.0	32.7

21.8	23.8	35.1	29.1	32.7
22.0	23.4	30.7	30.1	32.1
22.2	25.5	28.2	31.5	33.7
21.2	23.6	28.4	30.8	32.1
22.7	29.2	31.9	33.8	35.5
31.5	31.5	36.0	40.3	38.4
33.1	34.3	38.5	40.8	41.9
30.8	35.5	37.7	39.7	43.0
27.0	35.4	34.0	37.2	41.0
24.9	30.0	31.9	34.8	36.2
28.1	32.6	29.9	33.0	34.5
26.6	28.2	35.7	32.6	35.2
25.7	28.2	37.5	33.2	36.9
24.5	26.0	30.7	31.9	31.2
23.6	25.3	27.8	31.3	30.9
26.8	32.1	36.9	36.2	36.7
26.8	31.0	35.1	35.1	36.7
28.3	31.5	35.6	41.1	42.8
28.5	31.0	35.8	40.8	42.4
29.8	32.6	42.4	41.5	46.5
36.4	37.9	42.2	45.3	48.4
26.1	28.7	32.0	35.3	35.5
25.9	25.9	25.8	30.8	29.0
23.0	28.6	27.3	33.3	30.6
21.8	26.3	35.2	32.3	29.8
29.7	35.6	39.7	38.2	36.7

1/3 LASmin 200	1/3 LASmin 250	1/3 LASmin 315	1/3 LASmin 400	1/3 LASmin 500
29.2	29.1	29.8	30.4	34.5
27.9	29.3	29.7	30.0	33.8
30.9	29.4	30.7	31.7	33.1
32.6	33.1	32.0	31.9	33.7
34.2	35.3	35.8	35.7	37.4
35.0	37.6	37.8	38.1	40.5
35.7	38.0	35.7	36.7	38.8
32.3	35.9	34.6	36.2	38.9
29.1	33.0	33.5	34.9	36.5
28.7	32.3	33.5	34.9	36.6
30.0	34.6	33.9	35.0	37.2
46.5	49.1	47.5	48.2	50.7
47.3	49.0	47.8	48.6	51.0
38.8	39.8	38.5	38.9	41.1
34.3	35.6	34.6	35.3	36.8
34.1	35.8	36.0	35.7	37.4
37.0	39.5	40.5	42.0	43.6
43.7	46.0	43.0	43.8	45.1
41.1	43.1	39.9	40.6	41.7
51.2	47.1	46.4	45.1	45.4
47.0	47.3	44.9	48.0	50.3
44.4	43.0	42.2	44.3	46.1
35.5	35.5	36.7	37.3	39.0
35.0	37.3	37.0	37.3	39.0
44.3	45.5	46.1	44.7	45.9
35.3	35.6	35.0	36.4	39.0
35.8	34.9	34.6	36.1	39.2
35.8	37.4	35.8	36.1	39.0
31.9	34.4	34.8	35.9	38.6
30.1	33.1	34.1	35.3	37.7
38.7	36.6	37.1	37.1	38.7
38.9	38.3	38.8	39.3	40.3
49.3	50.1	48.2	48.5	51.0
43.6	45.2	43.3	44.7	46.3
47.0	48.2	49.3	50.1	52.3
40.3	42.2	41.4	44.0	45.2
38.0	40.0	39.6	40.6	42.4
37.2	40.3	39.6	40.2	42.0
34.3	39.1	38.3	38.7	42.2
39.8	41.5	42.5	41.6	45.1
35.2	37.4	35.0	38.3	40.2
30.5	34.0	32.5	35.7	37.4
29.4	31.6	31.2	33.2	35.3
30.7	32.3	33.0	35.0	36.2
32.5	38.9	40.5	38.1	40.9
32.8	37.5	39.0	37.5	39.6

34.7	37.2	40.1	39.8	40.3
44.6	46.1	47.9	49.2	51.6
45.0	43.9	41.8	45.7	48.1
36.5	37.7	36.3	38.2	41.2
34.9	35.2	35.2	36.1	39.1
34.9	35.3	35.8	37.7	40.5
38.2	37.5	38.6	40.9	45.8
40.6	39.3	39.7	42.3	47.0
36.9	37.4	37.9	41.4	45.6
36.3	36.2	37.3	41.2	45.6
37.3	36.3	36.6	38.3	43.3
37.0	36.1	36.9	38.7	43.2
39.5	39.6	41.2	43.5	47.3
40.6	39.9	41.5	46.4	52.2
37.7	38.8	40.0	44.2	49.5
38.3	40.4	41.3	44.8	49.1
41.3	41.6	41.2	43.9	47.3
38.1	38.9	38.5	42.1	44.0
39.7	39.1	38.9	42.7	44.9
39.6	36.6	36.8	40.0	44.1
40.6	38.6	40.9	45.5	49.0
40.1	37.5	40.4	44.4	47.8
33.3	34.2	34.9	36.1	38.1
33.0	34.4	34.6	35.3	37.3
34.2	36.2	36.2	35.8	37.9
32.3	34.0	35.2	35.2	37.7
32.0	34.2	35.8	35.4	38.6
35.3	39.0	40.2	40.6	43.9
37.5	41.9	43.8	44.2	45.8
42.0	42.0	41.6	43.1	44.9
35.3	36.2	37.6	38.5	40.8
32.8	35.4	36.5	36.9	38.9
33.0	36.7	34.3	35.2	37.4
35.8	36.2	33.8	37.5	40.5
39.3	37.6	36.0	39.5	43.0
35.3	33.6	33.2	36.6	38.9
35.5	35.1	35.6	36.6	38.5
39.2	38.8	36.8	40.7	41.7
38.8	42.5	38.4	41.2	41.5
42.5	41.2	40.8	41.4	43.6
44.5	42.1	44.5	46.0	43.1
46.5	45.3	44.3	47.3	49.1
36.9	37.4	37.3	40.0	40.7
32.4	36.1	35.0	35.5	35.5
32.9	36.2	34.3	35.3	35.2
38.2	40.5	41.4	40.7	40.8
38.1	41.5	39.9	41.2	43.3
34.0	34.9	36.1	37.9	40.0

32.2	34.2	36.5	37.7	39.8
31.5	34.5	35.5	38.0	39.3
33.8	38.1	36.4	37.7	40.1
33.6	35.5	35.9	37.0	37.5
34.9	35.9	37.1	36.8	37.4
41.9	40.7	43.1	41.6	41.7
43.8	45.1	50.3	48.3	51.1
45.8	44.8	43.7	47.1	48.6
42.1	43.0	42.2	44.6	45.5
35.8	37.9	38.8	40.6	42.4
35.1	36.7	38.0	39.8	42.0
37.3	37.3	39.0	38.5	41.5
37.9	37.7	38.8	38.8	41.2
34.7	34.6	36.5	36.7	40.0
32.2	33.7	34.8	35.0	37.5
38.9	43.3	41.7	41.2	42.5
39.0	42.3	39.4	40.3	42.4
44.6	45.8	46.3	45.4	49.1
44.4	50.2	50.3	47.1	51.9
47.8	49.7	48.5	48.7	50.6
48.4	48.8	49.1	50.9	50.8
33.7	37.4	36.7	37.8	41.7
31.4	34.3	33.6	35.0	37.8
31.0	34.0	34.9	35.2	38.9
33.1	35.9	36.8	38.0	40.9
41.5	43.9	44.2	44.3	47.3

1/3 LASmin 630	1/3 LASmin 800	1/3 LASmin 1000	1/3 LASmin 1250	1/3 LASmin 1600
38.3	40.2	40.4	39.9	37.5
37.1	39.7	40.3	39.4	37.5
35.7	39.9	39.8	38.3	35.8
36.6	40.5	41.8	38.3	36.0
41.1	43.9	46.1	44.5	41.1
43.0	47.3	48.7	45.6	42.2
42.2	46.1	48.5	45.6	42.4
41.4	46.0	47.5	45.5	42.6
39.2	43.6	44.9	42.6	39.7
39.6	43.6	45.0	42.5	40.0
40.2	44.3	46.4	43.4	40.2
52.6	55.0	58.3	57.1	54.2
52.9	55.7	58.4	56.5	53.9
42.8	46.9	50.5	49.0	45.4
39.9	43.4	46.1	41.9	38.9
39.2	42.5	44.7	41.4	39.8
45.1	47.1	47.4	45.7	44.2
46.5	49.5	50.3	48.7	46.1
43.7	47.9	49.3	47.2	44.2
47.5	51.0	51.7	48.9	45.1
51.2	53.8	55.9	53.3	50.7
48.4	51.5	52.5	49.8	47.0
41.9	45.1	46.6	44.5	42.1
41.8	45.1	47.0	44.7	42.2
49.0	52.2	55.5	54.2	51.5
40.8	45.2	47.0	44.3	42.3
41.1	44.4	46.6	43.8	41.5
42.4	45.9	47.3	44.3	41.8
41.5	45.2	47.2	45.4	42.2
41.3	45.2	47.4	44.7	41.3
41.9	44.6	46.4	43.1	40.4
42.2	44.8	46.8	43.6	40.9
52.8	55.7	58.9	56.3	52.5
48.2	50.5	52.0	50.1	47.1
54.9	56.6	58.3	56.7	54.7
47.4	50.1	52.0	50.5	48.6
45.2	48.4	50.0	47.5	45.0
44.7	47.6	48.9	46.3	43.3
42.8	45.6	47.2	45.1	42.3
46.6	50.1	50.1	46.6	44.4
41.8	45.1	47.1	45.2	42.7
38.5	41.9	43.2	40.8	38.5
37.3	40.4	42.0	39.4	37.3
38.6	42.7	43.5	41.2	39.1
42.6	45.5	47.3	45.9	42.3
42.4	44.9	45.9	45.1	42.6

43.8	46.9	47.3	45.5	42.6
53.5	56.1	57.9	54.2	52.6
48.2	50.7	50.9	48.8	47.4
42.5	46.7	48.7	46.9	43.9
41.2	45.1	47.6	46.8	43.3
41.5	46.0	47.7	46.1	44.1
44.0	46.5	47.8	47.4	45.6
46.5	48.9	49.9	48.2	47.2
44.9	47.1	48.0	45.7	44.8
43.9	45.7	46.5	44.2	44.1
43.0	45.4	46.9	44.5	44.3
44.3	47.5	48.5	46.3	44.5
47.5	49.6	49.8	47.9	48.0
51.4	52.7	53.0	51.6	51.9
47.6	50.4	50.4	48.0	48.0
48.2	52.2	52.4	49.9	49.6
48.8	51.7	50.7	47.3	45.9
46.1	49.0	49.4	47.3	46.3
46.5	49.8	49.7	47.4	46.8
43.8	46.6	47.8	46.4	45.2
46.7	48.1	48.6	47.3	46.7
46.2	47.6	48.7	47.8	47.9
40.0	43.8	45.2	43.1	40.8
39.9	43.1	44.5	42.1	39.8
40.5	42.7	44.2	42.3	40.4
40.4	43.7	45.9	44.3	42.3
43.0	46.3	48.8	48.8	46.1
47.6	49.4	50.7	48.8	45.7
48.3	50.5	50.8	48.6	45.7
48.1	51.8	51.5	49.5	46.1
44.1	48.4	48.8	46.1	43.6
41.7	45.6	47.1	45.2	43.0
40.7	43.8	45.1	43.2	41.0
42.0	44.2	45.7	43.8	41.5
44.8	47.9	47.8	45.9	44.2
40.4	44.5	45.4	43.6	41.2
40.6	44.1	45.6	44.2	41.3
43.2	47.9	49.2	47.1	43.9
45.1	48.7	50.9	48.7	45.9
44.0	47.3	49.0	47.6	44.9
43.9	47.2	48.5	47.0	43.7
52.5	54.7	53.6	50.3	47.3
43.0	46.0	47.0	45.1	43.4
38.3	41.0	43.5	42.3	39.9
38.2	41.0	43.1	42.4	40.9
43.3	44.5	45.4	43.7	41.7
45.7	48.6	50.3	49.4	46.8
42.7	46.6	47.8	46.2	43.5

43.6	47.3	48.4	46.3	43.3
42.9	46.6	47.4	45.5	43.7
42.5	46.3	47.6	45.9	44.1
40.9	43.6	44.8	42.5	40.7
40.9	43.6	44.0	41.7	40.0
41.5	44.1	44.8	42.8	40.1
51.0	56.0	59.0	55.8	54.9
49.0	52.3	54.7	52.3	50.3
46.7	49.8	51.4	50.0	47.7
45.6	49.2	50.3	48.2	45.5
45.0	48.3	49.9	47.4	44.9
43.8	46.6	48.3	46.4	44.1
43.7	46.8	48.2	45.7	43.6
43.6	46.1	46.0	43.6	41.6
40.7	44.1	44.6	42.4	41.5
44.0	46.6	48.3	46.6	45.7
43.2	46.7	48.3	45.5	44.1
50.6	54.2	56.3	52.6	50.9
51.4	56.1	60.1	54.9	54.6
52.4	56.1	57.1	53.3	52.1
53.3	55.0	56.1	53.4	51.3
44.3	47.1	48.5	46.7	44.2
40.7	44.6	47.1	44.2	41.6
41.3	44.8	47.1	44.7	43.2
42.6	46.9	47.5	46.5	44.0
49.4	52.3	54.5	52.8	52.0

1/3 LASmin 2000	1/3 LASmin 2500	1/3 LASmin 3150	1/3 LASmin 4000	1/3 LASmin 5000
34.2	30.0	27.0	22.8	19.1
33.5	30.7	27.4	23.8	20.1
32.8	30.7	28.3	27.4	21.0
32.8	31.1	29.8	31.0	22.8
37.3	33.8	31.1	30.2	23.4
38.9	35.5	32.1	30.3	22.8
38.7	35.5	32.6	29.1	23.5
38.4	35.5	32.6	28.9	24.6
37.2	34.0	31.6	29.7	24.2
37.1	33.6	31.7	33.0	24.4
37.3	33.8	33.0	33.2	27.8
49.2	45.2	42.1	40.9	34.9
49.3	45.2	42.1	42.9	34.9
40.4	36.8	33.6	31.5	28.4
36.7	34.0	31.7	29.8	26.1
36.5	34.2	31.7	32.2	26.0
39.9	37.6	34.3	33.3	28.6
43.1	39.7	37.1	33.9	30.7
40.6	36.5	33.5	31.6	27.6
40.8	36.5	33.7	32.7	28.5
45.9	41.4	37.6	34.1	30.6
42.5	39.0	35.6	32.7	28.6
37.8	34.0	30.7	26.8	21.7
37.9	33.9	30.8	28.6	21.4
46.6	42.0	38.0	34.6	30.7
38.2	34.6	31.3	27.4	21.5
37.8	34.5	30.1	27.1	20.8
38.2	35.0	30.3	31.6	21.9
39.0	36.0	32.0	27.4	22.1
37.8	34.7	30.3	26.0	20.9
37.2	33.9	30.9	26.4	21.4
37.9	36.0	33.5	29.8	25.0
49.6	47.9	44.5	40.3	36.4
43.5	40.4	37.3	33.6	29.7
51.3	47.0	43.7	41.7	38.0
44.6	41.1	37.1	34.0	29.4
41.5	38.4	34.3	30.5	25.7
40.3	37.4	33.0	29.4	24.7
39.4	36.7	32.6	28.7	24.6
39.9	36.7	33.1	29.5	25.4
38.8	35.2	31.4	27.2	23.0
35.1	32.1	29.1	25.4	21.5
34.5	31.3	27.7	24.0	20.3
35.0	31.8	27.6	24.1	20.6
37.5	34.2	30.3	26.3	21.1
38.1	35.8	31.4	27.7	22.9

38.8	36.2	32.7	28.1	22.9
48.2	46.0	42.3	38.7	35.1
44.7	41.9	40.1	37.3	34.0
40.0	36.7	34.1	29.7	25.4
39.7	35.8	32.1	27.5	23.3
41.3	36.8	33.2	28.8	24.3
43.3	40.4	37.1	34.1	29.9
44.8	42.2	38.9	35.0	30.5
43.4	40.6	37.6	34.1	30.1
42.7	40.0	37.3	34.5	30.2
42.4	39.3	36.5	33.7	29.1
42.5	39.9	37.4	34.5	29.5
47.2	43.8	40.5	37.0	33.0
48.7	46.2	43.7	39.8	35.6
46.9	43.8	40.6	37.8	33.2
49.0	45.0	41.9	38.9	34.4
43.9	41.0	38.4	35.0	31.8
44.1	41.8	39.1	35.6	31.2
44.5	42.3	39.8	36.3	31.7
42.7	39.9	36.7	33.3	28.7
45.0	43.0	40.2	37.0	33.2
46.4	43.3	40.4	36.6	32.2
38.3	35.6	32.2	28.4	24.0
36.7	33.5	29.9	25.9	21.8
36.5	33.1	29.9	26.0	21.7
39.3	35.8	31.3	27.2	22.5
42.6	37.9	33.5	28.0	23.1
43.0	39.4	35.4	30.9	25.1
42.8	39.0	35.3	30.7	25.0
42.1	38.3	35.0	30.6	25.9
40.7	37.8	33.8	29.2	24.2
39.8	35.7	32.0	27.8	23.5
38.1	34.2	30.6	26.5	22.9
38.4	34.7	31.3	26.6	24.9
40.9	37.6	34.6	30.8	26.3
38.4	35.5	32.9	29.4	25.0
39.0	35.8	33.5	29.4	24.5
40.9	38.3	34.8	30.3	25.2
42.1	38.1	34.5	30.1	24.8
41.4	38.1	34.5	30.3	24.9
40.3	37.1	33.4	29.1	24.0
43.3	39.6	35.4	31.7	27.9
40.8	37.2	34.2	30.9	26.0
37.1	34.1	30.6	28.0	23.6
39.1	34.8	31.6	29.5	25.0
38.2	35.0	31.8	28.8	24.2
42.7	38.6	34.8	31.0	26.6
40.5	37.2	33.7	30.1	25.4

39.8	36.2	32.6	28.5	23.2
39.9	36.1	32.3	28.1	22.9
39.8	36.3	32.4	27.8	23.0
37.5	33.9	30.8	27.0	22.7
37.2	33.9	31.0	27.8	23.0
38.1	36.1	33.7	30.5	26.0
51.4	49.1	45.6	44.2	39.3
47.1	43.1	39.4	36.1	32.0
45.0	41.8	39.0	36.5	32.4
41.6	38.2	35.3	31.6	27.1
42.2	38.7	34.6	30.9	26.6
41.6	38.7	35.5	32.0	27.5
41.5	38.6	35.3	31.5	27.2
38.7	35.8	32.1	28.1	24.3
39.0	35.6	31.8	28.0	24.0
42.5	39.0	34.8	32.2	28.9
41.2	37.4	32.9	28.7	23.9
46.5	43.2	39.8	37.2	33.4
50.8	47.0	43.1	40.0	35.8
48.3	45.5	42.9	38.5	35.0
49.0	44.6	41.6	37.7	34.6
40.3	37.3	34.5	30.9	26.9
38.6	36.6	33.9	29.4	25.4
40.6	36.9	33.4	29.1	24.9
41.3	37.2	33.2	29.1	25.0
48.8	43.5	40.6	36.9	33.5

1/3 LASmin 6300	1/3 LASmin 8000	1/3 LASmin 10000	1/3 LASmin 12500	1/3 LASmin 16000
16.4	14.5	13.5	11.5	9.5
16.6	14.6	13.4	11.4	9.4
17.3	15.1	14.1	11.7	9.4
21.1	17.1	15.2	12.0	9.7
18.7	15.8	14.2	11.8	9.5
18.6	15.5	14.4	12.0	9.7
18.9	15.4	14.2	11.7	9.6
19.7	16.2	14.6	11.8	9.5
19.2	15.3	14.1	11.5	9.3
19.1	16.2	14.6	11.8	9.3
23.3	16.6	14.4	11.8	9.5
31.9	25.8	20.7	15.3	10.9
32.0	26.3	21.9	17.2	12.5
26.3	18.6	15.2	12.5	10.2
24.2	16.9	14.0	11.6	9.6
24.0	16.6	14.0	11.5	9.4
26.3	19.5	14.9	11.8	9.4
27.5	19.5	16.2	12.5	10.1
24.5	16.6	13.9	11.6	9.5
25.5	16.7	14.0	11.6	9.6
27.0	21.5	17.5	13.7	10.4
23.7	19.6	16.6	20.5	11.0
17.9	14.5	13.5	11.5	9.2
17.5	14.6	13.6	11.4	9.2
27.2	23.5	20.0	15.3	11.4
18.0	15.5	13.9	11.5	9.4
17.4	14.8	13.6	11.4	9.2
18.6	16.0	13.7	11.4	9.2
18.3	15.3	14.0	11.6	9.5
17.1	14.3	13.3	11.3	9.2
17.4	14.5	13.3	11.4	9.3
20.4	16.1	14.5	12.0	9.5
34.2	28.7	23.5	19.2	13.9
26.3	20.9	16.7	12.8	9.8
35.3	30.3	26.2	20.3	13.9
24.9	22.1	19.9	15.6	11.8
20.4	16.2	14.1	11.8	9.5
20.0	15.7	13.9	11.6	9.3
20.2	15.9	14.2	11.7	9.4
20.2	15.8	14.2	11.8	9.4
19.3	16.0	14.1	11.6	9.4
18.4	15.3	13.8	11.5	9.3
17.3	15.0	14.1	11.7	9.3
17.6	15.2	14.1	11.7	9.4
18.3	15.4	14.0	11.8	9.4
18.9	16.2	14.7	12.2	9.9

18.9	16.2	14.7	12.3	9.9
31.2	27.2	23.1	18.9	13.8
30.5	25.3	21.1	16.9	12.5
21.2	17.7	15.9	13.2	10.7
19.2	15.9	14.5	12.1	9.9
19.8	16.1	14.4	11.9	9.6
24.2	18.1	14.6	12.0	9.7
24.2	17.7	14.8	12.1	9.7
24.0	17.8	14.9	12.3	9.8
24.2	17.6	14.7	12.2	9.8
23.1	17.1	14.6	12.2	9.8
23.3	17.3	14.4	11.9	9.5
27.1	19.0	14.4	11.6	9.5
28.8	20.1	14.4	11.6	9.4
27.2	19.0	14.2	11.7	9.4
27.8	19.5	14.5	11.8	9.4
27.1	21.9	17.0	13.5	10.7
24.7	17.3	14.1	11.6	9.4
24.9	17.4	14.1	11.5	9.3
22.6	16.2	13.8	11.6	9.4
27.0	18.2	13.9	11.5	9.3
25.8	17.9	13.9	11.5	9.4
19.8	16.1	14.5	12.2	9.8
18.2	15.4	14.3	12.0	9.7
17.8	14.9	14.0	11.8	9.5
18.3	14.9	13.7	11.5	9.3
18.2	15.1	13.6	11.5	9.2
19.3	15.8	13.7	11.5	9.1
19.4	15.8	13.8	11.6	9.3
22.1	18.4	16.0	13.3	10.8
19.7	16.0	14.6	12.2	9.8
19.5	16.1	14.6	12.1	9.7
19.2	16.0	14.2	11.9	9.5
18.7	15.4	14.1	11.7	9.4
22.4	18.5	15.5	12.3	9.7
20.6	16.7	13.9	11.5	9.3
19.7	15.7	13.9	11.7	9.7
20.0	15.7	13.9	11.6	9.4
19.5	15.4	13.9	11.6	9.3
19.5	15.4	13.9	11.5	9.3
19.2	15.5	13.8	11.6	9.3
24.1	19.6	16.2	12.4	9.8
20.7	15.5	14.0	11.6	9.4
19.0	14.9	13.6	11.5	9.2
19.8	15.0	13.6	11.4	9.3
19.9	16.0	14.4	11.7	9.5
22.4	19.1	16.9	13.6	10.4
20.2	15.4	14.0	11.7	9.4

18.3	14.9	13.7	11.5	9.3
18.3	14.7	13.6	11.4	9.2
18.9	15.3	14.0	11.7	9.3
19.0	15.7	14.3	11.8	9.4
19.4	16.0	14.4	11.9	9.6
21.4	17.5	15.3	12.6	10.2
34.4	28.3	23.5	18.5	14.1
29.2	25.0	19.3	14.7	11.0
28.8	24.6	20.0	15.8	12.1
22.4	17.6	15.1	12.5	9.9
21.8	17.4	15.0	12.5	10.0
22.9	16.8	14.5	12.0	9.6
22.3	16.6	14.2	11.7	9.4
20.2	16.0	14.4	11.8	9.3
20.6	16.1	14.6	11.8	9.3
23.0	18.9	16.3	13.0	10.2
19.0	15.4	14.0	11.5	9.4
30.2	25.9	22.0	17.3	12.6
33.3	29.3	26.5	21.5	15.2
30.1	26.1	22.3	17.1	12.1
31.7	27.2	22.3	16.1	10.8
22.7	18.7	16.0	13.0	10.3
20.9	16.7	14.4	11.7	9.4
20.0	15.4	13.8	11.4	9.2
20.2	15.9	14.0	11.6	9.3
30.2	25.0	21.9	16.4	10.6

1/3 LASmin 20000	LAIeq-LAeq	OVLD	OBA OVLD	Marker
9.0	0.7	No	No	
9.1	8.3	No	No	
9.0	1.7	No	No	
9.3	-0.2	No	No	
9.1	1.7	No	No	
9.2	0.6	No	No	
9.3	0.5	No	No	
9.4	0.5	No	No	
9.2	8.8	No	No	
9.2	6.6	No	No	
9.3	-0.1	No	No	
9.7	0.0	No	No	
10.0	4.2	No	No	
9.6	3.7	No	No	
9.4	3.2	No	No	
9.3	1.1	No	No	
9.2	0.9	No	No	
9.5	0.7	No	No	
9.3	0.7	No	No	
9.4	5.8	No	No	
9.6	4.0	No	No	
9.6	7.6	No	No	
9.3	0.4	No	No	
9.3	2.0	No	No	
9.7	9.3	No	No	
9.3	1.2	No	No	
9.3	0.2	No	No	
9.3	0.3	No	No	
9.4	0.4	No	No	
9.3	0.7	No	No	
9.5	0.7	No	No	
9.5	0.1	No	No	
10.6	5.4	No	No	
9.5	1.6	No	No	
10.5	0.3	No	No	
10.0	0.5	No	No	
9.5	0.8	No	No	
9.4	0.7	No	No	
9.4	0.7	No	No	
9.4	11.1	No	No	
9.4	6.1	No	No	
9.3	0.8	No	No	
9.4	0.5	No	No	
9.4	0.1	No	No	
9.3	0.0	No	No	
9.6	-0.2	No	No	

9.6	0.3	No	No
10.4	0.3	No	No
10.1	2.0	No	No
9.8	0.9	No	No
9.6	1.1	No	No
9.4	0.3	No	No
9.4	0.2	No	No
9.6	0.1	No	No
9.5	1.9	No	No
9.5	0.4	No	No
9.5	0.3	No	No
9.3	0.9	No	No
9.4	1.6	No	No
9.4	2.6	No	No
9.4	0.1	No	No
9.3	0.3	No	No
9.5	0.0	No	No
9.3	0.1	No	No
9.3	1.0	No	No
9.4	0.4	No	No
9.5	2.8	No	No
9.6	0.7	No	No
9.7	0.6	No	No
9.8	0.8	No	No
9.6	0.3	No	No
9.4	-0.1	No	No
9.4	0.8	No	No
9.4	0.5	No	No
9.5	2.0	No	No
10.1	0.7	No	No
9.7	0.0	No	No
9.5	0.1	No	No
9.4	0.7	No	No
9.4	0.5	No	No
9.3	0.6	No	No
9.3	0.9	No	No
9.4	0.3	No	No
9.5	0.3	No	No
9.3	1.2	No	No
9.4	4.1	No	No
9.5	1.8	No	No
9.6	10.3	No	No
9.5	0.4	No	No
9.5	0.6	No	No
9.5	0.8	No	No
9.7	6.9	No	No
10.0	9.3	No	No
9.6	0.7	No	No

9.5	1.0	No	No
9.5	1.7	No	No
9.4	1.2	No	No
9.4	1.2	No	No
9.6	0.3	No	No
9.9	0.4	No	No
10.9	0.2	No	No
9.8	0.3	No	No
9.9	3.1	No	No
9.6	1.7	No	No
9.6	0.5	No	No
9.3	0.5	No	No
9.3	0.8	No	No
9.3	0.6	No	No
9.4	0.5	No	No
9.6	0.6	No	No
9.2	5.8	No	No
9.7	0.2	No	No
10.1	0.5	No	No
9.7	3.0	No	No
9.5	6.3	No	No
9.6	1.9	No	No
9.4	2.6	No	No
9.3	0.1	No	No
9.3	0.3	No	No
9.7	-0.3	No	No

Summary

File Name on Meter	EF_HS.054
File Name on PC	SLM_0003788_EF_HS_054.00.ldbin
Serial Number	0003788
Model	SoundExpert® LxT
Firmware Version	2.301
User	
Location	
Job Description	
Note	

Measurement

Description	EF Academy Project
Start	2017-06-27 17:15:33
Stop	2017-06-27 17:25:33
Duration	00:10:00.0
Run Time	00:10:00.0
Pause	00:00:00.0
Pre Calibration	2017-06-27 16:21:22
Post Calibration	None
Calibration Deviation	---

Overall Settings

RMS Weight	A Weighting	
Peak Weight	A Weighting	
Detector	Slow	
Preamp	PRMLxT1L	
Microphone Correction	Off	
Integration Method	Exponential	
OBA Range	Normal	
OBA Bandwidth	1/1 and 1/3	
OBA Freq. Weighting	A Weighting	
OBA Max Spectrum	At LMax	
Overload	120.3 dB	
	A	**C**
Under Range Peak	**76.6**	73.6
Under Range Limit	**25.3**	24.8
Noise Floor	15.9	15.7

Results

LASeq	70.6 dB	
LASE	98.4 dB	
EAS	760.604 µPa²h	
LASpeak (max)	2017-06-27 17:16:30	103.2
LASmax	2017-06-27 17:16:30	85.7
LASmin	2017-06-27 17:21:28	54.5
SEA	-99.9 dB	

LAS > 85.0 dB (Exceedance Counts / Duration)	1	1.5
LAS > 115.0 dB (Exceedance Counts / Duration)	0	0.0
LASpeak > 135.0 dB (Exceedance Counts / Duration)	0	0.0
LASpeak > 137.0 dB (Exceedance Counts / Duration)	0	0.0
LASpeak > 140.0 dB (Exceedance Counts / Duration)	0	0.0

Community Noise	**Ldn**	**LDay 07:00-23:00**
	70.6	70.6

LCSeq	79.7	dB
LASeq	70.6	dB
LCSeq - LASeq	9.1	dB
LAIeq	72.3	dB
LAeq	70.6	dB
LAIeq - LAeq	1.7	dB

	A	
	dB	**Time Stamp**
Leq	70.6	
LS(max)	85.7	2017/06/27 17:16:30
LS(min)	54.5	2017/06/27 17:21:28
LPeak(max)	103.2	2017/06/27 17:16:30

# Overloads	0	
Overload Duration	0.0	s
# OBA Overloads	0	
OBA Overload Duration	0.0	s

Statistics

LAS5.00	76.6	dB
LAS10.00	74.5	dB
LAS33.30	68.7	dB
LAS50.00	66.4	dB
LAS66.60	62.4	dB
LAS90.00	58.8	dB

Calibration History

Preamp	**Date**	**dB re. 1V/Pa**
Direct	2017-01-03 10:54:35	-27.0
Direct	2017-01-03 10:30:13	-26.0
Direct	2014-07-01 09:45:44	-27.0
PRMLxT1L	2017-06-27 16:21:22	-26.6
PRMLxT1L	2017-06-26 11:13:28	-26.6
PRMLxT1L	2017-06-20 10:09:05	-26.6
PRMLxT1L	2017-06-12 12:50:10	-26.6
PRMLxT1L	2017-06-06 15:05:30	-26.6
PRMLxT1L	2017-05-05 15:45:44	-26.6

PRMLxT1L	2017-04-29 09:09:14	-26.6
PRMLxT1L	2017-04-21 11:23:22	-26.5
PRMLxT1L	2017-03-31 13:13:53	-26.6
PRMLxT1L	2017-03-14 08:18:51	-26.6
PRMLxT1L	2017-03-10 10:18:04	-26.5

Z
78.6 dB
31.3 dB
21.4 dB

dB
dB
dB

s
s
s
s
s

LNight 23:00-07:00	Lden	LDay 07:00-19:00	LEvening 19:00-23:00	LNight 23:00-07:00
-99.9	70.6	70.6	-99.9	-99.9

C		Z	
dB	Time Stamp	dB	Time Stamp

6.3	**8.0**	**10.0**	**12.5**
2.5	1.9	3.3	7.7
61.7	59.8	59.2	54.2
64.6	55.5	59.0	60.8
61.3	59.9	62.9	60.0
61.9	63.5	53.7	67.2
48.3	50.2	49.4	58.8
48.5	42.2	44.8	43.0
51.3	59.2	56.0	47.6

39.5	40.2	49.9	42.2
37.9	45.8	40.7	31.9
48.6	50.1	57.0	56.7
42.4	46.2	50.2	47.7
39.5	42.0	44.7	43.1

dB

16.0	**20.0**	**25.0**	**31.5**	**40.0**	**50.0**	**63.0**	**80.0**	**100**	**125**	**160**	**200**	**250**	**315**	**400**	**500**
-1.0	2.3	0.5	3.1	2.3	0.9	2.9	4.5	6.7	17.0	7.3	3.9	12.5	9.3	7.1	3.6
61.0	44.5	36.3	44.2	35.5	41.3	42.1	33.4	39.3	37.9	29.0	27.5	26.0	24.1	19.7	20.0
56.7	50.3	53.1	46.7	42.7	47.4	40.0	41.2	44.2	46.7	45.4	44.6	39.9	34.1	34.7	33.9
65.2	53.8	52.2	50.6	50.7	52.6	45.8	44.1	41.8	44.0	42.5	41.5	38.5	35.7	32.7	29.0
67.9	53.0	49.2	51.6	57.3	49.4	45.7	39.6	47.2	42.3	41.2	46.7	48.5	50.6	52.0	52.6
56.7	47.6	39.9	34.8	38.1	45.6	39.2	37.3	40.3	35.3	35.2	42.1	40.0	45.1	45.4	46.2
58.8	54.4	33.4	42.3	46.2	55.6	46.5	32.9	42.4	39.2	36.9	40.1	40.7	33.7	38.1	29.8
45.2	40.7	49.8	45.0	52.4	46.9	41.8	43.5	35.1	39.5	37.8	37.0	35.6	32.8	30.4	25.8

45.9	36.9	38.3	43.8	40.7	37.6	37.8	33.8	31.5	32.4	25.3	25.4	27.3	21.4	22.2	16.4
36.8	39.9	42.4	45.7	48.9	45.8	39.0	52.1	54.6	47.0	39.7	35.5	37.4	33.6	27.9	20.6
53.2	49.6	43.0	43.6	51.3	49.2	46.0	36.2	40.9	37.3	40.1	37.5	41.7	38.4	36.1	31.9
43.3	32.8	41.8	42.5	43.5	40.8	40.8	37.3	31.2	30.3	22.9	15.8	17.3	15.7	15.4	15.3
44.6	36.6	31.4	30.2	38.4	45.3	53.3	44.1	43.4	43.7	42.7	49.0	55.1	45.6	51.4	53.3

630	800	1000	1250	1600	2000	2500	3150	4000	5000	6300	8000	10000	12500
8.0	9.0	7.3	10.0	9.2	9.8	11.6	12.5	13.2	40.2	17.7	16.3	18.1	20.4
17.4	28.0	113.0	48.1	19.6	62.7	18.7	56.6	25.5	27.7	20.7	22.0	23.6	25.3
21.4	29.3	114.0	49.1	19.8	66.0	18.7	57.5	29.4	28.0	21.3	22.9	24.6	26.4
17.4	28.6	114.0	49.1	19.1	65.8	18.9	57.4	29.4	27.8	21.7	22.9	24.2	26.2
43.9	30.1	114.0	49.1	20.9	65.8	19.0	57.4	29.5	27.9	21.5	22.7	24.6	26.3
32.4	30.2	114.0	49.2	19.3	65.9	19.4	57.4	29.6	28.0	21.5	22.9	24.4	26.2
22.0	28.8	114.0	49.1	19.1	66.0	19.0	57.5	29.5	27.8	21.4	22.7	24.5	26.4
20.4	28.5	113.9	49.0	19.0	66.0	19.2	57.4	29.7	27.7	21.7	22.8	24.6	26.3

16.8	28.8	113.9	49.0	18.9	65.7	19.4	57.2	29.4	27.9	21.1	22.5	24.3	26.0
18.1	28.8	114.1	49.2	19.2	65.9	19.0	56.7	28.8	27.3	21.5	23.0	24.6	26.4
20.9	28.6	114.0	49.1	19.4	65.9	19.3	57.5	29.5	27.9	21.5	22.6	24.3	26.5
18.2	29.5	113.9	49.1	19.3	65.7	19.4	57.2	29.6	28.1	21.7	22.8	24.3	26.0
45.3	30.8	114.1	49.2	21.1	66.1	19.5	57.6	29.8	28.3	21.9	22.9	24.6	26.3

16000	20000
20.2	21.5
28.1	30.6
28.8	31.4
28.8	31.5
28.9	31.5
28.8	31.9
28.8	31.6
28.7	31.2

28.7	31.2
28.9	31.6
28.7	31.3
28.7	31.3
28.8	31.6

1/1 Octave

Frequency (Hz)	8.0	16.0	31.5	63.0	125	250	500	1000	2000	4000	8000	16000
Overall 1/1 Spectra	7.7	19.6	32.9	48.4	61.1	62.5	63.8	66.5	59.9	53.9	50.2	30.8
Max 1/1 Spectra	5.9	20.5	48.2	64.7	79.3	80.9	80.4	76.6	67.7	66.2	50.1	31.4
Min 1/1 Spectra	5.9	4.2	22.9	33.6	39.5	44.9	46.6	51.5	45.8	38.7	27.8	15.9

1/3 Octave

Frequency (Hz)	6.3	8.0	10.0	12.5	16.0	20.0	25.0	31.5	40.0	50.0	63.0	80.0
Overall 1/3 Spectra	1.9	2.0	4.8	9.3	13.5	17.9	22.4	26.4	31.2	36.8	40.3	47.3
Max 1/3 Spectra	1.9	0.9	0.3	-0.1	6.5	19.9	22.0	35.3	47.9	44.3	55.2	64.4
Min 1/3 Spectra	1.9	0.9	0.3	-0.8	-1.6	2.3	11.8	15.1	19.9	23.5	28.8	28.9

1/1 OBA Ref. Spectra

Frequency (Hz)	8.0	16.0	31.5	63.0	125	250	500	1000	2000	4000	8000	16000
1	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
2	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
3	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
4	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

1/3 OBA Ref. Spectra

Frequency (Hz)	6.3	8.0	10.0	12.5	16.0	20.0	25.0	31.5	40.0	50.0	63.0	80.0
1	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
2	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
3	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
4	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

1/1 OBA Under Range

Frequency (Hz)	8.0	16.0	31.5	63.0	125	250	500	1000	2000	4000	8000	16000
Under Range Limit	20.3	17.6	15.7	13.9	12.3	13.0	14.3	16.5	19.1	22.3	24.9	28.1
Noise Floor	15.9	13.2	11.1	9.2	7.6	7.4	8.6	10.6	13.0	16.0	18.7	21.7

1/3 OBA Under Range

Frequency (Hz)	6.3	8.0	10.0	12.5	16.0	20.0	25.0	31.5	40.0	50.0	63.0	80.0
Under Range Limit	21.9	20.9	20.3	19.2	18.4	17.6	16.9	16.3	15.7	14.9	14.5	13.9
Noise Floor	11.9	10.9	10.3	9.2	8.4	7.6	6.9	6.3	5.7	4.9	4.5	3.9

100	125	160	200	250	315	400	500	630	800	1000	1250	1600	2000	2500	3150
50.8	57.3	58.1	56.6	58.2	58.4	56.9	59.4	60.2	62.0	62.9	59.8	57.0	54.6	52.8	50.7
61.5	65.6	79.2	72.8	76.1	78.7	73.7	75.7	76.2	74.7	71.3	68.8	64.5	61.6	62.3	61.8
32.3	34.2	35.9	37.2	41.5	39.3	40.2	41.2	43.3	46.5	47.2	45.5	43.1	40.5	38.1	36.0

100	125	160	200	250	315	400	500	630	800	1000	1250	1600	2000	2500	3150
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

100	125	160	200	250	315	400	500	630	800	1000	1250	1600	2000	2500	3150
13.3	12.7	12.3	12.4	12.5	13.0	13.4	13.8	14.3	15.1	15.7	16.5	17.3	18.2	19.1	20.1
3.3	2.7	2.3	2.4	2.5	3.0	3.4	3.8	4.3	5.1	5.7	6.5	7.3	8.2	9.1	10.1

4000	5000	6300	8000	10000	12500	16000	20000
47.7	48.3	50.3	37.8	33.7	28.8	23.9	21.2
63.5	57.8	48.5	43.7	35.9	30.2	23.7	17.1
33.6	30.2	26.3	20.6	16.5	12.7	9.8	9.3

4000	5000	6300	8000	10000	12500	16000	20000
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

4000	5000	6300	8000	10000	12500	16000	20000
21.0	22.3	22.8	23.8	24.9	25.8	26.7	28.1
11.0	12.3	12.8	13.8	14.9	15.8	16.7	18.1

Record #	Date	Time	Record Type	Cause	#	TH Record	Sound Record
1	2017-06-27	17:15:33	Run	Key	1	1	
2	2017-06-27	17:25:33	Stop	Timer	1	122	

Statistics		
Level (dB)	**Count**	**Percent**
Under	0	0.00
54.5	1	0.00
54.6	65	0.11
54.7	104	0.17
54.8	27	0.04
54.9	35	0.06
55.0	37	0.06
55.1	67	0.11
55.2	79	0.13
55.3	57	0.09
55.4	38	0.06
55.5	31	0.05
55.6	101	0.17
55.7	54	0.09
55.8	69	0.12
55.9	98	0.16
56.0	73	0.12
56.1	42	0.07
56.2	111	0.19
56.3	60	0.10
56.4	84	0.14
56.5	60	0.10
56.6	100	0.17
56.7	82	0.14
56.8	91	0.15
56.9	86	0.14
57.0	135	0.22
57.1	168	0.28
57.2	97	0.16
57.3	66	0.11
57.4	57	0.09
57.5	139	0.23
57.6	231	0.38
57.7	180	0.30
57.8	166	0.28
57.9	295	0.49
58.0	310	0.52
58.1	373	0.62
58.2	248	0.41
58.3	365	0.61
58.4	409	0.68
58.5	278	0.46
58.6	406	0.68
58.7	357	0.60
58.8	353	0.59
58.9	449	0.75

59.0	338	0.56
59.1	272	0.45
59.2	321	0.54
59.3	299	0.50
59.4	517	0.86
59.5	552	0.92
59.6	448	0.75
59.7	456	0.76
59.8	436	0.73
59.9	440	0.73
60.0	408	0.68
60.1	418	0.70
60.2	346	0.58
60.3	317	0.53
60.4	391	0.65
60.5	336	0.56
60.6	395	0.66
60.7	429	0.71
60.8	467	0.78
60.9	447	0.75
61.0	363	0.61
61.1	343	0.57
61.2	410	0.68
61.3	388	0.65
61.4	314	0.52
61.5	343	0.57
61.6	373	0.62
61.7	360	0.60
61.8	385	0.64
61.9	345	0.57
62.0	282	0.47
62.1	316	0.53
62.2	332	0.55
62.3	479	0.80
62.4	330	0.55
62.5	323	0.54
62.6	298	0.50
62.7	280	0.47
62.8	273	0.46
62.9	206	0.34
63.0	282	0.47
63.1	243	0.41
63.2	229	0.38
63.3	220	0.37
63.4	198	0.33
63.5	179	0.30
63.6	206	0.34
63.7	235	0.39

63.8	214	0.36
63.9	255	0.43
64.0	201	0.33
64.1	232	0.39
64.2	342	0.57
64.3	191	0.32
64.4	232	0.39
64.5	248	0.41
64.6	395	0.66
64.7	195	0.33
64.8	214	0.36
64.9	178	0.30
65.0	205	0.34
65.1	251	0.42
65.2	219	0.37
65.3	218	0.36
65.4	207	0.34
65.5	262	0.44
65.6	286	0.48
65.7	257	0.43
65.8	310	0.52
65.9	268	0.45
66.0	359	0.60
66.1	328	0.55
66.2	255	0.43
66.3	327	0.55
66.4	319	0.53
66.5	491	0.82
66.6	321	0.54
66.7	253	0.42
66.8	381	0.63
66.9	418	0.70
67.0	409	0.68
67.1	430	0.72
67.2	414	0.69
67.3	388	0.65
67.4	559	0.93
67.5	421	0.70
67.6	317	0.53
67.7	455	0.76
67.8	421	0.70
67.9	592	0.99
68.0	571	0.95
68.1	427	0.71
68.2	536	0.89
68.3	596	0.99
68.4	502	0.84
68.5	440	0.73

68.6	401	0.67
68.7	538	0.90
68.8	468	0.78
68.9	435	0.72
69.0	223	0.37
69.1	211	0.35
69.2	216	0.36
69.3	275	0.46
69.4	368	0.61
69.5	209	0.35
69.6	229	0.38
69.7	280	0.47
69.8	233	0.39
69.9	190	0.32
70.0	277	0.46
70.1	270	0.45
70.2	179	0.30
70.3	173	0.29
70.4	208	0.35
70.5	174	0.29
70.6	205	0.34
70.7	158	0.26
70.8	162	0.27
70.9	164	0.27
71.0	217	0.36
71.1	172	0.29
71.2	152	0.25
71.3	196	0.33
71.4	205	0.34
71.5	212	0.35
71.6	255	0.43
71.7	255	0.43
71.8	268	0.45
71.9	320	0.53
72.0	280	0.47
72.1	379	0.63
72.2	420	0.70
72.3	378	0.63
72.4	237	0.39
72.5	225	0.38
72.6	197	0.33
72.7	197	0.33
72.8	204	0.34
72.9	322	0.54
73.0	279	0.47
73.1	227	0.38
73.2	322	0.54
73.3	229	0.38

73.4	210	0.35
73.5	171	0.28
73.6	194	0.32
73.7	214	0.36
73.8	277	0.46
73.9	180	0.30
74.0	160	0.27
74.1	123	0.20
74.2	154	0.26
74.3	166	0.28
74.4	134	0.22
74.5	132	0.22
74.6	149	0.25
74.7	136	0.23
74.8	149	0.25
74.9	148	0.25
75.0	175	0.29
75.1	216	0.36
75.2	204	0.34
75.3	207	0.34
75.4	142	0.24
75.5	128	0.21
75.6	127	0.21
75.7	137	0.23
75.8	144	0.24
75.9	116	0.19
76.0	105	0.18
76.1	115	0.19
76.2	129	0.22
76.3	101	0.17
76.4	109	0.18
76.5	118	0.20
76.6	117	0.19
76.7	113	0.19
76.8	132	0.22
76.9	171	0.28
77.0	109	0.18
77.1	83	0.14
77.2	94	0.16
77.3	110	0.18
77.4	93	0.16
77.5	104	0.17
77.6	62	0.10
77.7	100	0.17
77.8	79	0.13
77.9	88	0.15
78.0	64	0.11
78.1	86	0.14

78.2	38	0.06
78.3	34	0.06
78.4	56	0.09
78.5	53	0.09
78.6	56	0.09
78.7	43	0.07
78.8	46	0.08
78.9	70	0.12
79.0	56	0.09
79.1	52	0.09
79.2	37	0.06
79.3	19	0.03
79.4	20	0.03
79.5	20	0.03
79.6	20	0.03
79.7	18	0.03
79.8	18	0.03
79.9	19	0.03
80.0	15	0.03
80.1	18	0.03
80.2	16	0.03
80.3	19	0.03
80.4	17	0.03
80.5	17	0.03
80.6	19	0.03
80.7	17	0.03
80.8	21	0.04
80.9	18	0.03
81.0	20	0.03
81.1	22	0.04
81.2	25	0.04
81.3	25	0.04
81.4	31	0.05
81.5	46	0.08
81.6	42	0.07
81.7	26	0.04
81.8	46	0.08
81.9	12	0.02
82.0	12	0.02
82.1	20	0.03
82.2	19	0.03
82.3	15	0.03
82.4	22	0.04
82.5	4	0.01
82.6	4	0.01
82.7	5	0.01
82.8	4	0.01
82.9	4	0.01

83.0	4	0.01
83.1	4	0.01
83.2	4	0.01
83.3	4	0.01
83.4	5	0.01
83.5	3	0.00
83.6	4	0.01
83.7	5	0.01
83.8	2	0.00
83.9	6	0.01
84.0	3	0.00
84.1	5	0.01
84.2	3	0.00
84.3	5	0.01
84.4	4	0.01
84.5	5	0.01
84.6	5	0.01
84.7	4	0.01
84.8	5	0.01
84.9	4	0.01
85.0	6	0.01
85.1	6	0.01
85.2	7	0.01
85.3	8	0.01
85.4	9	0.02
85.5	14	0.02
85.6	17	0.03
85.7	12	0.02
Over	0	0.00
Total Count	60000	

Record #	Date	Time	Run Duration	Run Time	Pause	LASeq	LASE	LASmin
1	2017-06-27	17:15:33	00:10:00.0	00:10:00.0	00:00:00.0	70.6	98.4	54.5

LASmin Time	LASmax	LASmax Time	LApeak (max)	LApeak (max) Time	SPL 1 Count
17:21:28	85.7	17:16:30	103.2	17:16:30	1

SPL 1 Duration	SPL 2 Count	SPL 2 Duration	Peak 1 Count	Peak 1 Duration	Peak 2 Count
1.5	0	0.0	0	0.0	0

Peak 2 Duration	Peak 3 Count	Peak 3 Duration	LAS5.00	LAS10.00	LAS33.30	LAS50.00
0.0	0	0.0	76.6	74.5	68.7	66.4

LAS66.60	LAS90.00	SEA	LCSeq	LASeq	LCSeq - LASeq	LAIeq	LAeq	LAIeq - LAeq
62.4	58.8	-99.9	79.7	70.6	9.1	72.3	70.6	1.7

# Overloads	Overloads Duration	# OBA Overloads	OBA Overloads Duration	1/1 LASeq 8.0
0	0.0	0	0.0	7.7

1/1 LASeq 16.0	1/1 LASeq 31.5	1/1 LASeq 63.0	1/1 LASeq 125	1/1 LASeq 250	1/1 LASeq 500
19.6	32.9	48.4	61.1	62.5	63.8

1/1 LASeq 1000	1/1 LASeq 2000	1/1 LASeq 4000	1/1 LASeq 8000	1/1 LASeq 16000
66.5	59.9	53.9	50.2	30.8

1/1 LASmax 8.0	1/1 LASmax 16.0	1/1 LASmax 31.5	1/1 LASmax 63.0	1/1 LASmax 125
5.9	20.5	48.2	64.7	79.3

1/1 LASmax 250	1/1 LASmax 500	1/1 LASmax 1000	1/1 LASmax 2000	1/1 LASmax 4000
80.9	80.4	76.6	67.7	66.2

1/1 LASmax 8000	1/1 LASmax 16000	1/1 LASmin 8.0	1/1 LASmin 16.0	1/1 LASmin 31.5
50.1	31.4	5.9	4.2	22.9

1/1 LASmin 63.0	1/1 LASmin 125	1/1 LASmin 250	1/1 LASmin 500	1/1 LASmin 1000
33.6	39.5	44.9	46.6	51.5

1/1 LASmin 2000	1/1 LASmin 4000	1/1 LASmin 8000	1/1 LASmin 16000	1/3 LASeq 6.3
45.8	38.7	27.8	15.9	1.9

1/3 LASeq 8.0	1/3 LASeq 10.0	1/3 LASeq 12.5	1/3 LASeq 16.0	1/3 LASeq 20.0	1/3 LASeq 25.0
2.0	4.8	9.3	13.5	17.9	22.4

1/3 LASeq 31.5	1/3 LASeq 40.0	1/3 LASeq 50.0	1/3 LASeq 63.0	1/3 LASeq 80.0	1/3 LASeq 100
26.4	31.2	36.8	40.3	47.3	50.8

1/3 LASeq 125	1/3 LASeq 160	1/3 LASeq 200	1/3 LASeq 250	1/3 LASeq 315	1/3 LASeq 400
57.3	58.1	56.6	58.2	58.4	56.9

1/3 LASeq 500	1/3 LASeq 630	1/3 LASeq 800	1/3 LASeq 1000	1/3 LASeq 1250	1/3 LASeq 1600
59.4	60.2	62.0	62.9	59.8	57.0

1/3 LASeq 2000	1/3 LASeq 2500	1/3 LASeq 3150	1/3 LASeq 4000	1/3 LASeq 5000
54.6	52.8	50.7	47.7	48.3

1/3 LASeq 6300	1/3 LASeq 8000	1/3 LASeq 10000	1/3 LASeq 12500	1/3 LASeq 16000
50.3	37.8	33.7	28.8	23.9

1/3 LASeq 20000	1/3 LASmax 6.3	1/3 LASmax 8.0	1/3 LASmax 10.0	1/3 LASmax 12.5
21.2	1.9	0.9	0.3	-0.1

1/3 LASmax 16.0	1/3 LASmax 20.0	1/3 LASmax 25.0	1/3 LASmax 31.5	1/3 LASmax 40.0
6.5	19.9	22.0	35.3	47.9

1/3 LASmax 50.0	1/3 LASmax 63.0	1/3 LASmax 80.0	1/3 LASmax 100	1/3 LASmax 125
44.3	55.2	64.4	61.5	65.6

1/3 LASmax 160	1/3 LASmax 200	1/3 LASmax 250	1/3 LASmax 315	1/3 LASmax 400
79.2	72.8	76.1	78.7	73.7

1/3 LASmax 500	1/3 LASmax 630	1/3 LASmax 800	1/3 LASmax 1000	1/3 LASmax 1250
75.7	76.2	74.7	71.3	68.8

1/3 LASmax 1600	1/3 LASmax 2000	1/3 LASmax 2500	1/3 LASmax 3150	1/3 LASmax 4000
64.5	61.6	62.3	61.8	63.5

1/3 LASmax 5000	1/3 LASmax 6300	1/3 LASmax 8000	1/3 LASmax 10000	1/3 LASmax 12500
57.8	48.5	43.7	35.9	30.2

1/3 LASmax 16000	1/3 LASmax 20000	1/3 LASmin 6.3	1/3 LASmin 8.0	1/3 LASmin 10.0
23.7	17.1	1.9	0.9	0.3

1/3 LASmin 12.5	1/3 LASmin 16.0	1/3 LASmin 20.0	1/3 LASmin 25.0	1/3 LASmin 31.5
-0.8	-1.6	2.3	11.8	15.1

1/3 LASmin 40.0	1/3 LASmin 50.0	1/3 LASmin 63.0	1/3 LASmin 80.0	1/3 LASmin 100
19.9	23.5	28.8	28.9	32.3

1/3 LASmin 125	1/3 LASmin 160	1/3 LASmin 200	1/3 LASmin 250	1/3 LASmin 315
34.2	35.9	37.2	41.5	39.3

1/3 LASmin 400	1/3 LASmin 500	1/3 LASmin 630	1/3 LASmin 800	1/3 LASmin 1000
40.2	41.2	43.3	46.5	47.2

1/3 LASmin 1250	1/3 LASmin 1600	1/3 LASmin 2000	1/3 LASmin 2500	1/3 LASmin 3150
45.5	43.1	40.5	38.1	36.0

1/3 LASmin 4000	1/3 LASmin 5000	1/3 LASmin 6300	1/3 LASmin 8000	1/3 LASmin 10000
33.6	30.2	26.3	20.6	16.5

1/3 LASmin 12500	1/3 LASmin 16000	1/3 LASmin 20000
12.7	9.8	9.3

Record #	Record Type	Date	Time	LASeq	LApeak	LASmax	LASmin	Battery
1	Run	2017-06-27	17:15:33					
2		2017-06-27	17:15:33	60.7	75.2	61.6	58.8	4.9
3		2017-06-27	17:15:38	58.2	74.1	59.2	56.9	4.9
4		2017-06-27	17:15:43	58.7	72.7	60.2	57.1	4.9
5		2017-06-27	17:15:48	62.6	82.4	64.8	57.6	4.9
6		2017-06-27	17:15:53	62.3	76.0	64.6	58.8	4.9
7		2017-06-27	17:15:58	58.0	71.5	58.7	57.6	4.9
8		2017-06-27	17:16:03	60.9	79.8	62.9	58.1	4.9
9		2017-06-27	17:16:08	59.3	73.4	62.2	56.5	4.9
10		2017-06-27	17:16:13	67.4	84.8	72.6	57.0	4.9
11		2017-06-27	17:16:18	79.9	95.6	81.8	72.6	4.9
12		2017-06-27	17:16:23	75.9	88.7	78.3	74.9	4.9
13		2017-06-27	17:16:28	82.0	103.2	85.7	75.8	4.9
14		2017-06-27	17:16:33	72.1	81.7	77.4	67.6	4.9
15		2017-06-27	17:16:38	63.9	77.2	67.6	60.6	4.9
16		2017-06-27	17:16:43	62.2	78.6	62.7	61.3	4.9
17		2017-06-27	17:16:48	61.3	76.0	63.0	60.7	4.9
18		2017-06-27	17:16:53	70.1	86.2	72.9	62.9	4.9
19		2017-06-27	17:16:58	66.2	76.5	71.2	62.9	4.9
20		2017-06-27	17:17:03	63.4	77.8	64.2	62.6	4.9
21		2017-06-27	17:17:08	64.1	76.5	64.7	62.5	4.9
22		2017-06-27	17:17:13	61.4	78.4	64.5	59.6	4.9
23		2017-06-27	17:17:18	70.6	84.4	72.2	64.5	4.9
24		2017-06-27	17:17:23	71.8	87.6	73.6	70.9	4.9
25		2017-06-27	17:17:28	73.6	91.0	76.3	67.9	4.9
26		2017-06-27	17:17:33	63.6	76.0	67.8	59.5	4.9
27		2017-06-27	17:17:38	58.9	74.3	59.9	58.1	4.9
28		2017-06-27	17:17:43	59.4	72.3	59.9	58.9	4.9
29		2017-06-27	17:17:48	63.9	80.7	66.5	59.1	4.9
30		2017-06-27	17:17:53	67.5	81.7	68.8	64.8	4.9
31		2017-06-27	17:17:58	68.3	83.1	69.8	67.1	4.9
32		2017-06-27	17:18:03	67.5	81.2	69.8	63.6	4.9
33		2017-06-27	17:18:08	60.7	73.4	63.6	59.3	4.9
34		2017-06-27	17:18:13	75.2	93.9	78.2	59.9	4.9
35		2017-06-27	17:18:18	67.9	81.6	73.2	60.5	4.9
36		2017-06-27	17:18:23	58.9	71.0	60.5	58.1	4.9
37		2017-06-27	17:18:28	60.0	76.3	61.0	58.7	4.9
38		2017-06-27	17:18:33	58.8	72.2	59.7	58.0	4.9
39		2017-06-27	17:18:38	61.2	80.1	65.9	58.3	4.9
40		2017-06-27	17:18:43	65.2	77.9	66.7	63.2	4.9
41		2017-06-27	17:18:48	60.9	74.0	63.2	59.4	4.9
42		2017-06-27	17:18:53	61.8	77.4	63.9	60.2	4.9
43		2017-06-27	17:18:58	61.9	75.6	63.8	58.9	4.9
44		2017-06-27	17:19:03	58.0	72.3	59.6	57.5	4.9
45		2017-06-27	17:19:08	74.1	92.4	79.2	59.6	4.9
46		2017-06-27	17:19:13	79.5	93.0	82.4	74.9	4.9
47		2017-06-27	17:19:18	75.2	88.5	77.4	72.8	4.9

48	2017-06-27	17:19:23	72.1	84.2	76.3	68.3	4.9
49	2017-06-27	17:19:28	70.3	83.7	72.8	68.0	4.9
50	2017-06-27	17:19:33	71.2	85.7	72.7	68.4	4.9
51	2017-06-27	17:19:38	67.9	81.5	68.4	67.4	4.9
52	2017-06-27	17:19:43	66.3	79.8	67.5	65.4	4.9
53	2017-06-27	17:19:48	63.5	76.6	65.4	61.7	4.9
54	2017-06-27	17:19:53	64.5	78.1	65.4	62.0	4.9
55	2017-06-27	17:19:58	61.5	75.0	64.1	60.0	4.9
56	2017-06-27	17:20:03	65.6	81.9	68.7	61.0	4.9
57	2017-06-27	17:20:08	68.2	80.9	68.9	66.8	4.9
58	2017-06-27	17:20:13	68.7	84.4	70.1	66.8	4.9
59	2017-06-27	17:20:18	66.5	86.6	69.4	61.1	4.9
60	2017-06-27	17:20:23	60.3	74.3	61.6	59.4	4.9
61	2017-06-27	17:20:28	62.1	76.4	62.6	61.5	4.9
62	2017-06-27	17:20:33	59.8	73.6	61.8	57.9	4.9
63	2017-06-27	17:20:38	66.8	86.7	73.3	58.1	4.9
64	2017-06-27	17:20:43	73.3	87.7	74.0	72.8	4.9
65	2017-06-27	17:20:48	71.3	85.2	73.5	67.5	4.9
66	2017-06-27	17:20:53	66.7	79.3	67.5	66.3	4.9
67	2017-06-27	17:20:58	63.6	77.8	66.6	59.0	4.9
68	2017-06-27	17:21:03	58.6	73.7	60.6	57.8	4.9
69	2017-06-27	17:21:08	60.7	75.0	61.4	59.5	4.9
70	2017-06-27	17:21:13	60.8	73.8	62.1	59.3	4.9
71	2017-06-27	17:21:18	60.8	75.3	62.6	57.1	4.9
72	2017-06-27	17:21:23	55.6	67.6	57.1	54.6	4.9
73	2017-06-27	17:21:28	57.3	72.6	59.6	54.5	4.9
74	2017-06-27	17:21:33	59.9	81.2	61.1	57.3	4.9
75	2017-06-27	17:21:38	56.7	69.4	57.3	56.2	4.9
76	2017-06-27	17:21:43	56.2	70.2	58.0	55.5	4.9
77	2017-06-27	17:21:48	64.1	79.0	66.6	58.0	4.9
78	2017-06-27	17:21:53	65.0	79.2	66.5	61.5	4.9
79	2017-06-27	17:21:58	65.8	85.0	70.3	60.5	4.9
80	2017-06-27	17:22:03	69.6	83.5	70.8	68.1	4.9
81	2017-06-27	17:22:08	72.0	85.9	72.6	70.8	4.9
82	2017-06-27	17:22:13	72.1	85.1	72.5	71.6	4.9
83	2017-06-27	17:22:18	73.7	87.4	75.6	71.5	4.9
84	2017-06-27	17:22:23	75.4	93.7	78.0	71.5	4.9
85	2017-06-27	17:22:28	76.9	95.1	79.3	72.9	4.9
86	2017-06-27	17:22:33	76.4	92.7	79.0	73.2	4.9
87	2017-06-27	17:22:38	71.3	83.7	73.2	69.2	4.9
88	2017-06-27	17:22:43	67.9	80.8	69.2	66.8	4.9
89	2017-06-27	17:22:48	67.7	81.6	68.7	67.0	4.9
90	2017-06-27	17:22:53	67.3	81.3	68.7	66.0	4.9
91	2017-06-27	17:22:58	74.3	91.4	76.9	67.2	4.9
92	2017-06-27	17:23:03	73.2	88.7	77.0	68.7	4.9
93	2017-06-27	17:23:08	76.1	93.7	78.0	72.4	4.9
94	2017-06-27	17:23:13	73.0	90.5	75.4	69.2	4.9
95	2017-06-27	17:23:18	70.1	86.7	73.9	67.0	4.9

96		2017-06-27	17:23:23	69.7	83.1	73.7	66.8	4.9
97		2017-06-27	17:23:28	74.1	102.1	77.0	68.4	4.9
98		2017-06-27	17:23:33	71.6	82.9	75.8	68.7	4.9
99		2017-06-27	17:23:38	68.4	81.0	69.4	67.5	4.9
100		2017-06-27	17:23:43	68.3	81.9	68.9	67.4	4.9
101		2017-06-27	17:23:48	75.8	95.2	79.1	68.4	4.9
102		2017-06-27	17:23:53	70.7	82.4	74.0	68.4	4.9
103		2017-06-27	17:23:58	68.9	83.5	70.2	68.2	4.9
104		2017-06-27	17:24:03	67.3	80.6	68.3	65.6	4.9
105		2017-06-27	17:24:08	66.9	81.2	68.1	65.5	4.9
106		2017-06-27	17:24:13	66.1	80.2	67.9	65.4	4.9
107		2017-06-27	17:24:18	70.2	83.9	71.4	67.9	4.9
108		2017-06-27	17:24:23	72.0	86.6	73.0	70.8	4.9
109		2017-06-27	17:24:28	68.6	81.4	70.7	67.7	4.9
110		2017-06-27	17:24:33	67.4	79.9	68.3	66.9	4.9
111		2017-06-27	17:24:38	67.0	81.1	67.9	64.9	4.9
112		2017-06-27	17:24:43	66.2	79.1	67.1	64.6	4.9
113		2017-06-27	17:24:48	66.0	83.9	68.9	62.6	4.9
114		2017-06-27	17:24:53	66.4	79.5	68.9	64.5	4.9
115		2017-06-27	17:24:58	63.2	76.5	64.6	60.4	4.9
116		2017-06-27	17:25:03	59.3	76.1	61.2	58.2	4.9
117		2017-06-27	17:25:08	61.8	75.9	62.4	60.7	4.9
118		2017-06-27	17:25:13	59.9	72.2	60.7	59.6	4.9
119		2017-06-27	17:25:18	64.6	87.6	70.0	59.5	4.9
120		2017-06-27	17:25:23	73.4	87.9	74.3	70.0	4.9
121		2017-06-27	17:25:28	75.5	89.9	76.9	73.2	4.9
122	Stop	2017-06-27	17:25:33					

Int. Temp (°F)	LCSeq-LASeq	1/1 LASeq 8.0	1/1 LASeq 16.0	1/1 LASeq 31.5	1/1 LASeq 63.0
102.4	12.8	5.9	9.9	31.3	47.4
102.4	12.8	5.9	7.5	31.9	41.0
102.4	11.8	5.9	8.2	32.9	39.4
102.4	9.5	5.9	9.7	34.0	41.7
102.4	10.4	5.9	8.2	34.6	42.2
102.4	14.2	5.9	8.0	34.8	42.4
102.4	11.9	5.9	10.5	35.2	42.5
102.4	14.1	5.9	13.5	34.6	42.1
102.5	11.4	5.9	13.2	35.1	49.6
102.5	8.9	5.9	16.8	35.9	58.2
102.8	7.8	5.9	17.4	35.4	52.5
102.9	9.7	5.9	14.9	42.4	60.3
102.9	8.6	5.9	17.2	37.7	50.5
102.9	6.4	5.9	10.7	27.9	37.8
102.9	8.2	5.9	12.2	24.8	39.0
102.9	9.2	5.9	15.8	26.6	40.5
102.9	3.9	5.9	9.1	28.0	39.4
102.9	6.0	5.9	6.0	27.3	41.6
102.9	9.2	5.9	8.7	29.1	43.0
102.9	8.4	5.9	11.3	31.4	43.0
102.9	11.2	5.9	12.9	31.8	45.5
102.9	7.5	5.9	12.8	33.7	48.3
102.9	7.0	5.9	15.1	32.9	48.3
102.9	7.5	5.9	14.6	35.1	48.9
102.9	7.4	5.9	10.7	29.2	41.0
102.9	9.5	5.9	10.0	27.2	38.7
102.9	9.1	5.9	11.3	27.9	38.3
102.9	6.6	5.9	10.5	26.2	38.1
102.9	10.6	5.9	11.0	29.8	47.8
102.9	6.5	5.9	10.1	30.5	46.8
103.0	5.0	5.9	11.9	29.2	42.1
103.0	10.3	5.9	15.2	28.4	41.3
103.1	3.1	5.9	14.9	34.2	45.0
103.1	4.4	5.9	12.1	30.8	38.2
103.1	10.0	5.9	10.7	28.5	35.8
103.1	9.7	5.9	13.0	29.3	37.7
103.4	9.4	5.9	11.7	27.7	36.1
103.4	13.1	5.9	15.1	32.4	42.6
103.4	11.8	5.9	23.1	40.1	42.6
103.4	10.7	5.9	15.0	30.5	38.0
103.4	12.4	5.9	13.3	33.3	42.0
103.4	11.1	5.9	11.1	30.5	43.4
103.4	12.6	5.9	7.9	29.3	40.6
103.4	10.8	5.9	11.3	31.0	44.8
103.4	12.3	5.9	14.2	33.9	53.5
103.4	12.5	5.9	13.9	32.2	59.4

103.4	12.3	5.9	14.6	30.8	58.2
103.4	10.0	5.9	14.7	30.1	45.0
103.4	9.7	5.9	12.8	28.7	41.7
103.4	6.7	5.9	12.8	27.7	43.0
103.4	6.4	5.9	12.0	29.5	42.6
103.4	8.9	5.9	17.6	30.1	37.9
103.6	12.0	8.6	25.0	33.8	40.5
103.4	14.4	10.6	19.6	37.3	43.0
103.4	9.7	6.9	16.0	31.2	40.9
103.4	9.5	8.9	21.3	32.3	44.5
103.5	8.3	11.5	22.7	31.6	44.5
103.4	8.8	7.8	17.9	32.6	44.1
103.5	12.5	6.6	18.8	29.7	40.6
103.5	11.0	5.9	16.9	30.2	42.4
103.5	11.5	5.9	14.7	30.9	42.1
103.7	9.3	5.9	10.8	28.3	47.1
103.8	8.3	5.9	12.6	30.2	48.3
103.7	5.7	5.9	10.2	31.6	44.7
103.5	8.9	5.9	13.3	31.3	42.6
103.7	7.8	5.9	14.0	30.8	39.7
103.7	9.8	5.9	11.0	28.2	37.4
103.8	9.4	5.9	12.6	26.6	39.1
103.8	9.5	6.6	16.5	27.1	36.7
103.8	7.1	5.9	12.0	26.3	36.2
103.8	11.9	5.9	14.0	26.8	35.9
103.8	9.7	5.9	13.8	26.6	34.7
103.8	8.5	5.9	11.4	27.0	36.6
103.8	11.1	5.9	10.9	28.6	35.1
103.8	12.7	5.9	13.7	29.6	38.1
103.8	12.2	5.9	12.2	29.1	51.4
103.8	10.8	5.9	15.2	28.9	51.5
103.8	5.9	5.9	11.1	28.4	41.0
103.8	5.7	5.9	11.6	32.2	43.5
103.8	6.0	5.9	16.4	32.8	46.6
103.8	5.8	5.9	15.5	31.8	46.0
103.8	10.4	5.9	12.5	34.8	52.6
103.8	9.0	5.9	9.3	37.0	57.9
103.8	7.3	5.9	12.1	34.7	50.6
103.8	7.8	5.9	14.7	33.8	49.5
103.8	10.2	5.9	13.0	30.6	46.5
103.8	7.1	5.9	11.3	29.3	43.1
103.8	7.4	5.9	13.4	30.1	42.9
103.8	8.4	9.6	24.4	33.3	43.2
103.8	4.1	5.9	15.5	30.8	45.7
103.8	7.8	7.6	21.2	32.6	48.9
103.8	4.8	6.2	18.6	33.2	49.9
103.8	6.7	11.7	26.0	34.3	43.9
103.8	6.8	13.6	24.8	33.4	41.2

103.8	5.0	6.0	14.5	28.9	41.7
103.8	4.5	6.1	17.9	31.6	44.4
103.8	6.0	6.1	18.3	31.6	45.8
103.8	8.8	10.1	22.9	31.6	42.7
103.8	9.0	8.7	22.9	32.8	42.3
103.8	4.9	10.5	23.8	33.0	46.9
103.8	7.8	10.3	24.2	32.4	45.9
103.8	8.9	11.4	24.6	34.4	45.9
103.8	12.0	12.0	26.9	35.5	44.1
103.8	8.9	12.8	22.8	32.5	41.8
103.8	8.9	7.6	22.4	30.8	40.8
103.8	10.3	6.2	26.8	35.6	42.9
103.8	6.4	14.6	28.3	36.4	43.2
103.8	9.9	9.6	24.4	35.1	43.8
104.0	12.8	11.7	25.5	34.9	49.4
103.8	13.7	16.0	31.1	38.7	45.2
104.0	10.3	7.5	22.9	33.3	42.7
103.8	11.9	9.1	25.6	34.5	45.5
103.8	9.4	11.2	23.0	34.3	44.0
103.8	9.7	5.9	16.8	31.4	41.2
103.8	13.6	5.9	17.4	28.8	43.8
103.8	11.7	5.9	16.1	29.6	44.4
104.0	13.9	5.9	19.1	29.9	43.4
104.0	12.1	6.0	22.5	32.1	46.3
103.8	9.4	12.2	26.5	35.8	51.8
104.0	9.1	8.4	17.3	32.7	56.7

1/1 LASeq 125	1/1 LASeq 250	1/1 LASeq 500	1/1 LASeq 1000	1/1 LASeq 2000	1/1 LASeq 4000
49.2	52.5	52.7	56.4	52.7	47.4
46.0	50.6	51.2	54.5	48.8	41.6
44.9	47.5	51.9	55.4	50.9	42.1
45.7	51.3	54.8	59.9	54.6	47.4
47.9	52.1	54.4	59.7	53.5	45.7
45.9	47.5	49.9	55.0	49.5	42.2
47.9	53.6	52.6	56.1	54.0	48.8
47.0	51.0	51.3	55.2	52.2	46.0
60.1	60.8	60.1	61.0	57.4	51.7
67.6	74.8	75.5	72.5	66.2	58.7
63.6	69.5	69.8	71.7	64.7	56.8
75.1	77.4	75.9	73.7	66.1	62.1
63.9	66.4	65.8	67.2	59.5	51.3
48.4	52.9	56.1	61.8	53.9	42.9
49.0	52.1	56.0	59.1	51.8	44.6
46.6	51.0	54.8	58.3	52.1	44.1
51.3	56.5	62.5	67.7	62.2	54.3
49.7	54.2	58.5	63.3	58.9	52.1
50.1	53.3	56.2	59.7	55.7	50.0
49.6	55.2	56.6	61.2	54.4	47.4
49.0	52.0	54.6	57.7	52.3	46.3
56.1	60.3	64.4	66.9	62.7	55.5
56.7	62.7	65.0	68.3	63.2	56.2
61.1	66.4	67.8	69.2	62.9	56.7
48.9	54.0	57.0	60.5	54.8	46.8
44.6	48.8	51.8	55.3	51.2	45.1
44.3	49.9	52.6	55.7	51.6	46.3
48.8	50.6	57.0	61.6	53.5	46.1
58.6	58.8	60.8	63.2	56.8	52.1
54.0	56.1	60.7	66.1	58.6	49.6
50.1	53.9	58.7	66.1	56.6	46.6
49.0	51.3	53.3	57.9	50.9	42.1
51.5	59.9	66.4	73.8	64.7	54.4
49.4	53.3	59.2	66.5	57.0	47.4
46.1	49.0	51.0	55.6	50.9	44.5
45.9	49.7	54.3	56.1	51.2	45.2
43.6	48.2	51.6	55.0	52.0	45.9
47.3	51.4	53.8	57.1	53.2	49.7
52.3	57.3	58.8	61.5	54.8	50.4
50.3	53.8	52.8	57.6	49.7	42.4
54.0	54.3	53.7	56.8	53.0	47.2
52.8	51.1	54.2	58.2	53.9	47.3
50.0	48.5	50.0	53.5	50.2	43.9
69.0	67.5	65.1	66.9	62.5	56.6
76.1	73.8	68.5	71.4	64.8	58.2
70.8	65.7	66.9	69.5	62.6	56.6

67.8	63.5	64.1	67.0	59.6	53.3
62.8	65.1	62.1	64.1	58.0	51.5
65.7	63.8	62.9	66.0	59.9	52.9
55.3	58.1	60.5	65.0	58.8	52.5
50.2	55.4	58.3	64.0	57.4	48.1
48.3	53.1	55.7	61.1	54.3	44.0
51.5	55.0	57.2	61.8	53.7	44.1
54.1	54.6	53.9	56.6	50.6	44.7
54.7	55.0	58.1	60.4	59.2	55.1
55.1	57.9	61.7	64.3	60.1	55.2
53.8	58.8	62.3	65.8	58.7	51.7
52.7	57.3	60.0	63.4	57.1	48.5
47.9	51.2	53.8	56.4	51.7	44.2
51.0	54.5	55.4	58.0	52.7	46.5
49.6	51.4	52.7	56.1	50.6	42.6
54.4	55.6	59.4	61.8	60.3	55.3
62.5	63.3	66.6	69.5	64.9	59.5
55.6	61.0	64.6	68.9	60.5	52.8
53.7	57.2	59.2	63.1	57.1	55.9
46.6	52.8	54.5	59.6	53.6	58.0
43.9	50.9	51.4	54.9	49.2	43.6
46.7	54.3	54.3	56.5	50.4	43.5
45.2	50.9	53.7	58.0	51.7	41.6
42.2	50.8	52.8	58.6	50.7	41.4
40.2	47.2	48.2	52.4	46.4	39.1
41.8	47.4	48.7	54.4	49.7	43.0
44.4	51.2	51.8	56.7	51.7	45.5
42.0	48.0	49.4	53.4	48.1	42.4
41.3	46.5	49.3	52.5	48.2	43.0
49.0	53.5	56.6	60.9	54.9	48.5
51.5	55.0	58.2	61.9	55.2	48.6
47.6	54.4	56.8	61.8	60.5	53.8
52.0	59.4	61.5	66.5	62.4	56.3
56.5	61.5	65.5	69.2	62.7	56.6
56.1	61.4	65.1	69.6	62.6	54.0
65.4	62.6	67.9	69.8	62.5	55.4
63.8	62.9	65.5	69.0	63.3	66.9
66.1	65.8	69.5	74.3	65.9	60.0
65.6	64.5	68.6	74.0	66.0	56.5
63.5	60.4	63.4	68.1	61.1	52.2
54.2	56.3	60.0	65.5	58.9	50.5
50.7	56.2	60.2	65.4	58.2	49.2
49.8	56.3	60.0	64.8	58.2	50.3
53.8	60.1	66.8	72.0	66.0	56.0
56.4	60.1	67.1	70.7	63.0	54.4
56.1	63.1	69.6	74.1	64.2	55.5
51.1	58.0	65.7	70.9	64.4	53.0
49.7	57.4	61.6	68.2	61.3	51.3

51.7	59.1	62.9	67.2	60.3	52.4
56.3	61.2	68.3	71.4	64.5	56.5
55.4	60.3	66.5	68.2	63.3	55.7
53.9	58.0	63.1	63.9	60.6	54.7
54.7	59.1	62.0	64.2	60.4	54.7
56.4	64.0	68.6	73.9	64.3	56.1
53.3	59.5	63.9	68.3	60.3	52.5
52.3	58.3	62.4	65.8	60.1	53.9
52.2	58.3	62.1	62.9	58.7	53.5
51.3	57.0	61.5	63.3	57.2	51.5
50.8	56.8	61.2	61.4	57.6	52.7
52.1	58.4	64.8	66.6	61.4	55.3
53.1	60.0	66.4	69.2	62.8	54.4
53.2	58.8	63.1	64.5	60.2	53.7
53.4	58.8	62.2	62.5	59.0	53.1
52.8	57.6	62.6	61.6	58.7	52.5
52.8	56.4	61.8	60.6	58.0	52.4
52.1	56.2	60.7	61.6	57.6	52.0
52.4	57.7	60.3	62.9	57.0	49.7
49.7	53.7	56.4	60.4	52.8	44.8
48.9	50.4	51.7	55.4	50.0	44.5
50.1	53.5	54.4	58.0	53.1	46.1
50.1	51.0	52.5	56.1	51.1	43.3
53.3	54.6	58.0	60.4	56.0	50.7
61.7	66.7	66.7	68.5	64.4	58.7
63.8	66.7	69.0	71.6	66.1	60.1

1/1 LASeq 8000	1/1 LASeq 16000	1/1 LASmax 8.0	1/1 LASmax 16.0	1/1 LASmax 31.5
38.4	27.2	5.9	12.1	32.8
31.7	17.3	5.9	9.4	32.8
31.8	17.1	5.9	10.6	34.3
36.7	22.2	5.9	11.5	35.0
35.0	20.0	5.9	9.4	35.8
31.8	18.4	5.9	9.5	36.2
39.2	26.2	5.9	12.0	36.5
35.9	21.0	5.9	15.0	37.3
43.3	30.6	5.9	14.9	36.9
48.9	36.3	5.9	20.0	38.6
45.5	32.5	5.9	19.6	39.9
47.7	30.4	5.9	19.8	48.2
38.1	20.2	5.9	20.5	43.9
30.2	17.2	5.9	11.9	31.2
35.3	22.3	5.9	18.0	27.1
34.2	19.9	5.9	18.0	27.6
43.9	31.5	5.9	12.4	29.1
42.5	29.3	5.9	7.7	28.7
45.2	39.4	5.9	10.6	30.5
41.8	34.5	5.9	13.6	33.0
37.5	23.8	5.9	13.9	33.4
47.0	33.0	5.9	15.2	37.2
48.5	34.0	5.9	16.9	36.7
49.6	37.0	5.9	17.1	39.5
37.0	25.2	5.9	11.5	30.6
37.4	33.1	5.9	11.5	28.2
37.7	24.6	5.9	12.7	29.6
36.8	22.6	5.9	12.5	27.5
42.9	32.6	5.9	12.2	33.4
38.3	24.2	5.9	11.6	33.2
34.5	19.6	5.9	12.8	31.5
32.0	17.9	5.9	17.0	29.9
42.6	28.8	5.9	17.6	38.5
35.5	21.0	5.9	13.0	35.1
36.1	21.5	5.9	12.3	30.2
36.3	21.7	5.9	16.4	30.3
36.6	21.2	5.9	13.7	29.3
43.4	32.7	5.9	17.0	36.8
43.5	31.8	5.9	25.9	42.5
33.7	18.1	5.9	17.7	34.2
37.4	23.5	5.9	15.8	35.2
37.6	22.9	5.9	13.6	33.2
34.0	18.1	5.9	9.6	31.1
49.1	35.7	5.9	14.6	34.0
48.9	36.4	5.9	15.2	37.2
47.8	34.7	5.9	16.4	33.5

43.3	29.5	5.9	17.2	32.9
42.2	27.2	5.9	17.5	31.7
43.9	27.8	5.9	14.3	30.0
43.3	25.9	5.9	15.7	29.6
36.7	21.0	5.9	13.5	30.3
31.4	17.2	6.7	20.6	30.7
32.7	18.7	12.2	28.3	36.7
32.8	19.5	13.0	22.3	39.5
43.5	31.6	10.5	18.9	34.3
43.5	30.3	11.5	24.3	33.7
42.4	28.6	14.4	26.5	33.7
37.9	24.7	11.1	21.2	35.9
33.6	20.8	8.9	21.3	31.3
36.2	22.5	5.9	19.0	31.6
31.6	25.2	5.9	16.3	33.8
44.9	32.9	5.9	13.7	29.4
49.6	37.6	5.9	14.6	32.5
43.1	30.1	5.9	11.4	33.6
41.4	26.0	5.9	16.1	34.5
37.7	21.1	5.9	16.7	31.9
31.6	17.1	5.9	13.8	30.1
33.6	19.1	5.9	16.6	27.8
30.3	16.9	9.8	19.0	28.5
29.9	17.1	5.9	14.7	27.7
28.8	16.2	5.9	17.1	27.8
32.9	17.6	5.9	17.2	27.8
35.5	22.3	5.9	13.2	27.9
32.5	18.1	5.9	12.7	30.8
32.9	17.3	5.9	15.6	31.2
39.7	25.5	5.9	15.6	30.9
39.3	25.5	5.9	17.6	30.9
44.5	30.4	5.9	12.5	30.7
46.3	32.5	5.9	14.7	34.1
46.6	33.5	5.9	19.4	34.4
44.5	32.4	6.2	17.4	36.9
50.7	31.1	5.9	15.8	37.4
69.9	44.7	5.9	12.0	41.0
56.0	33.3	5.9	13.6	38.7
45.3	31.1	5.9	17.4	37.5
40.2	24.2	5.9	15.6	32.0
39.3	23.6	5.9	14.4	31.1
37.7	22.6	5.9	21.9	32.2
39.9	25.9	12.6	28.1	35.5
47.2	35.8	6.0	19.3	32.0
44.1	31.0	9.8	25.2	35.4
46.4	31.0	7.6	19.9	34.7
41.2	26.3	15.0	27.1	35.7
39.2	24.0	16.6	28.4	36.1

40.9	23.1	8.1	17.7	30.4
45.7	30.3	7.3	21.2	34.3
44.2	26.6	8.0	21.2	35.0
43.7	19.9	13.7	25.8	35.0
43.0	19.5	11.8	25.9	36.1
44.5	30.3	13.7	27.2	35.2
41.2	22.6	12.6	26.8	36.4
42.9	23.4	14.8	27.0	37.2
42.8	21.4	16.8	30.7	39.0
40.5	20.3	17.0	27.7	35.5
41.5	19.4	10.1	24.0	32.3
43.6	20.9	9.7	34.6	41.5
43.0	24.5	18.8	33.9	41.2
44.3	26.0	12.8	28.2	37.8
42.8	31.7	15.0	31.6	36.7
41.1	26.7	19.4	35.5	43.5
41.0	19.3	11.7	25.3	35.0
43.2	27.9	11.7	27.9	36.4
40.3	23.9	14.3	26.9	37.0
34.3	21.0	5.9	19.3	32.8
34.0	20.8	5.9	19.9	30.0
36.5	22.4	5.9	17.3	30.5
34.0	20.0	6.7	20.1	31.5
41.7	30.8	7.0	24.6	33.5
49.4	36.4	15.8	29.9	38.7
53.6	39.9	12.2	21.4	34.1

1/1 LASmax 63.0	1/1 LASmax 125	1/1 LASmax 250	1/1 LASmax 500	1/1 LASmax 1000
50.9	51.2	53.6	54.0	57.3
42.5	47.7	52.8	52.1	55.7
40.3	46.3	48.3	53.9	57.0
44.2	47.4	54.4	57.1	62.3
43.1	48.4	54.8	56.9	62.0
44.8	47.6	48.4	51.0	55.7
44.4	49.9	58.1	54.3	57.7
43.0	49.8	55.1	54.1	57.7
53.8	65.7	67.5	64.5	66.0
61.1	69.2	77.2	78.1	74.0
55.8	66.2	72.2	73.5	72.9
64.7	79.3	80.9	80.4	76.6
57.0	70.6	72.9	71.6	70.2
40.6	52.1	56.5	59.6	65.8
42.0	50.3	52.6	56.7	60.0
42.6	48.4	52.1	55.9	60.4
42.5	54.6	58.7	64.9	70.4
45.0	52.9	57.6	63.0	68.7
44.9	52.0	54.7	57.5	61.0
44.5	50.5	55.9	57.5	61.9
48.5	52.2	54.0	58.3	60.1
50.2	58.3	62.8	65.7	68.7
49.8	59.6	65.1	67.4	69.5
51.4	64.3	69.9	70.8	71.4
43.6	53.3	58.4	61.3	64.7
40.1	46.1	50.5	52.8	56.5
40.6	45.4	51.7	53.1	56.0
44.7	53.8	53.6	59.3	64.6
51.7	60.8	60.9	62.6	64.0
51.0	58.7	58.1	61.5	68.3
44.0	51.5	56.3	61.0	68.4
43.4	50.3	52.6	55.7	61.5
49.9	54.2	63.4	70.1	76.8
43.2	51.4	58.5	64.5	71.9
36.8	47.6	50.6	53.9	58.5
39.8	46.8	50.7	55.4	57.4
37.0	44.3	48.7	53.4	56.2
45.5	53.6	56.9	59.5	61.4
45.8	54.8	58.7	60.6	62.4
39.3	54.9	55.5	55.7	60.7
43.5	56.1	56.6	56.7	60.2
44.3	53.6	52.9	56.3	60.3
42.0	51.0	50.2	52.3	54.7
49.2	74.7	73.0	69.1	71.1
56.0	79.9	77.4	70.0	71.9
63.5	75.3	68.5	68.6	70.9

63.6	73.8	67.6	66.4	69.3
47.2	66.9	69.5	63.2	65.0
42.5	69.0	67.7	63.4	67.0
45.1	59.1	59.2	61.5	65.5
43.9	51.2	56.7	59.6	65.2
40.2	49.3	54.0	57.8	63.2
42.0	54.5	57.2	58.2	63.0
45.3	55.7	57.3	56.0	60.6
41.9	56.7	56.8	60.8	63.9
46.8	55.8	59.0	63.1	65.0
47.2	54.9	60.6	64.2	67.4
47.1	55.0	60.2	62.8	66.5
42.7	50.5	54.4	55.1	57.8
46.1	51.8	55.6	56.1	58.6
45.5	51.7	53.3	54.9	58.0
52.2	63.8	62.6	65.6	67.9
52.2	66.0	64.8	67.3	70.9
46.5	56.9	63.1	66.9	71.0
45.4	55.6	58.9	61.3	64.2
42.6	49.2	55.3	57.0	62.0
38.5	44.9	54.8	53.1	56.6
40.5	48.3	55.5	55.7	57.3
39.0	47.2	52.0	54.6	59.9
38.3	43.0	51.8	54.9	60.8
37.6	40.8	49.3	49.6	53.9
36.9	43.8	50.5	51.3	56.9
37.8	45.9	52.2	53.2	57.9
36.0	43.1	48.9	50.2	54.1
43.3	43.5	47.5	50.1	54.4
56.1	51.7	56.2	59.3	63.6
55.6	53.4	56.3	59.3	63.5
43.9	51.2	59.4	61.8	65.9
46.1	54.8	60.6	62.6	68.3
47.9	57.6	62.2	66.6	69.9
48.8	57.1	62.0	65.7	69.9
55.6	69.1	64.6	70.2	71.1
62.2	68.2	64.6	67.4	71.2
52.5	68.6	67.7	72.3	77.1
50.5	66.3	66.7	71.1	77.0
49.1	66.0	62.5	65.7	70.2
44.0	57.6	57.9	61.4	66.6
44.7	51.5	57.2	61.2	66.5
44.3	51.1	57.2	61.2	66.6
48.0	56.7	63.4	71.3	74.4
50.2	59.3	63.4	71.2	74.5
53.2	57.3	65.3	72.0	75.9
46.9	53.5	60.0	68.4	73.4
43.9	53.1	62.5	65.3	72.2

43.7	53.0	62.1	64.9	72.0
50.6	61.2	64.6	72.4	73.5
50.2	59.6	63.7	71.1	72.4
43.7	55.4	59.0	64.4	65.1
43.1	56.3	60.0	62.8	65.1
51.8	59.4	67.7	72.0	77.2
48.3	55.2	62.4	67.1	72.1
47.7	53.2	59.2	63.4	67.4
47.6	53.4	59.6	62.8	64.5
43.3	52.3	57.7	62.7	65.0
42.0	51.5	57.6	63.5	63.0
46.5	53.2	59.2	67.0	67.8
45.0	53.5	60.9	67.4	70.4
47.4	53.9	60.0	64.5	67.8
51.6	54.4	59.6	63.0	63.5
47.5	53.5	58.4	63.8	62.9
44.5	53.7	56.8	62.8	62.0
49.0	54.7	59.9	64.1	64.8
47.6	54.7	60.2	63.4	64.8
43.0	51.0	56.2	58.1	61.4
46.4	50.1	53.1	53.5	57.7
46.0	51.1	54.1	55.1	58.8
45.4	51.5	52.4	53.4	57.0
50.6	60.0	61.2	64.3	65.8
52.8	63.4	68.6	68.0	69.2
59.9	66.2	68.8	70.9	73.1

1/1 LASmax 2000	1/1 LASmax 4000	1/1 LASmax 8000	1/1 LASmax 16000	1/1 LASmin 8.0
54.2	49.2	41.2	30.2	5.9
49.7	42.5	32.7	19.9	5.9
52.3	42.5	32.8	17.7	5.9
56.1	48.6	38.0	23.5	5.9
55.7	48.2	37.5	23.1	5.9
50.2	44.0	34.6	21.4	5.9
55.6	50.7	41.2	27.7	5.9
55.5	49.7	40.5	25.9	5.9
61.5	55.7	48.5	37.6	5.9
67.8	60.4	50.5	37.8	5.9
66.0	58.1	47.8	34.9	5.9
67.7	66.2	50.1	34.4	5.9
63.1	56.4	42.9	22.9	5.9
57.3	46.1	32.9	19.9	5.9
52.7	46.4	37.6	24.5	5.9
53.2	46.4	37.4	23.5	5.9
66.4	57.9	47.9	37.0	5.9
64.3	56.2	45.9	34.4	5.9
57.4	52.5	49.3	44.5	5.9
55.1	48.2	47.3	41.1	5.9
55.7	50.2	42.2	27.4	5.9
64.0	56.8	48.1	34.3	5.9
64.7	58.1	50.9	37.1	5.9
64.9	59.8	53.2	41.3	5.9
59.2	51.3	41.8	32.6	5.9
52.8	47.5	39.4	36.8	5.9
52.6	47.9	39.8	29.3	5.9
55.2	48.2	38.8	25.8	5.9
58.1	53.7	44.8	36.2	5.9
60.1	51.0	40.8	28.9	5.9
59.3	48.9	36.8	21.3	5.9
53.7	44.0	32.9	18.4	5.9
67.5	57.4	45.8	32.7	5.9
62.1	52.2	39.5	24.8	5.9
52.0	45.0	36.8	23.0	5.9
52.3	46.2	37.0	23.2	5.9
52.6	46.9	37.4	22.2	5.9
56.4	53.7	48.0	37.6	5.9
56.7	53.7	47.9	37.3	5.9
51.5	44.5	36.5	21.1	5.9
56.1	50.8	41.1	27.5	5.9
55.7	50.1	40.5	26.9	5.9
51.4	46.5	37.7	23.0	5.9
66.1	59.9	52.4	39.1	5.9
65.4	59.9	50.9	38.0	5.9
64.6	58.3	50.3	38.0	5.9

61.4	56.0	46.1	33.3	5.9
59.7	53.1	44.1	29.7	5.9
60.4	53.9	45.2	29.7	5.9
60.0	53.9	44.8	28.0	5.9
58.9	51.2	40.8	24.2	5.9
56.5	46.4	33.9	18.8	5.9
54.7	44.9	33.8	19.5	5.9
53.5	48.4	36.2	21.9	8.5
63.0	59.4	47.4	35.7	5.9
62.9	58.7	46.3	33.7	5.9
60.1	52.4	43.5	31.1	8.8
60.3	51.9	42.1	29.5	5.9
52.3	47.1	36.7	24.1	5.9
53.2	47.2	36.7	23.9	5.9
52.5	45.2	34.3	29.3	5.9
66.0	61.9	51.8	40.7	5.9
66.4	62.4	52.4	41.0	5.9
63.3	55.8	46.0	33.0	5.9
58.4	62.0	43.1	27.4	5.9
56.7	61.8	41.8	24.5	5.9
50.0	47.2	32.3	17.7	5.9
51.1	44.7	34.8	20.4	5.9
52.5	42.4	32.1	17.9	5.9
52.5	42.9	30.9	17.7	5.9
47.3	39.7	29.9	16.6	5.9
52.4	46.8	36.7	21.8	5.9
53.9	47.5	37.8	25.9	5.9
48.9	43.0	33.4	20.0	5.9
50.5	44.9	35.2	19.3	5.9
56.5	49.9	41.3	27.5	5.9
56.4	49.9	40.8	28.1	5.9
65.3	58.4	48.8	35.5	5.9
65.4	58.6	48.6	35.0	5.9
63.0	57.7	47.8	34.9	5.9
63.2	55.0	45.4	34.6	5.9
63.8	56.8	59.9	34.1	5.9
65.4	69.9	73.8	49.2	5.9
68.6	63.3	61.7	36.3	5.9
68.3	58.9	47.6	35.2	5.9
62.9	53.8	41.6	26.6	5.9
60.4	52.2	40.9	25.0	5.9
59.5	50.0	38.7	23.5	5.9
59.5	51.7	41.8	28.8	5.9
67.7	58.6	48.8	37.2	5.9
66.9	58.7	48.9	36.3	5.9
66.1	57.6	49.6	33.4	5.9
66.8	55.2	43.4	29.1	5.9
64.5	54.7	43.1	29.1	8.1

64.3	54.4	42.5	28.2	5.9
68.5	59.9	49.6	34.7	5.9
67.5	58.3	47.7	32.3	5.9
61.8	56.1	45.0	20.5	6.7
60.9	55.5	43.9	20.2	5.9
67.0	58.4	47.5	34.9	6.9
62.7	54.3	42.4	26.0	8.7
61.0	54.6	43.9	24.7	7.1
60.4	55.9	45.0	23.5	8.1
57.9	53.2	42.1	21.5	5.9
59.7	55.4	44.2	20.2	5.9
62.3	56.4	44.4	21.5	5.9
63.8	55.4	44.2	26.6	7.0
62.1	55.1	47.9	28.8	5.9
60.8	55.0	44.5	36.1	7.8
59.7	53.5	42.0	32.9	11.7
59.3	54.2	42.6	22.7	5.9
59.7	53.4	45.2	30.6	5.9
59.7	53.4	45.1	28.3	5.9
54.5	46.8	36.8	23.5	5.9
51.9	46.7	37.5	24.2	5.9
54.1	47.2	38.1	24.5	5.9
51.7	44.1	35.7	21.9	5.9
60.1	54.7	45.3	33.1	5.9
66.3	61.0	53.6	39.9	5.9
66.9	61.6	55.5	41.5	5.9

1/1 LASmin 16.0	1/1 LASmin 31.5	1/1 LASmin 63.0	1/1 LASmin 125	1/1 LASmin 250
6.5	29.2	42.2	47.0	51.0
5.9	30.8	39.1	43.8	47.3
4.9	31.9	37.9	43.4	46.8
7.9	31.9	38.3	44.1	46.6
6.4	33.0	41.5	46.8	48.1
6.9	32.5	40.7	44.5	46.9
7.4	34.1	41.8	45.3	48.3
11.3	32.4	40.8	44.8	47.5
12.2	32.0	41.0	44.8	47.6
13.2	33.1	53.8	65.7	67.1
14.9	31.4	48.5	61.6	68.2
12.0	32.9	47.5	62.3	70.1
11.3	31.2	40.5	52.1	56.5
8.6	26.0	35.3	46.3	49.8
7.4	22.9	37.2	47.4	51.2
12.5	24.8	36.4	45.1	50.1
7.3	26.2	34.8	45.4	52.1
4.2	26.0	38.5	47.1	51.3
5.5	26.1	41.0	48.5	52.3
8.8	29.6	41.6	48.3	54.0
11.9	30.8	41.5	46.8	50.7
10.9	30.4	45.7	52.0	53.2
12.7	30.0	45.9	54.9	61.3
11.4	30.7	43.6	53.3	58.5
9.4	27.1	38.6	46.1	49.6
8.7	26.2	38.1	43.5	48.0
9.9	25.8	35.6	43.2	47.7
9.1	24.5	35.0	42.5	47.6
8.9	26.6	40.4	53.8	53.3
8.9	28.1	43.7	49.9	54.8
9.7	27.8	37.5	48.9	52.0
11.6	27.2	38.2	47.0	49.8
12.7	27.0	36.7	47.1	51.5
10.8	27.6	33.9	46.1	47.0
8.6	26.9	33.7	44.5	46.5
9.9	28.0	35.6	44.1	48.4
10.3	26.6	34.9	42.9	47.3
10.7	28.5	35.7	43.0	48.0
16.1	34.3	37.5	47.4	54.8
10.6	27.4	36.4	46.3	52.4
10.7	27.4	38.0	52.7	52.5
8.6	27.9	41.9	51.1	49.2
6.3	27.8	38.9	49.3	47.8
7.3	29.0	40.8	49.1	50.2
12.5	29.9	49.0	66.4	66.5
11.5	29.5	50.7	62.9	63.4

11.6	29.2	47.2	59.9	60.1
11.9	28.2	42.2	59.8	59.9
11.3	26.5	40.4	59.1	59.1
9.3	26.1	40.1	51.0	56.7
8.5	27.2	40.2	48.1	54.0
10.9	29.0	36.1	47.3	52.1
18.0	30.1	36.5	48.1	52.0
15.1	34.0	40.1	52.0	51.1
12.6	28.6	40.0	52.1	51.6
15.8	30.1	41.4	53.9	56.1
19.4	29.9	42.3	52.8	56.8
13.0	28.2	39.4	47.8	51.4
15.8	28.2	38.5	45.5	48.7
14.9	28.6	40.2	49.9	53.1
13.0	28.0	39.3	46.6	48.8
7.6	27.3	38.8	46.4	48.4
9.0	28.3	44.4	56.9	61.8
9.1	29.1	40.6	54.3	58.9
10.0	27.8	39.2	49.2	55.4
11.0	29.6	36.2	43.4	49.3
9.1	26.2	36.3	42.5	48.2
8.9	24.8	36.7	43.7	52.0
13.3	25.7	35.8	42.2	50.3
9.3	24.9	34.8	40.4	48.7
9.2	25.6	34.2	39.5	45.4
10.1	25.2	33.6	40.0	44.9
8.0	26.0	35.2	42.9	48.8
6.7	26.0	34.5	41.1	47.3
11.0	28.8	34.2	40.1	45.8
10.3	27.5	43.3	43.3	47.0
11.3	26.7	43.9	48.0	51.3
7.4	26.6	38.4	45.3	49.6
9.3	29.5	39.5	50.5	57.8
11.8	30.7	44.7	54.8	60.1
13.0	28.5	43.4	54.7	60.5
9.2	31.0	48.2	56.9	60.5
6.8	31.0	52.3	61.3	60.9
10.0	32.1	49.0	64.3	62.8
11.7	31.6	48.3	64.9	62.5
8.4	29.5	44.0	57.6	58.0
8.3	27.7	42.4	50.5	55.4
6.6	27.9	41.3	50.1	55.6
18.6	30.4	42.2	48.8	55.0
12.3	29.7	42.8	49.4	55.8
11.5	30.7	45.8	53.3	56.4
17.5	30.7	46.9	53.5	60.0
17.7	31.6	41.3	48.4	55.2
17.8	28.6	40.1	47.9	54.3

11.7	26.7	40.6	50.4	56.7
13.2	26.3	40.7	50.3	57.3
15.2	29.4	42.0	52.9	57.9
17.9	27.1	41.1	52.3	57.1
20.3	29.7	41.1	52.9	57.8
21.3	30.8	41.0	52.9	58.7
22.2	30.9	42.7	51.9	57.9
21.8	31.2	43.5	51.5	57.3
19.6	30.0	41.4	51.1	56.3
16.7	29.6	40.2	50.7	56.2
20.3	30.0	39.6	50.2	56.2
17.3	29.4	39.5	51.1	56.8
19.5	30.5	41.6	52.5	58.8
19.3	32.7	40.6	52.4	58.2
22.0	33.0	46.3	52.5	57.8
24.9	33.8	41.6	52.0	56.5
19.5	31.8	41.2	51.7	54.5
23.5	32.4	41.8	50.1	51.7
17.6	31.3	39.8	50.4	56.0
15.0	29.5	39.9	47.6	50.2
14.8	26.9	40.0	48.1	49.1
14.0	27.9	42.7	49.3	52.4
16.4	28.5	41.5	48.7	50.1
18.5	30.1	41.7	49.5	50.1
19.8	32.0	49.6	59.9	61.2
14.0	31.3	50.8	61.4	64.6

1/1 LASmin 500	1/1 LASmin 1000	1/1 LASmin 2000	1/1 LASmin 4000	1/1 LASmin 8000
51.1	55.0	49.7	42.5	32.5
49.9	53.5	48.1	41.0	31.0
50.0	53.7	48.3	41.6	30.7
49.9	53.8	50.2	42.5	32.0
51.0	55.7	50.2	42.5	31.2
49.4	54.3	48.9	41.4	30.8
49.9	54.5	50.1	44.1	34.6
49.1	52.4	48.6	41.3	31.6
49.4	52.7	49.0	42.1	32.9
64.4	66.0	61.5	55.7	47.8
67.9	71.0	64.1	56.1	44.4
68.6	70.2	63.1	56.4	43.0
59.6	65.7	57.3	46.1	32.8
53.6	57.8	51.1	40.6	27.8
54.3	58.3	50.7	42.1	32.2
54.0	57.5	51.2	41.6	29.6
55.9	60.5	53.1	43.1	29.9
55.5	59.1	55.5	50.1	40.8
54.7	59.1	53.5	46.3	38.1
55.5	59.4	52.5	45.2	35.4
51.8	56.0	50.0	43.5	33.8
58.3	60.2	55.8	50.2	42.2
63.7	67.4	61.3	54.0	45.5
61.3	64.7	59.2	51.3	41.9
52.6	56.0	51.0	43.2	32.7
50.8	54.1	50.2	43.6	34.7
52.1	55.3	50.4	43.4	33.9
52.4	56.0	50.6	43.3	33.7
57.5	61.4	54.2	48.1	38.8
60.2	63.6	57.3	48.8	36.8
55.7	61.5	53.7	44.0	32.3
51.9	55.7	48.5	41.2	31.1
53.0	56.4	49.3	41.8	32.9
50.9	58.5	52.0	43.6	33.3
49.8	53.7	50.0	43.9	34.5
53.0	54.4	49.3	43.6	35.1
50.5	54.4	50.7	44.9	35.7
50.8	54.4	50.7	44.9	35.9
55.8	60.7	51.5	44.5	36.5
50.6	54.6	48.3	41.6	32.0
50.8	54.5	48.8	41.6	31.8
50.6	54.6	51.2	44.4	34.9
48.8	52.8	49.4	43.0	32.3
52.3	54.3	51.5	46.6	37.8
67.1	70.9	63.9	57.2	47.4
65.9	68.5	61.4	54.5	45.8

61.5	64.2	57.3	50.6	41.5
60.9	63.2	56.6	49.8	40.5
61.5	64.9	58.2	51.5	42.1
59.5	64.4	57.5	51.3	40.9
57.5	63.2	56.5	46.4	33.9
54.1	58.8	52.1	41.6	29.1
54.9	59.2	51.8	42.5	30.0
52.9	54.1	48.4	41.2	30.0
54.6	55.0	53.6	48.4	36.2
60.0	63.3	57.4	51.3	41.2
59.9	63.4	57.4	50.9	41.3
54.8	57.8	52.0	43.3	31.8
52.5	55.4	51.5	42.3	30.6
54.4	57.1	52.1	45.2	34.3
50.4	53.9	49.5	41.3	30.6
51.3	54.1	49.9	41.8	31.1
65.6	67.9	63.1	55.8	45.9
61.3	64.2	56.6	49.6	40.2
57.0	62.0	56.1	49.2	39.2
51.1	55.8	49.8	47.2	32.2
50.3	53.8	48.4	41.8	30.8
53.0	55.6	49.4	42.2	32.1
52.8	55.5	49.8	40.9	29.4
49.6	54.0	47.3	39.7	28.8
46.7	51.5	45.8	38.7	28.0
46.6	51.5	45.9	39.3	29.5
50.2	54.1	47.9	41.7	31.8
48.8	52.5	47.2	41.4	31.4
48.7	51.5	47.3	41.9	31.3
50.1	54.4	50.4	44.9	35.2
55.0	58.4	52.3	45.9	35.5
53.0	57.5	51.8	45.4	34.8
60.1	65.3	59.9	53.9	43.3
62.6	68.3	61.8	55.1	45.0
64.7	69.0	61.9	52.9	42.7
65.0	66.8	60.3	53.2	43.2
63.0	66.4	60.3	54.3	59.7
62.9	66.3	59.9	55.9	46.8
65.7	70.2	62.9	53.8	41.6
61.4	66.6	60.2	51.0	38.8
59.1	64.2	57.6	49.1	37.9
59.0	64.6	57.2	48.0	36.6
59.2	63.1	56.8	49.0	38.4
59.5	64.5	59.2	49.7	39.9
62.0	66.2	58.4	49.0	38.3
66.1	70.4	60.0	50.6	41.2
61.5	67.2	59.7	49.7	37.9
59.3	64.5	58.7	48.3	36.1

61.2	62.5	57.2	50.9	39.5
62.4	65.4	58.4	51.9	40.8
63.1	64.7	60.4	53.9	41.9
61.4	63.1	59.9	53.2	43.0
61.0	62.8	59.6	53.8	42.1
62.1	64.4	60.6	53.9	41.7
61.5	65.2	59.4	51.7	40.4
61.5	64.5	59.0	53.4	41.4
60.7	61.4	56.4	50.1	39.8
60.4	61.4	56.3	49.6	38.6
60.1	60.3	56.4	51.8	40.4
63.3	62.9	59.7	54.0	42.5
64.5	67.7	62.0	53.4	42.1
62.6	63.0	59.2	52.4	40.5
61.2	61.8	58.0	52.0	42.0
59.9	59.3	56.7	50.4	38.9
59.9	58.5	56.3	50.4	38.8
56.1	57.8	54.9	49.6	39.5
57.9	61.2	54.5	46.7	35.5
53.5	57.7	49.7	42.0	30.2
50.6	53.8	48.7	41.5	29.8
53.3	57.0	51.7	43.9	33.2
51.7	55.4	50.5	42.8	32.6
51.7	55.2	50.8	44.0	34.6
64.1	65.9	60.1	54.7	45.3
66.4	69.2	64.3	57.3	50.1

1/1 LASmin 16000	1/3 LASeq 6.3	1/3 LASeq 8.0	1/3 LASeq 10.0	1/3 LASeq 12.5
19.9	1.9	0.9	0.3	1.8
16.4	1.9	0.9	0.3	-0.8
16.6	1.9	0.9	0.3	-0.8
17.8	1.9	0.9	0.3	-0.7
17.0	1.9	0.9	0.3	-0.8
16.8	1.9	0.9	0.3	-0.8
21.5	1.9	0.9	0.3	-0.8
17.0	1.9	0.9	0.3	-0.3
18.8	1.9	0.9	0.3	0.0
34.9	1.9	0.9	0.3	1.7
30.3	1.9	0.9	0.7	5.9
23.0	1.9	0.9	0.3	-0.6
18.6	1.9	0.9	0.3	1.4
16.0	1.9	0.9	0.3	-0.4
19.6	1.9	0.9	0.3	-0.4
16.3	1.9	0.9	1.5	4.3
16.3	1.9	0.9	0.5	1.9
26.6	1.9	0.9	0.3	-0.8
24.9	1.9	0.9	0.3	-0.8
23.2	1.9	0.9	0.3	-0.8
20.5	1.9	0.9	0.3	-0.8
27.5	1.9	0.9	0.3	-0.8
30.8	1.9	0.9	0.3	0.3
27.2	1.9	0.9	0.3	-0.8
18.9	1.9	0.9	0.3	-0.8
29.3	1.9	0.9	0.3	-0.8
18.8	1.9	0.9	0.3	-0.8
18.6	1.9	0.9	0.3	-0.8
25.9	1.9	0.9	0.3	-0.8
21.0	1.9	0.9	0.3	-0.8
18.0	1.9	0.9	0.3	-0.8
17.5	1.9	0.9	1.7	0.9
18.4	1.9	0.9	0.8	2.1
19.1	1.9	0.9	0.3	1.0
19.6	1.9	0.9	0.3	-0.8
20.6	1.9	0.9	0.3	-0.4
19.9	1.9	0.9	0.3	-0.3
20.6	1.9	0.9	0.3	-0.7
21.1	1.9	0.9	0.3	6.0
16.6	1.9	0.9	0.3	-0.4
16.7	1.9	0.9	0.3	-0.4
18.4	1.9	0.9	0.3	0.4
16.6	1.9	0.9	0.3	-0.8
23.1	1.9	0.9	0.3	-0.8
33.9	1.9	0.9	0.3	-0.8
31.6	1.9	0.9	0.6	2.2

26.7	1.9	0.9	0.3	2.8
25.5	1.9	0.9	0.3	4.2
23.5	1.9	0.9	0.3	1.5
23.4	1.9	0.9	0.3	1.8
18.8	1.9	0.9	0.3	1.2
16.2	1.9	0.9	1.9	7.6
16.7	1.9	1.2	6.8	11.0
17.7	1.9	2.0	9.0	10.2
22.0	1.9	5.5	4.8	7.5
26.9	1.9	1.6	7.1	9.7
26.2	1.9	3.1	10.7	14.8
17.5	1.9	3.6	5.9	10.6
16.5	1.9	0.9	4.5	8.7
19.5	1.9	0.9	2.1	7.0
17.6	1.9	0.9	0.9	5.8
21.9	1.9	0.9	0.3	0.0
33.0	1.9	0.9	0.3	0.6
26.3	1.9	0.9	0.3	-0.8
24.4	1.9	0.9	0.3	-0.8
17.6	1.9	0.9	0.3	2.3
16.6	1.9	0.9	0.3	-0.4
17.5	1.9	0.9	0.3	-0.5
16.4	1.9	0.9	3.2	6.3
16.6	1.9	0.9	2.1	3.5
15.9	1.9	0.9	0.3	-0.1
16.0	1.9	0.9	0.3	1.8
18.1	1.9	0.9	0.3	-0.6
16.9	1.9	0.9	0.3	-0.8
16.5	1.9	0.9	0.3	0.2
19.3	1.9	0.9	0.3	-0.6
19.8	1.9	0.9	1.0	1.1
19.0	1.9	0.9	0.3	-0.5
28.3	1.9	0.9	0.3	-0.8
30.9	1.9	0.9	0.4	2.5
28.8	1.9	0.9	2.2	6.3
28.8	1.9	0.9	0.3	0.6
31.9	1.9	0.9	0.3	0.0
29.5	1.9	0.9	0.3	-0.6
26.6	1.9	0.9	0.3	2.8
21.7	1.9	0.9	0.3	0.1
22.4	1.9	0.9	0.3	2.1
22.0	1.9	0.9	0.3	-0.2
21.9	1.9	1.7	8.4	10.9
26.0	1.9	1.0	2.5	8.3
24.2	1.9	0.9	5.4	8.9
25.2	1.9	1.1	4.4	8.1
22.3	1.9	3.5	8.8	16.0
19.1	3.1	8.9	11.8	16.5

19.4	2.4	5.5	2.7	7.0
22.1	1.9	0.9	2.4	4.9
20.3	1.9	0.9	2.9	6.9
19.3	1.9	1.9	9.2	11.6
18.7	1.9	3.1	7.3	12.9
20.0	1.9	1.8	8.9	15.7
20.3	1.9	3.6	9.2	13.0
20.5	1.9	4.7	9.6	13.3
19.3	1.9	5.9	9.8	15.4
19.2	1.9	7.7	12.1	18.6
19.1	1.9	2.8	5.5	12.0
20.1	1.9	1.1	4.2	11.7
21.0	2.9	9.1	12.5	18.1
22.1	1.9	3.1	8.4	12.9
27.1	1.9	5.1	9.8	17.1
18.8	2.1	6.3	15.4	21.0
18.0	2.3	5.4	6.8	14.4
22.7	1.9	0.9	7.6	13.7
20.6	1.9	1.7	10.9	13.5
17.1	1.9	1.3	2.0	3.5
16.9	1.9	0.9	0.4	4.2
19.0	1.9	0.9	0.4	1.0
18.3	1.9	0.9	1.8	7.9
22.0	1.9	1.1	2.5	13.4
33.0	1.9	0.9	11.2	17.4
37.1	1.9	3.1	8.5	11.7

1/3 LASeq 16.0	1/3 LASeq 20.0	1/3 LASeq 25.0	1/3 LASeq 31.5	1/3 LASeq 40.0	1/3 LASeq 50.0
5.4	7.5	20.8	25.0	29.5	35.5
0.1	5.8	20.0	24.7	31.4	34.5
-0.7	6.8	20.5	24.0	31.9	34.9
1.3	8.6	18.2	23.9	33.0	36.2
0.2	6.9	17.0	25.2	34.3	36.5
-0.1	7.1	16.4	25.5	34.0	36.5
1.3	9.4	19.9	23.9	34.5	35.7
5.0	12.4	23.2	25.2	32.8	38.4
4.0	12.5	21.8	23.3	34.0	38.0
9.4	14.2	22.8	25.5	35.2	37.7
12.7	16.1	22.0	24.3	34.8	42.3
5.7	13.2	20.6	29.4	41.9	41.9
5.2	17.4	19.1	29.3	37.5	35.7
3.4	9.7	17.6	23.9	25.6	31.7
1.1	10.0	16.9	18.1	22.5	28.7
10.8	14.1	19.0	21.8	24.2	27.0
5.6	7.7	20.1	23.0	25.2	32.1
1.0	4.6	20.1	22.7	24.0	34.9
0.0	7.5	18.3	24.3	27.0	34.8
-0.4	10.7	19.8	26.2	29.3	34.2
2.9	12.2	19.6	24.9	30.5	32.5
6.0	11.3	20.4	26.0	32.0	41.1
8.5	13.6	20.2	26.3	31.2	42.0
9.0	13.5	21.3	26.4	33.4	39.2
6.1	9.1	17.1	24.1	26.9	32.0
5.5	8.0	14.6	23.6	24.1	27.4
5.2	9.7	16.9	25.9	22.8	26.6
6.8	8.4	16.9	23.4	22.0	26.2
5.1	9.4	16.6	24.3	27.8	30.9
5.8	8.2	17.2	24.0	29.1	31.9
7.0	10.0	15.1	24.2	27.4	30.3
9.5	12.9	17.7	24.4	25.3	28.4
11.2	12.8	17.0	24.5	33.3	32.9
7.7	9.9	16.2	23.7	30.0	30.8
7.4	8.4	17.5	23.3	26.3	25.4
7.9	10.5	18.7	24.6	26.8	28.1
6.9	10.5	17.6	23.9	25.0	28.6
6.7	13.8	22.2	27.5	29.2	33.2
16.7	21.7	23.4	35.6	38.1	36.8
9.7	14.5	18.8	26.1	28.9	31.8
5.1	12.2	16.6	20.4	33.0	32.6
5.4	10.1	19.3	21.2	30.0	32.6
1.4	7.2	21.4	21.7	27.6	31.8
2.5	9.7	22.3	24.4	29.2	35.5
6.5	13.2	18.3	25.3	33.6	42.1
9.0	11.8	19.4	25.1	30.8	36.1

8.3	13.1	20.7	23.8	30.0	36.7
8.1	13.2	19.0	20.9	29.2	30.7
5.3	11.9	19.0	20.5	27.8	31.2
6.9	11.5	17.7	19.5	26.9	31.0
3.8	10.6	18.4	18.3	28.6	31.0
10.3	15.3	19.8	22.8	28.6	30.5
18.2	23.4	23.9	27.8	31.7	32.6
16.9	17.7	20.8	24.8	37.2	32.0
11.5	13.2	20.0	24.0	29.7	30.4
14.1	18.8	22.7	26.3	29.6	34.6
16.9	20.6	23.4	27.8	28.0	31.6
14.0	16.2	22.2	25.7	31.6	35.9
13.5	16.7	22.7	25.1	26.0	32.7
11.1	15.2	21.8	25.6	26.7	34.4
9.2	13.3	19.7	24.2	29.8	28.1
3.7	10.5	20.2	22.9	25.9	30.8
6.7	11.0	20.6	23.8	28.3	35.8
4.3	8.7	16.9	20.4	31.6	33.9
3.3	12.5	16.9	20.7	30.3	38.0
6.6	13.3	16.4	19.6	29.6	38.2
3.3	10.5	17.0	19.3	26.8	31.0
3.4	11.6	17.4	19.5	24.9	26.4
10.5	14.5	19.3	19.6	25.3	25.1
6.5	11.4	15.9	19.7	24.6	26.5
4.2	12.7	16.4	18.2	26.0	27.4
7.6	13.1	16.2	19.6	25.3	25.3
4.7	10.6	18.6	21.5	25.0	27.9
0.0	10.4	19.4	23.8	26.3	29.3
2.8	13.0	18.6	26.5	26.3	28.5
2.5	11.7	18.8	24.4	25.8	30.0
6.5	14.6	19.8	24.0	26.3	29.8
0.6	10.7	18.4	22.9	26.3	29.3
3.5	10.3	20.4	24.2	30.8	31.5
4.9	15.2	21.0	25.6	32.1	33.7
10.6	13.0	21.3	25.6	30.2	35.0
6.9	11.5	20.0	26.6	33.9	45.3
2.0	7.9	17.3	25.9	36.6	46.2
6.7	9.7	17.5	25.5	33.8	42.5
8.6	13.4	20.4	25.6	33.0	37.4
5.0	11.5	18.6	26.9	27.8	33.2
4.9	10.8	18.2	25.2	26.8	34.5
2.7	9.7	18.4	25.0	27.6	34.8
16.9	23.3	23.5	28.0	31.5	34.8
10.6	14.2	21.2	25.7	28.5	38.6
14.3	19.6	23.8	28.2	29.4	47.8
12.4	17.2	22.0	28.5	30.6	42.5
20.0	23.4	27.7	30.4	30.2	32.8
21.2	22.3	27.0	30.3	28.4	30.4

11.3	13.3	18.4	25.6	25.4	30.6
9.6	16.4	19.8	26.5	28.6	31.7
9.5	16.6	20.5	27.4	29.3	32.3
17.0	20.1	22.6	27.6	28.2	33.1
18.1	20.8	23.6	29.5	29.2	36.4
18.2	21.1	26.2	28.5	30.6	34.7
18.5	22.9	25.1	27.3	29.4	37.8
18.9	22.7	26.6	29.7	30.8	35.6
19.4	24.5	27.6	31.0	31.7	33.0
18.8	21.9	26.0	29.4	27.5	30.5
15.7	20.6	25.0	27.5	25.5	28.9
12.5	22.0	26.3	31.5	30.9	34.5
25.3	27.6	28.9	32.8	33.3	34.9
18.7	21.0	26.1	28.0	32.9	37.5
19.1	22.6	27.6	30.4	31.4	38.5
24.2	29.9	33.4	33.5	34.1	38.6
18.5	20.7	27.3	27.8	29.8	38.4
18.4	23.5	28.0	28.9	31.5	37.7
19.3	22.1	25.2	27.8	32.5	38.1
6.6	16.7	22.1	24.0	29.7	37.4
8.7	16.5	22.4	23.1	26.4	37.6
4.6	16.1	21.6	22.0	27.8	37.4
11.0	17.6	21.6	23.2	28.2	37.0
16.8	20.2	23.7	25.4	30.8	36.2
17.3	25.3	27.4	27.9	33.8	39.6
11.0	16.6	22.0	27.0	31.5	43.1

1/3 LASeq 63.0	1/3 LASeq 80.0	1/3 LASeq 100	1/3 LASeq 125	1/3 LASeq 160	1/3 LASeq 200
42.6	45.1	41.4	44.4	46.4	44.2
37.7	35.8	35.4	42.1	43.1	44.0
35.3	33.9	34.9	41.5	41.3	42.9
36.5	38.0	38.9	41.0	42.3	45.6
36.5	39.4	42.1	43.3	44.2	47.3
37.7	38.0	40.2	42.0	41.5	42.2
35.7	39.7	43.3	42.6	43.8	50.5
34.2	38.9	43.2	41.1	42.8	47.6
41.0	48.4	49.6	52.2	58.6	52.9
43.1	57.6	64.3	54.3	64.9	67.8
45.2	51.2	56.1	57.8	61.0	64.6
49.7	59.7	56.4	60.9	74.9	69.2
41.6	50.3	47.3	52.1	63.8	59.5
33.5	34.3	40.1	41.4	46.8	47.0
33.7	36.8	40.3	45.1	45.9	47.7
33.1	39.3	41.3	42.1	43.1	45.8
32.8	36.8	41.1	46.5	48.4	50.2
33.8	39.4	41.7	44.7	46.9	49.0
35.4	41.2	47.3	42.9	45.0	47.0
33.6	41.9	41.8	44.6	46.9	48.9
36.6	44.6	42.1	43.7	45.6	46.1
41.9	45.3	46.3	50.5	53.8	53.9
43.3	44.6	47.0	52.3	53.4	58.9
40.4	47.1	52.4	53.8	59.3	58.5
35.0	39.0	39.6	44.8	45.8	48.1
33.2	36.9	39.1	39.6	41.0	43.5
31.9	37.0	38.4	38.9	40.8	42.9
31.4	35.9	42.8	45.3	41.8	43.7
36.1	47.3	52.7	56.6	48.1	55.2
36.8	46.4	44.9	52.4	47.8	50.8
34.6	41.0	44.4	44.4	46.9	48.0
33.7	40.4	41.4	43.4	46.5	46.5
42.2	39.6	43.3	46.7	48.7	54.5
35.3	33.8	42.8	45.0	46.0	48.2
31.6	33.1	43.0	40.8	40.1	44.3
32.8	35.4	42.4	41.1	40.2	44.0
32.7	32.1	38.7	38.5	39.3	41.5
39.7	36.8	41.5	40.7	44.1	45.2
38.9	38.9	47.9	47.9	47.1	49.9
33.7	34.3	43.2	47.8	43.3	49.9
34.9	40.9	50.2	49.9	47.5	51.8
38.0	42.0	48.8	47.8	47.4	46.4
36.0	38.0	44.5	45.6	45.8	44.3
38.6	42.3	49.8	59.7	68.1	64.6
42.6	53.0	54.7	75.4	69.1	66.9
41.9	59.2	54.7	69.3	65.6	60.4

38.9	58.7	57.9	65.4	64.1	59.4
38.2	44.3	49.1	54.4	61.8	63.9
35.9	39.9	48.9	50.1	65.6	61.7
38.1	40.6	45.2	49.0	53.8	52.8
37.4	40.5	39.5	46.4	47.0	49.3
33.7	34.6	38.0	43.1	46.0	46.4
36.8	37.0	43.6	48.1	46.9	51.2
33.2	42.2	45.2	52.2	47.5	52.3
32.3	39.6	51.0	49.2	48.9	50.1
36.7	43.3	47.5	52.3	49.4	52.3
36.3	43.8	47.0	49.6	50.3	52.7
38.6	42.3	47.2	48.4	48.6	52.3
36.7	36.4	41.2	43.7	44.0	45.2
38.6	38.8	42.5	48.5	46.4	48.7
36.1	40.9	43.1	43.6	46.9	47.2
35.5	46.2	50.6	46.5	48.1	49.8
36.1	47.7	59.2	58.4	53.5	59.7
37.5	43.8	49.8	49.6	53.0	57.2
39.0	36.4	52.0	44.0	48.9	51.2
32.4	34.0	40.4	41.1	43.9	45.9
32.8	34.7	37.3	39.1	40.2	47.3
33.8	36.9	41.4	40.1	43.3	50.5
33.2	33.1	41.4	38.8	41.0	44.0
33.0	31.9	36.9	37.9	38.0	41.6
32.2	31.9	33.7	35.5	37.0	39.6
31.6	30.6	34.8	36.1	38.8	41.0
32.1	34.2	39.2	38.3	40.5	44.6
31.2	31.4	35.9	36.6	38.9	41.9
33.9	35.0	35.9	36.1	37.6	39.3
41.5	50.5	41.2	40.8	46.6	44.4
44.1	50.7	44.0	44.4	49.8	48.6
38.0	37.7	41.3	43.0	43.8	48.5
38.6	41.5	44.4	47.4	48.7	53.5
39.9	45.2	50.1	49.9	53.7	55.8
39.7	44.2	48.9	50.6	53.5	55.8
50.0	46.2	55.7	62.3	61.1	58.7
49.0	57.1	55.4	61.3	57.9	58.2
44.9	48.4	56.6	64.2	60.1	61.0
46.3	46.3	62.0	61.0	57.5	57.7
42.4	44.2	58.1	61.7	51.9	53.6
37.0	40.6	51.7	48.8	47.1	50.7
36.7	40.3	46.3	45.0	46.6	50.5
38.2	40.4	45.2	44.7	45.9	51.3
38.5	44.0	47.2	46.7	50.5	54.3
37.5	43.4	53.7	46.4	52.4	54.4
41.9	48.3	50.0	49.9	53.3	58.5
39.7	41.4	43.5	46.0	48.5	53.3
36.1	38.4	42.9	43.2	46.8	51.5

35.7	39.9	43.4	45.6	49.6	54.7
38.1	42.2	46.0	47.3	54.9	56.5
40.9	44.3	46.6	48.7	53.3	56.1
38.5	40.6	45.0	49.0	51.9	55.3
37.3	39.0	47.9	49.1	52.3	55.4
38.4	45.6	47.0	51.4	53.9	58.7
42.9	42.0	44.2	48.1	51.8	55.1
43.5	41.8	42.9	47.2	49.9	54.1
38.6	42.2	46.8	45.2	49.8	54.2
35.4	39.8	44.0	44.8	49.2	53.5
34.2	39.3	42.3	45.1	48.8	53.5
38.4	40.3	43.3	46.2	50.3	54.8
38.4	40.6	44.7	46.4	51.3	55.7
39.6	39.8	43.5	46.8	51.4	55.4
41.9	48.1	46.5	47.8	50.8	53.8
39.6	42.4	45.8	46.9	49.9	53.0
35.8	38.8	44.1	46.2	50.9	53.3
37.1	43.7	46.3	46.0	48.9	49.8
37.3	41.9	46.7	47.8	48.4	50.8
34.3	37.6	42.6	43.9	47.4	48.1
37.4	40.8	44.0	42.9	45.6	44.8
38.5	42.2	46.0	43.9	46.7	46.7
37.9	39.3	44.6	45.2	46.2	45.4
40.2	44.0	48.8	46.6	48.4	49.0
42.5	50.9	56.5	55.8	58.3	59.5
52.1	54.8	58.3	56.3	61.0	62.6

1/3 LASeq 250	1/3 LASeq 315	1/3 LASeq 400	1/3 LASeq 500	1/3 LASeq 630	1/3 LASeq 800
48.9	48.7	46.0	46.7	49.9	51.0
46.1	47.2	44.4	45.8	47.9	49.4
42.9	42.6	46.4	46.7	48.1	50.2
46.5	46.8	47.0	49.6	52.2	55.0
48.4	46.5	46.8	49.6	51.3	54.8
43.7	42.1	43.2	45.1	46.7	49.6
47.6	46.8	46.5	48.0	48.3	51.1
45.7	44.7	45.6	46.6	47.0	49.5
56.6	56.1	54.9	54.1	56.3	56.2
69.8	71.7	70.0	71.2	71.4	68.7
64.5	65.3	65.0	64.8	65.7	67.0
72.6	74.6	69.6	71.2	71.7	70.6
62.2	62.9	59.2	60.9	62.6	62.7
49.0	48.8	49.1	50.5	53.1	56.4
48.0	46.7	48.1	50.5	53.2	55.2
46.8	46.1	47.6	50.0	51.7	53.4
52.2	52.4	54.3	57.0	60.1	63.7
50.2	49.4	51.2	53.2	56.0	59.2
48.7	49.4	50.9	51.0	52.3	54.9
51.3	50.7	50.1	52.1	52.9	56.1
48.4	46.9	47.9	50.6	50.5	53.2
55.1	57.3	57.7	60.1	60.5	62.1
58.3	56.7	59.5	60.2	61.0	63.9
64.7	59.2	62.7	63.2	63.6	65.8
50.6	49.0	50.7	52.1	53.6	56.5
44.8	44.0	44.9	46.9	48.5	51.0
46.8	45.2	45.8	47.5	49.4	50.6
46.1	46.9	47.8	50.4	55.2	57.0
53.1	53.4	54.7	55.3	57.6	59.6
51.1	52.3	53.2	55.5	57.8	60.8
49.7	49.3	51.1	53.3	55.9	61.1
46.5	46.0	46.9	47.5	50.4	53.2
54.7	55.8	58.6	59.6	64.5	69.0
48.8	48.7	52.2	53.0	56.8	62.0
44.5	43.6	44.0	46.1	47.8	50.7
45.7	45.1	48.4	48.7	51.0	51.9
44.3	43.9	45.8	45.8	48.4	49.9
47.1	47.0	47.4	48.6	50.2	51.9
54.6	51.9	52.0	53.6	55.6	56.5
49.5	47.8	46.5	47.3	49.7	53.1
47.8	47.7	48.0	48.0	50.1	51.7
46.8	46.2	46.9	49.5	51.0	53.2
44.1	42.1	43.3	45.4	46.3	47.8
60.7	61.7	58.5	61.0	61.0	62.6
71.6	67.2	61.5	64.5	64.8	67.5
60.8	60.7	60.1	62.6	63.4	65.4

57.7	58.6	57.4	59.5	60.5	62.6
56.6	56.8	56.8	56.8	58.3	59.9
57.2	56.9	56.8	57.3	59.8	62.1
54.1	52.4	53.4	55.1	57.7	60.7
51.2	51.6	51.2	53.4	55.5	58.7
48.7	49.6	48.0	51.1	52.8	55.4
50.1	49.2	50.1	51.9	54.3	57.5
49.6	47.1	47.4	49.4	50.3	52.0
50.0	50.4	50.7	53.7	54.5	55.7
53.7	53.3	54.9	56.9	58.5	60.6
55.1	53.5	55.3	57.9	58.7	61.5
53.7	52.3	53.5	55.4	56.2	59.0
46.5	47.3	48.6	48.1	49.9	51.7
48.4	51.4	50.6	50.1	50.8	53.4
47.1	46.3	47.1	47.5	49.0	51.2
49.7	51.7	52.8	54.4	55.8	57.3
57.4	58.3	59.7	61.3	63.3	64.5
56.4	54.8	57.1	58.8	62.3	65.0
52.9	53.2	52.3	54.4	56.0	58.9
48.4	49.2	47.9	49.8	51.1	55.3
45.9	45.1	45.3	45.8	48.0	50.6
50.2	48.0	48.9	49.0	50.5	52.7
46.7	47.1	47.7	49.3	49.7	52.4
47.8	46.5	45.6	47.9	49.8	53.1
45.0	41.4	41.4	42.7	45.2	47.5
44.3	41.7	41.8	42.9	45.7	48.8
48.2	45.1	45.1	46.4	48.7	51.0
44.9	42.6	42.8	44.4	46.1	48.8
43.2	42.3	42.5	44.0	46.1	47.9
50.2	49.8	49.7	52.0	53.0	56.1
51.8	49.8	51.9	53.4	54.8	58.0
50.1	49.2	50.5	51.7	52.9	55.8
56.2	53.0	54.5	56.8	58.3	61.3
57.3	56.3	57.3	60.4	62.4	64.2
57.8	56.1	57.0	60.4	62.0	63.9
57.7	56.5	59.7	63.3	64.7	66.0
58.1	57.9	58.7	60.8	62.5	64.2
61.0	61.4	61.4	64.2	66.7	69.9
59.6	61.5	61.9	63.5	65.5	68.4
55.8	57.7	56.6	58.4	60.4	62.7
51.6	52.2	52.3	55.3	56.8	60.7
51.8	52.2	52.6	54.9	57.6	60.5
52.0	51.5	52.8	55.5	56.8	59.5
56.2	55.7	58.3	62.0	63.7	66.4
55.9	55.8	57.7	61.9	64.6	66.6
58.4	58.7	61.0	64.1	67.5	70.0
53.5	53.4	56.3	59.8	63.9	66.6
53.2	52.6	53.9	57.3	58.1	61.7

55.2	53.5	54.7	60.3	57.5	61.0
57.1	56.2	59.4	63.4	64.9	67.2
55.2	55.7	58.7	62.5	62.2	64.1
52.9	50.7	53.0	60.4	58.6	59.1
55.0	51.9	52.4	59.0	58.1	59.6
59.5	59.9	59.9	64.0	66.0	69.2
54.7	54.6	55.4	60.7	60.2	63.5
53.7	53.8	53.4	60.1	56.6	59.6
53.0	53.3	54.4	60.0	55.5	58.6
51.5	51.3	52.6	58.7	57.1	59.9
52.0	50.6	50.8	59.5	54.6	57.1
53.8	52.8	54.4	62.8	59.1	61.8
55.3	54.6	56.4	64.2	61.0	64.1
54.3	52.2	53.9	61.1	57.0	59.7
54.5	54.0	53.1	60.0	56.4	58.1
53.3	52.2	51.8	61.0	56.0	56.7
51.2	49.7	51.1	60.3	55.0	55.9
52.3	51.9	51.1	57.5	56.8	55.7
54.1	53.6	53.0	55.7	57.1	58.0
50.5	48.0	49.6	51.3	53.2	55.4
46.1	45.4	45.5	46.8	48.2	50.2
50.3	48.6	48.2	50.1	50.7	52.2
47.1	45.6	46.2	47.7	48.9	50.2
49.1	50.3	51.4	51.8	54.9	56.1
61.5	63.5	61.1	61.7	62.8	63.5
62.0	60.3	60.8	65.1	65.8	66.3

1/3 LASeq 1000	1/3 LASeq 1250	1/3 LASeq 1600	1/3 LASeq 2000	1/3 LASeq 2500
52.6	51.3	48.7	47.8	46.9
51.0	48.4	46.5	43.1	40.4
51.9	49.4	48.5	45.4	42.6
56.7	53.0	51.3	49.5	48.3
56.2	53.3	50.7	48.0	46.0
51.6	49.3	46.5	44.3	42.3
52.1	50.4	49.1	49.7	48.9
51.5	49.7	48.2	47.8	45.9
57.3	54.5	53.2	52.4	51.8
68.0	65.5	63.3	61.0	59.1
68.4	65.3	61.8	59.3	57.4
69.0	66.7	62.8	60.4	59.8
63.6	60.8	57.2	53.5	51.4
58.4	56.0	51.9	47.9	44.0
55.6	51.5	49.3	46.3	44.1
54.5	52.5	49.7	46.4	44.0
63.9	60.3	59.6	56.3	54.5
59.6	56.3	56.3	53.2	51.6
56.0	53.8	52.6	50.3	48.9
57.8	55.1	51.5	49.1	47.1
53.7	51.9	49.3	47.0	45.3
63.1	60.9	59.6	57.4	55.6
64.5	61.9	59.6	58.7	56.7
65.0	61.8	59.6	57.9	56.2
56.5	54.0	51.9	50.0	47.0
51.1	49.6	48.0	46.3	44.2
52.1	49.9	47.8	47.3	45.2
58.6	53.6	50.7	48.6	46.0
59.3	55.3	53.4	52.0	50.3
63.0	59.7	56.2	53.0	49.8
63.2	59.1	54.4	50.7	47.8
54.1	51.8	48.8	44.8	42.0
70.5	66.3	62.5	58.7	56.1
63.4	59.5	54.7	51.1	48.6
51.9	50.1	47.7	46.0	43.8
51.6	50.5	48.1	46.0	44.5
50.6	50.1	49.0	46.9	44.8
53.0	51.9	50.2	47.7	46.6
58.1	55.1	51.8	49.5	47.8
53.9	50.8	47.4	44.2	41.1
53.2	50.8	49.2	48.5	46.2
54.6	52.5	50.7	49.3	46.6
49.8	48.5	46.6	45.4	43.9
62.9	60.1	59.2	57.5	56.0
67.5	64.7	61.8	59.4	57.7
65.5	62.6	59.6	57.1	55.9

63.4	60.0	56.4	54.4	52.9
60.3	57.2	55.0	52.8	51.2
61.9	59.4	57.1	54.2	53.0
61.3	58.3	55.5	53.4	52.8
60.8	57.7	55.0	51.7	49.0
57.9	55.2	52.2	48.5	44.8
57.9	55.0	51.6	47.6	44.8
53.2	49.7	48.0	44.5	43.6
55.8	55.8	55.8	53.3	54.1
59.9	57.8	56.5	54.8	54.5
62.2	58.4	55.4	53.9	51.8
59.7	56.8	54.1	52.1	49.4
52.2	50.8	48.6	46.5	44.8
54.1	52.0	49.6	47.2	46.2
52.3	50.6	47.7	45.4	43.2
57.4	56.7	56.1	55.0	55.3
65.9	63.9	61.4	59.8	58.9
65.2	61.2	58.0	55.0	52.7
59.3	56.4	54.6	51.7	49.1
56.1	53.0	50.9	48.5	45.8
51.0	48.7	46.3	43.9	41.9
52.2	49.7	47.1	45.3	43.7
54.0	53.1	49.3	46.0	42.4
55.2	52.9	48.3	44.9	41.9
48.6	46.6	43.8	41.1	38.6
50.3	49.5	47.2	44.2	41.9
53.5	51.1	49.2	46.1	44.3
49.8	47.0	45.0	42.8	41.9
48.8	46.4	44.7	43.0	42.3
57.4	54.1	52.1	49.1	47.6
57.8	55.2	52.1	49.7	48.5
57.1	58.0	58.0	55.0	53.2
62.8	60.9	58.5	57.8	56.4
65.5	63.4	59.5	57.3	56.2
66.3	63.9	60.0	57.1	54.7
65.6	62.7	59.4	57.5	55.4
65.2	62.8	59.7	57.8	57.4
71.1	66.8	63.3	60.3	58.1
70.7	68.4	63.4	60.3	58.1
64.8	62.1	58.8	55.3	52.8
62.3	58.9	56.4	53.3	50.8
62.1	58.8	55.9	52.6	49.6
61.8	58.4	55.9	52.3	49.6
68.9	65.9	63.6	60.7	57.2
67.1	63.3	60.3	57.9	55.2
70.8	65.4	61.6	58.8	56.2
67.2	64.1	62.6	58.0	54.5
65.0	62.8	59.2	55.3	52.7

63.9	62.1	57.6	54.7	52.7
68.1	63.0	61.3	59.5	58.3
64.3	61.0	60.1	58.3	56.8
60.5	57.3	57.5	55.5	54.0
60.6	57.3	57.3	55.3	53.7
71.1	65.7	61.5	59.1	57.0
65.2	61.6	58.0	54.8	52.3
62.2	61.0	57.1	54.7	53.2
59.2	56.1	55.4	53.7	52.4
59.0	56.0	53.9	52.2	50.4
57.9	54.5	54.0	53.0	51.4
63.2	60.1	58.4	56.1	54.3
65.7	63.0	60.5	57.1	54.5
61.0	58.3	57.2	55.0	53.5
58.8	56.2	55.8	54.0	52.4
58.4	54.7	55.5	53.5	52.1
57.2	53.8	54.5	53.1	51.9
58.2	56.0	53.6	52.9	51.5
59.1	57.3	53.8	52.0	50.3
57.2	53.9	49.8	47.5	45.7
51.8	49.5	46.6	44.7	43.6
54.2	53.4	49.9	47.8	46.0
52.5	51.0	48.5	45.8	43.5
56.4	53.4	52.8	50.6	49.8
64.9	62.3	61.0	59.1	58.4
68.2	65.6	62.7	61.1	59.5

1/3 LASeq 3150	1/3 LASeq 4000	1/3 LASeq 5000	1/3 LASeq 6300	1/3 LASeq 8000
44.1	42.6	40.1	36.3	32.6
39.0	36.1	33.8	30.6	23.9
39.8	36.1	33.5	30.5	25.0
44.9	41.9	38.6	34.8	30.7
43.4	40.1	37.0	33.3	28.8
39.9	36.5	33.8	30.3	25.3
46.6	43.2	39.6	37.4	33.0
43.8	40.2	36.9	34.4	29.3
49.2	46.1	43.8	41.0	38.1
56.3	53.1	50.0	46.7	43.3
54.7	51.0	47.3	43.5	39.6
58.2	58.8	53.1	46.1	41.4
48.5	47.0	42.1	36.6	32.0
40.9	37.2	32.7	28.7	23.8
42.3	39.3	35.6	33.2	29.8
41.6	38.9	35.4	32.3	28.4
52.4	48.0	45.4	42.0	38.3
49.8	46.5	44.2	40.5	36.8
47.9	44.3	41.0	37.0	33.8
45.1	41.9	38.8	35.5	31.9
42.8	42.1	38.2	35.4	31.9
52.4	50.5	47.9	45.0	41.4
53.4	50.8	48.6	46.5	43.2
53.8	51.6	49.1	46.4	45.8
44.4	41.1	38.6	34.7	31.4
42.6	39.8	37.0	33.8	30.4
43.5	41.2	38.8	36.0	31.5
43.5	40.8	37.8	34.9	31.1
49.7	46.4	43.8	40.4	37.8
47.5	44.0	40.3	36.6	32.4
44.3	41.1	37.2	32.8	28.1
39.5	37.1	33.6	30.2	25.9
52.5	48.5	44.9	40.4	37.1
45.3	41.7	38.0	33.6	29.7
41.2	39.8	37.0	34.0	31.0
42.5	40.1	37.1	34.4	30.6
43.2	40.9	37.6	34.8	30.1
46.6	44.4	43.1	40.0	38.6
47.1	45.2	43.8	40.3	38.7
39.6	37.2	34.9	32.2	27.5
44.7	41.9	39.1	35.3	31.7
44.8	41.9	39.0	36.0	31.3
41.6	38.4	35.4	32.6	27.4
53.9	51.5	48.8	46.7	44.0
55.6	52.9	50.5	46.6	43.3
53.4	51.6	49.3	45.5	42.6

50.5	48.6	44.7	41.2	38.0
48.9	46.2	43.4	40.3	36.5
50.3	47.6	45.0	42.1	38.3
50.0	46.4	45.1	42.0	35.8
45.9	42.3	39.1	35.0	30.2
41.9	38.5	34.5	29.8	24.9
41.9	38.5	34.9	30.9	26.7
42.3	39.5	35.6	31.2	26.5
53.0	49.3	45.9	41.8	37.2
53.4	48.9	45.8	41.7	37.3
49.2	46.6	43.0	40.3	36.9
46.2	43.0	39.0	36.1	31.8
41.8	38.7	35.2	31.6	27.7
44.2	40.9	37.9	34.1	30.7
40.4	36.9	33.9	29.9	25.5
52.6	49.9	47.4	42.3	39.4
56.4	54.7	51.6	47.3	43.7
50.2	47.6	44.6	40.9	37.5
55.0	47.0	42.9	39.5	35.5
57.9	42.2	38.3	36.3	30.9
42.1	36.6	33.9	30.1	25.1
40.9	38.2	35.5	32.1	27.2
39.2	36.1	32.8	28.9	23.6
39.0	36.0	32.6	28.4	23.3
36.5	33.9	30.8	27.4	22.0
40.2	37.9	35.2	31.4	25.9
42.8	40.4	37.5	33.4	29.7
39.4	37.3	34.8	30.9	26.3
40.2	37.9	35.4	31.6	26.3
46.1	42.9	40.7	38.0	33.8
46.0	43.1	41.2	37.4	33.4
51.4	48.6	45.7	42.3	39.0
54.2	50.4	47.4	44.2	40.6
54.2	51.2	47.8	44.3	41.2
51.7	48.5	45.1	42.1	39.1
53.2	49.5	47.3	50.8	38.7
57.5	51.8	66.2	70.4	47.4
54.0	50.5	58.4	55.0	39.3
54.4	50.6	47.8	43.3	38.6
50.0	46.8	43.0	38.7	33.7
48.2	45.2	41.6	37.8	32.6
46.8	43.8	40.2	36.0	31.4
47.8	44.8	41.9	38.1	33.7
53.7	50.4	47.5	44.9	42.0
51.7	49.3	45.6	41.9	38.8
53.1	50.0	46.4	45.4	38.6
50.8	47.3	43.3	39.5	35.1
49.2	45.4	42.0	37.6	33.0

49.9	46.8	44.1	39.5	34.1
54.2	51.1	48.3	43.9	39.4
53.2	50.5	47.6	42.7	37.6
51.7	49.7	47.5	42.7	35.7
51.5	49.8	47.2	42.0	35.1
53.7	50.6	47.0	42.7	38.6
49.8	47.3	44.5	39.9	34.2
51.1	48.9	46.1	41.6	35.8
50.5	48.5	46.3	41.7	35.4
48.6	46.4	43.9	39.3	32.8
49.9	47.7	45.0	40.4	33.9
52.4	50.2	47.5	42.5	35.8
51.8	49.0	46.4	41.7	36.1
51.2	48.3	45.5	41.0	41.1
50.5	47.9	45.2	41.0	36.7
49.9	47.1	44.7	39.9	33.4
49.7	47.1	44.3	39.9	33.6
49.4	46.7	44.1	41.4	37.1
47.1	44.4	41.4	38.8	33.9
42.6	39.2	35.6	32.2	29.0
42.3	38.5	35.7	31.8	29.0
43.6	40.8	37.6	34.2	31.8
40.8	37.6	35.4	32.1	28.3
48.2	45.3	42.6	39.1	36.6
56.3	53.2	49.9	47.2	43.7
57.2	55.1	52.4	51.0	49.4

1/3 LASeq 10000	1/3 LASeq 12500	1/3 LASeq 16000	1/3 LASeq 20000	1/3 LASmax 6.3
28.9	24.9	19.8	20.5	1.9
19.1	14.4	10.6	11.4	1.9
19.8	14.5	10.5	10.5	1.9
26.0	20.5	15.1	11.7	1.9
23.7	18.0	13.0	11.0	1.9
20.7	15.8	12.2	11.0	1.9
29.5	24.5	19.4	14.6	1.9
25.1	19.2	13.5	11.1	1.9
34.0	29.1	23.5	17.1	1.9
39.5	34.8	29.3	21.4	1.9
35.5	30.9	25.7	18.9	1.9
34.2	29.0	23.2	16.8	1.9
24.2	18.3	13.0	11.1	1.9
19.0	14.5	10.7	10.5	1.9
25.4	20.4	15.7	11.6	1.9
23.5	17.9	13.0	10.9	1.9
32.6	28.0	28.6	12.7	1.9
31.8	26.0	26.1	12.6	1.9
44.4	35.5	19.8	28.6	1.9
40.2	29.7	17.3	25.0	1.9
27.5	22.3	15.8	12.1	1.9
36.5	31.4	26.4	18.8	1.9
37.9	32.5	27.1	19.7	1.9
39.3	35.2	31.4	22.9	1.9
27.9	21.3	21.1	10.9	1.9
33.2	24.3	31.6	12.7	1.9
27.5	21.9	20.0	11.8	1.9
26.0	20.0	15.1	16.3	1.9
33.9	29.4	28.5	22.5	1.9
26.9	21.3	19.6	14.3	1.9
23.5	17.6	12.6	9.8	1.9
21.1	15.7	11.1	9.5	1.9
32.8	27.0	22.2	15.5	1.9
24.9	19.1	13.9	10.3	1.9
24.5	19.6	15.2	10.4	1.9
25.2	20.0	15.0	10.3	1.9
26.9	19.5	13.0	9.7	1.9
36.2	31.2	25.4	20.2	1.9
36.0	30.3	24.1	18.5	1.9
22.2	16.0	11.2	9.7	1.9
27.7	21.8	17.1	11.1	1.9
26.8	21.3	16.3	10.7	1.9
21.5	16.0	11.2	9.6	1.9
39.7	34.3	28.7	20.7	1.9
39.3	34.4	30.8	21.4	1.9
38.2	32.4	29.9	21.2	1.9

32.9	27.9	23.0	16.4	1.9
31.4	25.8	20.0	13.3	1.9
32.0	26.4	20.6	13.3	1.9
30.7	24.3	19.3	11.5	1.9
25.2	19.1	14.2	10.0	1.9
19.7	14.6	11.0	9.8	1.9
21.9	16.5	12.2	10.5	1.9
21.4	17.2	13.3	10.7	1.9
32.3	29.2	27.1	17.2	1.9
32.9	28.5	24.2	16.2	1.9
32.6	27.1	21.6	15.0	2.0
27.7	23.0	18.1	12.7	1.9
23.3	18.7	15.0	10.6	1.9
25.7	20.6	16.5	11.1	1.9
20.1	15.3	24.2	17.4	1.9
36.4	30.2	27.1	20.8	1.9
41.1	35.6	30.3	23.3	1.9
33.2	28.9	22.6	15.5	1.9
30.1	24.4	19.0	12.1	1.9
25.6	19.4	13.6	10.2	1.9
19.8	14.6	10.6	9.6	1.9
21.6	17.2	12.1	9.9	1.9
18.5	14.2	10.5	9.9	1.9
18.9	14.6	10.8	9.7	1.9
17.4	13.3	10.1	9.7	1.9
20.8	15.2	10.9	9.9	1.9
25.1	20.3	17.0	11.0	1.9
20.3	15.9	11.8	9.9	1.9
20.4	14.9	10.5	9.8	1.9
28.7	23.9	18.8	12.1	1.9
28.5	24.1	18.5	12.0	1.9
34.1	29.1	23.0	15.1	1.9
36.3	30.9	25.7	18.0	1.9
36.9	31.9	26.8	20.2	1.9
35.8	30.7	26.0	18.7	1.9
34.7	29.5	24.5	17.1	1.9
44.2	42.1	36.8	40.0	1.9
35.2	31.6	25.2	24.8	1.9
34.1	29.6	24.3	16.7	1.9
28.2	22.6	16.9	11.5	1.9
27.4	22.2	15.8	10.9	1.9
26.4	21.2	15.0	10.9	1.9
29.4	24.4	19.0	12.0	1.9
37.9	34.6	28.4	20.9	1.9
34.3	29.4	24.3	17.8	1.9
34.4	29.5	24.3	17.6	1.9
30.3	24.7	19.3	14.0	1.9
27.8	22.3	17.3	12.4	5.9

27.7	21.4	16.1	11.5	4.7
34.2	28.8	23.4	16.2	1.9
30.8	25.3	19.3	13.3	1.9
26.8	17.8	12.4	11.2	1.9
26.5	17.4	11.8	10.6	1.9
33.6	28.5	23.9	17.7	1.9
27.3	20.7	15.6	12.1	1.9
29.1	21.9	15.4	11.8	1.9
27.8	19.6	13.5	11.5	1.9
25.5	18.2	13.2	11.2	1.9
25.4	17.3	12.1	10.8	1.9
27.4	18.9	13.2	11.2	1.9
29.9	23.0	16.9	12.5	5.4
27.0	20.3	23.1	19.5	2.7
31.9	31.7	20.1	15.3	1.9
27.9	26.6	12.6	12.0	3.6
25.1	17.2	11.8	11.0	3.6
32.3	26.3	21.0	14.1	1.9
28.5	22.2	16.6	12.1	1.9
23.2	19.2	13.8	11.6	1.9
23.5	18.9	14.1	11.7	1.9
25.7	20.7	15.4	11.8	1.9
23.4	18.0	13.1	11.3	1.9
33.1	29.6	23.0	16.2	1.9
40.1	34.9	29.2	21.6	1.9
42.9	38.6	32.7	23.8	1.9

1/3 LASmax 8.0	1/3 LASmax 10.0	1/3 LASmax 12.5	1/3 LASmax 16.0	1/3 LASmax 20.0
0.9	0.3	5.0	8.3	8.8
0.9	0.3	-0.8	2.8	7.7
0.9	0.3	-0.8	1.7	10.1
0.9	0.3	0.1	4.3	10.1
0.9	0.3	-0.8	1.7	8.3
0.9	0.3	-0.8	2.1	8.9
0.9	0.3	-0.8	3.9	11.5
0.9	0.3	2.0	7.2	13.9
0.9	0.3	3.6	6.4	14.5
0.9	0.3	6.3	13.0	16.5
0.9	2.9	9.2	14.6	18.1
0.9	0.3	0.9	9.1	16.2
0.9	0.3	3.9	8.1	20.6
0.9	0.3	1.5	6.0	11.6
0.9	0.3	1.4	3.4	16.2
0.9	3.3	6.8	13.6	16.5
1.4	1.5	6.1	10.4	11.7
0.9	0.3	-0.8	3.7	6.0
0.9	0.3	-0.8	2.2	9.6
0.9	0.3	-0.8	1.5	13.3
0.9	0.3	-0.8	5.2	13.4
0.9	0.3	-0.8	7.6	14.3
0.9	0.3	3.5	10.7	16.0
0.9	0.3	-0.6	11.1	15.5
0.9	0.3	-0.8	7.9	10.4
0.9	0.3	-0.8	6.5	10.1
0.9	0.3	-0.8	6.6	11.5
0.9	0.3	-0.2	8.2	10.8
0.9	0.3	-0.8	5.9	11.2
0.9	0.3	-0.8	7.3	10.4
0.9	0.3	-0.8	8.8	11.2
0.9	4.3	3.4	12.1	15.4
0.9	3.4	4.4	13.4	16.1
0.9	0.3	3.8	9.0	11.5
0.9	0.3	-0.4	8.8	10.2
0.9	0.3	2.5	11.9	14.2
0.9	0.3	2.5	10.1	12.8
0.9	0.3	0.7	9.2	16.6
0.9	0.3	10.6	21.1	25.5
0.9	0.3	1.4	13.5	18.0
0.9	0.3	2.2	9.0	14.9
0.9	0.3	2.5	8.9	12.7
0.9	0.3	-0.7	4.6	8.4
0.9	0.3	-0.2	5.7	13.8
0.9	0.3	-0.4	8.8	14.5
0.9	2.4	5.5	13.0	14.0

0.9	0.3	4.5	10.1	16.2
0.9	0.3	6.7	10.7	16.0
0.9	0.3	4.6	7.2	13.6
0.9	0.3	4.0	9.7	14.1
0.9	0.3	3.7	5.7	12.4
0.9	5.5	12.3	14.4	18.5
3.0	11.4	13.8	21.6	27.3
4.4	11.8	11.3	20.7	21.0
8.3	7.8	11.2	14.7	16.3
4.7	10.5	13.0	18.5	22.6
6.0	14.1	17.9	20.5	23.8
5.7	8.7	14.5	17.6	19.5
1.4	8.1	11.8	16.9	19.3
0.9	4.9	9.7	13.0	17.4
0.9	3.2	9.6	12.1	14.9
0.9	0.6	3.8	8.2	13.0
0.9	0.3	2.5	9.2	13.8
0.9	0.3	-0.8	6.2	10.7
0.9	0.3	-0.8	8.3	15.2
0.9	0.3	6.0	8.5	15.9
0.9	0.3	1.5	5.0	13.6
0.9	0.3	1.5	5.4	16.2
0.9	9.0	10.9	13.7	16.7
0.9	7.2	7.6	10.0	13.6
0.9	0.3	2.3	8.2	16.7
0.9	0.3	4.3	10.6	16.3
0.9	0.3	0.6	7.6	12.3
0.9	0.3	-0.8	2.6	12.8
0.9	0.3	3.1	5.9	15.5
0.9	0.3	1.7	4.8	13.7
0.9	2.7	4.3	9.8	17.2
0.9	0.3	1.7	4.1	12.3
0.9	0.3	-0.8	6.8	14.3
0.9	1.8	8.6	9.8	19.0
0.9	4.4	8.1	13.3	15.7
0.9	0.3	3.7	9.4	14.5
0.9	0.3	3.0	4.6	10.5
0.9	0.3	1.1	10.8	11.0
0.9	1.1	6.0	10.6	16.6
0.9	0.3	2.6	6.8	14.6
0.9	0.3	4.3	8.0	14.1
0.9	0.3	2.7	7.3	13.8
3.6	11.9	13.8	18.8	27.4
2.0	5.8	11.5	14.1	17.6
0.9	9.0	13.7	18.9	23.4
2.3	8.1	11.9	15.4	19.2
8.1	12.2	19.7	23.3	25.4
12.4	13.5	18.7	25.1	25.7

10.3	7.6	12.5	16.9	16.7
0.9	6.8	9.8	14.1	19.7
0.9	6.1	9.8	13.7	18.8
3.6	13.4	16.1	22.0	22.5
5.9	10.3	15.7	22.1	24.0
4.3	12.6	19.3	21.1	25.0
5.6	11.3	16.4	21.2	25.0
9.1	13.0	15.8	22.0	25.7
7.8	12.4	23.1	23.9	28.7
9.9	16.5	23.3	22.8	27.3
6.1	8.3	15.2	18.8	22.0
2.6	6.3	14.1	15.1	30.7
14.0	15.8	22.6	29.9	32.5
8.6	11.3	19.3	24.7	24.1
9.3	13.2	19.5	23.5	26.7
8.2	18.9	24.4	28.3	34.2
8.8	12.0	18.1	22.2	24.3
0.9	10.7	15.8	22.1	25.6
3.1	13.9	15.9	23.1	25.2
3.3	6.9	9.2	11.8	18.9
0.9	1.9	7.2	10.6	19.4
0.9	1.8	4.4	9.7	18.4
0.9	5.1	11.7	13.6	19.0
2.4	5.6	17.2	20.6	21.6
0.9	15.8	21.0	20.6	29.1
5.1	13.6	17.4	16.1	21.3

1/3 LASmax 25.0	1/3 LASmax 31.5	1/3 LASmax 40.0	1/3 LASmax 50.0	1/3 LASmax 63.0
22.0	28.3	31.7	38.1	47.2
23.0	26.0	33.0	35.4	39.5
23.3	25.5	33.0	35.9	36.3
19.2	25.4	34.2	37.2	38.4
18.4	26.5	35.4	37.7	38.2
18.3	27.2	35.6	37.5	41.1
23.4	25.7	35.8	36.7	38.7
26.0	27.3	35.6	39.2	35.7
24.6	24.9	36.5	39.3	43.0
24.4	27.0	38.1	41.2	44.9
23.5	26.3	39.9	45.3	47.5
22.0	35.3	47.9	44.9	55.2
20.9	33.6	44.1	37.5	47.2
19.9	29.0	28.8	34.0	35.5
19.6	19.8	24.6	30.2	37.2
21.1	23.2	26.5	28.6	37.0
21.6	25.1	26.4	35.3	34.3
22.4	24.5	24.8	36.3	35.9
20.7	25.8	28.9	35.9	38.0
22.4	28.8	31.4	36.7	35.8
22.4	25.8	32.2	34.5	39.3
22.0	27.3	35.7	45.1	44.7
22.3	28.4	35.6	44.4	44.6
23.6	28.5	38.0	41.4	42.0
19.2	25.1	28.6	34.0	38.6
16.1	25.1	24.9	30.1	34.3
19.0	27.8	24.5	27.9	33.6
18.3	24.6	24.7	27.3	34.1
17.8	25.8	32.4	33.5	39.8
18.6	25.3	32.4	34.9	39.5
16.8	25.2	30.1	32.6	36.9
20.3	25.6	26.8	31.0	36.0
17.7	27.6	38.1	37.2	47.3
17.6	24.6	35.2	34.9	40.8
19.6	24.0	28.7	27.4	33.1
20.2	26.1	28.9	29.5	34.3
19.1	25.5	28.0	30.9	34.0
27.6	29.9	32.2	36.7	42.1
28.0	39.8	41.1	40.7	41.9
20.3	31.0	32.4	33.4	35.6
18.1	22.6	35.2	34.9	36.4
21.1	22.6	33.1	35.3	39.9
22.5	22.5	29.8	33.2	38.4
23.6	26.6	33.1	37.0	43.0
20.3	26.8	37.1	45.2	44.2
22.2	27.1	32.9	37.6	44.2

22.6	26.3	32.6	39.9	41.2
20.1	23.5	30.7	32.1	40.5
20.8	22.1	28.9	32.4	37.9
19.1	21.1	28.5	32.8	40.8
20.8	20.1	29.8	34.0	40.3
21.7	24.4	29.5	33.6	36.7
25.7	30.7	35.6	34.9	39.0
23.9	26.9	39.5	33.9	35.8
21.1	26.4	33.8	32.8	34.1
25.6	29.8	31.9	36.3	38.9
25.5	30.9	30.3	34.1	37.8
23.2	27.8	35.7	41.3	42.8
24.4	26.5	27.6	36.7	39.8
23.0	26.6	29.0	37.1	41.1
20.8	25.8	32.7	30.3	38.3
21.4	25.2	28.0	32.8	37.4
22.6	26.0	29.9	38.5	38.1
18.6	21.8	33.5	36.0	39.2
18.3	22.7	33.5	41.0	43.8
18.9	21.0	30.9	41.2	35.2
18.4	20.8	28.9	34.2	33.7
20.0	20.9	26.2	27.2	36.5
21.0	21.3	26.3	26.6	35.7
16.9	22.0	26.8	29.6	35.2
18.6	21.0	27.2	29.6	34.0
18.2	20.9	26.9	26.5	32.9
19.8	22.7	26.1	29.9	33.2
20.6	28.0	28.6	31.1	32.2
20.9	27.7	28.1	31.9	38.3
21.5	26.5	27.6	31.7	48.4
21.9	25.7	28.2	31.3	48.5
19.6	24.1	28.5	32.6	39.6
22.1	26.7	32.8	34.5	42.1
22.0	26.8	33.8	37.4	41.7
22.3	27.6	35.3	37.1	43.2
22.6	29.1	36.5	49.2	54.0
19.3	27.6	40.7	48.7	51.7
21.5	27.4	38.2	44.8	48.1
22.8	28.7	37.2	39.6	47.9
20.2	29.0	29.7	34.8	45.3
19.8	27.6	28.5	35.7	39.3
20.3	26.9	29.9	36.6	39.2
26.0	30.4	34.3	37.4	39.6
23.1	26.8	30.4	42.7	40.0
26.0	30.3	32.1	49.5	40.2
23.4	30.6	32.5	46.1	45.0
29.3	32.6	32.6	35.4	41.9
30.3	33.7	30.5	32.4	38.1

20.8	27.0	27.2	33.4	37.8
22.1	28.1	31.6	35.3	45.9
23.4	29.4	33.4	35.2	45.7
26.0	31.5	31.6	36.3	40.0
26.8	33.1	33.3	38.7	39.8
28.5	30.6	34.1	38.7	42.0
27.1	28.4	32.1	41.1	47.0
29.2	33.6	33.2	39.7	46.0
32.1	34.0	35.4	36.5	43.5
28.5	32.4	31.0	32.7	36.9
27.4	29.2	27.0	30.0	35.0
32.4	38.5	37.5	40.3	43.3
32.9	37.6	38.0	38.9	40.6
28.5	30.2	35.5	41.3	45.4
29.0	33.6	32.9	41.5	45.3
37.7	36.9	38.5	40.8	42.6
28.8	29.7	32.2	41.3	37.4
29.9	31.5	33.5	41.2	39.9
28.7	31.0	34.8	41.9	40.7
23.8	25.1	32.2	39.6	36.0
23.6	24.5	28.0	41.4	39.7
22.8	23.5	29.0	40.5	39.9
23.7	24.7	29.5	40.3	39.3
25.7	27.7	32.3	37.8	42.6
31.8	30.3	36.9	40.8	43.5
24.4	28.8	33.2	47.4	56.2

1/3 LASmax 80.0	1/3 LASmax 100	1/3 LASmax 125	1/3 LASmax 160	1/3 LASmax 200
49.3	45.0	47.6	49.5	46.1
39.8	37.5	43.3	45.2	45.0
35.3	37.8	43.5	42.9	44.3
41.5	41.6	42.0	44.3	49.3
40.5	44.7	44.5	45.1	49.4
41.8	41.6	43.2	43.4	43.8
42.0	45.9	46.1	46.0	56.3
41.1	46.5	43.8	45.2	52.6
52.6	53.4	56.0	65.2	60.3
60.7	66.9	55.4	67.7	70.6
55.2	58.6	59.9	65.1	66.4
64.4	61.5	65.6	79.2	72.8
57.1	51.0	58.0	70.6	65.5
37.9	41.6	43.9	51.0	50.3
40.0	41.5	47.3	46.6	48.9
41.6	43.9	45.7	45.5	47.2
40.7	44.3	50.8	52.1	52.8
44.5	45.6	49.1	50.0	52.3
44.5	50.7	44.6	46.9	49.3
43.5	44.3	45.8	48.1	50.0
48.1	44.5	46.1	50.6	48.4
47.3	48.0	53.6	55.9	56.4
46.9	50.6	53.8	57.1	62.7
49.8	55.9	55.7	63.0	62.5
41.5	43.6	49.3	50.5	51.9
39.0	40.0	41.6	43.3	45.5
39.4	39.9	40.2	42.2	44.3
43.7	47.8	52.3	45.0	46.2
51.4	56.2	59.9	49.9	57.4
51.0	48.5	58.0	50.2	53.8
42.7	45.9	46.8	48.4	49.9
42.9	44.7	45.5	48.7	48.9
44.3	47.0	48.6	52.0	58.1
38.3	46.0	46.8	49.4	53.5
34.5	45.8	42.3	41.5	46.2
38.5	44.4	43.1	41.1	44.7
33.3	40.0	39.5	40.7	42.8
42.3	50.8	43.5	47.8	49.6
41.7	52.1	51.6	49.2	51.0
35.7	48.2	53.6	46.5	53.3
42.6	54.9	53.7	50.5	54.5
44.1	49.6	49.2	49.0	48.5
40.1	48.4	46.6	46.9	45.7
48.0	52.1	69.4	74.4	71.2
55.4	57.4	79.4	72.7	70.4
63.8	59.6	73.9	71.5	63.7

64.0	60.9	71.9	69.8	63.6
46.9	51.6	58.0	66.6	69.1
41.8	51.6	52.9	68.9	67.0
42.9	46.7	51.0	58.8	55.7
42.9	42.7	48.2	48.6	51.3
35.8	40.4	45.0	47.9	48.0
38.7	44.7	51.3	48.7	55.7
44.7	48.1	54.3	49.9	55.8
41.3	54.8	51.9	50.4	52.0
46.0	50.0	54.0	50.3	53.3
47.4	50.0	52.1	51.8	55.7
46.5	50.0	50.4	50.9	54.9
37.4	43.7	48.7	45.9	47.2
44.9	44.1	49.4	48.9	50.5
44.6	45.2	47.3	49.3	49.8
52.0	60.9	56.9	54.7	58.8
52.0	62.0	63.1	54.8	61.6
45.9	52.9	51.8	54.5	60.4
39.2	54.0	46.2	51.3	53.0
35.1	45.0	43.1	47.0	48.4
36.2	38.8	41.8	41.6	50.5
38.9	43.5	42.2	46.1	53.3
35.6	43.8	40.7	43.1	47.3
33.8	38.6	39.2	39.0	42.9
33.5	34.8	36.3	38.7	41.4
34.0	37.1	39.5	40.9	44.1
35.5	41.2	39.5	41.7	45.5
32.8	37.7	37.4	39.8	43.5
41.8	41.1	37.8	39.1	41.1
55.3	43.6	45.0	49.6	47.9
54.8	45.7	45.4	52.6	49.6
42.0	46.1	47.1	47.0	53.6
44.7	48.0	48.9	51.6	55.2
46.9	51.8	51.2	55.0	57.3
47.3	51.7	53.6	55.1	56.5
48.4	60.5	66.4	64.8	61.5
61.8	57.4	67.6	60.8	59.5
51.7	59.6	68.2	62.2	62.8
48.5	63.6	62.2	61.4	60.1
47.0	61.1	64.7	54.5	55.1
42.2	54.9	53.7	48.4	52.4
42.4	47.2	45.8	47.6	52.4
42.5	46.7	45.9	46.6	52.2
46.6	52.3	48.7	52.3	56.5
46.8	57.0	49.9	54.3	57.0
52.7	52.2	51.1	55.3	60.4
45.1	45.6	48.5	51.6	56.0
41.4	44.8	47.0	50.0	55.9

41.5	44.9	46.8	50.5	55.8
48.7	51.0	53.1	59.8	58.6
48.7	50.1	52.1	58.1	58.5
42.0	47.8	51.9	53.7	56.5
40.2	49.9	50.4	54.7	56.1
50.8	51.2	54.4	56.5	62.1
44.6	46.0	49.4	54.1	58.1
45.7	45.2	48.5	50.8	54.8
46.0	49.4	46.1	50.4	55.3
42.2	45.5	45.7	50.1	54.7
40.8	43.1	46.0	49.9	54.8
43.3	45.1	47.1	51.5	56.0
43.1	45.9	47.1	52.2	56.5
42.8	44.9	49.9	52.0	56.1
51.2	48.4	49.9	52.0	55.2
44.6	46.7	48.2	50.7	53.8
41.7	46.1	47.2	52.2	54.8
48.3	51.3	50.0	51.1	52.5
45.9	51.0	50.8	49.9	52.5
39.3	44.3	45.9	48.8	49.9
44.5	45.1	44.4	46.9	45.6
44.7	47.3	44.6	47.3	47.5
40.9	45.7	48.1	47.0	47.4
49.6	57.2	54.8	53.8	55.5
52.6	59.1	57.2	60.6	60.8
57.9	61.2	57.5	63.8	65.2

1/3 LASmax 250	1/3 LASmax 315	1/3 LASmax 400	1/3 LASmax 500	1/3 LASmax 630
50.7	49.8	48.4	47.9	51.8
48.1	50.9	46.4	46.3	48.7
44.0	43.7	50.1	47.8	50.3
50.1	49.1	48.9	52.1	54.6
51.9	49.0	48.7	52.0	54.1
44.7	43.8	44.4	46.5	47.6
51.0	48.2	48.7	50.0	50.4
48.9	47.8	48.2	50.0	49.5
64.7	59.7	59.3	58.9	60.7
72.6	75.1	72.6	73.5	74.2
66.8	70.1	69.4	68.8	69.1
76.1	78.7	73.7	75.7	76.2
68.8	69.5	65.4	67.0	67.9
52.3	52.6	52.6	53.9	56.9
49.2	47.9	50.2	51.9	53.9
48.0	48.1	48.8	50.9	52.8
55.2	54.1	56.5	59.8	62.8
53.5	53.2	55.2	57.6	60.7
50.6	50.5	52.9	52.1	53.8
52.0	51.4	50.9	53.3	53.7
50.3	49.5	50.3	55.8	52.9
58.8	59.2	60.0	61.0	61.9
59.9	58.3	62.5	61.9	63.3
68.7	62.2	65.8	66.2	66.5
55.8	53.2	55.4	56.4	57.8
47.4	45.4	46.5	48.2	49.8
48.8	47.9	47.0	48.3	49.9
48.6	51.2	49.7	52.6	57.9
56.1	56.3	56.8	57.2	59.3
53.1	53.8	54.8	56.5	58.6
52.4	51.8	52.7	55.5	58.5
48.3	47.7	48.6	50.6	52.3
58.1	59.3	61.9	63.1	68.5
53.5	53.8	57.3	58.1	62.3
45.9	45.1	47.1	49.4	49.8
47.5	46.7	49.7	49.9	52.6
45.6	44.7	48.3	47.3	50.0
53.7	51.7	53.5	53.4	56.9
56.4	53.1	54.4	55.4	57.7
51.5	50.1	48.5	50.6	52.8
48.4	50.0	49.8	51.4	54.7
48.4	48.7	48.8	51.6	54.3
45.7	44.2	44.7	47.7	49.3
68.0	66.2	62.1	65.1	65.4
75.6	71.5	63.1	66.3	66.3
64.0	62.6	61.6	65.0	64.7

61.1	62.0	59.6	62.0	62.4
59.0	58.4	58.9	57.6	59.3
59.8	58.6	58.2	58.0	60.7
55.3	53.8	55.0	56.0	58.8
52.2	52.4	52.3	54.3	56.8
49.7	50.4	49.7	53.2	55.0
51.6	50.0	51.5	52.9	55.7
51.0	48.4	49.1	51.0	53.1
51.8	52.7	53.9	56.1	57.4
55.2	54.7	56.8	58.8	59.6
57.3	55.0	57.7	60.5	59.9
56.8	55.0	55.8	58.3	59.1
47.8	52.3	51.3	49.6	51.5
50.0	53.3	51.8	51.2	51.3
49.4	48.8	49.9	49.7	50.9
56.5	57.6	58.2	61.2	62.6
58.2	60.1	60.9	62.2	64.7
58.2	56.5	59.1	61.1	65.1
54.2	55.4	54.7	55.7	58.3
51.2	51.9	50.7	52.5	53.7
50.5	49.1	47.6	47.2	49.7
51.5	49.5	51.0	50.5	51.4
48.1	48.0	48.1	50.2	51.6
49.0	48.2	47.8	49.8	51.9
47.4	43.3	42.2	44.3	46.9
47.6	44.8	43.7	44.9	48.5
49.5	46.3	46.2	48.1	50.0
45.7	43.1	43.9	45.0	47.0
44.3	43.5	43.2	45.2	46.9
52.7	52.9	54.3	54.5	55.6
53.2	51.6	54.0	54.6	56.0
56.1	53.9	55.4	57.3	57.6
57.8	55.8	55.6	58.0	59.8
58.8	56.9	58.6	61.3	63.6
58.8	57.4	57.9	61.1	62.7
59.6	58.2	61.0	66.2	66.9
59.8	60.2	60.7	63.1	64.7
63.0	63.9	63.5	67.3	69.7
61.9	64.1	64.9	65.8	68.2
57.7	60.2	59.4	60.4	62.6
53.2	54.1	53.7	57.0	58.3
53.3	53.0	53.9	56.1	59.0
53.2	52.7	53.6	56.6	58.0
59.3	58.9	60.5	65.4	69.2
59.6	59.0	60.7	65.4	69.2
61.2	60.7	62.6	66.3	70.1
55.9	55.5	58.5	62.1	66.8
59.5	57.3	59.3	60.9	61.1

59.3	56.9	58.7	61.8	60.5
60.3	60.6	64.1	67.3	68.4
58.9	59.7	63.2	66.6	67.0
54.1	52.0	55.2	61.3	59.7
56.1	53.6	53.5	60.1	58.9
63.3	64.2	63.5	67.6	69.4
57.9	57.6	58.7	62.6	64.3
54.8	55.2	55.0	61.3	57.6
54.3	55.0	56.4	60.8	56.6
52.1	52.1	53.5	59.6	59.0
52.7	51.3	51.6	62.4	55.8
54.8	54.1	56.6	65.5	60.5
56.3	56.1	57.1	65.3	62.4
55.6	53.6	55.4	62.1	59.3
55.6	55.6	53.9	61.0	57.6
54.7	54.1	53.1	62.6	57.0
52.6	50.9	52.0	61.5	56.5
56.2	55.9	54.5	60.7	60.7
56.6	56.5	54.8	59.2	60.4
53.2	50.7	52.2	53.2	54.7
49.6	48.1	47.7	48.8	50.6
51.2	49.7	48.9	51.1	51.7
49.0	47.0	47.0	49.6	49.7
56.5	56.5	56.9	57.2	61.8
63.0	66.1	63.5	63.5	64.2
64.4	62.4	62.1	67.6	67.9

1/3 LASmax 800	1/3 LASmax 1000	1/3 LASmax 1250	1/3 LASmax 1600	1/3 LASmax 2000
52.0	53.7	52.6	49.7	49.8
50.3	52.5	49.6	47.3	44.0
51.7	53.7	51.2	50.2	46.7
58.1	58.9	55.6	53.4	51.4
57.5	58.6	55.5	52.9	50.2
50.6	52.4	50.0	47.2	45.4
52.5	53.7	52.0	50.7	51.6
52.6	53.8	52.2	50.7	51.4
61.2	62.1	59.3	57.3	56.6
70.8	69.7	67.5	65.2	62.4
67.8	69.6	66.8	63.4	60.4
74.7	71.3	68.8	64.5	61.6
66.6	65.8	63.9	60.7	57.1
60.3	62.5	59.6	55.4	51.1
55.9	56.9	52.7	49.9	47.2
55.8	56.9	53.7	51.0	47.4
66.2	66.8	63.0	64.4	59.9
64.7	65.1	61.1	62.0	58.4
57.0	57.7	54.9	54.1	52.4
56.8	58.6	56.3	52.4	49.7
56.5	55.6	54.4	52.5	50.3
63.9	65.2	62.5	61.2	59.0
66.0	65.4	63.0	61.0	60.7
68.3	67.1	63.5	61.2	60.0
60.8	60.5	58.0	56.1	54.6
52.6	52.1	50.9	49.4	48.1
51.2	52.7	50.6	48.8	48.4
59.6	62.3	55.8	52.2	50.4
61.1	60.4	57.1	54.8	53.6
63.4	65.2	62.0	58.0	54.2
63.5	65.5	61.4	57.2	53.4
56.7	58.0	54.8	51.7	47.6
72.3	73.3	69.6	65.4	61.6
67.2	68.8	64.6	59.8	56.2
53.4	54.8	53.0	49.4	46.6
53.4	53.0	52.1	49.5	47.2
51.5	52.1	50.9	49.7	47.8
57.4	57.0	55.1	52.9	51.6
57.8	59.1	56.5	53.7	51.6
56.2	57.3	53.5	49.2	45.9
55.8	57.0	53.6	52.1	51.9
56.6	56.4	53.6	52.3	51.6
49.2	51.2	49.7	48.0	46.7
67.4	67.2	63.7	62.7	61.3
68.8	68.5	66.3	62.5	60.4
66.4	67.4	64.6	62.0	59.1

65.1	65.8	61.5	58.2	56.2
61.0	61.1	58.5	56.7	54.6
63.5	63.1	60.4	58.1	55.2
61.3	62.0	59.0	56.5	54.7
60.5	61.8	58.6	56.1	53.0
57.3	60.1	57.3	54.3	50.9
58.8	59.5	56.0	52.8	48.2
56.1	57.3	53.1	51.2	46.7
59.8	59.1	59.5	59.4	57.3
61.6	60.5	59.1	59.4	57.5
63.0	64.1	59.7	57.0	55.1
61.8	62.9	59.7	57.2	55.1
53.3	54.1	51.6	49.3	47.0
54.2	54.7	52.9	50.4	47.7
52.6	54.6	52.6	49.5	47.2
63.8	63.7	62.6	61.7	60.8
66.8	67.2	64.5	62.3	61.2
67.1	67.6	64.0	60.6	58.1
60.3	60.3	57.1	55.8	53.1
58.0	58.5	55.5	53.9	51.6
53.0	52.2	49.9	47.2	45.1
53.8	52.9	50.6	47.7	46.4
54.1	56.4	55.4	50.5	46.9
55.0	57.6	55.2	50.2	46.7
49.2	50.4	48.0	44.7	41.9
51.1	52.8	52.4	49.9	46.7
51.9	54.9	53.0	51.4	48.0
49.4	50.9	47.9	46.1	43.5
49.1	51.3	48.4	47.3	45.4
59.1	60.1	56.7	53.7	50.8
59.0	60.0	56.7	53.5	50.8
60.2	60.4	63.0	61.7	60.8
62.9	64.9	62.7	61.7	61.1
65.5	66.4	64.0	60.1	57.9
65.0	66.9	64.7	60.8	57.7
67.4	67.0	63.6	60.9	59.0
66.4	67.5	64.9	61.6	59.8
72.8	73.9	69.7	66.1	62.8
71.0	74.0	71.2	65.8	62.4
64.6	66.9	64.4	60.5	57.2
61.7	63.3	60.3	58.0	54.7
61.2	63.4	60.0	57.3	53.7
61.4	63.9	60.0	57.5	53.6
70.4	70.7	67.6	65.6	62.3
70.7	70.8	66.8	64.1	62.0
72.2	72.9	67.5	63.6	60.9
69.6	69.7	66.3	65.2	60.7
65.6	69.2	67.1	62.3	58.7

65.1	69.1	67.0	62.1	58.3
69.5	69.5	65.7	65.2	63.7
68.5	68.5	65.0	64.4	62.3
60.4	61.8	58.1	58.7	56.9
60.5	61.6	57.9	58.1	55.9
72.7	74.5	69.0	64.3	61.8
67.7	69.0	64.4	60.1	57.3
60.8	64.3	62.5	58.0	55.5
59.9	60.9	58.2	56.9	55.3
61.9	60.8	57.4	54.5	53.3
58.3	59.8	56.9	55.8	55.1
63.3	64.4	61.4	59.9	56.8
65.2	67.0	64.2	61.7	58.0
62.4	64.3	62.2	59.8	56.2
58.8	59.9	57.2	57.7	55.7
57.7	60.0	56.0	56.6	54.5
57.1	58.9	54.6	56.0	54.9
59.8	60.7	59.9	56.0	55.2
60.4	60.8	59.6	56.1	55.2
56.6	58.2	55.2	51.5	49.4
52.9	54.5	51.7	48.4	46.8
53.1	55.0	54.4	51.0	49.0
51.2	53.3	52.0	49.0	46.3
62.5	61.4	58.0	57.1	54.1
64.4	65.9	64.0	62.8	61.0
68.1	69.8	67.3	63.3	62.0

1/3 LASmax 2500	1/3 LASmax 3150	1/3 LASmax 4000	1/3 LASmax 5000	1/3 LASmax 6300
49.0	45.9	44.8	42.1	38.7
41.9	40.0	37.5	34.8	31.8
43.9	40.5	36.5	34.7	31.9
50.9	46.4	43.6	40.0	36.1
48.6	45.9	42.7	39.4	35.5
44.0	41.3	39.2	36.0	32.9
50.5	48.6	45.0	41.5	39.4
49.9	47.6	44.1	40.6	38.9
55.9	52.9	50.4	47.9	45.9
60.5	58.0	54.8	51.3	48.3
58.4	55.8	52.4	49.2	45.8
62.3	61.8	63.5	57.8	48.5
55.4	53.0	52.7	47.6	41.4
47.4	44.1	40.3	35.9	31.1
45.4	43.8	41.6	38.0	35.3
45.5	43.7	41.6	38.2	35.2
58.2	56.0	51.8	49.3	45.9
56.3	54.2	50.1	47.7	44.1
51.3	50.5	47.2	44.2	40.1
47.8	46.0	42.7	39.8	36.3
49.5	46.4	45.8	42.9	40.5
57.4	54.0	51.5	48.9	46.1
58.6	55.2	52.8	51.0	49.0
58.9	56.7	54.7	52.4	49.8
51.6	48.8	45.6	43.4	39.6
46.0	44.7	42.4	40.3	37.3
46.1	45.1	43.0	40.7	37.9
48.1	45.8	42.7	39.7	36.5
51.9	51.7	48.1	45.8	42.5
50.7	48.9	45.2	42.1	38.8
50.0	46.8	43.2	39.4	35.1
44.4	41.3	39.6	34.3	31.0
59.0	55.5	51.6	47.9	43.5
53.7	50.3	46.2	42.2	37.5
44.7	41.8	40.6	37.8	34.7
45.6	43.7	40.8	37.7	35.1
45.8	44.3	42.0	38.4	35.7
50.4	50.1	48.3	48.0	44.5
50.4	50.1	48.4	47.8	44.4
42.7	41.5	39.2	37.5	34.9
49.7	48.4	45.4	42.7	38.9
49.0	47.6	44.8	41.9	38.4
45.9	44.0	40.9	38.3	35.4
59.3	57.3	54.7	51.9	50.0
58.8	57.5	54.6	52.4	48.5
57.6	55.1	52.9	52.2	47.8

55.2	52.8	51.5	47.5	44.1
53.4	50.7	47.7	45.0	42.0
54.1	51.2	48.6	46.2	43.4
54.7	51.2	47.7	46.8	43.5
52.0	49.0	45.2	43.0	39.2
47.2	44.3	40.8	36.7	32.2
45.7	42.8	39.3	35.8	32.1
46.9	45.7	43.7	38.9	34.6
58.6	57.6	53.1	49.9	45.7
57.5	56.9	52.2	49.0	44.6
52.8	49.9	47.4	43.9	41.4
52.8	49.4	46.6	42.8	40.1
46.4	44.6	41.8	38.3	34.5
46.7	44.7	41.9	38.5	34.5
45.4	43.1	39.4	36.4	32.4
61.4	58.9	56.7	54.2	49.2
61.7	59.3	57.3	54.7	49.9
55.5	52.9	50.7	48.0	43.8
50.3	61.9	49.4	45.0	41.3
48.8	61.7	46.1	42.0	40.5
42.6	46.5	37.5	34.5	30.9
44.9	41.9	39.3	37.0	33.3
43.2	39.7	37.0	34.2	30.6
43.4	40.4	37.7	34.0	29.2
39.4	37.3	34.5	31.6	28.3
45.2	44.1	41.7	39.0	35.0
46.3	44.6	42.7	39.8	35.6
43.0	40.0	37.8	35.6	31.7
43.6	42.2	39.6	37.6	33.7
49.3	47.5	44.4	41.9	39.5
49.2	47.4	44.2	42.7	39.0
58.6	56.0	52.9	49.7	46.4
59.0	56.8	52.9	49.8	46.4
57.1	55.4	52.6	49.0	45.5
55.3	52.7	49.6	46.3	43.1
56.7	54.7	51.0	48.6	60.4
59.7	61.2	55.1	69.7	74.6
60.3	56.2	52.7	63.2	61.2
60.4	56.9	53.2	49.9	45.5
54.8	51.7	48.2	44.3	39.9
52.3	49.6	47.1	44.0	39.5
50.4	47.6	44.7	41.2	37.1
50.4	49.2	46.2	43.7	39.9
59.4	55.9	53.5	50.1	46.6
59.5	56.2	53.6	50.3	46.6
58.2	55.2	52.1	48.7	49.1
57.0	52.9	49.6	45.4	41.4
56.2	52.6	48.7	45.5	41.1

55.8	52.4	48.6	45.2	40.6
63.6	57.9	54.5	52.1	47.5
61.2	56.1	52.9	50.1	45.7
55.5	53.5	51.0	48.6	44.0
54.3	52.3	50.9	48.1	42.9
59.6	56.3	52.7	49.1	45.3
55.0	51.9	48.7	46.0	41.0
54.0	51.7	49.8	46.8	42.6
54.3	52.7	50.9	48.7	43.9
51.9	50.5	48.2	45.9	41.1
53.7	52.3	50.7	48.0	43.1
55.0	53.5	51.4	48.7	43.3
55.5	52.7	50.0	47.4	42.7
54.5	52.6	49.8	47.1	42.5
54.5	52.5	49.7	47.0	42.6
53.2	50.9	48.1	45.9	40.9
53.8	51.8	48.9	45.8	41.4
53.1	50.6	48.1	45.8	43.8
53.1	50.5	48.1	45.7	43.7
47.4	44.5	41.4	38.1	34.7
46.0	44.4	41.5	38.6	35.0
46.8	44.7	42.0	38.8	35.7
44.6	41.8	38.7	37.1	33.7
54.2	52.3	49.1	46.3	42.7
60.3	58.6	55.5	53.4	51.9
60.6	59.1	56.3	54.2	53.0

1/3 LASmax 8000	1/3 LASmax 10000	1/3 LASmax 12500	1/3 LASmax 16000	1/3 LASmax 20000
35.7	32.6	28.0	22.9	23.8
25.9	21.8	17.4	12.7	13.2
25.9	20.9	15.4	10.8	10.9
32.1	27.3	21.8	16.5	12.4
31.5	26.9	21.4	16.2	11.8
28.2	24.1	19.4	14.7	12.2
35.0	31.5	26.1	20.8	15.6
34.0	30.2	24.4	18.1	13.0
43.1	40.7	36.2	30.7	22.4
45.2	41.2	36.4	30.9	23.1
41.7	37.9	33.5	28.3	22.0
43.7	36.5	32.8	28.0	21.5
36.9	27.9	21.4	15.2	11.9
27.2	22.8	17.9	13.0	11.0
32.4	27.9	22.8	17.8	12.4
32.0	27.5	21.9	16.6	11.8
42.3	36.9	32.9	34.7	15.5
40.2	34.5	29.6	32.4	13.8
36.5	49.4	40.5	21.4	33.5
32.9	47.0	36.0	20.5	31.7
36.4	30.5	26.2	19.8	13.7
42.7	38.0	32.5	28.2	21.1
45.4	40.1	35.2	31.8	23.5
49.7	43.2	39.5	35.9	27.4
36.8	34.8	25.6	30.1	13.5
34.0	38.3	27.0	36.3	15.8
33.7	30.4	25.9	25.8	15.0
33.6	29.2	24.0	20.0	21.5
39.7	36.3	32.0	33.2	28.3
35.3	30.4	25.4	25.0	19.7
30.6	25.4	19.4	14.8	10.3
27.1	21.9	16.3	11.4	9.6
40.4	36.5	30.9	26.5	19.6
33.8	29.0	23.1	17.8	12.2
32.3	25.5	21.3	16.5	11.2
31.6	25.8	21.5	16.7	11.2
31.0	28.3	20.6	13.7	9.9
43.4	40.9	36.1	30.3	25.0
43.4	40.8	35.8	29.9	24.3
30.4	25.7	19.3	13.6	10.5
35.4	31.6	25.9	21.2	13.3
34.7	30.9	25.3	20.5	12.9
32.8	27.3	21.5	15.1	10.3
47.6	42.7	37.6	32.2	23.8
45.6	41.5	36.3	35.0	23.1
45.1	41.3	34.8	34.5	23.6

40.6	35.4	31.4	27.5	21.1
38.7	33.8	28.3	22.4	15.7
39.8	33.9	28.3	22.3	15.6
37.1	32.4	26.4	21.1	12.7
34.1	29.0	22.7	17.2	10.7
27.5	22.5	16.7	12.2	10.1
27.7	22.9	17.5	13.0	11.8
29.5	24.5	19.9	16.3	11.5
41.1	36.5	33.3	31.5	21.1
39.9	35.5	31.7	28.6	19.1
37.8	34.4	29.5	24.2	18.0
36.3	32.7	27.9	23.0	16.4
31.3	27.0	22.2	18.3	12.0
31.4	26.8	22.0	18.3	12.0
28.5	23.0	17.6	28.5	21.5
45.9	44.3	38.2	34.1	27.9
46.3	44.7	38.5	34.1	27.9
40.5	36.2	31.7	25.4	18.3
37.4	31.7	25.8	20.7	13.1
34.8	29.5	23.0	16.7	11.1
26.0	20.5	15.4	11.0	9.9
28.7	22.8	18.7	13.2	10.4
25.6	20.0	15.7	11.1	10.1
24.5	20.2	15.4	11.3	9.8
23.5	18.4	13.9	10.5	9.8
30.1	25.6	20.0	14.7	11.0
32.5	27.5	23.8	21.9	12.8
27.4	21.7	18.1	13.9	10.1
28.7	23.0	17.4	12.1	9.9
35.5	30.6	26.0	20.8	13.3
35.1	30.7	26.8	21.2	13.7
43.5	39.5	34.1	28.2	19.8
42.8	39.0	33.5	28.5	20.9
42.5	38.3	33.1	28.5	22.4
40.2	37.7	32.7	28.8	21.7
40.6	37.2	32.5	27.7	21.7
51.0	48.2	46.7	41.3	44.6
41.0	36.7	33.9	27.7	31.1
41.7	37.8	33.7	28.8	20.8
35.7	30.7	25.2	19.3	12.7
34.1	28.1	23.9	17.2	11.6
32.4	27.3	22.3	15.9	11.1
35.6	31.9	27.5	22.5	13.9
43.6	39.5	36.0	30.3	23.4
43.7	39.5	34.6	29.7	23.1
40.7	36.5	31.9	26.9	20.2
37.8	33.0	27.5	22.4	16.1
37.3	32.6	27.5	22.5	15.7

36.9	32.0	26.7	21.4	14.6
44.0	38.0	33.3	28.0	20.2
41.9	35.9	31.0	25.1	17.6
37.1	27.8	18.5	13.8	12.4
36.1	27.3	18.3	12.7	10.9
42.2	37.8	33.1	28.8	22.3
35.8	29.9	24.2	19.4	14.3
37.0	30.5	23.2	16.7	12.5
37.3	29.5	22.1	15.2	12.1
34.2	26.6	19.4	14.6	11.7
36.7	27.6	18.2	12.5	11.0
36.8	28.0	19.7	13.7	12.0
37.5	31.8	25.2	18.7	15.1
46.6	30.0	24.3	27.2	22.7
39.4	34.6	36.7	22.2	18.0
34.3	32.7	33.1	15.7	14.1
35.2	28.1	21.0	15.2	11.4
39.2	35.0	29.0	23.8	16.0
38.7	33.1	26.8	21.2	14.0
31.5	25.8	21.9	16.1	12.2
32.9	27.1	22.5	17.6	12.6
33.7	27.5	22.9	17.7	12.6
29.5	25.2	20.2	15.3	12.0
40.4	36.5	31.4	26.8	19.7
47.2	43.1	38.9	31.8	24.3
52.9	44.0	40.5	33.7	24.9

1/3 LASmin 6.3	1/3 LASmin 8.0	1/3 LASmin 10.0	1/3 LASmin 12.5	1/3 LASmin 16.0
1.9	0.9	0.3	-0.8	2.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.5
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-0.8
1.9	0.9	0.3	-0.8	2.0
1.9	0.9	0.3	-0.8	1.4
1.9	0.9	0.3	-0.8	4.5
1.9	0.9	0.3	0.9	8.5
1.9	0.9	0.3	-0.8	1.1
1.9	0.9	0.3	-0.8	0.2
1.9	0.9	0.3	-0.8	1.6
1.9	0.9	0.3	-0.8	-1.3
1.9	0.9	0.3	-0.8	3.4
1.9	0.9	0.3	-0.8	1.7
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	1.0
1.9	0.9	0.3	-0.8	4.0
1.9	0.9	0.3	-0.8	6.0
1.9	0.9	0.3	-0.8	6.5
1.9	0.9	0.3	-0.8	4.0
1.9	0.9	0.3	-0.8	4.3
1.9	0.9	0.3	-0.8	3.4
1.9	0.9	0.3	-0.8	5.1
1.9	0.9	0.3	-0.8	4.0
1.9	0.9	0.3	-0.8	4.4
1.9	0.9	0.3	-0.8	4.4
1.9	0.9	0.3	-0.8	4.5
1.9	0.9	0.3	-0.5	7.7
1.9	0.9	0.3	-0.8	5.3
1.9	0.9	0.3	-0.8	5.7
1.9	0.9	0.3	-0.8	5.1
1.9	0.9	0.3	-0.8	4.5
1.9	0.9	0.3	-0.8	3.9
1.9	0.9	0.3	-0.8	4.2
1.9	0.9	0.3	-0.8	6.2
1.9	0.9	0.3	-0.8	1.4
1.9	0.9	0.3	-0.8	1.4
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	4.4
1.9	0.9	0.3	-0.8	4.3

1.9	0.9	0.3	0.1	5.7
1.9	0.9	0.3	0.2	4.9
1.9	0.9	0.3	-0.8	3.4
1.9	0.9	0.3	-0.8	2.5
1.9	0.9	0.3	-0.8	1.2
1.9	0.9	0.3	1.6	2.2
1.9	0.9	1.8	7.1	11.5
1.9	0.9	5.9	8.8	14.0
1.9	0.9	0.8	2.7	7.7
1.9	0.9	0.3	7.0	9.4
1.9	0.9	8.2	11.0	12.7
1.9	1.5	0.3	4.2	7.1
1.9	0.9	0.3	3.6	7.0
1.9	0.9	0.3	1.6	8.8
1.9	0.9	0.3	2.2	5.8
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	1.0
1.9	0.9	0.3	-0.8	1.1
1.9	0.9	0.3	-0.8	3.8
1.9	0.9	0.3	-0.8	1.5
1.9	0.9	0.3	-0.8	1.6
1.9	0.9	0.3	-0.8	5.6
1.9	0.9	0.3	-0.8	2.1
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	2.7
1.9	0.9	0.3	-0.8	1.8
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.0
1.9	0.9	0.3	-0.8	0.7
1.9	0.9	0.3	-0.8	0.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	1.0
1.9	0.9	0.3	3.5	7.2
1.9	0.9	0.3	-0.8	3.1
1.9	0.9	0.3	-0.8	-1.1
1.9	0.9	0.3	-0.8	0.8
1.9	0.9	0.3	-0.8	5.4
1.9	0.9	0.3	-0.8	2.6
1.9	0.9	0.3	-0.8	0.8
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	0.0	6.8
1.9	0.9	0.3	0.9	4.5
1.9	0.9	0.3	0.2	4.5
1.9	0.9	0.3	3.9	10.8
1.9	0.9	2.9	9.7	10.6
1.9	5.8	7.6	12.5	16.9

1.9	0.9	0.3	1.5	5.6
1.9	0.9	0.3	-0.8	3.6
1.9	0.9	0.3	4.2	6.8
1.9	0.9	3.5	5.3	12.6
1.9	0.9	2.7	10.8	13.7
1.9	0.9	3.2	10.9	15.4
1.9	1.0	6.9	9.9	15.3
1.9	0.9	5.6	10.8	15.4
1.9	2.5	6.7	10.8	14.4
1.9	3.6	4.7	9.1	10.5
1.9	0.9	2.0	6.8	9.0
1.9	0.9	2.1	7.9	8.0
1.9	0.9	1.7	7.3	11.7
1.9	0.9	4.6	6.5	12.4
1.9	0.9	6.2	12.6	14.0
1.9	3.8	9.7	13.5	18.4
1.9	0.9	3.0	11.0	14.2
1.9	0.9	1.6	10.8	15.2
1.9	0.9	6.9	9.2	11.8
1.9	0.9	0.3	-0.8	2.0
1.9	0.9	0.3	-0.7	6.3
1.9	0.9	0.3	-0.8	1.0
1.9	0.9	0.3	-0.8	1.3
1.9	0.9	0.3	7.8	12.0
1.9	0.9	1.9	10.2	13.5
1.9	0.9	0.3	2.3	5.4

1/3 LASmin 20.0	1/3 LASmin 25.0	1/3 LASmin 31.5	1/3 LASmin 40.0	1/3 LASmin 50.0
5.2	18.1	21.4	27.3	33.4
3.9	17.4	23.2	29.6	33.1
2.3	17.1	22.0	30.3	34.0
6.2	16.3	22.4	30.9	34.4
4.5	15.6	23.2	32.5	34.6
5.7	14.2	23.0	31.5	35.5
5.6	15.7	22.6	33.2	33.4
8.8	21.5	23.2	30.4	36.4
11.2	19.0	22.2	30.5	36.6
11.2	20.5	23.7	32.3	34.5
14.0	20.7	22.5	29.6	38.8
10.8	19.0	23.2	31.9	37.0
11.0	15.9	24.9	28.8	33.7
8.5	15.5	19.8	23.6	29.6
6.1	12.5	16.4	20.5	27.5
11.2	16.5	19.4	22.0	25.5
5.4	18.5	17.6	23.6	26.6
3.0	17.9	21.2	22.9	33.6
2.9	15.6	20.9	23.3	33.4
8.3	16.8	23.4	26.7	31.1
10.9	17.7	23.8	29.0	31.0
8.4	18.2	24.5	27.5	34.4
11.2	17.4	25.1	26.9	37.3
9.9	18.3	25.1	27.5	34.0
7.8	14.0	23.2	24.1	29.7
6.5	11.8	21.6	23.2	25.9
8.2	14.9	24.3	20.5	25.0
6.1	14.9	21.7	19.9	24.7
6.8	14.5	22.3	23.8	27.1
6.8	15.9	22.5	24.9	29.4
7.5	13.6	23.3	24.7	26.1
9.3	13.5	22.8	23.4	24.5
10.0	15.8	22.7	24.3	26.4
8.7	14.0	22.6	26.1	26.9
5.3	15.4	22.4	24.1	23.9
5.6	17.4	22.6	24.6	25.3
8.1	15.9	22.6	23.3	26.5
7.7	17.1	22.4	26.8	25.9
12.2	18.1	30.1	30.7	31.3
8.5	16.6	21.7	25.0	30.1
9.0	15.5	18.2	24.7	30.0
7.2	17.0	19.7	27.3	30.5
5.5	17.7	19.8	25.4	30.1
6.4	19.8	22.3	26.9	31.9
11.6	16.8	22.3	28.3	36.3
7.9	17.1	22.4	28.4	33.4

9.4	18.5	19.7	27.8	31.0
10.8	17.3	18.4	27.4	29.3
9.9	17.6	18.4	26.1	30.2
9.0	16.2	17.1	25.3	28.3
7.4	15.4	16.8	26.4	28.0
9.5	17.9	20.1	27.5	27.7
15.6	20.3	22.2	27.6	29.5
13.7	18.0	22.7	33.8	29.0
9.9	17.9	22.3	25.4	28.4
14.0	19.5	24.4	27.4	31.1
15.9	21.1	24.3	25.2	29.8
11.1	20.0	22.8	25.7	29.9
13.7	19.1	23.0	24.1	28.9
13.5	20.4	24.3	23.4	30.3
11.2	18.9	22.3	25.9	27.0
6.9	18.7	20.7	24.5	27.1
7.3	17.2	21.2	26.7	32.7
6.8	15.4	17.9	28.5	30.6
9.0	15.2	18.5	26.9	28.8
9.5	14.6	17.5	28.1	32.3
7.9	14.6	17.7	24.9	26.7
7.0	15.7	17.7	23.2	25.6
11.9	17.0	17.1	24.0	23.7
9.8	14.4	17.2	23.1	24.8
8.8	14.3	15.1	24.9	24.4
9.2	14.4	17.4	23.6	23.7
6.4	15.0	20.0	23.8	25.6
5.9	18.1	17.3	24.0	27.9
9.7	16.6	24.7	25.1	23.5
9.6	16.5	22.1	23.9	27.5
11.0	16.6	22.5	23.5	27.2
6.6	17.3	21.4	23.9	27.1
7.9	18.8	19.4	28.3	28.7
10.0	19.1	24.0	29.0	31.7
9.6	19.6	23.3	27.0	33.0
6.9	17.6	24.2	30.1	37.2
5.0	15.2	24.4	29.4	40.3
7.8	14.6	23.2	31.2	38.4
8.3	18.7	23.7	28.6	34.6
6.3	16.6	25.2	25.2	31.0
7.0	16.1	22.9	24.4	31.5
5.8	14.6	23.2	24.7	33.4
13.7	19.9	25.8	28.0	32.2
10.6	18.8	24.3	27.4	31.2
9.0	19.7	25.2	27.0	42.6
15.4	20.4	26.3	27.7	35.4
14.7	21.0	27.0	27.4	29.7
16.3	20.8	25.5	24.8	28.6

10.8	15.1	23.4	23.3	28.0
11.5	17.8	21.8	22.8	30.2
14.6	18.4	25.7	26.1	28.9
16.1	18.8	23.6	23.5	28.4
18.5	20.1	26.6	24.2	32.3
18.0	23.2	27.4	26.8	30.4
20.7	22.9	25.7	27.8	30.8
18.9	22.9	26.5	27.9	30.2
16.8	20.1	26.2	25.6	27.6
15.5	22.7	26.8	23.3	29.4
16.0	23.3	25.3	24.1	27.3
15.9	22.8	25.4	23.7	27.8
17.7	23.5	26.5	27.6	31.8
17.6	22.7	26.1	30.2	32.9
20.3	26.3	28.2	29.1	35.2
24.2	28.8	29.7	29.7	36.3
16.5	25.4	24.9	27.3	35.8
22.2	26.4	27.0	28.8	34.4
16.2	21.3	22.1	30.3	34.0
14.6	19.9	22.6	26.7	35.5
12.7	21.5	21.8	24.2	32.9
13.8	20.1	20.8	24.6	34.4
14.3	19.4	22.2	26.7	33.3
17.0	20.6	22.9	28.3	33.5
17.8	21.3	25.6	29.8	35.0
12.9	19.7	25.5	29.7	39.2

1/3 LASmin 63.0	1/3 LASmin 80.0	1/3 LASmin 100	1/3 LASmin 125	1/3 LASmin 160
35.3	39.6	37.6	41.9	43.7
36.0	32.8	32.8	40.0	40.4
33.6	32.7	33.0	39.6	39.0
33.2	33.2	36.5	39.6	40.4
33.9	37.2	40.5	41.2	43.3
34.8	36.2	39.0	40.1	39.5
34.4	38.2	40.6	39.8	39.9
32.8	37.0	38.8	39.7	41.3
34.4	38.7	38.6	40.1	41.5
41.6	52.7	52.2	53.0	59.7
41.3	47.7	51.8	54.9	57.5
40.0	45.8	50.1	55.3	60.3
35.5	37.9	41.6	43.8	51.0
30.1	30.6	38.5	39.4	43.8
31.0	34.3	38.7	42.3	44.3
29.5	33.3	37.6	39.5	40.6
29.5	31.0	36.9	40.9	41.2
31.2	34.8	39.8	41.4	44.7
32.3	36.8	41.8	40.4	44.0
31.7	40.6	38.3	43.0	45.9
32.4	40.5	38.7	41.7	41.8
35.6	43.6	43.1	44.2	50.4
41.2	42.4	45.5	50.6	51.3
38.3	41.5	43.6	49.4	50.6
32.5	36.6	37.7	41.1	42.5
31.3	36.0	37.9	38.2	39.5
29.8	33.4	37.0	38.2	38.7
28.8	32.4	36.7	37.5	38.2
32.0	38.9	44.4	49.5	44.3
33.6	41.8	42.7	46.1	45.1
31.0	35.9	43.0	42.7	43.8
30.9	35.1	39.1	40.8	40.9
32.5	33.3	38.6	44.8	40.0
29.9	29.9	40.3	41.3	41.5
28.9	29.9	39.4	39.4	38.9
30.8	31.9	40.0	38.7	39.0
31.2	30.7	37.2	37.4	38.3
32.3	31.8	37.3	38.0	38.5
33.0	34.9	41.9	43.3	42.9
31.1	33.1	39.0	42.0	41.7
33.5	34.7	44.0	46.4	44.0
34.8	40.1	48.2	46.2	44.8
33.3	34.7	41.2	44.4	44.5
34.6	37.9	41.1	45.1	45.5
39.9	47.9	48.9	65.1	60.6
38.4	49.3	50.5	61.0	55.6

35.7	46.9	51.5	58.0	54.7
34.2	41.8	46.5	52.7	54.6
33.9	37.9	46.4	46.5	58.8
35.4	37.3	42.7	46.8	46.9
33.8	35.6	37.5	43.3	45.6
30.3	33.5	36.5	40.8	44.2
32.2	33.3	40.6	42.9	43.0
30.8	37.6	43.0	48.5	45.2
30.5	38.0	47.1	46.7	46.2
33.7	39.7	44.3	50.7	48.3
33.7	40.8	44.3	47.6	48.9
34.7	35.2	41.4	43.9	43.8
33.8	35.3	39.3	41.0	41.0
36.1	35.7	40.3	47.0	44.7
34.9	36.5	40.0	41.8	43.2
33.9	34.6	40.1	41.5	42.6
34.8	43.0	52.9	51.5	52.7
35.0	39.2	47.2	46.1	50.9
34.2	34.7	45.0	41.4	45.7
30.9	32.3	36.6	38.4	40.0
31.2	33.1	35.7	36.4	39.0
30.4	34.6	35.5	38.5	38.2
31.4	31.1	37.6	36.7	37.8
31.2	30.6	33.8	35.6	37.1
30.7	29.7	32.5	34.5	35.9
30.4	28.9	32.3	34.2	37.4
30.7	32.6	36.2	36.5	39.1
30.5	30.2	34.3	36.0	37.3
30.8	29.8	33.1	35.1	36.7
32.7	41.9	38.4	37.2	39.2
39.2	42.0	41.1	42.9	45.5
35.3	34.4	37.9	40.9	41.4
35.6	36.9	42.6	45.1	46.3
37.6	42.8	47.7	48.3	51.2
37.2	40.9	45.1	48.9	52.0
43.1	43.5	45.2	53.6	53.4
45.5	46.1	52.9	57.1	53.4
42.6	44.9	52.1	58.7	52.4
45.3	43.7	59.6	58.6	53.9
39.4	42.0	54.8	53.8	48.4
35.0	39.2	47.1	44.0	45.7
34.7	38.2	45.6	44.4	45.5
35.8	38.0	44.0	43.8	44.9
37.4	40.8	43.2	43.8	45.6
34.9	40.5	49.4	43.1	50.1
35.1	42.3	45.5	47.1	51.5
37.3	38.1	41.6	42.8	45.4
34.1	36.3	41.8	41.6	44.8

33.6	38.6	42.2	44.2	48.2
34.1	38.5	42.7	44.3	47.7
36.3	39.4	44.0	45.6	50.5
35.6	38.9	43.0	46.1	50.2
34.4	38.0	43.8	47.6	49.9
36.1	38.6	42.1	48.6	49.8
33.8	40.7	42.8	47.0	49.6
40.3	39.3	42.4	45.7	48.8
34.7	38.3	44.6	44.2	48.9
33.7	36.5	42.0	44.1	48.3
33.0	37.9	41.5	44.4	47.8
33.8	37.6	41.9	45.1	49.0
36.0	38.9	43.0	45.4	50.7
34.5	37.7	42.0	44.8	50.5
39.1	41.3	43.7	46.3	49.4
35.8	37.3	44.8	45.7	49.1
34.1	36.5	42.7	44.9	48.7
34.1	38.2	41.6	43.3	47.6
33.7	37.9	43.6	44.8	47.3
31.9	35.5	41.4	41.0	45.0
31.0	36.0	41.4	41.5	44.8
36.5	39.0	44.3	43.3	45.9
35.5	37.2	43.0	42.0	45.4
37.6	37.7	43.6	43.8	45.5
41.4	48.2	54.1	54.4	53.6
41.1	48.3	54.2	54.4	58.0

1/3 LASmin 200	1/3 LASmin 250	1/3 LASmin 315	1/3 LASmin 400	1/3 LASmin 500
42.1	46.1	47.3	42.8	45.0
42.3	42.7	42.3	42.9	45.0
40.2	42.2	41.4	43.5	45.5
40.0	41.5	42.5	43.7	45.0
43.8	44.1	42.7	43.6	46.5
40.7	43.2	41.4	42.3	44.3
41.2	44.6	43.7	43.9	44.6
42.9	42.8	41.8	42.6	43.9
42.8	43.0	42.8	42.3	44.7
60.4	64.2	58.7	59.1	58.9
62.6	62.5	61.8	62.3	62.5
65.5	65.4	64.7	63.7	62.9
50.1	52.2	52.6	52.1	53.8
44.9	44.8	45.6	46.8	47.7
45.4	45.8	45.7	46.2	47.7
44.9	45.9	44.3	46.4	49.2
46.6	47.1	47.9	48.5	50.7
45.5	47.3	46.7	48.1	50.2
46.0	47.7	47.2	48.6	49.8
48.0	50.2	49.5	49.2	50.7
44.1	46.9	45.2	45.3	46.8
48.1	48.9	48.4	50.1	55.8
55.3	57.2	54.9	58.1	58.6
51.9	55.8	53.2	55.4	56.4
45.5	44.9	44.6	46.4	47.6
42.4	44.1	42.8	43.5	45.6
41.1	44.6	42.1	44.9	46.7
40.8	44.2	42.4	45.0	47.0
46.0	47.1	49.9	49.8	51.7
48.2	50.2	51.2	52.3	55.0
46.9	47.4	46.6	48.6	50.6
44.0	45.5	44.4	45.7	45.9
46.3	46.9	46.1	46.7	46.6
41.5	43.2	41.4	43.6	45.3
41.6	42.4	40.6	42.3	44.2
42.9	43.6	43.3	46.3	47.3
40.5	43.2	43.0	44.1	44.2
41.0	43.7	43.4	44.5	45.2
48.8	51.5	50.1	48.3	50.6
46.9	46.9	46.0	45.0	44.2
48.6	46.6	46.3	45.8	44.3
45.0	44.4	42.9	43.4	46.0
43.4	43.1	41.1	41.9	44.1
45.7	45.7	44.2	44.0	47.7
58.9	64.0	60.9	59.3	63.3
57.9	57.1	59.1	58.4	60.2

55.2	55.3	55.0	55.5	56.8
54.2	55.1	54.9	54.7	55.8
55.4	53.7	53.8	54.9	56.0
50.6	52.2	51.5	52.0	54.2
47.7	49.8	50.1	49.5	52.8
44.9	47.3	48.0	46.5	49.5
45.6	47.7	47.7	47.7	49.7
46.5	46.9	45.5	46.3	48.3
47.1	47.0	46.6	48.0	50.6
51.1	51.3	51.6	52.4	55.0
50.0	53.2	51.9	52.2	54.5
46.1	47.8	46.4	48.9	49.4
44.0	44.6	43.0	46.0	46.6
46.3	47.3	48.6	49.8	49.1
44.4	44.4	44.1	45.1	44.3
44.4	43.5	43.9	45.4	45.3
58.0	56.6	56.1	58.1	60.3
52.9	54.0	52.8	54.7	55.5
48.0	51.2	51.4	50.7	52.4
44.1	45.0	45.0	45.3	46.1
44.3	43.3	43.0	43.7	44.8
47.4	48.1	46.8	47.4	46.7
42.1	45.9	46.0	47.2	48.5
40.4	46.1	43.2	42.1	44.2
37.7	42.4	39.4	40.6	41.2
37.2	41.7	39.3	40.2	41.2
43.1	45.4	43.1	43.7	44.7
40.9	44.1	41.9	42.0	43.8
38.1	42.4	41.2	41.9	43.2
38.8	42.6	43.6	42.5	45.2
45.9	47.2	46.1	48.6	50.4
44.6	44.6	44.0	46.7	48.0
51.2	54.4	51.3	53.4	55.1
54.1	55.4	55.7	54.3	57.9
54.7	56.4	54.9	56.2	59.9
54.9	55.9	54.9	57.8	60.5
56.3	55.5	55.4	56.5	58.1
59.0	56.7	56.1	56.5	57.9
55.0	57.7	59.0	58.8	60.5
52.3	53.2	54.1	53.5	57.0
49.4	49.9	50.9	51.3	54.3
49.6	50.9	51.3	51.5	53.8
50.2	50.6	50.0	51.6	54.6
50.3	51.7	50.5	51.6	55.8
51.5	51.3	51.9	53.1	57.3
55.0	54.9	55.5	58.5	60.3
49.9	50.1	50.9	53.5	56.3
48.7	49.1	49.9	50.3	55.2

52.7	52.0	51.2	51.0	58.2
53.9	52.4	51.4	52.2	59.6
54.6	52.7	51.5	55.2	59.4
54.1	51.9	49.5	51.2	58.3
54.7	52.6	49.3	51.3	58.1
54.7	54.5	52.7	53.4	58.6
53.8	52.8	52.7	52.0	58.8
53.6	52.3	52.3	52.0	59.1
52.8	50.8	51.0	52.6	58.3
52.4	50.8	50.7	51.2	57.7
52.6	51.1	49.5	50.0	58.1
52.9	51.7	50.9	51.0	61.1
55.1	53.8	53.6	55.4	62.1
54.3	53.3	50.4	53.0	60.2
52.5	53.0	52.2	52.4	59.0
52.0	52.0	50.0	49.7	58.2
52.0	49.1	48.2	49.5	58.2
46.8	46.8	46.8	47.2	52.8
49.7	52.2	50.6	51.6	53.1
45.3	46.3	44.6	45.9	48.8
43.8	44.1	43.6	44.6	45.5
44.9	48.9	46.9	46.9	48.7
44.5	45.7	44.5	45.3	46.4
44.4	45.7	45.4	46.1	46.5
55.2	56.4	56.6	56.8	57.2
59.0	59.6	55.9	57.5	61.6

1/3 LASmin 630	1/3 LASmin 800	1/3 LASmin 1000	1/3 LASmin 1250	1/3 LASmin 1600
48.0	49.4	51.7	49.3	47.2
46.1	48.8	49.5	47.3	45.6
45.9	47.9	49.8	47.8	45.6
46.6	47.9	50.7	48.4	47.4
47.6	50.6	52.4	49.5	47.2
46.1	48.9	50.7	48.6	46.0
46.5	48.9	50.8	48.9	46.6
45.3	47.3	48.6	46.4	45.5
45.8	47.5	48.9	46.8	46.0
60.7	61.2	62.2	59.2	57.3
63.5	66.3	67.5	64.1	61.1
63.8	66.0	65.9	63.9	60.8
56.9	60.3	62.3	59.0	55.4
50.3	52.5	54.1	51.9	48.9
51.9	53.8	54.1	50.8	48.4
50.9	52.3	53.6	51.9	49.0
52.8	55.7	56.9	53.6	50.8
52.6	54.6	54.4	53.5	51.8
51.1	54.1	54.7	52.3	50.7
52.0	54.9	55.5	53.3	49.3
48.5	51.5	51.9	49.9	47.3
52.9	56.5	55.2	54.4	52.6
60.1	62.8	63.1	60.7	58.1
57.9	60.8	60.6	58.0	56.1
49.5	51.1	52.0	50.3	47.8
47.4	49.6	49.9	48.4	46.9
48.3	50.0	51.6	49.0	46.6
49.7	51.0	52.7	49.2	47.4
54.6	57.2	57.9	53.7	51.0
57.0	59.2	59.7	57.0	54.4
52.4	56.7	58.1	54.8	51.7
48.8	51.5	51.6	48.6	46.0
50.4	52.4	52.6	49.1	46.7
48.5	53.4	54.8	53.0	49.4
46.6	48.8	49.9	48.1	46.5
49.7	49.7	49.9	48.0	45.9
47.6	49.1	49.9	49.5	47.8
47.8	49.0	50.2	48.7	47.4
52.8	55.2	57.1	53.6	49.2
46.9	50.4	50.4	47.9	45.3
47.2	49.7	50.1	48.2	46.0
46.7	48.7	50.9	49.7	48.0
44.7	46.8	48.7	48.0	45.6
49.3	49.2	50.6	48.9	47.4
63.8	65.7	66.4	63.4	60.7
62.1	64.5	64.4	61.5	58.2

57.6	60.0	60.2	57.5	54.2
57.1	58.7	59.5	56.1	53.4
58.6	60.3	60.7	58.3	55.5
56.5	60.1	60.3	57.5	54.4
54.1	57.2	60.1	57.1	54.3
50.8	53.5	55.0	53.1	49.8
51.6	54.8	55.0	53.1	49.4
48.5	48.9	50.3	48.2	45.6
49.8	49.4	51.2	49.8	51.2
57.0	59.1	59.0	56.0	53.9
56.7	58.8	59.7	56.3	54.0
51.5	53.3	54.1	51.6	49.1
48.9	50.5	50.8	50.2	48.2
49.7	52.2	53.3	50.9	48.8
47.0	49.2	49.7	48.6	46.5
48.0	49.4	49.6	48.9	47.2
62.5	63.6	63.7	62.6	60.4
58.2	60.3	60.3	57.0	54.1
53.7	58.0	58.5	55.4	53.6
47.6	51.0	51.9	49.6	46.9
47.0	49.5	50.0	47.6	45.2
48.4	51.5	51.6	48.9	46.2
48.3	50.9	51.4	48.8	46.5
46.9	49.1	50.5	48.1	44.6
43.5	46.5	47.2	46.0	43.1
43.3	46.6	47.5	45.9	43.3
47.1	49.2	50.9	47.4	45.2
45.5	48.1	48.6	46.2	43.8
45.6	46.9	47.4	45.5	43.6
46.7	48.2	51.3	48.4	47.2
51.6	54.7	54.1	51.8	49.0
49.2	52.8	53.2	51.4	48.8
56.8	60.0	60.4	59.0	56.0
59.6	62.6	64.9	62.7	58.2
61.1	62.9	65.5	62.8	59.0
61.1	62.6	62.7	60.0	57.5
59.6	61.7	62.7	59.8	56.8
59.6	61.8	62.8	59.6	56.6
62.6	64.6	67.0	64.3	60.5
58.3	61.6	63.3	60.3	57.8
55.9	59.4	61.2	57.7	55.0
55.9	59.5	61.5	58.2	54.8
55.3	57.7	59.6	56.8	54.3
55.7	58.3	61.4	58.8	57.1
59.2	61.4	62.6	59.9	55.7
63.9	66.8	66.8	61.7	57.6
59.3	62.2	63.3	61.2	57.3
56.0	58.7	60.9	59.1	56.7

55.5	58.0	58.8	55.7	53.7
57.9	60.5	62.5	57.5	55.4
58.3	60.2	61.1	57.1	57.2
57.7	58.2	59.6	56.6	56.6
56.9	58.1	59.1	55.8	56.3
58.2	59.4	60.6	57.9	57.3
56.4	59.1	61.4	60.5	56.9
55.7	58.8	60.3	58.1	55.8
54.7	57.6	56.8	54.1	53.3
54.7	57.8	56.8	54.3	53.2
53.9	56.1	56.4	52.4	52.3
55.7	58.3	59.2	56.7	55.7
59.3	62.5	64.4	61.4	59.7
55.4	58.2	59.5	56.4	55.8
55.1	57.5	57.9	55.3	54.9
53.8	54.4	56.1	52.7	53.6
53.1	53.6	55.2	51.9	52.7
51.5	52.0	54.8	51.5	51.1
54.1	56.1	57.6	54.9	51.4
50.6	52.8	54.5	50.7	46.6
46.7	48.2	49.8	48.4	45.4
49.4	51.0	53.3	51.7	48.4
47.7	49.4	51.6	50.4	47.7
48.1	49.5	51.1	50.0	47.7
61.6	62.3	61.5	58.0	57.0
63.5	62.9	65.9	63.6	61.1

1/3 LASmin 2000	1/3 LASmin 2500	1/3 LASmin 3150	1/3 LASmin 4000	1/3 LASmin 5000
44.1	41.9	39.6	37.5	34.8
42.3	39.6	38.2	35.5	32.9
42.9	40.4	38.8	35.7	32.4
44.8	42.4	40.3	36.5	34.1
45.2	42.1	40.3	36.5	33.7
43.9	41.1	39.1	35.6	32.6
44.7	44.0	41.3	39.2	36.0
43.7	40.8	38.6	35.9	33.5
43.9	41.3	39.2	37.0	34.5
56.7	55.9	52.9	50.4	47.9
58.7	56.7	53.9	50.1	46.6
57.2	55.5	53.0	50.7	46.8
51.1	47.4	44.1	40.4	35.9
45.4	41.5	38.6	34.9	30.5
45.2	42.0	39.8	36.6	32.9
45.2	42.3	39.5	35.8	32.1
47.1	44.4	41.4	36.2	32.6
50.0	49.2	47.7	44.6	42.3
48.1	46.0	44.0	40.7	38.0
47.3	45.2	42.9	39.6	36.3
44.3	42.5	40.4	39.1	35.2
50.3	49.5	46.5	45.9	43.0
56.5	54.3	51.4	48.5	45.9
54.7	51.6	48.8	45.7	43.4
46.0	43.2	40.9	37.6	34.7
45.5	43.0	41.0	38.4	35.2
45.8	43.4	40.8	38.1	35.1
45.8	43.2	40.7	38.0	35.0
49.2	47.6	45.7	42.6	39.6
52.1	48.8	46.8	43.0	39.2
47.6	44.4	41.3	39.3	33.8
42.9	40.7	38.6	35.9	32.6
43.7	41.3	38.9	36.9	34.3
46.5	43.8	40.6	38.5	35.6
45.3	43.3	40.7	38.8	35.9
44.3	42.6	40.7	38.7	36.1
45.6	43.1	42.0	39.9	36.5
45.4	43.5	42.2	39.7	37.0
45.9	42.7	41.5	39.2	37.5
43.3	40.4	38.7	36.1	33.5
43.6	40.9	39.2	36.1	33.2
45.9	44.1	41.9	38.8	36.1
44.6	43.1	40.7	37.4	34.1
46.7	45.9	44.0	40.9	38.4
58.6	57.1	54.4	51.7	49.1
55.8	54.2	51.4	49.2	47.2

52.0	50.3	48.1	45.6	42.2
51.2	49.6	47.3	44.6	41.4
52.5	51.3	49.0	45.9	43.4
51.9	50.9	49.0	45.2	43.0
51.0	47.2	44.3	40.9	36.7
46.1	42.7	39.6	35.9	32.1
45.9	43.1	40.5	36.3	32.5
42.7	40.8	38.8	35.8	32.6
46.7	46.9	45.8	43.7	38.9
52.5	51.1	48.6	46.1	42.8
52.4	50.8	48.4	45.8	41.8
47.0	44.3	41.1	37.8	34.1
45.8	44.0	40.1	36.5	33.0
46.7	45.4	43.1	39.4	36.4
44.2	42.1	38.8	35.7	32.8
44.3	42.9	39.3	36.2	33.8
58.0	55.3	52.9	50.7	48.0
50.7	48.8	46.9	44.3	41.3
50.4	48.1	46.6	44.0	40.6
44.7	42.5	46.6	37.4	34.3
43.0	41.2	39.2	35.9	33.1
43.9	42.4	39.5	36.6	34.3
44.9	41.8	38.6	35.5	32.0
41.9	39.4	37.2	34.5	31.3
40.5	38.1	36.0	33.6	30.2
40.5	38.1	36.2	34.4	31.6
42.6	40.6	39.0	36.5	33.9
41.9	40.3	38.5	36.2	33.6
42.0	41.6	39.0	36.7	34.1
45.3	43.6	42.3	39.5	37.6
47.1	45.7	43.1	40.5	38.1
46.3	44.6	42.5	40.2	37.4
55.1	54.0	51.8	47.7	45.0
56.5	55.2	52.7	49.6	46.3
56.4	53.7	50.6	47.3	43.7
55.0	52.8	50.7	46.6	44.8
54.7	53.1	51.6	47.0	47.9
54.2	53.9	50.7	46.8	49.9
57.2	54.8	51.6	48.0	44.3
54.4	51.6	48.9	45.6	41.3
52.0	49.4	46.7	43.8	39.9
51.5	48.5	45.6	42.8	38.9
50.6	48.7	46.6	43.6	40.5
53.0	49.6	47.3	44.0	40.9
52.9	50.2	46.5	43.4	40.3
54.3	51.8	48.2	45.0	42.0
53.7	51.1	47.3	43.9	40.4
52.4	49.5	46.0	42.7	38.7

52.2	50.6	48.3	45.5	42.7
53.1	51.5	49.2	46.6	44.0
55.4	53.7	51.2	48.9	45.9
54.4	52.5	49.8	48.1	46.5
54.5	53.1	50.8	48.8	46.3
55.6	53.8	51.1	48.7	45.4
54.1	51.1	48.8	46.4	43.5
53.8	52.3	50.3	48.1	45.3
51.3	49.2	47.0	45.0	43.0
51.1	48.9	46.7	44.6	41.9
51.8	50.2	48.7	46.8	44.0
55.1	53.7	51.1	48.8	46.2
56.1	53.7	50.8	47.9	45.1
54.4	52.5	49.9	47.0	44.2
53.0	51.1	49.3	46.8	44.1
51.5	50.1	47.7	45.0	42.5
51.2	49.7	47.6	45.1	42.3
50.1	48.8	47.0	44.5	41.4
49.3	47.4	44.3	41.3	37.8
44.1	42.8	40.0	36.2	32.3
43.2	41.9	39.4	35.5	31.8
46.3	44.4	41.6	38.3	35.0
45.3	42.9	40.4	36.8	34.5
45.2	43.7	41.5	37.9	35.8
54.1	54.3	52.2	49.1	46.4
58.9	57.1	54.3	52.3	49.5

1/3 LASmin 6300	1/3 LASmin 8000	1/3 LASmin 10000	1/3 LASmin 12500	1/3 LASmin 16000
30.8	25.9	21.8	17.4	12.7
29.9	23.2	17.8	13.1	9.9
29.4	23.7	18.7	13.7	10.1
30.3	25.9	20.9	15.4	10.8
29.8	24.5	19.3	14.1	10.4
29.3	24.0	19.0	13.8	10.4
33.0	28.2	24.3	19.5	14.8
30.2	24.4	19.5	14.1	10.4
31.2	27.0	21.4	16.8	11.3
45.8	41.8	37.9	33.5	27.7
42.4	38.4	33.9	28.7	23.5
41.5	37.0	28.0	21.4	15.2
31.2	26.5	21.1	16.2	12.0
26.3	21.0	16.5	12.7	9.8
30.2	26.6	22.2	17.4	12.9
27.9	23.4	18.0	13.2	10.0
28.3	23.8	18.0	13.1	9.9
38.7	35.1	29.5	24.6	19.6
34.0	30.8	29.0	23.4	17.1
33.0	28.7	28.2	20.0	13.0
31.7	28.2	24.2	18.7	12.8
40.6	36.4	30.5	26.2	19.8
43.4	39.9	34.9	29.3	23.4
39.7	36.8	30.5	25.7	20.7
30.7	26.8	22.2	16.7	12.1
31.4	26.8	28.8	20.2	25.9
32.1	27.8	22.9	16.6	12.0
32.0	27.5	22.6	16.5	11.3
36.4	33.5	29.2	24.0	20.0
35.1	30.6	25.1	18.9	14.8
30.5	26.1	21.7	15.9	11.0
29.1	25.0	20.3	15.3	10.9
31.0	27.1	21.9	16.3	11.4
31.5	27.2	22.5	17.1	11.8
32.6	28.9	23.0	17.6	12.9
33.3	29.4	24.2	18.8	13.4
34.0	29.2	24.9	18.1	12.3
34.2	29.3	26.1	18.9	12.5
34.9	30.4	25.7	19.3	13.6
30.3	25.7	20.0	14.0	10.0
30.1	25.9	20.1	14.1	10.1
33.7	27.1	21.0	16.3	11.9
30.9	25.5	19.4	14.1	10.1
35.4	32.8	27.3	21.6	15.2
45.3	41.6	37.4	32.5	26.7
43.5	40.4	35.4	29.5	26.3

39.4	36.3	31.0	25.3	19.1
38.5	34.9	29.8	24.0	18.0
40.7	35.5	28.5	22.0	16.2
39.2	34.2	28.5	21.9	16.1
32.2	27.5	22.5	16.7	12.2
27.5	22.5	17.4	13.2	10.4
28.3	23.7	18.6	13.8	10.7
28.2	23.7	18.9	14.9	11.8
34.7	29.5	24.6	19.9	16.4
39.2	35.4	30.8	25.4	19.9
39.1	35.8	30.7	24.7	18.8
30.4	24.9	19.8	14.9	11.1
29.3	23.5	18.7	13.8	10.4
32.5	28.6	23.0	17.6	12.8
28.8	24.0	18.8	14.3	11.2
29.6	24.4	19.1	14.4	18.3
43.7	40.4	36.2	31.8	25.4
38.2	34.3	29.9	24.9	19.2
37.2	33.2	28.5	22.9	16.6
30.5	26.0	20.6	15.4	10.8
29.3	24.2	18.9	14.0	10.2
30.6	25.6	20.0	15.3	10.8
27.9	22.4	17.6	13.7	10.2
27.4	21.9	17.6	13.9	10.4
26.6	20.6	16.5	12.9	9.8
27.9	22.9	17.5	13.0	9.8
30.0	25.9	20.5	15.8	12.0
29.7	25.4	19.6	14.3	10.3
29.9	24.7	18.9	13.9	10.0
33.7	28.8	23.0	17.5	12.1
33.8	29.2	23.4	18.2	12.6
33.1	28.4	22.5	17.2	11.7
41.3	37.4	32.6	26.6	21.4
43.1	39.3	34.3	29.6	23.5
40.8	36.5	32.5	27.1	22.6
41.6	36.6	32.5	27.1	21.6
60.2	37.6	35.5	30.7	24.3
45.0	37.4	32.6	28.3	21.5
39.7	35.7	30.3	25.2	19.1
37.3	32.1	26.2	20.1	14.2
36.5	31.1	26.3	21.0	14.6
34.9	30.3	25.6	20.5	14.5
36.8	32.0	26.6	20.3	14.4
37.9	34.3	29.9	24.4	19.1
36.3	32.6	27.7	22.5	17.3
40.2	33.3	28.9	23.6	18.0
36.1	31.9	26.8	20.5	15.1
34.4	29.3	23.0	16.9	12.4

38.2	32.6	25.1	17.4	12.1
39.5	33.5	26.9	20.4	14.9
40.6	34.5	26.2	18.4	12.5
42.0	34.8	26.0	17.1	11.5
41.0	34.2	25.8	16.5	11.0
40.5	34.3	26.0	18.0	12.7
39.0	33.2	25.6	18.3	13.2
40.2	33.9	26.2	18.5	13.2
38.7	32.4	24.6	17.1	12.2
37.4	31.3	24.2	17.0	12.1
39.4	32.8	24.8	16.9	11.7
41.3	34.9	26.8	18.1	12.0
40.9	34.9	27.2	19.2	13.2
39.3	33.3	25.0	18.0	17.4
40.1	34.3	30.0	24.3	15.7
37.8	31.3	23.2	17.0	10.7
37.7	31.2	22.8	15.5	10.6
37.8	33.2	27.3	21.0	15.1
33.8	29.2	24.9	18.6	13.4
28.4	24.5	18.8	14.3	10.4
27.9	23.9	18.5	14.0	10.2
31.1	27.9	22.3	16.7	12.1
30.7	26.8	21.8	15.9	11.4
32.3	29.2	24.6	20.1	15.3
42.7	40.3	36.5	31.3	26.5
47.3	45.6	40.4	35.4	30.6

1/3 LASmin 20000	LAIeq-LAeq	OVLD	OBA OVLD	Marker
13.3	0.2	No	No	
10.6	0.1	No	No	
10.3	0.5	No	No	
10.5	1.5	No	No	
10.7	0.7	No	No	
10.6	0.7	No	No	
12.2	3.0	No	No	
10.5	0.3	No	No	
10.7	0.9	No	No	
19.9	1.3	No	No	
16.9	0.4	No	No	
11.9	10.9	No	No	
10.7	1.2	No	No	
10.3	0.7	No	No	
10.9	1.4	No	No	
10.5	0.7	No	No	
10.5	5.2	No	No	
11.9	0.0	No	No	
11.4	1.5	No	No	
13.7	1.3	No	No	
10.9	0.5	No	No	
12.8	0.4	No	No	
16.6	-0.2	No	No	
13.6	2.4	No	No	
9.7	0.0	No	No	
9.8	0.0	No	No	
9.6	-0.3	No	No	
9.6	0.9	No	No	
13.1	1.4	No	No	
10.3	2.2	No	No	
9.4	3.5	No	No	
9.3	0.8	No	No	
9.5	4.7	No	No	
9.5	0.9	No	No	
9.8	0.9	No	No	
9.7	0.5	No	No	
9.6	0.5	No	No	
9.7	2.1	No	No	
10.5	0.1	No	No	
9.3	0.0	No	No	
9.4	1.6	No	No	
9.5	0.1	No	No	
9.4	-0.4	No	No	
10.3	0.4	No	No	
18.7	0.3	No	No	
17.1	2.4	No	No	

12.3	-0.1	No	No
11.7	0.8	No	No
10.6	1.0	No	No
10.5	0.4	No	No
9.8	0.9	No	No
9.6	0.1	No	No
9.8	0.9	No	No
10.3	0.0	No	No
10.8	0.8	No	No
13.4	1.1	No	No
12.7	0.3	No	No
9.9	0.3	No	No
9.5	0.6	No	No
9.8	0.4	No	No
9.7	0.5	No	No
12.4	0.4	No	No
17.8	1.0	No	No
12.5	1.5	No	No
11.0	3.9	No	No
9.6	0.3	No	No
9.4	-0.1	No	No
9.6	0.4	No	No
9.7	0.6	No	No
9.6	-0.1	No	No
9.6	0.6	No	No
9.6	0.1	No	No
10.0	0.9	No	No
9.7	0.1	No	No
9.7	0.2	No	No
9.9	0.8	No	No
9.9	0.3	No	No
9.6	0.5	No	No
13.9	-0.1	No	No
16.3	0.5	No	No
15.7	0.0	No	No
14.7	0.3	No	No
21.7	0.7	No	No
15.6	5.6	No	No
12.7	1.7	No	No
10.6	1.6	No	No
10.4	1.9	No	No
10.6	0.0	No	No
10.4	0.7	No	No
11.7	1.1	No	No
12.2	3.5	No	No
13.1	5.9	No	No
11.9	2.9	No	No
10.6	1.3	No	No

10.2	1.6	No	No
11.0	8.5	No	No
10.6	0.3	No	No
10.5	0.4	No	No
10.3	0.3	No	No
10.7	3.8	No	No
11.1	0.4	No	No
11.0	0.4	No	No
10.8	0.5	No	No
10.8	0.6	No	No
10.6	1.1	No	No
10.8	0.8	No	No
11.1	0.7	No	No
15.1	0.1	No	No
13.4	0.8	No	No
10.7	0.1	No	No
10.8	3.4	No	No
11.3	0.5	No	No
11.3	0.1	No	No
11.0	0.8	No	No
10.9	0.2	No	No
11.2	0.9	No	No
10.9	0.2	No	No
12.0	2.1	No	No
19.0	0.1	No	No
22.5	0.7	No	No

Summary

File Name on Meter	EF_HS.055
File Name on PC	SLM_0003788_EF_HS_055.00.ldbin
Serial Number	0003788
Model	SoundExpert® LxT
Firmware Version	2.301
User	
Location	
Job Description	
Note	

Measurement

Description	EF Academy Project
Start	2017-06-27 17:35:25
Stop	2017-06-27 17:45:25
Duration	00:10:00.0
Run Time	00:10:00.0
Pause	00:00:00.0
Pre Calibration	2017-06-27 16:21:22
Post Calibration	None
Calibration Deviation	---

Overall Settings

RMS Weight	A Weighting	
Peak Weight	A Weighting	
Detector	Slow	
Preamp	PRMLxT1L	
Microphone Correction	Off	
Integration Method	Exponential	
OBA Range	Normal	
OBA Bandwidth	1/1 and 1/3	
OBA Freq. Weighting	A Weighting	
OBA Max Spectrum	At LMax	
Overload	120.3 dB	
	A	**C**
Under Range Peak	**76.6**	73.6
Under Range Limit	**25.3**	24.8
Noise Floor	15.9	15.7

Results

LASeq	72.3 dB	
LASE	100.0 dB	
EAS	1.121 mPa²h	
LASpeak (max)	2017-06-27 17:38:28	102.6
LASmax	2017-06-27 17:38:29	90.6
LASmin	2017-06-27 17:39:16	54.4
SEA	-99.9 dB	

LAS > 85.0 dB (Exceedance Counts / Duration)	1	5.1
LAS > 115.0 dB (Exceedance Counts / Duration)	0	0.0
LA_{Speak} > 135.0 dB (Exceedance Counts / Duration)	0	0.0
LA_{Speak} > 137.0 dB (Exceedance Counts / Duration)	0	0.0
LA_{Speak} > 140.0 dB (Exceedance Counts / Duration)	0	0.0

Community Noise	**Ldn**	**LDay 07:00-23:00**
	72.3	72.3

LC_{Seq}	82.4	dB
LA_{Seq}	72.3	dB
LCS_{eq} - LAS_{eq}	10.2	dB
LAI_{eq}	73.8	dB
LA_{eq}	72.3	dB
LAI_{eq} - LA_{eq}	1.6	dB

	A	
	dB	**Time Stamp**
L_{eq}	72.3	
$L_{S(max)}$	90.6	2017/06/27 17:38:29
$L_{S(min)}$	54.4	2017/06/27 17:39:16
$L_{Peak(max)}$	102.6	2017/06/27 17:38:28

# Overloads	0	
Overload Duration	0.0	s
# OBA Overloads	0	
OBA Overload Duration	0.0	s

Statistics

LAS5.00	75.9	dB
LAS10.00	74.6	dB
LAS33.30	71.1	dB
LAS50.00	68.3	dB
LAS66.60	65.4	dB
LAS90.00	59.0	dB

Calibration History

Preamp	**Date**	**dB re. 1V/Pa**
Direct	2017-01-03 10:54:35	-27.0
Direct	2017-01-03 10:30:13	-26.0
Direct	2014-07-01 09:45:44	-27.0
PRMLxT1L	2017-06-27 16:21:22	-26.6
PRMLxT1L	2017-06-26 11:13:28	-26.6
PRMLxT1L	2017-06-20 10:09:05	-26.6
PRMLxT1L	2017-06-12 12:50:10	-26.6
PRMLxT1L	2017-06-06 15:05:30	-26.6
PRMLxT1L	2017-05-05 15:45:44	-26.6

PRMLxT1L	2017-04-29 09:09:14	-26.6
PRMLxT1L	2017-04-21 11:23:22	-26.5
PRMLxT1L	2017-03-31 13:13:53	-26.6
PRMLxT1L	2017-03-14 08:18:51	-26.6
PRMLxT1L	2017-03-10 10:18:04	-26.5

Z
78.6 dB
31.3 dB
21.4 dB

dB
dB
dB

s
s
s
s
s

LNight 23:00-07:00	Lden	LDay 07:00-19:00	LEvening 19:00-23:00	LNight 23:00-07:00
-99.9	72.3	72.3	-99.9	-99.9

C		Z	
dB	Time Stamp	dB	Time Stamp

6.3	**8.0**	**10.0**	**12.5**
2.5	1.9	3.3	7.7
61.7	59.8	59.2	54.2
64.6	55.5	59.0	60.8
61.3	59.9	62.9	60.0
61.9	63.5	53.7	67.2
48.3	50.2	49.4	58.8
48.5	42.2	44.8	43.0
51.3	59.2	56.0	47.6

39.5	40.2	49.9	42.2
37.9	45.8	40.7	31.9
48.6	50.1	57.0	56.7
42.4	46.2	50.2	47.7
39.5	42.0	44.7	43.1

dB

16.0	**20.0**	**25.0**	**31.5**	**40.0**	**50.0**	**63.0**	**80.0**	**100**	**125**	**160**	**200**	**250**	**315**	**400**	**500**
-1.0	2.3	0.5	3.1	2.3	0.9	2.9	4.5	6.7	17.0	7.3	3.9	12.5	9.3	7.1	3.6
61.0	44.5	36.3	44.2	35.5	41.3	42.1	33.4	39.3	37.9	29.0	27.5	26.0	24.1	19.7	20.0
56.7	50.3	53.1	46.7	42.7	47.4	40.0	41.2	44.2	46.7	45.4	44.6	39.9	34.1	34.7	33.9
65.2	53.8	52.2	50.6	50.7	52.6	45.8	44.1	41.8	44.0	42.5	41.5	38.5	35.7	32.7	29.0
67.9	53.0	49.2	51.6	57.3	49.4	45.7	39.6	47.2	42.3	41.2	46.7	48.5	50.6	52.0	52.6
56.7	47.6	39.9	34.8	38.1	45.6	39.2	37.3	40.3	35.3	35.2	42.1	40.0	45.1	45.4	46.2
58.8	54.4	33.4	42.3	46.2	55.6	46.5	32.9	42.4	39.2	36.9	40.1	40.7	33.7	38.1	29.8
45.2	40.7	49.8	45.0	52.4	46.9	41.8	43.5	35.1	39.5	37.8	37.0	35.6	32.8	30.4	25.8

45.9	36.9	38.3	43.8	40.7	37.6	37.8	33.8	31.5	32.4	25.3	25.4	27.3	21.4	22.2	16.4
36.8	39.9	42.4	45.7	48.9	45.8	39.0	52.1	54.6	47.0	39.7	35.5	37.4	33.6	27.9	20.6
53.2	49.6	43.0	43.6	51.3	49.2	46.0	36.2	40.9	37.3	40.1	37.5	41.7	38.4	36.1	31.9
43.3	32.8	41.8	42.5	43.5	40.8	40.8	37.3	31.2	30.3	22.9	15.8	17.3	15.7	15.4	15.3
44.6	36.6	31.4	30.2	38.4	45.3	53.3	44.1	43.4	43.7	42.7	49.0	55.1	45.6	51.4	53.3

630	800	1000	1250	1600	2000	2500	3150	4000	5000	6300	8000	10000	12500
8.0	9.0	7.3	10.0	9.2	9.8	11.6	12.5	13.2	40.2	17.7	16.3	18.1	20.4
17.4	28.0	113.0	48.1	19.6	62.7	18.7	56.6	25.5	27.7	20.7	22.0	23.6	25.3
21.4	29.3	114.0	49.1	19.8	66.0	18.7	57.5	29.4	28.0	21.3	22.9	24.6	26.4
17.4	28.6	114.0	49.1	19.1	65.8	18.9	57.4	29.4	27.8	21.7	22.9	24.2	26.2
43.9	30.1	114.0	49.1	20.9	65.8	19.0	57.4	29.5	27.9	21.5	22.7	24.6	26.3
32.4	30.2	114.0	49.2	19.3	65.9	19.4	57.4	29.6	28.0	21.5	22.9	24.4	26.2
22.0	28.8	114.0	49.1	19.1	66.0	19.0	57.5	29.5	27.8	21.4	22.7	24.5	26.4
20.4	28.5	113.9	49.0	19.0	66.0	19.2	57.4	29.7	27.7	21.7	22.8	24.6	26.3

16.8	28.8	113.9	49.0	18.9	65.7	19.4	57.2	29.4	27.9	21.1	22.5	24.3	26.0
18.1	28.8	114.1	49.2	19.2	65.9	19.0	56.7	28.8	27.3	21.5	23.0	24.6	26.4
20.9	28.6	114.0	49.1	19.4	65.9	19.3	57.5	29.5	27.9	21.5	22.6	24.3	26.5
18.2	29.5	113.9	49.1	19.3	65.7	19.4	57.2	29.6	28.1	21.7	22.8	24.3	26.0
45.3	30.8	114.1	49.2	21.1	66.1	19.5	57.6	29.8	28.3	21.9	22.9	24.6	26.3

16000	20000
20.2	21.5
28.1	30.6
28.8	31.4
28.8	31.5
28.9	31.5
28.8	31.9
28.8	31.6
28.7	31.2

28.7	31.2
28.9	31.6
28.7	31.3
28.7	31.3
28.8	31.6

1/1 Octave

Frequency (Hz)	8.0	16.0	31.5	63.0	125	250	500	1000	2000	4000	8000	16000
Overall 1/1 Spectra	6.0	17.2	36.5	52.1	63.6	65.8	64.7	66.9	63.7	55.5	46.7	34.3
Max 1/1 Spectra	5.9	18.8	39.1	76.2	83.4	88.5	84.2	75.8	72.9	66.8	57.3	44.2
Min 1/1 Spectra	5.9	6.2	23.6	34.6	43.2	43.1	46.0	50.3	45.5	34.8	23.0	14.7

1/3 Octave

Frequency (Hz)	6.3	8.0	10.0	12.5	16.0	20.0	25.0	31.5	40.0	50.0	63.0	80.0
Overall 1/3 Spectra	1.9	0.9	1.5	5.3	10.7	15.7	23.3	28.1	35.7	39.6	42.2	51.4
Max 1/3 Spectra	1.9	0.9	2.0	9.0	15.2	17.3	29.8	31.0	38.7	56.2	57.5	76.3
Min 1/3 Spectra	1.9	0.9	0.3	-0.8	-1.6	4.3	11.5	15.9	21.6	25.8	27.6	31.0

1/1 OBA Ref. Spectra

Frequency (Hz)	8.0	16.0	31.5	63.0	125	250	500	1000	2000	4000	8000	16000
1	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
2	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
3	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
4	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

1/3 OBA Ref. Spectra

Frequency (Hz)	6.3	8.0	10.0	12.5	16.0	20.0	25.0	31.5	40.0	50.0	63.0	80.0
1	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
2	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
3	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
4	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

1/1 OBA Under Range

Frequency (Hz)	8.0	16.0	31.5	63.0	125	250	500	1000	2000	4000	8000	16000
Under Range Limit	20.3	17.6	15.7	13.9	12.3	13.0	14.3	16.5	19.1	22.3	24.9	28.1
Noise Floor	15.9	13.2	11.1	9.2	7.6	7.4	8.6	10.6	13.0	16.0	18.7	21.7

1/3 OBA Under Range

Frequency (Hz)	6.3	8.0	10.0	12.5	16.0	20.0	25.0	31.5	40.0	50.0	63.0	80.0
Under Range Limit	21.9	20.9	20.3	19.2	18.4	17.6	16.9	16.3	15.7	14.9	14.5	13.9
Noise Floor	11.9	10.9	10.3	9.2	8.4	7.6	6.9	6.3	5.7	4.9	4.5	3.9

100	125	160	200	250	315	400	500	630	800	1000	1250	1600	2000	2500	3150
55.9	59.6	60.0	62.0	60.1	60.6	59.3	59.8	60.6	61.6	62.9	61.9	60.9	58.6	55.8	52.9
77.9	76.3	82.6	86.0	82.4	83.2	80.7	79.6	77.1	73.8	72.9	67.8	67.4	68.6	68.2	64.6
36.2	38.3	37.1	38.4	37.5	37.6	38.9	40.9	42.9	44.8	45.9	45.1	43.2	39.9	36.6	32.8

100	125	160	200	250	315	400	500	630	800	1000	1250	1600	2000	2500	3150
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

100	125	160	200	250	315	400	500	630	800	1000	1250	1600	2000	2500	3150
13.3	12.7	12.3	12.4	12.5	13.0	13.4	13.8	14.3	15.1	15.7	16.5	17.3	18.2	19.1	20.1
3.3	2.7	2.3	2.4	2.5	3.0	3.4	3.8	4.3	5.1	5.7	6.5	7.3	8.2	9.1	10.1

4000	5000	6300	8000	10000	12500	16000	20000
50.0	48.1	44.5	41.1	37.1	32.1	28.2	24.5
60.4	59.6	55.6	50.9	47.6	42.6	37.1	29.4
28.6	25.4	20.8	16.6	14.0	11.0	9.1	8.5

4000	5000	6300	8000	10000	12500	16000	20000
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

4000	5000	6300	8000	10000	12500	16000	20000
21.0	22.3	22.8	23.8	24.9	25.8	26.7	28.1
11.0	12.3	12.8	13.8	14.9	15.8	16.7	18.1

Record #	Date	Time	Record Type	Cause	#	TH Record	Sound Record
1	2017-06-27	17:35:25	Run	Key	1	1	
2	2017-06-27	17:45:25	Stop	Timer	1	122	

Statistics		
Level (dB)	**Count**	**Percent**
Under	0	0.00
54.4	70	0.12
54.5	32	0.05
54.6	108	0.18
54.7	131	0.22
54.8	96	0.16
54.9	63	0.10
55.0	73	0.12
55.1	93	0.16
55.2	124	0.21
55.3	74	0.12
55.4	82	0.14
55.5	117	0.19
55.6	105	0.18
55.7	46	0.08
55.8	46	0.08
55.9	131	0.22
56.0	309	0.51
56.1	249	0.41
56.2	187	0.31
56.3	117	0.19
56.4	80	0.13
56.5	77	0.13
56.6	89	0.15
56.7	67	0.11
56.8	57	0.09
56.9	150	0.25
57.0	113	0.19
57.1	135	0.22
57.2	195	0.33
57.3	116	0.19
57.4	128	0.21
57.5	197	0.33
57.6	184	0.31
57.7	255	0.43
57.8	220	0.37
57.9	212	0.35
58.0	208	0.35
58.1	315	0.52
58.2	182	0.30
58.3	143	0.24
58.4	114	0.19
58.5	99	0.16
58.6	108	0.18
58.7	115	0.19
58.8	79	0.13

58.9	88	0.15
59.0	98	0.16
59.1	100	0.17
59.2	151	0.25
59.3	85	0.14
59.4	95	0.16
59.5	116	0.19
59.6	105	0.18
59.7	168	0.28
59.8	304	0.51
59.9	438	0.73
60.0	235	0.39
60.1	141	0.23
60.2	116	0.19
60.3	138	0.23
60.4	120	0.20
60.5	125	0.21
60.6	133	0.22
60.7	145	0.24
60.8	237	0.39
60.9	226	0.38
61.0	210	0.35
61.1	250	0.42
61.2	292	0.49
61.3	327	0.55
61.4	291	0.49
61.5	277	0.46
61.6	318	0.53
61.7	243	0.41
61.8	285	0.47
61.9	205	0.34
62.0	206	0.34
62.1	190	0.32
62.2	248	0.41
62.3	277	0.46
62.4	276	0.46
62.5	360	0.60
62.6	301	0.50
62.7	245	0.41
62.8	169	0.28
62.9	236	0.39
63.0	237	0.39
63.1	218	0.36
63.2	230	0.38
63.3	155	0.26
63.4	186	0.31
63.5	173	0.29
63.6	151	0.25

63.7	266	0.44
63.8	188	0.31
63.9	276	0.46
64.0	199	0.33
64.1	238	0.40
64.2	202	0.34
64.3	216	0.36
64.4	170	0.28
64.5	168	0.28
64.6	216	0.36
64.7	197	0.33
64.8	255	0.43
64.9	258	0.43
65.0	218	0.36
65.1	271	0.45
65.2	348	0.58
65.3	268	0.45
65.4	350	0.58
65.5	333	0.56
65.6	267	0.44
65.7	344	0.57
65.8	367	0.61
65.9	426	0.71
66.0	314	0.52
66.1	428	0.71
66.2	350	0.58
66.3	364	0.61
66.4	352	0.59
66.5	590	0.98
66.6	544	0.91
66.7	470	0.78
66.8	549	0.92
66.9	400	0.67
67.0	379	0.63
67.1	322	0.54
67.2	303	0.50
67.3	316	0.53
67.4	230	0.38
67.5	298	0.50
67.6	250	0.42
67.7	347	0.58
67.8	352	0.59
67.9	221	0.37
68.0	214	0.36
68.1	186	0.31
68.2	188	0.31
68.3	241	0.40
68.4	260	0.43

68.5	284	0.47
68.6	276	0.46
68.7	309	0.51
68.8	332	0.55
68.9	297	0.50
69.0	404	0.67
69.1	472	0.79
69.2	520	0.87
69.3	360	0.60
69.4	412	0.69
69.5	463	0.77
69.6	370	0.62
69.7	383	0.64
69.8	343	0.57
69.9	338	0.56
70.0	295	0.49
70.1	276	0.46
70.2	419	0.70
70.3	343	0.57
70.4	375	0.63
70.5	421	0.70
70.6	480	0.80
70.7	448	0.75
70.8	346	0.58
70.9	328	0.55
71.0	369	0.62
71.1	451	0.75
71.2	371	0.62
71.3	349	0.58
71.4	435	0.72
71.5	402	0.67
71.6	325	0.54
71.7	336	0.56
71.8	414	0.69
71.9	491	0.82
72.0	561	0.94
72.1	506	0.84
72.2	563	0.94
72.3	461	0.77
72.4	585	0.98
72.5	360	0.60
72.6	418	0.70
72.7	421	0.70
72.8	339	0.56
72.9	429	0.71
73.0	335	0.56
73.1	305	0.51
73.2	342	0.57

73.3	363	0.61
73.4	469	0.78
73.5	353	0.59
73.6	362	0.60
73.7	344	0.57
73.8	394	0.66
73.9	365	0.61
74.0	365	0.61
74.1	346	0.58
74.2	321	0.54
74.3	395	0.66
74.4	328	0.55
74.5	384	0.64
74.6	303	0.50
74.7	293	0.49
74.8	312	0.52
74.9	394	0.66
75.0	271	0.45
75.1	245	0.41
75.2	198	0.33
75.3	165	0.28
75.4	219	0.37
75.5	203	0.34
75.6	163	0.27
75.7	141	0.23
75.8	87	0.14
75.9	103	0.17
76.0	95	0.16
76.1	66	0.11
76.2	61	0.10
76.3	61	0.10
76.4	76	0.13
76.5	65	0.11
76.6	55	0.09
76.7	49	0.08
76.8	52	0.09
76.9	60	0.10
77.0	114	0.19
77.1	74	0.12
77.2	70	0.12
77.3	68	0.11
77.4	59	0.10
77.5	46	0.08
77.6	50	0.08
77.7	60	0.10
77.8	43	0.07
77.9	53	0.09
78.0	47	0.08

78.1	47	0.08
78.2	47	0.08
78.3	38	0.06
78.4	37	0.06
78.5	39	0.06
78.6	43	0.07
78.7	39	0.06
78.8	37	0.06
78.9	46	0.08
79.0	63	0.10
79.1	29	0.05
79.2	35	0.06
79.3	41	0.07
79.4	28	0.05
79.5	28	0.05
79.6	29	0.05
79.7	39	0.06
79.8	29	0.05
79.9	39	0.06
80.0	50	0.08
80.1	52	0.09
80.2	31	0.05
80.3	14	0.02
80.4	15	0.03
80.5	10	0.02
80.6	13	0.02
80.7	25	0.04
80.8	28	0.05
80.9	6	0.01
81.0	5	0.01
81.1	6	0.01
81.2	7	0.01
81.3	5	0.01
81.4	10	0.02
81.5	7	0.01
81.6	8	0.01
81.7	8	0.01
81.8	8	0.01
81.9	5	0.01
82.0	5	0.01
82.1	4	0.01
82.2	5	0.01
82.3	5	0.01
82.4	5	0.01
82.5	4	0.01
82.6	5	0.01
82.7	4	0.01
82.8	4	0.01

82.9	5	0.01
83.0	6	0.01
83.1	3	0.00
83.2	6	0.01
83.3	4	0.01
83.4	7	0.01
83.5	5	0.01
83.6	5	0.01
83.7	6	0.01
83.8	31	0.05
83.9	22	0.04
84.0	21	0.04
84.1	18	0.03
84.2	27	0.04
84.3	3	0.00
84.4	4	0.01
84.5	4	0.01
84.6	5	0.01
84.7	4	0.01
84.8	3	0.00
84.9	6	0.01
85.0	3	0.00
85.1	5	0.01
85.2	3	0.00
85.3	3	0.00
85.4	3	0.00
85.5	4	0.01
85.6	4	0.01
85.7	3	0.00
85.8	4	0.01
85.9	2	0.00
86.0	4	0.01
86.1	4	0.01
86.2	3	0.00
86.3	3	0.00
86.4	4	0.01
86.5	4	0.01
86.6	3	0.00
86.7	3	0.00
86.8	4	0.01
86.9	3	0.00
87.0	4	0.01
87.1	4	0.01
87.2	4	0.01
87.3	5	0.01
87.4	4	0.01
87.5	3	0.00
87.6	4	0.01

87.7	4	0.01
87.8	4	0.01
87.9	5	0.01
88.0	4	0.01
88.1	5	0.01
88.2	4	0.01
88.3	5	0.01
88.4	4	0.01
88.5	5	0.01
88.6	4	0.01
88.7	4	0.01
88.8	4	0.01
88.9	5	0.01
89.0	5	0.01
89.1	6	0.01
89.2	7	0.01
89.3	9	0.02
89.4	9	0.02
89.5	14	0.02
89.6	11	0.02
89.7	16	0.03
89.8	12	0.02
89.9	6	0.01
90.0	8	0.01
90.1	9	0.02
90.2	6	0.01
90.3	10	0.02
90.4	8	0.01
90.5	16	0.03
90.6	20	0.03
Over	0	0.00
Total Count	60000	

Record #	Date	Time	Run Duration	Run Time	Pause	LASeq	LASE	LASmin
1	2017-06-27	17:35:25	00:10:00.0	00:10:00.0	00:00:00.0	72.3	100.0	54.4

LASmin Time	LASmax	LASmax Time	LApeak (max)	LApeak (max) Time	SPL 1 Count
17:39:16	90.6	17:38:29	102.6	17:38:28	1

SPL 1 Duration	SPL 2 Count	SPL 2 Duration	Peak 1 Count	Peak 1 Duration	Peak 2 Count
5.1	0	0.0	0	0.0	0

Peak 2 Duration	Peak 3 Count	Peak 3 Duration	LAS5.00	LAS10.00	LAS33.30	LAS50.00
0.0	0	0.0	75.9	74.6	71.1	68.3

LAS66.60	LAS90.00	SEA	LCSeq	LASeq	LCSeq - LASeq	LAIeq	LAeq	LAIeq - LAeq
65.4	59.0	-99.9	82.4	72.3	10.2	73.8	72.3	1.6

# Overloads	Overloads Duration	# OBA Overloads	OBA Overloads Duration	1/1 LASeq 8.0
0	0.0	0	0.0	6.0

1/1 LASeq 16.0	1/1 LASeq 31.5	1/1 LASeq 63.0	1/1 LASeq 125	1/1 LASeq 250	1/1 LASeq 500
17.2	36.5	52.1	63.6	65.8	64.7

1/1 LASeq 1000	1/1 LASeq 2000	1/1 LASeq 4000	1/1 LASeq 8000	1/1 LASeq 16000
66.9	63.7	55.5	46.7	34.3

1/1 LASmax 8.0	1/1 LASmax 16.0	1/1 LASmax 31.5	1/1 LASmax 63.0	1/1 LASmax 125
5.9	18.8	39.1	76.2	83.4

1/1 LASmax 250	1/1 LASmax 500	1/1 LASmax 1000	1/1 LASmax 2000	1/1 LASmax 4000
88.5	84.2	75.8	72.9	66.8

1/1 LASmax 8000	1/1 LASmax 16000	1/1 LASmin 8.0	1/1 LASmin 16.0	1/1 LASmin 31.5
57.3	44.2	5.9	6.2	23.6

1/1 LASmin 63.0	1/1 LASmin 125	1/1 LASmin 250	1/1 LASmin 500	1/1 LASmin 1000
34.6	43.2	43.1	46.0	50.3

1/1 LASmin 2000	1/1 LASmin 4000	1/1 LASmin 8000	1/1 LASmin 16000	1/3 LASeq 6.3
45.5	34.8	23.0	14.7	1.9

1/3 LASeq 8.0	1/3 LASeq 10.0	1/3 LASeq 12.5	1/3 LASeq 16.0	1/3 LASeq 20.0	1/3 LASeq 25.0
0.9	1.5	5.3	10.7	15.7	23.3

1/3 LASeq 31.5	1/3 LASeq 40.0	1/3 LASeq 50.0	1/3 LASeq 63.0	1/3 LASeq 80.0	1/3 LASeq 100
28.1	35.7	39.6	42.2	51.4	55.9

1/3 LASeq 125	1/3 LASeq 160	1/3 LASeq 200	1/3 LASeq 250	1/3 LASeq 315	1/3 LASeq 400
59.6	60.0	62.0	60.1	60.6	59.3

1/3 LASeq 500	1/3 LASeq 630	1/3 LASeq 800	1/3 LASeq 1000	1/3 LASeq 1250	1/3 LASeq 1600
59.8	60.6	61.6	62.9	61.9	60.9

1/3 LASeq 2000	1/3 LASeq 2500	1/3 LASeq 3150	1/3 LASeq 4000	1/3 LASeq 5000
58.6	55.8	52.9	50.0	48.1

1/3 LASeq 6300	1/3 LASeq 8000	1/3 LASeq 10000	1/3 LASeq 12500	1/3 LASeq 16000
44.5	41.1	37.1	32.1	28.2

1/3 LASeq 20000	1/3 LASmax 6.3	1/3 LASmax 8.0	1/3 LASmax 10.0	1/3 LASmax 12.5
24.5	1.9	0.9	2.0	9.0

1/3 LASmax 16.0	1/3 LASmax 20.0	1/3 LASmax 25.0	1/3 LASmax 31.5	1/3 LASmax 40.0
15.2	17.3	29.8	31.0	38.7

1/3 LASmax 50.0	1/3 LASmax 63.0	1/3 LASmax 80.0	1/3 LASmax 100	1/3 LASmax 125
56.2	57.5	76.3	77.9	76.3

1/3 LASmax 160	1/3 LASmax 200	1/3 LASmax 250	1/3 LASmax 315	1/3 LASmax 400
82.6	86.0	82.4	83.2	80.7

1/3 LASmax 500	1/3 LASmax 630	1/3 LASmax 800	1/3 LASmax 1000	1/3 LASmax 1250
79.6	77.1	73.8	72.9	67.8

1/3 LASmax 1600	1/3 LASmax 2000	1/3 LASmax 2500	1/3 LASmax 3150	1/3 LASmax 4000
67.4	68.6	68.2	64.6	60.4

1/3 LASmax 5000	1/3 LASmax 6300	1/3 LASmax 8000	1/3 LASmax 10000	1/3 LASmax 12500
59.6	55.6	50.9	47.6	42.6

1/3 LASmax 16000	1/3 LASmax 20000	1/3 LASmin 6.3	1/3 LASmin 8.0	1/3 LASmin 10.0
37.1	29.4	1.9	0.9	0.3

1/3 LASmin 12.5	1/3 LASmin 16.0	1/3 LASmin 20.0	1/3 LASmin 25.0	1/3 LASmin 31.5
-0.8	-1.6	4.3	11.5	15.9

1/3 LASmin 40.0	1/3 LASmin 50.0	1/3 LASmin 63.0	1/3 LASmin 80.0	1/3 LASmin 100
21.6	25.8	27.6	31.0	36.2

1/3 LASmin 125	1/3 LASmin 160	1/3 LASmin 200	1/3 LASmin 250	1/3 LASmin 315
38.3	37.1	38.4	37.5	37.6

1/3 LASmin 400	1/3 LASmin 500	1/3 LASmin 630	1/3 LASmin 800	1/3 LASmin 1000
38.9	40.9	42.9	44.8	45.9

1/3 LASmin 1250	1/3 LASmin 1600	1/3 LASmin 2000	1/3 LASmin 2500	1/3 LASmin 3150
45.1	43.2	39.9	36.6	32.8

1/3 LASmin 4000	1/3 LASmin 5000	1/3 LASmin 6300	1/3 LASmin 8000	1/3 LASmin 10000
28.6	25.4	20.8	16.6	14.0

1/3 LASmin 12500	1/3 LASmin 16000	1/3 LASmin 20000
11.0	9.1	8.5

Record #	Record Type	Date	Time	LASeq	LApeak	LASmax	LASmin	Battery
1	Run	2017-06-27	17:35:25					
2		2017-06-27	17:35:25	65.6	78.4	68.6	62.8	4.9
3		2017-06-27	17:35:30	61.0	76.6	64.2	55.9	4.9
4		2017-06-27	17:35:35	55.2	73.7	56.0	54.5	4.9
5		2017-06-27	17:35:40	64.2	88.8	71.0	55.0	4.9
6		2017-06-27	17:35:45	72.2	86.6	72.8	71.0	4.9
7		2017-06-27	17:35:50	72.6	87.4	73.9	71.0	4.9
8		2017-06-27	17:35:55	73.6	86.9	74.5	71.8	4.9
9		2017-06-27	17:36:00	72.0	86.2	73.0	70.7	4.9
10		2017-06-27	17:36:05	70.9	85.6	72.4	69.4	4.9
11		2017-06-27	17:36:10	69.0	82.0	71.8	66.5	4.9
12		2017-06-27	17:36:15	65.4	78.9	66.6	62.2	4.9
13		2017-06-27	17:36:20	61.5	88.1	62.1	60.9	4.9
14		2017-06-27	17:36:25	58.6	73.9	61.0	56.2	4.9
15		2017-06-27	17:36:30	56.6	74.9	58.7	55.9	4.9
16		2017-06-27	17:36:35	58.3	76.9	62.7	55.9	4.9
17		2017-06-27	17:36:40	68.5	83.8	71.9	62.7	4.9
18		2017-06-27	17:36:45	73.6	86.4	75.2	69.8	4.9
19		2017-06-27	17:36:50	68.1	83.8	71.6	66.3	4.9
20		2017-06-27	17:36:55	77.6	92.4	80.3	71.7	4.9
21		2017-06-27	17:37:00	75.2	86.1	79.0	70.4	4.9
22		2017-06-27	17:37:05	68.4	81.6	70.4	66.7	4.9
23		2017-06-27	17:37:10	75.3	89.9	79.0	66.7	4.9
24		2017-06-27	17:37:15	70.1	80.1	75.1	66.5	4.9
25		2017-06-27	17:37:20	66.1	82.6	69.1	59.6	4.9
26		2017-06-27	17:37:25	58.1	71.8	59.6	57.1	4.9
27		2017-06-27	17:37:30	75.2	95.9	80.2	58.0	4.9
28		2017-06-27	17:37:35	75.7	88.2	78.1	74.3	4.9
29		2017-06-27	17:37:40	74.2	88.3	75.4	73.1	4.9
30		2017-06-27	17:37:45	73.5	88.9	74.6	72.4	4.9
31		2017-06-27	17:37:50	71.0	85.7	73.9	67.9	4.9
32		2017-06-27	17:37:55	66.5	81.1	67.9	65.7	4.9
33		2017-06-27	17:38:00	64.3	78.8	65.7	62.6	4.9
34		2017-06-27	17:38:05	63.1	76.0	63.7	62.5	4.9
35		2017-06-27	17:38:10	66.7	85.8	69.4	63.7	4.9
36		2017-06-27	17:38:15	67.4	82.6	68.8	66.5	4.9
37		2017-06-27	17:38:20	67.4	87.3	72.7	65.2	4.9
38		2017-06-27	17:38:25	87.1	102.6	90.6	72.9	4.9
39		2017-06-27	17:38:30	82.2	98.5	86.2	75.4	4.9
40		2017-06-27	17:38:35	73.9	85.8	75.4	71.9	4.9
41		2017-06-27	17:38:40	69.1	81.5	71.9	65.7	4.9
42		2017-06-27	17:38:45	65.5	78.7	66.5	64.6	4.9
43		2017-06-27	17:38:50	66.2	82.0	68.5	63.7	4.9
44		2017-06-27	17:38:55	69.9	87.2	72.2	65.3	4.9
45		2017-06-27	17:39:00	66.3	79.8	69.2	61.7	4.9
46		2017-06-27	17:39:05	62.9	76.1	64.0	60.2	4.9
47		2017-06-27	17:39:10	57.0	69.6	60.2	54.4	4.9

48	2017-06-27	17:39:15	55.3	70.6	57.0	54.4	4.9
49	2017-06-27	17:39:20	59.8	79.0	64.8	57.0	4.9
50	2017-06-27	17:39:25	72.3	88.3	74.6	64.8	4.9
51	2017-06-27	17:39:30	73.7	87.6	74.9	72.1	4.9
52	2017-06-27	17:39:35	74.1	88.7	75.1	72.1	4.9
53	2017-06-27	17:39:40	74.1	90.0	75.7	72.0	4.9
54	2017-06-27	17:39:45	74.0	89.7	76.5	71.4	4.9
55	2017-06-27	17:39:50	68.9	80.9	71.4	66.0	4.9
56	2017-06-27	17:39:55	64.7	76.8	66.0	62.7	4.9
57	2017-06-27	17:40:00	61.8	74.4	62.7	60.7	4.9
58	2017-06-27	17:40:05	60.2	73.8	61.1	59.7	4.9
59	2017-06-27	17:40:10	60.0	74.6	60.5	59.7	4.9
60	2017-06-27	17:40:15	60.7	75.4	62.3	59.6	4.9
61	2017-06-27	17:40:20	65.2	79.8	66.9	62.3	4.9
62	2017-06-27	17:40:25	66.7	80.9	67.9	65.4	4.9
63	2017-06-27	17:40:30	68.1	84.4	70.6	66.0	4.9
64	2017-06-27	17:40:35	69.8	83.2	70.7	68.6	4.9
65	2017-06-27	17:40:40	70.5	83.6	71.0	69.6	4.9
66	2017-06-27	17:40:45	69.6	84.3	70.7	68.4	4.9
67	2017-06-27	17:40:50	69.9	84.5	71.8	68.9	4.9
68	2017-06-27	17:40:55	66.8	81.3	71.6	60.1	4.9
69	2017-06-27	17:41:00	58.0	70.3	60.1	56.8	4.9
70	2017-06-27	17:41:05	70.3	86.5	74.4	57.5	4.9
71	2017-06-27	17:41:10	74.1	89.2	76.1	72.6	4.9
72	2017-06-27	17:41:15	74.2	89.5	75.2	72.7	4.9
73	2017-06-27	17:41:20	75.0	89.8	75.9	74.0	4.9
74	2017-06-27	17:41:25	73.2	89.4	74.9	71.2	4.9
75	2017-06-27	17:41:30	71.2	85.0	72.4	67.1	4.9
76	2017-06-27	17:41:35	63.4	75.3	67.1	61.2	4.9
77	2017-06-27	17:41:40	63.0	78.4	66.1	60.8	4.9
78	2017-06-27	17:41:45	64.2	77.5	66.2	61.1	4.9
79	2017-06-27	17:41:50	61.7	76.3	62.8	61.1	4.9
80	2017-06-27	17:41:55	61.9	77.3	63.2	60.7	4.9
81	2017-06-27	17:42:00	72.3	95.0	79.4	62.0	4.9
82	2017-06-27	17:42:05	73.7	88.0	79.1	66.3	4.9
83	2017-06-27	17:42:10	66.0	80.2	67.0	64.9	4.9
84	2017-06-27	17:42:15	65.9	78.8	66.8	64.9	4.9
85	2017-06-27	17:42:20	68.5	82.3	70.4	66.1	4.9
86	2017-06-27	17:42:25	71.8	85.6	72.6	70.2	4.9
87	2017-06-27	17:42:30	71.5	84.2	72.2	71.0	4.9
88	2017-06-27	17:42:35	70.1	82.6	71.2	67.9	4.9
89	2017-06-27	17:42:40	67.6	83.8	70.3	66.1	4.9
90	2017-06-27	17:42:45	71.7	86.6	73.4	70.3	4.9
91	2017-06-27	17:42:50	67.8	83.7	70.8	64.3	4.9
92	2017-06-27	17:42:55	70.8	86.2	72.7	68.3	4.9
93	2017-06-27	17:43:00	77.8	95.2	80.8	72.7	4.9
94	2017-06-27	17:43:05	73.6	87.5	77.3	69.9	4.9
95	2017-06-27	17:43:10	75.0	92.3	77.8	70.3	4.9

96		2017-06-27	17:43:15	70.6	87.8	74.7	68.7	4.9
97		2017-06-27	17:43:20	73.3	87.6	75.1	71.3	4.9
98		2017-06-27	17:43:25	71.1	87.1	74.0	68.5	4.9
99		2017-06-27	17:43:30	72.6	88.8	75.7	67.6	4.9
100		2017-06-27	17:43:35	64.9	78.0	67.6	62.1	4.9
101		2017-06-27	17:43:40	61.6	74.9	63.1	60.4	4.9
102		2017-06-27	17:43:45	58.8	73.4	60.8	57.8	4.9
103		2017-06-27	17:43:50	58.0	70.2	58.2	57.7	4.9
104		2017-06-27	17:43:55	59.1	72.9	60.8	58.1	4.9
105		2017-06-27	17:44:00	66.0	85.1	68.6	60.8	4.9
106		2017-06-27	17:44:05	66.6	84.4	67.4	65.4	4.9
107		2017-06-27	17:44:10	67.0	84.4	69.9	65.1	4.9
108		2017-06-27	17:44:15	75.1	91.0	77.1	70.0	4.9
109		2017-06-27	17:44:20	71.6	83.6	73.0	70.6	4.9
110		2017-06-27	17:44:25	69.7	83.1	70.7	68.0	4.9
111		2017-06-27	17:44:30	64.3	75.3	68.0	62.2	4.9
112		2017-06-27	17:44:35	59.7	73.5	62.5	56.3	4.9
113		2017-06-27	17:44:40	61.2	80.7	68.9	55.8	4.9
114		2017-06-27	17:44:45	68.5	81.1	70.0	65.5	4.9
115		2017-06-27	17:44:50	64.6	80.1	66.9	63.3	4.9
116		2017-06-27	17:44:55	74.1	89.6	75.5	67.0	4.9
117		2017-06-27	17:45:00	71.7	86.4	74.0	70.2	4.9
118		2017-06-27	17:45:05	71.8	88.1	74.6	70.1	4.9
119		2017-06-27	17:45:10	72.5	86.0	74.5	71.1	4.9
120		2017-06-27	17:45:15	72.3	86.7	74.0	70.8	4.9
121		2017-06-27	17:45:20	71.1	86.7	72.9	69.1	4.9
122	Stop	2017-06-27	17:45:25					

Int. Temp (°F)	LCSeq-LASeq	1/1 LASeq 8.0	1/1 LASeq 16.0	1/1 LASeq 31.5	1/1 LASeq 63.0
99.6	8.5	5.9	20.1	32.5	43.0
99.6	10.5	5.9	16.1	28.5	40.1
99.6	17.7	6.8	22.0	30.1	37.9
99.7	7.3	5.9	18.0	26.5	37.1
99.6	5.3	6.1	22.6	33.5	43.1
99.7	4.6	6.3	20.4	33.2	41.9
100.0	7.3	6.5	22.6	34.0	44.2
100.0	6.0	5.9	19.1	36.7	44.2
100.0	6.5	5.9	18.4	38.1	44.9
100.0	6.8	5.9	18.3	35.8	45.1
100.0	7.2	5.9	13.2	29.3	42.4
100.0	10.7	5.9	9.6	34.8	40.8
100.0	13.5	5.9	12.0	33.1	40.9
100.0	14.4	5.9	11.4	31.4	40.7
100.0	12.8	5.9	12.0	29.8	39.9
100.0	13.2	5.9	15.3	36.4	46.0
100.3	13.1	5.9	10.3	36.1	48.8
100.5	12.5	5.9	8.1	38.3	48.1
100.5	14.3	5.9	11.0	38.4	51.0
100.5	14.4	5.9	13.3	39.0	48.5
100.5	11.3	5.9	11.2	33.7	43.7
100.5	12.8	5.9	11.5	32.6	47.7
100.5	12.2	5.9	14.0	31.8	45.1
100.5	6.6	5.9	7.9	29.7	40.3
100.5	11.8	5.9	9.5	26.7	41.1
100.5	6.1	5.9	10.6	31.1	51.0
100.5	5.4	5.9	12.3	37.5	50.2
100.5	5.2	5.9	12.5	39.0	47.6
100.5	4.7	5.9	12.7	40.2	45.1
100.5	4.6	5.9	10.9	36.8	43.8
100.5	7.4	5.9	9.6	36.4	43.7
100.5	8.7	5.9	10.1	33.1	43.3
100.5	11.1	5.9	9.7	38.4	42.7
100.6	10.5	5.9	10.3	35.0	45.2
100.6	10.9	5.9	14.2	36.1	50.3
100.9	13.5	8.0	23.7	38.7	49.2
100.8	12.0	5.9	16.1	37.9	70.4
100.9	11.4	5.9	19.3	49.8	64.8
101.0	12.1	5.9	13.6	49.3	54.0
101.0	11.3	5.9	12.7	39.7	49.0
101.0	10.0	5.9	10.2	39.4	47.1
101.0	5.5	5.9	12.1	30.1	40.3
101.0	4.5	5.9	11.8	28.3	40.5
101.0	7.7	5.9	11.8	31.6	39.1
101.0	8.9	5.9	10.9	31.8	38.2
101.0	11.3	5.9	9.0	26.4	36.9

101.0	12.6	5.9	10.1	27.8	37.3
101.0	9.8	5.9	14.8	27.5	37.2
101.0	3.0	5.9	15.2	31.1	40.9
101.0	3.2	5.9	15.6	33.2	43.1
101.0	4.1	5.9	15.4	36.4	48.2
101.0	4.1	5.9	21.1	36.4	44.4
101.1	3.1	5.9	18.2	31.7	43.6
101.1	7.0	5.9	16.8	29.8	44.6
101.1	11.6	5.9	17.2	36.0	47.4
101.5	15.2	5.9	16.3	38.5	46.4
101.5	17.6	5.9	18.3	39.4	45.6
101.4	17.5	5.9	15.5	38.8	47.4
101.5	16.1	5.9	18.7	37.9	45.3
101.5	13.7	5.9	18.3	36.1	46.5
101.5	12.6	5.9	20.3	36.7	47.0
101.5	13.7	6.9	21.5	39.2	53.0
101.5	10.2	5.9	19.7	36.6	50.8
101.5	8.3	6.0	20.0	35.1	46.8
101.5	8.2	5.9	21.7	36.3	46.3
101.5	6.0	5.9	17.5	33.6	44.0
101.5	8.0	5.9	18.3	32.2	44.0
101.5	14.6	5.9	21.3	33.1	38.0
101.5	5.5	5.9	20.7	32.5	40.3
101.5	3.4	6.4	21.5	33.2	43.1
101.5	5.8	6.9	23.7	39.5	45.3
101.5	4.4	6.8	21.7	38.7	44.7
101.5	3.8	5.9	17.1	32.9	46.1
101.5	4.5	5.9	17.1	35.6	43.3
101.5	8.8	5.9	17.8	30.7	39.0
101.5	9.7	5.9	19.1	30.6	39.0
101.5	7.6	5.9	12.8	30.2	40.5
101.5	9.0	5.9	10.1	30.2	41.3
101.5	9.2	5.9	10.2	28.7	41.2
101.5	3.0	5.9	11.3	30.1	44.3
101.5	2.2	5.9	13.4	32.4	46.1
101.5	8.3	5.9	17.2	31.2	42.7
101.5	13.1	7.8	24.5	37.6	46.8
101.5	10.4	9.3	23.8	35.8	49.6
101.4	8.8	5.9	14.3	33.6	49.0
101.2	12.0	5.9	17.8	38.0	54.4
101.4	10.3	5.9	11.0	37.5	51.2
101.4	6.7	5.9	10.7	35.7	43.3
101.4	3.9	5.9	10.7	32.6	43.8
101.0	6.3	5.9	12.2	29.9	44.8
101.2	3.8	5.9	11.2	28.7	42.6
101.1	4.3	5.9	13.9	32.0	46.8
101.1	5.5	5.9	14.3	31.5	47.2
101.0	5.9	5.9	14.8	32.9	52.7

101.0	6.4	5.9	10.8	28.5	48.0
101.0	5.1	5.9	16.0	36.6	47.0
101.0	4.8	5.9	13.3	32.9	45.1
101.0	5.2	5.9	22.7	34.6	44.0
101.0	9.5	6.0	15.7	31.6	45.2
101.0	13.0	5.9	11.6	32.5	46.6
101.0	13.2	5.9	13.6	30.9	42.2
101.0	15.6	5.9	19.5	32.6	42.8
101.0	15.6	5.9	20.7	34.8	43.5
101.0	10.1	5.9	16.0	36.0	44.0
101.0	10.8	5.9	15.0	35.6	47.4
101.0	12.4	5.9	19.6	35.9	49.2
101.0	12.7	5.9	19.6	36.5	55.1
101.0	9.8	5.9	16.0	32.7	51.3
101.0	6.8	5.9	12.5	30.2	46.9
101.0	9.3	5.9	14.2	30.4	44.2
101.0	11.5	5.9	15.5	30.5	41.7
101.0	12.1	5.9	10.9	29.8	39.2
101.0	9.9	5.9	10.0	28.7	41.6
101.0	9.1	5.9	10.2	25.7	38.2
101.0	2.1	5.9	7.7	27.2	41.4
101.0	3.8	5.9	8.2	27.3	42.4
101.0	6.2	5.9	12.1	29.5	45.6
101.0	4.2	5.9	13.1	30.7	48.5
101.0	2.9	5.9	12.8	29.9	43.1
101.0	2.9	5.9	12.9	27.9	40.2

1/1 LASeq 125	1/1 LASeq 250	1/1 LASeq 500	1/1 LASeq 1000	1/1 LASeq 2000	1/1 LASeq 4000
50.7	55.0	58.1	62.4	58.3	49.5
48.0	51.7	55.5	57.8	49.8	40.5
46.0	44.8	47.4	51.5	46.5	38.9
48.5	49.8	55.4	61.2	58.4	47.2
53.1	57.5	62.8	69.6	66.4	56.5
54.6	57.4	62.6	69.7	67.2	56.8
62.4	61.2	64.3	70.2	67.5	57.1
57.9	58.5	63.4	69.1	65.9	55.3
52.4	56.5	62.1	68.6	64.2	54.3
51.6	56.5	61.6	66.2	62.1	53.3
48.7	53.6	58.0	62.6	57.7	47.5
48.7	51.2	54.3	57.9	54.0	47.3
50.1	48.8	51.2	54.2	51.1	43.4
48.8	46.9	47.7	50.9	50.3	45.2
49.7	48.5	50.9	53.6	50.6	43.9
64.9	59.8	58.0	60.6	58.1	52.2
71.6	65.5	61.4	64.1	58.4	51.2
62.5	59.2	60.1	62.7	58.2	51.1
75.3	69.6	67.2	65.9	63.5	58.1
73.1	66.4	64.7	67.0	63.2	56.9
62.2	59.4	59.8	63.7	60.0	52.2
72.0	70.0	65.7	63.9	60.7	53.3
66.5	64.4	60.6	62.3	59.2	51.1
53.0	55.1	56.6	62.8	60.4	50.4
46.3	50.1	49.5	54.7	49.3	37.8
53.1	67.7	68.8	70.5	68.3	60.9
56.1	66.3	67.7	72.1	69.6	60.7
57.3	61.5	65.3	71.3	68.4	58.1
51.8	58.3	65.7	70.8	67.0	57.2
49.1	56.1	62.8	68.7	63.8	54.9
48.4	52.5	57.8	63.9	60.2	49.5
48.0	51.9	57.3	61.5	56.9	46.5
50.9	51.5	55.5	59.7	56.0	45.5
57.6	56.0	58.8	63.4	57.2	48.0
56.8	57.6	59.9	63.7	59.1	51.5
59.7	59.1	59.3	62.1	57.8	51.3
80.0	84.1	80.6	72.7	64.7	58.1
74.2	78.6	76.0	73.4	69.9	63.4
65.6	67.4	66.6	68.4	64.9	56.3
59.6	59.9	60.7	65.3	61.7	52.0
51.3	53.0	56.5	62.7	59.3	47.3
49.0	51.6	58.0	62.9	60.9	50.9
53.3	57.4	60.1	67.0	64.4	53.5
56.0	52.5	55.2	63.7	59.5	46.3
51.8	51.5	55.6	59.4	55.4	46.7
47.2	46.4	49.9	53.5	48.6	39.7

43.9	45.1	47.4	52.2	46.9	35.8
44.6	46.3	50.1	56.6	54.2	42.6
49.6	56.3	63.6	68.9	67.3	58.5
52.2	58.2	65.8	71.0	67.5	58.1
51.4	57.4	65.2	71.8	67.9	57.4
51.0	58.5	66.6	71.4	67.3	57.4
53.2	58.6	64.6	71.4	68.2	57.5
54.3	56.3	61.0	65.6	62.7	53.6
50.2	53.8	56.5	61.2	58.4	48.3
49.9	52.0	55.3	57.3	54.4	47.5
50.7	51.1	53.8	55.0	52.5	44.8
50.5	50.6	54.1	54.4	51.7	44.3
50.2	51.9	55.0	55.2	52.4	45.8
59.0	59.0	56.7	57.7	56.1	49.5
58.6	58.8	60.0	61.5	57.2	50.8
57.0	60.6	61.6	63.4	58.5	51.5
57.9	61.3	62.9	65.6	61.3	55.1
56.9	61.8	62.7	66.5	63.5	56.4
53.9	57.9	62.5	66.4	62.3	53.8
53.2	57.4	62.6	66.7	63.3	55.3
52.6	56.5	60.3	63.2	59.3	52.7
46.7	48.9	50.5	54.7	49.4	39.2
50.5	54.0	60.2	67.1	65.4	54.9
50.2	56.9	66.4	71.2	68.4	57.3
54.1	59.0	65.9	71.7	67.8	57.5
56.8	61.1	65.3	72.2	69.1	59.4
52.0	58.7	64.1	70.6	67.0	56.9
50.3	55.9	62.3	69.0	64.7	54.8
49.4	50.1	54.5	61.0	56.2	46.6
51.3	49.2	53.6	60.1	56.4	46.0
50.4	49.6	54.1	61.8	57.6	47.2
48.2	51.0	53.6	58.0	55.0	48.1
49.5	52.6	53.8	57.2	55.4	50.3
52.1	57.0	56.9	64.7	68.9	65.8
50.1	57.2	57.7	65.5	70.8	67.2
51.4	54.0	57.4	60.1	62.0	54.6
53.8	55.9	59.4	61.7	58.7	51.7
56.9	58.4	59.7	63.9	62.5	56.9
61.8	61.9	63.2	67.0	65.3	60.8
62.1	63.6	62.7	67.2	64.0	57.2
59.9	59.9	61.6	66.5	62.8	54.5
50.7	54.4	58.6	64.8	61.2	51.2
51.4	56.4	62.3	68.9	66.3	55.8
49.8	53.1	58.1	65.2	62.0	51.5
50.3	57.2	63.0	67.9	64.4	53.8
59.8	69.5	73.4	73.5	67.8	59.5
58.2	63.3	67.1	70.3	66.1	56.4
57.8	62.6	66.3	72.4	68.1	57.9

55.6	57.3	61.6	67.8	64.2	53.4
54.9	58.4	64.4	70.7	66.9	56.6
52.4	57.3	62.3	68.3	65.4	54.9
52.9	62.3	66.4	69.1	65.1	56.3
52.5	54.4	57.7	61.5	57.2	48.6
53.6	54.4	53.4	56.7	52.6	45.6
49.9	50.3	51.5	54.2	50.5	43.8
49.5	46.3	50.7	53.5	49.7	42.9
51.0	48.5	52.0	54.5	50.7	44.5
55.0	56.6	59.4	62.7	55.7	48.7
56.3	58.5	59.9	62.8	55.8	49.1
57.4	58.0	58.8	63.5	57.2	49.8
71.1	68.1	66.8	66.6	64.3	59.1
63.9	61.3	64.2	67.1	63.8	58.0
55.1	57.8	61.8	66.6	63.0	55.6
51.8	54.1	55.8	60.9	57.6	49.5
46.8	49.0	50.1	56.8	52.7	41.2
52.0	57.8	52.3	52.5	46.5	37.9
56.7	66.8	60.6	57.0	49.5	42.5
54.6	59.4	56.9	59.2	55.6	44.6
51.7	58.3	64.9	71.1	69.2	59.1
52.9	55.0	61.7	69.4	65.8	54.9
55.8	58.2	63.5	69.2	64.4	55.8
52.3	58.4	64.0	70.2	65.4	55.6
49.0	56.4	65.2	69.8	65.2	55.0
50.2	53.9	63.7	68.3	65.0	55.0

1/1 LASeq 8000	1/1 LASeq 16000	1/1 LASmax 8.0	1/1 LASmax 16.0	1/1 LASmax 31.5
39.6	27.5	6.6	23.9	35.3
29.9	18.7	5.9	18.6	31.4
30.9	21.0	9.7	25.2	32.3
34.4	20.3	6.6	21.2	28.3
44.6	29.4	7.8	26.6	35.4
44.3	29.2	8.2	21.5	35.6
45.1	29.9	8.9	25.0	35.6
44.1	29.4	5.9	22.2	39.8
43.0	28.9	5.9	20.4	42.4
42.1	26.7	7.1	20.6	39.6
35.2	19.8	5.9	16.3	31.4
37.8	27.1	5.9	11.3	36.0
32.9	21.2	5.9	14.0	35.5
32.5	18.2	5.9	14.3	33.2
32.9	18.7	5.9	14.1	31.3
42.1	28.6	5.9	18.6	40.0
40.9	27.4	5.9	11.8	37.8
43.6	31.7	5.9	9.2	40.7
49.6	38.9	5.9	12.7	41.4
48.9	37.4	5.9	15.9	41.9
43.1	32.7	5.9	14.4	36.3
43.6	32.7	5.9	13.5	35.7
40.4	27.9	5.9	17.5	34.1
38.1	25.4	5.9	9.3	32.2
25.0	15.7	5.9	11.0	28.2
51.9	38.9	5.9	12.7	33.8
49.2	35.4	5.9	14.8	40.9
45.9	30.2	5.9	15.2	42.1
45.0	28.8	5.9	14.3	41.5
44.6	27.8	5.9	12.7	40.1
37.5	22.2	5.9	10.9	37.8
35.4	18.7	5.9	11.7	36.4
33.5	17.4	5.9	10.7	39.4
37.8	23.6	5.9	11.6	37.3
40.1	26.0	5.9	19.3	37.8
40.9	27.3	12.0	27.9	41.9
50.4	36.4	5.9	19.6	40.0
53.7	40.1	5.9	22.0	54.4
44.5	30.5	5.9	16.2	52.7
40.8	27.4	5.9	14.5	42.3
32.8	17.6	5.9	12.0	42.3
36.8	21.9	5.9	15.1	31.6
41.2	26.3	5.9	14.7	31.0
32.3	18.0	5.9	12.9	34.7
36.2	19.0	5.9	12.3	34.8
28.7	15.3	5.9	10.0	28.6

23.7	14.9	5.9	12.6	29.8
29.4	15.9	5.9	17.9	29.3
47.6	36.8	5.9	17.1	35.6
47.4	33.5	5.9	17.3	35.0
45.3	30.8	5.9	18.0	39.9
46.0	31.1	6.1	23.8	38.8
45.2	29.5	5.9	21.6	34.0
40.6	24.2	5.9	19.3	31.8
38.0	23.6	5.9	19.5	38.6
40.8	26.9	5.9	18.2	39.5
39.3	25.1	6.1	20.7	40.2
39.5	25.6	5.9	17.8	40.4
40.6	26.7	5.9	20.2	39.1
41.2	26.8	6.1	20.5	37.1
42.1	27.3	6.1	23.2	37.6
43.7	31.0	9.8	24.2	42.1
46.6	35.2	5.9	22.6	38.4
48.2	34.9	7.5	21.5	37.4
44.5	30.6	6.9	23.5	37.8
46.8	34.6	5.9	20.6	36.4
45.3	33.7	5.9	20.2	33.9
29.5	18.2	6.2	23.7	34.6
42.2	27.5	6.5	25.4	35.5
45.5	32.0	8.1	24.3	34.8
46.2	31.9	9.6	26.1	42.1
48.2	33.0	9.6	24.9	41.3
44.9	30.1	5.9	20.4	33.8
41.9	27.1	5.9	18.7	38.4
35.0	19.0	5.9	20.1	33.2
33.5	17.6	5.9	22.9	32.0
34.0	18.1	5.9	15.0	31.2
40.4	25.6	5.9	13.8	31.9
41.1	28.5	5.9	11.2	30.0
60.0	49.0	5.9	14.3	33.1
61.2	48.9	5.9	16.6	34.6
46.3	31.5	5.9	19.0	33.0
41.2	25.7	11.3	28.8	40.3
48.7	35.5	12.6	28.6	39.3
52.8	38.9	5.9	17.2	35.3
47.3	34.0	5.9	21.8	40.9
43.3	31.2	5.9	13.3	39.3
39.0	24.7	5.9	12.6	38.0
44.3	29.2	5.9	12.9	34.7
39.6	23.4	5.9	14.3	32.3
41.1	26.3	5.9	13.8	29.7
48.2	33.6	5.9	15.0	34.4
44.0	29.3	5.9	16.6	34.1
46.4	31.5	5.9	17.6	36.5

41.3	23.4	5.9	13.6	31.1
45.2	28.9	5.9	18.7	38.5
42.4	27.7	5.9	15.1	35.0
45.4	32.1	5.9	27.4	36.6
36.4	21.9	7.8	19.8	33.7
35.1	21.5	5.9	13.7	34.5
34.4	21.2	5.9	15.0	31.6
33.3	21.0	5.9	21.6	35.7
34.6	21.3	6.1	23.5	36.2
39.0	24.8	5.9	19.5	37.1
38.9	33.5	5.9	17.4	37.0
41.3	40.8	5.9	22.4	38.2
51.2	40.9	5.9	23.0	39.0
50.1	37.8	5.9	20.3	34.2
47.3	33.9	5.9	14.7	31.7
41.6	27.6	5.9	15.2	31.6
30.2	17.2	5.9	18.3	31.4
28.5	21.2	5.9	12.3	31.1
33.3	18.7	5.9	11.3	30.9
33.8	21.9	5.9	12.8	27.1
46.4	30.9	5.9	9.9	29.2
43.2	27.1	5.9	10.1	29.5
46.7	31.9	5.9	13.7	31.6
44.1	27.8	5.9	15.0	31.7
43.9	28.2	5.9	15.1	31.0
44.1	30.0	5.9	14.4	29.1

1/1 LASmax 63.0	1/1 LASmax 125	1/1 LASmax 250	1/1 LASmax 500	1/1 LASmax 1000
46.5	53.5	58.7	60.7	65.6
43.4	50.5	54.9	58.7	61.1
39.3	46.9	45.6	48.9	52.7
39.1	51.0	56.4	62.1	68.1
44.6	55.6	58.2	63.5	70.4
42.9	59.5	58.3	63.8	71.0
45.2	64.3	63.1	65.1	71.6
45.4	62.8	60.8	64.7	70.5
46.4	53.6	58.1	64.3	70.0
46.3	53.2	58.1	64.3	69.2
43.5	50.4	55.1	59.1	64.0
41.7	50.4	51.9	55.1	59.0
41.8	51.2	51.0	53.6	56.9
42.1	49.5	47.9	48.8	51.6
41.9	54.0	52.5	55.2	57.9
49.1	68.8	64.4	59.1	63.3
49.7	73.5	68.1	62.9	65.2
52.0	66.2	62.4	65.1	64.6
52.9	78.7	73.1	68.7	67.4
50.9	77.5	71.0	66.9	67.8
45.2	65.5	61.0	61.9	65.0
50.9	76.1	74.2	69.6	65.2
48.9	72.7	70.0	65.3	63.7
41.8	58.8	57.4	59.7	65.9
43.1	47.2	51.5	50.4	56.9
55.8	59.1	73.2	74.1	75.3
54.6	58.7	70.6	71.0	73.8
48.9	59.6	65.5	67.2	72.2
45.9	53.0	60.2	67.2	71.7
45.4	51.9	59.7	66.4	71.6
45.3	49.8	53.3	59.1	65.3
44.8	49.3	52.8	58.7	63.1
43.8	54.1	52.2	56.1	60.4
47.2	59.6	59.6	62.1	66.9
53.8	58.3	59.3	61.5	65.8
58.2	67.9	64.7	63.6	64.0
76.2	83.4	88.5	84.2	75.8
67.8	78.9	83.7	80.5	75.8
56.3	67.0	70.3	68.4	69.6
53.6	63.4	64.6	64.8	67.0
51.9	53.2	54.4	58.2	63.6
43.6	52.0	53.6	59.9	65.5
41.9	57.2	60.8	62.8	69.3
40.9	58.4	55.9	58.4	66.5
40.2	53.7	53.3	57.7	60.6
39.2	51.4	50.3	53.9	56.2

38.7	44.4	46.5	48.3	54.0
38.1	46.9	48.6	54.4	61.6
43.5	51.6	58.9	67.1	71.3
45.6	54.0	59.6	67.0	72.6
49.6	53.0	58.3	66.4	72.8
46.9	53.4	60.7	69.4	73.1
46.2	55.3	60.9	67.4	73.9
49.0	56.0	57.9	62.3	68.6
49.8	52.3	54.6	57.9	62.1
48.5	51.3	52.9	56.5	58.8
46.7	52.1	52.2	54.9	56.1
50.0	52.4	51.2	55.1	54.8
48.9	53.0	54.4	56.4	56.3
48.0	61.0	62.0	58.0	59.1
48.8	60.3	61.9	62.0	63.6
56.5	58.4	64.0	64.0	66.0
52.6	59.1	62.6	63.7	66.9
49.3	58.0	63.4	63.3	67.1
48.7	55.6	58.9	64.3	67.7
47.5	57.4	61.5	65.5	68.0
48.0	57.2	61.1	65.4	67.7
39.8	49.0	51.5	52.8	56.7
44.1	53.6	58.3	64.3	71.6
44.7	52.0	58.6	69.6	73.0
46.7	56.6	60.8	68.2	72.8
47.9	58.8	63.6	67.0	73.0
47.8	55.1	59.9	65.9	72.2
46.5	51.3	57.3	63.7	70.3
39.7	51.6	52.4	58.0	64.9
40.4	54.9	50.2	55.4	64.0
44.1	53.0	50.9	55.6	64.2
43.5	49.3	53.0	54.7	58.4
42.6	51.0	53.2	55.3	58.6
49.5	54.2	62.0	61.9	72.0
50.0	53.7	61.4	61.3	71.2
45.5	52.7	55.2	59.4	61.6
49.3	56.1	57.5	61.1	62.8
51.0	58.4	60.1	61.7	65.6
53.5	65.1	64.0	64.1	68.0
55.2	65.2	65.2	63.2	67.5
53.8	63.1	61.7	62.4	67.6
46.5	53.8	56.2	60.5	67.6
44.9	52.6	58.3	64.3	70.3
46.9	50.8	55.9	61.5	68.6
43.5	52.0	59.7	66.1	70.1
50.5	63.8	73.4	77.1	76.2
49.4	59.8	66.9	71.3	73.5
56.7	61.2	65.9	69.4	75.2

49.7	57.8	60.9	66.4	72.0
48.6	58.0	61.1	66.5	72.6
47.5	53.2	62.6	67.9	70.8
46.2	54.3	65.8	69.7	72.2
47.3	54.5	57.3	61.3	64.1
49.7	56.5	58.3	54.7	58.1
43.2	53.2	54.7	53.0	55.6
43.8	51.8	47.0	51.4	54.1
44.4	51.9	50.1	54.0	56.5
45.5	58.6	60.0	62.2	65.8
49.5	58.2	60.3	61.1	63.7
54.7	63.2	62.3	61.0	65.7
56.7	73.8	70.5	69.2	68.0
53.4	67.3	64.8	64.8	67.5
50.3	57.3	59.2	63.4	67.6
47.1	54.2	56.0	59.9	64.6
42.9	47.4	51.1	52.2	59.7
42.1	58.4	66.9	59.5	55.8
43.3	59.7	68.3	62.3	57.6
40.1	56.5	62.5	59.1	63.5
43.7	54.0	60.8	66.9	72.5
45.4	57.5	58.5	64.7	71.5
49.2	57.4	62.2	66.8	72.2
50.0	56.2	61.9	66.6	72.1
45.4	50.2	59.2	66.5	71.6
41.3	51.2	56.4	65.5	70.0

1/1 LASmax 2000	1/1 LASmax 4000	1/1 LASmax 8000	1/1 LASmax 16000	1/1 LASmin 8.0
61.4	52.8	43.0	29.5	5.9
53.3	45.1	34.6	22.3	5.9
47.0	41.5	35.1	24.6	5.9
65.2	54.5	41.7	25.9	5.9
66.8	58.1	47.0	31.3	5.9
68.7	58.4	46.5	32.3	5.9
69.0	58.7	47.2	32.6	5.9
67.0	56.0	45.7	30.6	5.9
66.0	55.8	45.0	31.1	5.9
65.2	55.8	45.0	31.1	5.9
59.5	49.4	37.1	21.6	5.9
54.7	48.9	39.0	28.8	5.9
53.8	46.3	36.5	25.2	5.9
54.7	50.5	36.8	19.9	5.9
55.7	48.6	37.4	21.3	5.9
58.9	53.4	43.4	30.1	5.9
58.7	51.5	41.7	27.9	5.9
61.4	55.4	48.8	36.6	5.9
64.8	60.0	51.5	41.7	5.9
64.6	59.8	51.4	40.5	5.9
61.3	54.5	46.5	35.6	5.9
62.9	55.5	45.9	34.9	5.9
62.7	53.3	42.8	31.2	5.9
63.7	53.7	41.4	29.3	5.9
51.7	41.1	28.4	17.3	5.9
72.9	66.3	57.4	44.7	5.9
71.6	64.0	53.9	41.0	5.9
69.5	59.5	48.2	33.5	5.9
68.5	58.1	47.5	30.7	5.9
66.3	58.0	47.9	31.4	5.9
61.8	50.7	38.5	25.6	5.9
58.6	48.3	37.9	20.4	5.9
56.4	46.2	35.1	19.6	5.9
58.2	49.0	39.0	25.4	5.9
60.0	53.9	42.3	27.6	5.9
59.3	53.6	44.3	31.1	5.9
66.8	60.7	53.9	39.3	5.9
73.0	66.9	57.3	44.2	5.9
66.2	58.1	47.3	32.5	5.9
63.4	54.4	43.5	31.3	5.9
60.6	48.8	35.2	20.9	5.9
63.7	54.3	40.2	25.6	5.9
66.6	56.0	44.5	30.1	5.9
62.8	50.9	37.6	22.0	5.9
57.4	48.7	40.0	22.6	5.9
51.2	44.1	33.8	17.1	5.9

49.3	39.2	26.6	15.4	5.9
60.1	48.5	33.7	17.6	5.9
69.4	61.0	51.5	42.2	5.9
68.1	58.7	48.6	36.8	5.9
69.2	58.4	46.8	32.8	5.9
69.9	58.9	48.7	34.4	5.9
70.6	60.0	48.5	33.1	5.9
65.9	55.9	42.7	26.5	5.9
60.4	50.4	40.7	26.8	5.9
55.6	48.2	41.8	27.8	5.9
53.6	46.6	41.2	26.3	5.9
52.5	45.9	40.3	26.4	5.9
54.3	47.6	41.5	27.7	5.9
57.1	50.9	42.3	27.9	5.9
58.3	51.4	42.8	28.2	5.9
60.7	54.7	46.6	36.0	5.9
62.7	56.1	47.4	36.0	5.9
64.2	57.1	49.5	36.5	5.9
63.4	55.0	46.2	32.6	5.9
64.6	58.8	52.2	40.9	5.9
64.1	58.4	51.5	40.2	5.9
51.2	42.2	33.2	21.4	5.9
69.2	58.9	46.5	31.9	5.9
70.3	59.1	47.4	34.8	5.9
68.9	58.8	47.5	33.9	5.9
69.7	60.7	50.5	35.4	5.9
69.1	59.3	47.6	33.6	5.9
66.4	56.2	44.0	29.7	5.9
60.1	51.0	36.9	21.3	5.9
58.9	49.8	36.6	20.2	5.9
59.7	50.2	37.0	20.3	5.9
56.6	51.8	44.4	29.6	5.9
58.1	57.0	44.2	31.2	5.9
76.8	72.4	66.8	55.5	5.9
76.6	72.0	66.3	55.0	5.9
64.4	57.6	50.9	36.9	5.9
60.1	53.3	43.2	27.0	5.9
65.3	59.6	51.3	38.9	5.9
66.2	62.3	54.7	40.6	5.9
64.6	59.4	49.9	36.0	5.9
63.9	56.4	45.8	33.3	5.9
64.4	54.4	41.9	28.2	5.9
68.3	58.0	46.5	32.5	5.9
64.6	54.3	43.9	27.6	5.9
65.5	55.5	43.1	29.3	5.9
70.2	62.9	51.8	38.0	5.9
70.1	60.5	48.2	34.1	5.9
70.3	60.6	49.8	35.7	5.9

68.1	58.1	47.8	31.1	5.9
68.8	58.6	48.5	32.2	5.9
68.8	58.1	45.6	31.7	5.9
68.2	59.7	49.2	36.5	5.9
60.3	51.3	39.5	24.1	5.9
53.8	47.4	36.6	22.6	5.9
51.4	44.8	35.3	21.9	5.9
50.1	43.1	33.5	21.2	5.9
53.2	47.0	36.7	22.5	5.9
56.9	49.6	40.1	25.9	5.9
56.6	49.8	39.5	40.0	5.9
60.2	54.8	47.6	45.8	5.9
65.1	60.2	52.7	42.1	5.9
64.6	59.8	52.2	41.2	5.9
63.6	56.1	48.8	35.9	5.9
61.7	54.8	46.9	33.1	5.9
56.5	44.9	34.8	20.5	5.9
47.8	41.9	33.3	25.7	5.9
50.3	43.1	34.7	19.9	5.9
62.3	51.4	39.6	24.4	5.9
70.6	61.2	48.1	32.8	5.9
68.3	57.6	46.2	30.8	5.9
66.7	58.4	48.4	33.8	5.9
66.8	58.2	47.6	32.0	5.9
67.2	56.9	46.9	31.5	5.9
66.9	57.6	47.4	34.1	5.9

1/1 LASmin 16.0	1/1 LASmin 31.5	1/1 LASmin 63.0	1/1 LASmin 125	1/1 LASmin 250
16.8	29.5	41.0	48.7	52.1
12.9	25.5	37.1	45.5	45.1
17.3	26.2	36.9	44.7	44.1
14.5	25.4	36.2	45.7	44.6
15.9	25.4	38.8	49.8	56.3
19.1	31.3	40.9	47.9	56.2
19.8	32.1	42.6	59.5	57.8
16.1	31.7	42.2	52.7	56.4
16.7	33.6	43.0	50.8	55.5
15.5	31.5	43.4	49.8	54.9
10.0	27.2	41.1	47.3	51.5
8.1	30.8	39.8	47.4	50.5
9.1	30.5	40.0	48.9	46.3
8.9	29.8	39.4	48.1	46.1
8.6	28.8	38.5	48.0	46.1
8.6	29.6	40.9	53.4	52.6
8.4	33.8	46.3	66.2	61.2
6.3	36.8	45.1	60.0	56.9
7.3	36.8	49.1	65.0	62.3
10.6	36.3	44.2	65.4	61.0
8.1	31.1	41.8	57.0	58.1
9.4	29.1	42.0	56.4	57.9
8.6	30.5	41.5	58.8	56.8
6.4	26.3	38.8	46.4	49.8
7.0	25.2	39.0	45.3	49.3
8.5	27.6	43.1	44.3	50.0
9.3	31.6	46.7	53.8	64.1
9.3	34.2	45.1	52.5	57.1
11.2	34.5	44.0	49.8	56.4
8.0	31.7	41.5	47.0	52.3
8.4	31.2	41.5	47.0	51.9
8.7	30.3	41.6	46.9	51.2
8.7	36.1	40.6	48.5	50.7
8.3	32.6	42.7	51.6	52.0
9.0	34.4	46.1	55.8	56.7
18.2	36.8	47.3	56.2	57.0
12.1	34.9	55.4	68.0	64.6
16.2	36.8	56.3	65.5	70.3
11.4	39.7	52.7	63.1	64.6
10.2	34.6	43.6	53.1	53.6
7.8	31.2	43.3	49.4	51.7
10.4	27.2	37.2	46.5	50.4
8.2	24.9	39.3	47.9	50.7
9.3	27.3	35.9	49.4	48.8
9.5	25.6	35.8	48.6	48.7
7.6	23.6	34.6	43.4	43.1

7.2	25.9	35.1	43.2	43.7
10.2	26.3	36.3	43.4	45.4
12.7	27.3	37.1	46.7	48.7
13.8	32.0	40.1	49.0	56.4
12.8	31.8	45.1	48.7	55.6
15.9	34.0	42.4	48.6	55.5
16.0	29.4	41.1	51.2	56.2
13.7	27.1	42.1	52.1	54.5
14.8	30.9	43.7	48.8	52.6
14.6	36.0	44.1	48.7	51.2
16.0	37.8	43.9	48.7	50.1
13.6	37.2	43.7	48.1	49.9
16.0	36.5	42.8	47.5	50.4
16.2	35.2	44.0	52.9	54.3
18.4	35.4	46.0	57.6	57.3
18.3	36.7	47.1	55.6	55.8
16.7	35.1	49.3	56.3	60.4
15.7	33.4	43.6	55.4	58.9
18.3	32.3	43.2	51.8	56.5
15.3	31.7	41.5	50.9	55.2
16.5	30.5	38.6	48.2	51.4
16.2	29.8	35.8	43.9	46.7
13.3	28.9	35.4	47.6	46.4
18.0	31.4	41.2	48.8	55.1
18.0	32.0	42.8	48.9	56.4
18.3	33.8	42.0	55.1	58.7
13.2	31.5	43.3	50.5	57.2
14.2	31.3	38.5	49.0	52.4
13.7	27.1	38.2	48.1	49.0
13.8	27.7	37.8	48.7	48.2
10.6	29.1	38.8	49.0	47.8
6.6	28.8	40.1	47.2	48.1
8.4	27.5	40.2	48.2	51.8
9.4	28.7	41.9	49.2	51.7
11.4	29.8	42.2	47.1	52.9
14.9	29.9	41.1	48.0	52.7
18.6	32.2	44.7	51.5	54.0
15.2	33.0	47.9	54.2	57.2
11.0	31.8	46.9	57.4	59.6
12.3	34.2	53.2	59.2	61.4
7.8	34.6	46.4	53.8	56.3
8.5	33.7	40.7	48.2	53.1
6.8	30.7	41.4	49.4	55.0
10.1	28.0	41.1	48.5	50.6
9.3	27.4	41.7	49.3	54.9
11.4	29.0	42.0	52.1	59.6
11.3	28.4	45.0	54.5	58.6
10.9	28.5	44.6	53.4	56.8

9.3	26.7	45.2	52.1	55.3
13.2	31.3	44.9	51.9	55.5
11.7	31.0	42.0	51.8	54.9
13.1	31.5	41.7	51.5	57.3
10.7	29.6	42.8	50.8	51.3
10.1	30.5	42.2	49.7	50.6
11.5	30.0	40.5	48.0	46.6
13.7	30.5	41.8	48.0	45.8
18.5	32.6	42.5	50.0	46.2
13.1	34.2	42.7	49.3	50.0
12.5	34.0	43.8	53.3	56.6
15.5	34.3	44.7	53.4	55.2
16.4	33.3	53.2	63.2	62.3
11.6	30.4	49.3	57.4	58.5
10.1	29.0	44.4	53.7	56.0
12.8	29.5	41.7	47.0	51.1
11.7	29.2	39.4	46.3	48.0
9.6	28.4	37.2	47.0	47.6
8.3	26.4	40.1	52.7	62.5
7.3	24.5	37.0	49.9	52.9
6.2	24.8	37.9	48.8	52.7
6.4	25.2	38.6	49.7	52.3
9.2	27.2	38.8	54.6	54.1
10.4	29.4	45.4	48.8	55.3
10.4	27.9	40.9	47.8	53.0
10.1	26.5	39.2	48.9	52.1

1/1 LASmin 500	1/1 LASmin 1000	1/1 LASmin 2000	1/1 LASmin 4000	1/1 LASmin 8000
55.3	59.4	53.3	45.2	34.6
48.7	52.7	46.8	36.2	26.2
46.4	50.6	45.6	36.2	26.4
47.1	51.4	46.9	36.2	25.3
61.9	68.1	65.2	54.6	41.7
60.4	68.3	65.6	55.1	41.8
62.3	68.0	65.1	54.9	42.7
62.3	67.6	64.6	54.1	41.7
60.7	67.0	62.3	53.4	42.0
58.8	63.6	59.4	49.5	37.1
55.0	59.0	53.8	46.2	34.3
53.5	56.8	52.9	46.0	34.8
48.9	51.2	47.6	39.9	29.6
47.1	50.3	47.4	39.9	29.3
47.4	51.2	47.8	40.3	29.3
55.3	57.9	55.7	48.7	37.5
58.9	63.0	57.9	50.5	40.1
57.4	60.8	57.1	49.1	38.8
65.2	63.5	61.4	55.4	48.0
61.9	65.0	61.3	54.4	46.5
57.5	62.7	58.7	50.3	39.8
57.8	62.7	59.1	51.0	41.2
56.2	61.5	57.5	49.9	39.1
50.3	56.7	51.7	41.1	28.5
48.7	53.0	48.3	36.2	23.1
50.4	53.3	50.6	38.8	25.5
65.9	70.8	68.5	58.3	45.5
63.6	70.4	67.3	56.5	43.7
64.0	70.0	65.5	56.3	43.2
59.1	65.3	61.8	50.8	37.1
56.8	63.0	58.6	48.3	36.8
54.9	59.4	54.9	44.4	32.2
54.9	59.2	55.0	44.4	32.3
55.8	60.3	56.2	46.1	35.1
57.8	62.3	57.9	47.8	36.9
56.2	60.1	56.0	48.8	37.6
63.6	63.4	59.3	53.6	44.3
68.4	69.6	66.0	58.2	47.3
64.8	66.8	63.3	54.4	42.6
56.1	62.5	59.1	47.5	35.2
54.8	61.9	58.4	45.9	30.8
56.4	60.4	56.8	44.4	30.5
56.1	61.7	60.2	49.4	35.4
51.8	59.1	55.0	41.2	26.7
51.9	56.2	51.2	41.3	27.2
46.0	51.3	46.2	35.6	23.7

46.4	51.0	46.1	34.8	23.0
47.9	54.0	49.3	39.2	26.6
54.4	61.6	60.1	48.6	33.7
63.6	69.1	66.5	57.4	45.8
62.8	69.7	66.1	55.4	42.8
62.6	69.6	66.2	55.4	42.3
61.8	68.7	65.9	55.1	41.7
57.9	62.1	60.4	50.4	38.0
55.4	58.8	55.7	47.1	36.2
54.2	55.9	53.4	46.6	39.6
53.0	54.2	51.6	43.9	38.4
53.1	53.8	50.7	43.5	38.4
53.2	54.0	50.8	44.7	39.4
55.9	56.3	54.2	47.6	40.6
57.7	59.0	56.2	50.0	41.2
58.9	61.6	56.7	48.7	41.2
61.8	64.0	60.1	54.2	45.7
61.5	65.9	62.7	55.0	46.2
60.8	65.2	61.5	52.8	43.0
60.6	66.1	61.7	53.2	42.4
52.7	56.8	51.3	42.3	33.2
48.6	53.6	48.7	37.7	27.7
48.3	54.4	49.6	37.5	28.0
63.0	69.9	66.6	55.7	43.6
63.0	69.9	67.4	56.5	44.2
63.8	71.5	68.0	57.8	45.7
61.7	68.7	65.0	54.7	41.8
58.0	64.9	60.1	51.0	36.9
52.6	58.6	53.2	43.3	32.5
52.4	57.3	53.6	43.0	30.5
52.5	57.8	54.7	43.3	30.5
52.4	57.5	54.1	43.9	32.6
52.2	56.0	53.7	47.4	38.1
52.3	56.0	55.5	53.4	40.6
54.4	59.1	63.1	57.6	50.9
55.8	59.0	59.5	52.3	42.8
57.4	60.6	58.0	51.0	40.2
58.1	61.8	57.8	51.2	40.3
61.3	65.5	64.6	59.2	49.9
62.2	66.5	63.7	56.1	45.7
59.8	65.0	60.7	51.6	40.6
57.5	63.3	59.2	48.8	36.8
60.4	67.6	64.5	54.3	41.8
55.0	61.9	57.3	46.9	35.0
58.7	65.3	62.7	52.0	38.1
65.9	70.1	64.4	55.0	42.4
62.6	66.6	61.9	51.8	38.8
60.8	67.8	63.8	53.0	40.2

59.2	66.1	62.5	50.7	36.3
62.1	68.9	64.3	53.8	41.9
59.8	65.6	62.1	51.4	37.9
61.3	64.1	60.3	51.1	39.3
54.2	58.1	53.7	46.1	34.7
52.4	55.6	51.5	44.8	34.6
50.3	53.4	50.0	42.9	33.3
50.1	53.2	49.1	42.5	33.0
50.6	53.2	49.2	42.7	33.1
54.0	56.5	53.2	47.0	36.7
58.8	61.6	55.3	48.4	37.9
56.6	60.6	56.3	46.8	36.4
61.0	62.2	60.3	54.9	47.6
63.3	66.6	63.3	56.1	47.2
60.0	64.6	61.8	54.8	45.8
52.2	59.1	55.0	44.9	34.9
47.8	52.5	47.6	37.0	26.3
47.2	51.0	45.5	35.8	26.1
59.1	55.8	47.8	41.9	31.1
54.7	56.8	49.9	40.5	29.2
56.6	63.5	62.4	51.5	39.6
60.2	67.8	63.6	53.2	40.6
60.4	67.6	63.3	53.3	42.3
61.8	68.9	64.2	53.7	41.5
63.1	67.9	62.9	53.1	41.4
62.1	65.9	62.4	51.8	39.3

1/1 LASmin 16000	1/3 LASeq 6.3	1/3 LASeq 8.0	1/3 LASeq 10.0	1/3 LASeq 12.5
22.4	1.9	0.9	3.9	9.9
16.3	1.9	0.9	1.5	7.6
16.6	1.9	0.9	4.8	7.8
16.4	1.9	1.4	2.0	8.2
25.9	1.9	0.9	3.4	10.9
25.6	1.9	0.9	5.1	9.5
27.1	1.9	0.9	4.9	10.3
27.3	1.9	0.9	3.0	9.3
26.4	1.9	0.9	1.4	6.7
20.9	1.9	0.9	1.8	6.3
18.7	1.9	0.9	0.7	3.6
21.7	1.9	0.9	0.3	-0.8
17.9	1.9	0.9	0.3	-0.8
17.3	1.9	0.9	0.3	1.8
17.3	1.9	0.9	0.3	-0.8
21.3	1.9	0.9	0.3	1.6
26.8	1.9	0.9	0.3	-0.3
26.3	1.9	0.9	0.3	-0.8
35.7	1.9	0.9	0.3	-0.8
34.3	1.9	0.9	0.3	3.2
29.5	1.9	0.9	0.3	-0.6
30.2	1.9	0.9	0.3	-0.6
25.7	1.9	0.9	0.3	3.7
17.4	1.9	0.9	0.3	-0.5
15.0	1.9	0.9	0.3	-0.8
15.0	1.9	0.9	0.3	-0.8
29.3	1.9	0.9	0.3	-0.8
26.5	1.9	0.9	0.3	-0.8
27.0	1.9	0.9	0.3	0.3
20.4	1.9	0.9	0.3	-0.8
20.0	1.9	0.9	0.3	-0.8
16.8	1.9	0.9	0.3	-0.8
16.7	1.9	0.9	0.3	-0.8
19.6	1.9	0.9	0.3	-0.8
23.6	1.9	0.9	0.3	0.4
22.9	1.9	1.1	6.0	11.9
31.0	1.9	1.0	1.7	6.5
32.5	1.9	0.9	0.3	0.1
28.2	1.9	0.9	0.3	2.2
20.9	1.9	0.9	0.3	-0.8
16.2	1.9	0.9	0.3	-0.3
16.0	1.9	0.9	0.3	0.1
20.4	1.9	0.9	0.3	-0.8
15.3	1.9	0.9	0.3	-0.8
15.3	1.9	0.9	0.3	-0.8
14.8	1.9	0.9	0.3	-0.8

14.7	1.9	0.9	0.3	-0.8
15.4	1.9	0.9	0.3	1.1
17.6	1.9	0.9	0.8	5.5
30.3	1.9	0.9	0.3	3.1
27.5	1.9	0.9	0.7	5.1
26.7	1.9	0.9	1.7	9.2
25.2	1.9	0.9	1.5	7.9
21.8	1.9	0.9	0.3	4.3
20.9	1.9	0.9	0.3	5.0
26.3	1.9	0.9	0.3	4.0
24.2	1.9	0.9	2.8	5.6
24.7	1.9	0.9	1.7	5.9
26.0	1.9	0.9	0.3	8.9
26.0	1.9	0.9	2.6	6.3
26.2	1.9	0.9	1.0	5.3
25.7	1.9	0.9	5.4	11.2
33.7	1.9	0.9	1.6	8.4
31.6	1.9	0.9	3.6	10.2
28.1	1.9	0.9	2.7	10.9
28.0	1.9	0.9	3.1	10.2
21.4	1.9	0.9	0.3	7.6
17.1	1.9	0.9	2.6	9.5
16.6	1.9	0.9	1.8	7.3
29.8	1.9	0.9	4.9	11.1
29.7	1.9	0.9	4.3	10.5
31.1	1.9	2.8	4.4	9.0
25.7	1.9	0.9	3.0	6.3
21.3	1.9	0.9	0.3	4.2
17.4	1.9	0.9	1.0	6.8
15.9	1.9	0.9	1.1	5.8
16.3	1.9	1.0	0.5	1.4
19.0	1.9	0.9	0.3	-0.8
26.6	1.9	0.9	0.3	-0.8
27.7	1.9	0.9	0.3	-0.7
36.9	1.9	0.9	0.3	-0.4
27.0	1.9	0.9	0.3	4.6
25.0	1.9	1.1	4.7	9.3
25.2	1.9	2.2	8.8	12.7
36.0	1.9	0.9	0.3	1.7
32.6	1.9	0.9	0.4	5.5
28.2	1.9	0.9	0.3	-0.5
21.6	1.9	0.9	0.3	-0.6
26.2	1.9	0.9	0.3	-0.8
18.8	1.9	0.9	0.3	-0.8
22.4	1.9	0.9	0.3	-0.7
26.1	1.9	0.9	0.3	0.5
23.1	1.9	0.9	0.3	1.0
24.1	1.9	0.9	0.3	1.5

18.9	1.9	0.9	0.3	-0.6
25.3	1.9	0.9	0.3	1.3
21.6	1.9	0.9	0.3	2.0
24.0	1.9	0.9	0.3	7.2
20.5	1.9	0.9	2.5	4.7
21.0	1.9	0.9	0.3	-0.7
20.8	1.9	0.9	0.3	-0.8
20.8	1.9	0.9	0.3	2.5
20.8	1.9	0.9	1.8	8.5
22.5	1.9	0.9	0.3	5.6
23.4	1.9	0.9	0.3	-0.7
34.7	1.9	0.9	0.3	3.6
40.0	1.9	0.9	0.6	3.7
33.7	1.9	0.9	0.9	5.9
32.0	1.9	0.9	0.3	0.2
20.5	1.9	0.9	0.3	1.5
15.8	1.9	0.9	0.8	2.7
15.5	1.9	0.9	0.3	-0.5
17.9	1.9	0.9	0.3	-0.7
19.6	1.9	0.9	0.3	-0.1
23.5	1.9	0.9	0.3	0.3
23.9	1.9	0.9	0.3	-0.8
27.9	1.9	0.9	0.3	-0.7
24.0	1.9	0.9	0.3	1.3
24.5	1.9	0.9	0.3	-0.7
23.3	1.9	0.9	0.3	-0.7

1/3 LASeq 16.0	1/3 LASeq 20.0	1/3 LASeq 25.0	1/3 LASeq 31.5	1/3 LASeq 40.0	1/3 LASeq 50.0
16.2	18.7	23.7	27.7	30.4	34.1
12.1	13.5	21.3	22.3	26.4	30.2
15.5	20.1	24.3	26.0	27.3	30.1
14.8	15.7	19.5	22.3	22.9	28.9
16.9	19.7	24.8	27.1	31.5	36.2
15.0	19.2	23.2	28.4	30.7	34.4
15.8	21.0	24.9	27.6	31.9	35.5
14.9	17.6	22.1	24.2	36.2	36.2
9.8	17.1	23.7	32.3	36.4	36.6
12.4	17.2	22.4	28.7	34.9	37.7
7.1	12.4	20.8	23.4	27.8	35.4
1.4	9.1	18.1	24.1	34.3	34.1
3.3	10.4	19.5	26.9	31.8	33.3
5.9	10.2	18.7	27.9	28.7	31.7
3.3	11.3	19.8	25.8	26.6	32.5
9.6	13.3	19.8	34.3	32.3	36.6
4.2	9.3	18.9	28.7	35.1	42.8
2.2	6.9	18.8	31.5	37.2	38.8
3.0	9.3	22.8	28.9	37.5	39.9
7.2	11.7	19.5	25.8	39.2	39.5
2.8	9.7	16.0	23.6	33.3	34.6
6.3	9.8	14.9	23.7	31.9	37.5
7.2	12.5	17.8	24.3	30.9	35.5
1.9	6.6	15.0	21.2	29.2	33.9
-1.0	8.9	12.6	19.7	25.6	33.6
0.5	9.8	15.1	21.3	30.1	36.6
3.0	11.5	18.7	26.2	37.0	44.6
0.8	12.1	18.3	25.3	38.9	40.0
4.0	12.0	19.0	27.0	39.8	37.8
3.2	10.6	16.8	27.3	36.6	38.9
-0.2	9.1	14.1	25.0	36.0	36.8
1.8	9.2	13.7	24.6	32.2	38.8
0.0	9.3	14.5	23.8	38.3	34.7
2.4	9.2	15.0	26.3	34.5	39.7
4.0	12.0	17.7	28.7	35.4	37.7
19.4	21.0	31.1	32.3	36.5	40.4
12.7	14.2	28.0	29.1	37.2	46.7
13.7	17.6	27.1	28.5	49.6	52.9
8.5	12.8	21.3	27.8	49.5	48.2
2.3	12.3	24.4	25.3	39.4	47.2
2.5	8.9	18.1	21.5	39.5	39.7
4.2	10.3	16.2	21.1	29.6	35.6
3.4	11.6	15.4	20.9	27.3	32.1
1.9	10.9	15.8	19.3	31.0	30.2
2.8	10.3	15.1	19.4	31.6	33.3
-1.4	8.6	16.1	18.0	25.3	33.5

-0.4	9.2	17.3	23.7	24.6	30.5
7.4	12.8	19.1	23.0	24.0	30.2
9.3	13.6	23.1	22.6	29.3	34.2
7.9	14.3	22.5	22.8	32.3	33.4
9.1	14.0	21.8	26.2	35.6	34.9
13.3	19.2	25.2	30.2	34.7	35.0
12.9	17.2	21.7	25.6	30.2	34.2
9.7	15.4	23.0	23.3	27.5	32.4
8.5	16.4	24.3	29.6	34.1	39.1
10.3	14.8	28.7	33.6	35.9	40.2
13.6	15.7	29.9	35.5	36.6	40.0
10.8	12.8	29.1	35.3	34.8	39.4
12.4	16.9	30.0	34.9	33.6	38.5
11.7	16.4	29.5	33.6	30.4	38.8
9.4	19.3	29.4	34.0	29.8	40.2
13.8	20.6	29.2	34.1	36.4	46.6
10.3	18.9	24.0	29.4	35.4	41.3
12.0	18.0	22.5	27.8	33.6	37.3
16.0	19.6	24.6	28.6	35.1	39.0
12.8	16.2	21.2	25.3	32.8	34.7
12.8	15.8	22.1	25.7	29.8	33.1
15.2	19.8	24.5	27.5	30.5	31.6
11.9	18.5	23.7	27.8	29.7	34.3
17.2	20.1	24.8	28.1	31.2	37.5
17.2	21.4	29.7	33.3	36.3	38.9
15.6	21.0	26.2	29.7	37.9	35.9
11.0	16.5	24.6	26.8	31.1	34.5
8.1	15.9	24.0	26.9	34.6	34.0
12.8	16.1	23.7	25.7	27.8	33.8
11.4	18.0	25.1	22.9	27.6	31.7
5.6	12.4	22.3	23.4	28.2	31.7
-1.3	10.4	19.5	22.6	28.8	30.7
-1.4	9.6	19.3	22.7	26.6	31.4
-0.6	10.9	19.6	23.0	28.9	33.9
4.8	11.9	20.5	24.6	31.7	33.6
10.0	15.5	23.3	25.4	29.1	34.8
15.2	22.2	28.3	31.8	35.5	39.6
18.7	23.5	28.4	29.7	34.8	39.9
6.6	13.5	21.4	26.3	32.7	39.6
10.6	16.7	20.7	34.8	34.7	49.3
5.0	9.9	18.1	27.1	37.0	46.2
5.7	8.6	17.7	26.4	35.1	37.7
2.7	9.4	18.6	26.9	31.1	37.3
5.2	11.2	17.9	23.7	28.2	39.9
2.2	10.2	18.5	23.5	27.0	34.7
5.1	12.8	19.4	24.2	30.4	34.7
6.3	13.6	19.7	25.0	30.0	35.7
8.1	13.4	19.3	28.4	30.6	41.4

5.2	9.3	18.3	22.4	27.2	36.0
7.9	14.9	20.0	28.0	35.8	37.3
7.5	12.0	19.3	25.9	31.6	33.7
15.9	21.5	24.1	28.4	32.7	34.1
8.3	14.9	21.0	25.3	29.8	32.2
2.7	10.3	19.0	28.0	30.1	31.9
4.8	13.0	22.1	28.2	25.6	30.3
8.7	18.4	24.3	28.8	28.8	32.2
12.8	19.8	25.2	27.8	33.5	33.4
9.1	15.8	24.9	27.9	34.8	34.3
3.5	14.2	24.4	28.2	34.3	35.0
9.4	18.8	24.8	29.6	34.2	41.3
11.4	18.6	23.6	30.2	35.1	45.7
10.8	15.0	20.8	25.8	31.9	37.6
4.8	11.3	18.0	23.7	28.5	33.7
7.0	12.8	18.2	25.0	28.4	32.6
9.0	14.2	18.7	25.2	28.3	32.7
4.7	9.8	18.4	23.9	28.5	30.8
4.3	8.7	20.4	21.6	26.9	31.1
3.7	8.2	18.3	19.5	23.2	27.9
3.3	6.1	18.9	21.1	24.9	29.1
-0.4	7.5	19.0	20.2	26.1	31.7
4.6	10.7	20.5	22.9	27.1	37.6
6.4	11.7	20.7	24.1	29.1	35.4
4.4	11.9	20.0	21.7	28.7	33.8
6.0	11.3	18.9	20.4	26.2	32.7

1/3 LASeq 63.0	1/3 LASeq 80.0	1/3 LASeq 100	1/3 LASeq 125	1/3 LASeq 160	1/3 LASeq 200
39.6	40.2	43.2	46.3	47.9	50.0
37.7	36.4	41.6	43.5	44.9	46.8
32.8	35.0	39.5	42.2	42.1	41.2
31.4	34.4	38.8	46.4	42.8	42.8
37.1	39.5	48.2	48.3	48.1	51.6
36.4	39.1	42.7	52.9	47.9	49.9
37.5	43.2	46.1	61.9	50.4	55.7
37.7	42.2	45.6	57.2	49.6	51.5
38.8	43.0	44.7	45.5	50.5	50.8
41.6	41.0	44.9	45.1	49.4	52.9
38.5	38.5	43.1	44.1	44.9	50.1
36.0	37.8	41.5	44.5	44.7	46.6
36.2	37.6	46.4	44.7	43.5	44.4
36.2	38.1	46.3	43.0	40.4	44.7
36.5	36.4	44.5	45.6	44.0	45.1
41.3	43.1	51.5	60.8	61.9	55.0
42.7	46.2	51.6	64.5	70.6	58.4
44.0	44.8	51.0	60.0	58.3	54.0
45.7	49.2	65.3	74.2	64.9	62.0
43.5	46.0	66.2	72.3	59.1	59.0
39.1	40.7	57.1	59.8	54.2	52.9
40.4	45.9	50.6	69.1	68.8	59.6
42.8	41.0	51.7	65.0	62.2	55.2
35.8	37.1	44.5	51.2	48.1	49.7
36.9	37.9	39.6	41.6	43.4	45.1
50.1	38.5	41.9	45.7	51.1	56.5
48.2	43.2	50.8	47.6	53.5	56.5
40.4	45.5	52.3	51.1	54.0	55.4
40.5	41.8	44.2	47.6	49.0	50.6
39.5	39.3	41.2	44.9	45.7	47.7
38.7	40.1	42.0	43.8	45.0	45.9
36.9	39.4	41.1	42.2	44.9	46.3
36.8	39.4	43.3	49.1	43.1	46.4
39.8	41.4	46.5	56.9	45.5	50.0
42.0	49.3	50.7	52.3	52.7	52.6
41.1	47.2	50.7	54.4	56.6	55.8
52.1	70.4	73.3	72.7	77.9	81.1
48.2	64.6	69.5	67.4	71.7	75.2
47.0	51.0	53.2	64.8	56.6	60.3
40.1	43.1	52.1	58.6	48.1	52.1
40.1	45.6	43.9	47.5	47.4	47.5
33.2	37.8	41.6	44.8	45.4	46.4
33.4	39.1	43.5	50.8	48.1	51.8
32.1	37.8	40.1	55.6	45.1	48.2
30.5	35.3	41.7	49.6	46.0	45.7
29.6	32.9	42.0	44.5	40.4	41.0

29.5	34.7	37.2	40.7	38.8	40.4
31.5	34.4	38.9	40.3	40.5	41.4
35.2	37.7	41.1	45.2	46.6	50.5
38.2	40.0	44.2	45.6	50.0	52.9
45.5	44.1	42.8	47.4	48.3	50.5
40.3	41.9	42.8	45.8	48.6	51.6
39.2	40.5	44.1	49.0	49.9	51.4
37.2	42.5	49.1	51.5	46.8	49.2
41.2	44.9	44.8	45.8	45.9	47.5
43.7	40.4	43.0	46.7	44.9	45.7
41.8	40.7	43.4	47.8	44.7	44.0
45.4	40.6	43.2	48.7	44.1	44.0
43.1	39.6	43.2	47.2	44.8	45.5
41.1	43.6	49.9	54.4	55.6	58.0
41.2	44.0	49.1	55.1	55.1	57.5
50.3	46.3	50.0	53.8	52.4	54.1
46.7	48.6	54.8	53.3	51.6	57.1
42.3	43.9	51.4	54.3	49.6	58.5
41.4	43.7	50.5	49.2	46.6	52.4
39.8	41.6	46.4	49.6	48.4	50.0
33.0	44.2	43.3	50.2	48.5	49.8
32.7	35.7	39.5	43.9	40.8	44.4
34.0	37.6	42.0	46.6	47.1	48.1
36.9	40.2	42.5	45.8	47.8	50.6
39.1	42.5	44.1	49.4	51.4	51.8
40.5	41.3	45.6	54.3	52.7	52.5
41.3	44.2	43.9	48.5	48.4	52.1
36.0	42.0	40.7	46.8	47.0	51.4
31.4	35.7	39.7	47.1	44.4	45.8
33.5	36.1	39.9	49.0	46.6	44.4
36.6	37.1	40.4	48.5	44.9	44.2
36.3	39.7	41.6	45.3	44.0	45.1
35.5	38.8	41.3	46.5	45.4	47.4
36.3	42.5	42.0	49.5	47.4	52.1
36.1	45.6	43.3	46.7	45.7	52.9
36.3	40.1	46.0	47.9	46.2	48.4
42.2	42.7	46.6	48.0	51.3	51.1
46.6	45.6	51.7	51.1	53.6	55.6
45.4	44.7	53.5	55.4	59.5	56.5
51.9	44.8	55.4	56.5	59.8	58.3
45.4	47.9	51.5	57.0	55.2	55.8
38.6	39.3	42.6	45.6	48.0	48.3
36.6	41.0	44.9	45.8	48.5	48.6
40.3	40.7	43.2	44.5	46.3	46.8
37.5	39.3	41.5	44.5	47.7	51.6
38.2	45.5	49.8	53.6	58.2	57.7
40.4	45.7	53.3	52.9	54.4	54.6
43.9	51.7	53.6	50.3	53.7	57.2

41.1	46.7	51.4	49.2	50.8	50.6
43.8	43.7	49.3	51.8	48.7	51.2
40.4	43.3	45.5	48.4	48.5	49.6
39.6	41.5	43.1	47.3	50.9	52.8
37.2	44.2	45.5	47.1	49.0	50.8
39.7	45.5	49.4	50.4	46.2	46.7
35.9	40.8	46.2	46.0	42.8	43.3
39.5	39.2	40.4	48.0	41.3	40.9
40.4	39.8	44.7	48.0	45.1	44.2
38.1	42.0	46.9	52.0	49.6	52.1
42.7	44.8	49.4	51.5	52.9	54.7
44.0	46.0	50.7	54.1	52.3	51.2
50.4	52.4	60.2	68.8	66.2	62.7
44.5	50.4	55.0	61.9	58.5	55.6
43.0	44.6	50.7	51.0	49.9	52.2
41.6	40.5	47.1	48.5	45.7	51.2
33.7	40.5	43.0	42.9	40.1	45.9
33.0	36.8	46.9	46.5	48.1	55.0
35.6	40.1	46.3	51.2	54.5	64.8
32.1	36.8	44.8	49.0	52.5	57.7
34.5	40.0	43.5	46.0	49.6	52.6
32.4	41.6	49.6	44.5	48.3	48.6
36.0	42.7	54.7	45.9	49.2	52.2
37.6	48.0	46.2	47.3	49.2	53.1
39.6	39.7	40.3	43.5	46.5	50.2
34.2	37.7	41.9	43.6	48.1	48.0

1/3 LASeq 250	1/3 LASeq 315	1/3 LASeq 400	1/3 LASeq 500	1/3 LASeq 630	1/3 LASeq 800
51.4	49.5	50.7	53.1	55.3	56.3
45.8	47.9	48.8	50.8	52.0	53.6
38.9	39.5	40.4	42.4	44.2	46.1
45.5	45.9	46.2	51.0	52.0	54.9
53.1	53.2	54.7	58.0	59.9	63.1
53.7	53.3	54.1	57.4	60.1	63.5
56.4	57.2	56.8	59.3	61.3	64.4
53.8	55.1	54.9	58.1	60.8	63.5
52.5	51.9	53.4	56.9	59.8	63.2
51.3	50.6	53.6	57.4	58.3	61.2
47.6	48.8	51.3	52.2	55.5	58.4
46.8	45.7	46.9	48.7	51.8	53.1
44.6	43.1	44.6	46.2	48.1	49.6
39.5	39.1	42.0	42.4	43.9	46.0
43.0	42.3	44.0	46.3	47.3	48.0
54.9	54.6	51.2	53.2	54.9	55.7
58.8	63.1	56.0	56.3	57.4	60.3
55.4	53.5	53.2	55.9	56.1	58.7
67.1	63.4	62.2	62.2	62.5	61.8
63.4	62.2	60.0	59.1	60.4	61.9
55.5	55.3	53.7	54.2	56.7	58.0
67.7	64.6	63.0	58.6	59.8	59.0
62.6	58.5	57.1	54.3	55.8	57.5
52.1	49.2	49.6	52.4	52.9	56.7
45.3	45.3	44.2	45.3	44.7	49.7
58.2	66.7	62.9	65.7	62.8	63.2
61.4	64.0	62.0	63.7	63.0	65.3
57.4	57.7	57.6	59.8	62.8	65.1
53.1	55.6	57.1	61.0	63.0	65.0
50.8	54.0	55.4	58.2	59.4	63.9
48.2	48.3	49.8	53.0	54.7	58.4
46.5	48.7	49.0	51.8	54.8	56.8
46.7	46.9	48.4	50.7	52.4	54.3
52.9	51.0	50.3	53.2	56.7	59.0
53.9	52.5	53.3	54.2	57.3	58.8
53.5	52.8	52.5	54.8	55.7	57.2
77.4	78.4	76.7	76.0	73.8	70.1
73.1	73.4	72.2	71.5	69.6	68.5
64.7	62.0	61.2	63.0	61.6	62.4
57.6	54.3	53.7	56.8	57.3	59.1
48.4	48.7	49.6	51.2	53.7	56.6
46.7	47.4	49.7	52.9	55.4	57.4
54.0	51.0	51.4	55.4	57.0	60.0
48.9	46.2	47.0	49.9	52.8	56.0
46.5	47.9	49.3	50.0	52.2	54.7
40.7	43.3	43.9	44.6	46.5	48.6

41.2	39.8	40.0	42.4	44.5	45.9
42.2	41.6	42.5	45.0	47.2	49.9
51.6	52.8	54.8	58.6	60.9	63.1
53.2	54.3	56.3	60.4	63.3	65.8
53.1	53.9	55.9	59.3	63.0	66.6
54.7	54.1	58.4	62.1	63.6	66.5
54.4	55.1	56.6	58.9	62.4	65.2
51.7	52.7	51.3	54.6	59.4	60.4
50.0	49.1	48.2	51.8	53.7	55.5
48.5	47.2	47.9	51.7	51.2	52.1
47.5	46.8	46.0	50.2	49.6	50.6
47.1	46.2	45.9	50.7	50.1	49.8
48.1	47.0	46.6	52.8	49.4	50.1
51.4	49.1	49.0	53.9	52.1	52.5
52.0	51.2	52.3	55.7	56.9	57.8
55.7	57.2	54.1	57.2	58.3	59.6
56.2	56.5	55.9	58.2	59.5	60.7
56.9	55.6	55.8	58.2	59.3	61.3
53.2	53.7	54.8	57.6	59.4	61.8
52.7	54.2	55.4	57.7	59.3	61.5
51.8	53.3	52.7	55.9	57.1	58.2
44.8	43.3	42.9	45.9	47.4	49.7
49.2	49.5	51.9	54.8	57.7	60.1
52.8	53.0	55.6	61.6	64.0	64.7
55.3	55.5	57.7	60.4	63.6	66.5
57.0	57.5	58.4	58.8	63.2	65.9
54.8	54.2	55.8	58.7	61.7	64.3
50.4	51.5	52.6	55.9	60.4	62.8
44.3	45.8	46.2	48.9	52.0	55.1
44.1	45.1	46.9	48.4	50.4	54.7
44.7	45.2	47.2	48.6	51.4	56.2
47.3	45.5	46.9	48.4	50.7	53.1
48.6	47.4	48.4	48.5	50.3	52.0
52.0	52.2	52.2	50.6	53.5	55.8
51.0	53.5	52.5	52.1	54.3	55.5
49.4	50.4	51.8	52.9	53.3	54.9
49.7	51.3	52.9	54.2	56.2	57.1
51.1	52.8	53.3	55.2	56.2	58.4
57.0	57.2	55.6	58.7	59.7	61.6
59.2	58.6	56.4	57.8	59.5	62.2
55.3	55.1	54.2	56.2	58.8	61.5
50.1	50.8	50.5	52.9	56.5	59.5
51.8	53.5	53.4	57.4	60.0	63.3
49.3	48.4	49.5	53.0	55.6	59.4
52.6	52.8	54.9	57.4	60.4	62.2
61.0	68.3	65.2	65.9	71.7	70.3
57.9	61.1	58.9	61.9	64.7	65.7
58.5	58.4	59.4	60.9	63.6	67.6

51.8	54.0	53.4	56.4	59.1	62.3
53.2	55.5	55.7	59.4	61.8	65.4
54.1	52.6	52.9	56.8	60.0	62.2
60.0	57.6	56.1	62.9	62.9	64.9
49.6	49.0	48.9	52.9	55.0	56.7
51.4	49.4	47.0	48.2	50.0	51.8
47.2	45.7	47.4	45.9	47.0	48.9
42.1	41.8	47.2	45.0	46.2	48.0
43.1	43.2	48.5	46.9	47.0	48.9
52.6	50.7	52.6	54.0	56.1	59.7
54.3	52.3	53.0	53.9	57.4	59.8
55.1	52.4	52.8	53.6	55.5	58.5
64.3	63.2	61.3	62.8	61.8	62.3
57.5	57.0	57.3	59.5	60.2	62.4
52.4	54.7	54.5	56.8	58.6	61.3
48.0	48.7	49.4	50.7	52.5	55.0
43.9	43.3	43.3	45.0	47.2	50.1
52.2	47.6	49.8	45.0	45.9	48.3
61.0	58.1	59.3	52.4	52.8	54.1
52.5	52.2	53.5	50.3	52.9	55.0
55.1	52.3	55.0	59.9	62.5	65.0
51.9	49.6	52.8	57.2	58.8	61.9
54.5	52.5	53.5	57.8	61.6	63.8
54.7	52.6	52.8	57.9	62.5	64.1
52.7	52.3	54.0	58.1	63.8	64.3
50.0	49.2	51.7	56.7	62.5	61.8

1/3 LASeq 1000	1/3 LASeq 1250	1/3 LASeq 1600	1/3 LASeq 2000	1/3 LASeq 2500
58.0	58.4	56.2	52.1	49.5
54.1	50.7	47.6	44.0	40.6
47.8	46.1	44.0	41.1	37.8
58.0	55.6	55.9	53.6	49.9
66.3	64.7	63.5	61.5	58.2
66.1	65.2	64.4	62.5	58.9
66.6	65.5	65.0	62.6	58.9
65.1	64.2	63.6	60.6	57.0
64.5	63.3	61.9	58.7	55.3
62.2	60.7	59.7	56.5	54.0
58.3	56.8	55.2	52.5	49.1
53.8	52.5	50.9	48.8	47.4
49.7	49.0	47.9	46.0	44.3
46.5	45.7	43.9	46.5	45.9
49.0	49.0	47.2	45.3	44.5
56.3	55.3	54.1	52.9	52.4
59.8	57.5	55.2	53.1	51.6
58.5	55.9	55.0	53.2	51.3
61.2	60.1	59.5	58.8	57.8
62.9	61.8	60.0	58.2	56.6
59.7	59.1	57.3	54.8	52.3
59.7	58.5	56.6	56.1	55.3
58.1	57.2	55.6	54.5	52.6
58.9	58.1	57.0	55.8	52.6
50.7	49.5	46.9	44.0	40.2
65.2	67.5	65.7	61.6	61.6
67.5	68.6	66.8	64.3	61.7
66.9	67.5	65.6	63.4	59.9
66.8	66.1	64.6	61.5	58.5
64.9	63.3	61.2	58.5	55.7
59.9	58.7	58.1	54.8	51.2
57.4	55.7	54.8	51.3	48.0
56.0	54.2	53.5	50.7	47.4
59.5	56.8	54.8	51.9	48.8
59.8	58.2	56.1	53.5	52.3
58.4	56.6	54.6	52.5	51.6
67.2	63.5	61.5	59.4	57.9
70.2	66.2	65.2	65.5	64.6
65.1	63.0	61.1	60.8	58.0
61.8	60.6	59.0	56.6	53.4
58.6	58.1	57.1	53.8	50.1
58.8	58.2	57.7	56.1	53.0
63.6	62.3	61.8	59.7	55.4
60.2	60.1	57.6	54.0	48.6
55.3	53.8	53.5	49.7	46.1
49.4	48.1	46.6	42.8	39.1

48.7	47.0	44.5	41.6	37.5
53.3	51.9	52.1	48.7	44.9
65.0	64.3	64.0	62.6	59.7
66.9	65.9	64.8	62.5	59.0
67.8	66.6	65.2	62.9	59.3
67.5	66.0	64.6	62.1	58.9
67.8	66.7	65.6	63.1	59.7
61.4	60.6	60.0	57.7	54.8
57.2	56.3	56.0	53.2	49.8
53.0	52.2	51.0	49.6	47.7
50.7	49.2	48.5	48.7	45.5
50.3	48.5	48.1	47.0	45.5
51.4	49.7	48.9	47.1	46.4
53.8	52.3	52.8	50.6	50.0
56.6	55.2	54.3	51.6	50.5
58.9	56.7	55.5	53.2	51.5
61.7	60.0	58.0	56.3	54.6
62.6	61.4	60.4	58.4	56.1
62.3	60.9	59.6	57.2	54.5
62.9	61.6	60.5	58.0	55.3
59.1	58.1	56.2	54.2	51.7
50.4	49.7	46.9	44.2	40.5
63.2	63.3	62.4	60.6	57.6
67.4	66.8	65.9	63.5	59.6
67.5	66.7	65.1	62.9	59.3
68.5	67.8	66.4	64.2	60.9
67.1	65.9	64.3	62.1	58.9
65.4	64.1	62.0	59.7	56.6
57.3	56.1	53.7	51.0	48.1
56.5	54.7	54.0	51.1	48.0
58.3	56.4	55.0	52.4	49.0
53.6	53.0	51.9	49.9	47.9
52.9	52.4	51.5	50.3	49.7
57.3	63.0	65.5	64.3	60.6
56.4	64.3	69.1	64.5	61.5
55.4	55.8	60.8	53.4	52.7
57.5	56.0	56.0	53.2	51.5
59.6	59.0	59.5	57.1	55.9
63.1	62.2	61.9	60.5	59.1
63.2	62.0	60.8	59.3	56.8
62.4	61.5	60.0	57.7	54.7
60.9	59.8	58.6	56.1	52.7
65.1	64.0	63.5	61.7	57.8
61.3	60.6	59.4	57.0	53.5
64.1	63.3	61.9	59.4	56.1
68.0	67.2	64.7	62.8	60.3
65.7	65.2	63.2	60.9	58.1
68.6	66.8	65.3	63.3	59.6

64.2	62.9	61.7	59.3	55.4
67.1	65.3	64.4	61.9	58.4
64.4	63.7	62.9	60.4	56.5
65.1	63.1	62.0	60.4	57.1
58.0	55.4	53.7	52.7	50.0
52.8	51.1	49.5	47.4	45.8
50.2	49.1	47.6	45.3	43.1
49.6	48.8	46.7	44.5	42.1
50.7	49.3	47.6	45.6	44.0
57.8	54.9	52.8	50.5	48.6
58.4	54.9	52.7	50.9	48.7
60.1	56.7	54.4	52.1	49.6
62.1	61.0	60.2	59.6	58.3
62.7	61.9	60.3	58.8	57.4
62.5	61.5	59.9	58.1	55.5
57.0	56.5	54.5	52.9	49.6
52.8	52.7	50.1	48.0	43.2
48.0	46.9	44.0	41.1	38.3
51.4	50.2	46.3	43.5	43.5
54.6	53.9	53.1	50.4	46.6
67.2	66.3	66.2	64.5	61.1
66.1	65.0	63.4	60.7	56.8
65.6	63.4	61.7	59.3	56.5
66.7	65.1	62.6	60.3	57.3
65.3	65.5	63.2	59.5	56.4
64.0	64.3	63.0	59.2	56.3

1/3 LASeq 3150	1/3 LASeq 4000	1/3 LASeq 5000	1/3 LASeq 6300	1/3 LASeq 8000
47.2	44.1	40.7	37.5	33.9
38.1	34.8	32.4	27.8	24.1
35.3	33.7	32.7	29.1	24.6
45.4	41.1	36.9	32.4	28.7
54.5	50.8	47.1	42.7	38.7
54.9	50.7	46.6	42.4	38.2
55.1	51.3	47.4	43.4	39.0
53.2	49.4	45.7	42.3	38.2
52.1	48.9	45.1	41.2	37.0
51.0	47.8	44.4	40.4	35.9
45.3	42.0	38.1	33.5	28.8
44.4	41.8	39.1	35.1	32.8
40.9	37.7	34.8	30.7	27.5
44.3	34.5	34.2	30.2	27.7
41.4	38.3	36.1	31.2	26.5
49.9	46.5	44.1	40.0	36.4
48.9	45.5	42.9	38.8	35.4
48.3	45.6	43.8	40.3	39.6
55.5	52.4	50.2	46.9	44.2
54.2	51.5	49.1	46.3	43.6
49.9	46.8	43.4	40.6	37.6
50.7	48.3	44.8	41.3	37.9
48.8	45.7	42.1	38.1	34.6
48.5	44.4	40.6	36.2	31.9
36.0	31.7	27.8	23.0	18.7
58.1	56.1	53.2	49.7	46.5
58.3	55.8	51.5	47.3	43.4
56.0	52.2	48.3	43.9	40.1
55.3	51.0	47.7	43.4	38.5
52.5	48.4	47.5	42.6	37.8
47.3	43.7	40.1	35.5	32.1
44.1	40.9	37.6	32.8	30.8
43.3	39.8	36.5	32.1	26.7
45.9	41.9	39.2	35.4	32.1
48.9	46.1	43.7	38.4	33.6
48.9	45.5	43.1	38.9	35.1
55.2	52.6	51.0	48.1	44.9
61.1	57.3	55.9	51.8	47.4
54.3	50.3	47.1	42.6	38.4
49.8	46.4	43.1	38.7	35.1
45.6	41.0	36.4	31.2	26.2
49.2	44.6	40.0	35.1	30.2
51.5	47.7	43.6	39.3	35.3
44.5	40.3	35.8	30.5	26.0
43.3	40.9	41.1	33.4	27.1
36.4	34.3	33.3	26.4	20.1

33.7	29.9	26.2	21.6	17.3
40.7	36.4	32.2	27.8	22.9
56.0	53.2	50.0	45.7	41.4
55.5	52.9	49.4	45.7	41.1
55.4	51.5	47.7	43.5	39.2
55.2	51.9	48.3	44.4	39.7
55.4	51.8	47.9	43.5	39.0
51.7	47.8	43.5	38.9	34.2
46.2	42.5	38.6	35.9	33.1
45.1	42.0	39.3	38.3	36.2
42.1	39.5	37.2	36.5	35.0
41.5	39.1	36.6	36.3	35.6
42.8	40.8	37.8	37.8	36.5
47.0	44.0	41.1	38.9	36.6
48.1	45.4	42.8	39.8	37.3
48.9	46.1	43.3	41.4	38.6
52.3	49.8	47.2	44.4	40.9
53.5	51.0	49.5	46.4	41.6
51.2	48.2	46.5	42.7	37.7
52.5	49.9	47.5	44.2	41.8
49.8	47.2	45.5	42.4	40.7
37.2	33.0	30.1	27.0	24.3
53.1	48.8	44.5	40.2	36.3
55.2	51.6	47.6	43.5	39.5
55.3	51.8	48.1	44.3	40.3
57.3	53.5	50.2	46.6	41.8
54.9	51.0	47.2	43.2	38.6
52.8	49.0	44.7	40.1	35.6
44.7	40.8	36.1	31.2	26.8
44.0	40.1	36.0	31.6	26.2
45.2	41.3	37.2	32.4	27.5
45.4	42.7	40.7	39.0	33.4
48.3	44.6	41.7	39.6	34.5
62.0	59.9	61.2	57.3	54.3
63.5	61.9	62.1	58.9	56.1
51.9	48.8	47.8	44.4	40.6
49.5	46.1	43.0	39.3	35.3
53.8	51.4	50.8	46.9	42.5
57.6	55.7	53.8	50.6	47.5
54.6	52.0	49.1	45.2	41.6
52.2	49.1	45.4	41.4	37.2
49.1	45.5	41.2	37.0	33.5
53.7	50.2	46.3	42.3	38.5
49.3	45.7	41.7	37.5	34.1
51.8	48.0	44.0	39.4	34.9
56.7	54.2	51.9	46.4	41.8
54.4	50.6	46.7	42.2	37.9
55.5	52.3	48.7	44.6	40.1

51.4	47.2	43.7	39.8	34.7
54.6	50.8	47.2	43.6	38.8
52.9	49.1	45.0	40.5	36.5
53.4	51.0	48.5	43.5	38.9
46.6	42.5	39.0	34.5	29.7
43.2	39.8	37.1	33.3	28.8
41.3	38.3	35.4	32.4	28.8
40.3	37.4	34.8	31.1	27.6
41.9	39.1	36.3	32.7	28.6
46.0	43.4	40.6	37.1	33.1
46.4	44.0	40.9	36.9	32.9
47.3	44.4	41.6	39.0	36.1
56.2	54.1	51.7	48.7	45.7
55.1	52.7	50.7	47.8	44.9
53.0	50.5	47.5	44.9	42.1
47.0	44.3	41.3	39.1	36.6
39.2	35.3	31.5	28.3	24.2
35.3	32.5	30.0	26.5	22.6
40.2	36.6	34.5	31.7	27.1
42.5	38.5	35.1	31.7	28.6
57.1	53.2	48.9	44.6	40.4
52.7	49.1	45.6	41.4	37.1
53.1	50.3	47.8	44.7	41.0
53.5	49.7	46.4	42.6	37.6
52.6	49.6	46.0	42.0	38.0
52.8	49.5	46.0	42.1	38.3

1/3 LASeq 10000	1/3 LASeq 12500	1/3 LASeq 16000	1/3 LASeq 20000	1/3 LASmax 6.3
30.2	25.7	21.4	15.0	1.9
20.5	16.6	12.6	9.6	1.9
21.1	19.4	14.8	10.3	1.9
23.6	18.3	13.8	10.0	1.9
33.9	27.8	22.2	15.0	1.9
33.7	27.8	21.6	14.8	1.9
34.3	28.5	22.4	15.6	1.9
33.2	27.6	22.9	16.2	1.9
31.7	27.9	21.0	15.6	1.9
30.6	25.3	19.1	14.3	1.9
23.5	17.9	12.9	9.7	1.9
28.6	25.2	21.4	14.2	1.9
22.6	19.1	15.5	10.4	1.9
21.1	15.9	12.2	9.2	1.9
22.0	16.6	12.2	9.3	1.9
32.0	27.0	21.6	14.7	1.9
30.3	25.8	20.5	14.1	1.9
34.4	30.1	24.8	19.2	1.9
41.5	37.7	30.7	24.7	1.9
40.9	35.8	30.4	24.8	1.9
35.0	31.0	26.5	19.6	1.9
34.9	30.6	27.4	19.7	1.9
31.7	26.3	21.2	14.8	1.9
28.4	23.6	19.1	13.7	1.9
15.7	12.7	10.1	9.0	1.9
41.3	36.9	33.2	25.9	1.9
38.3	33.6	29.3	22.2	1.9
34.9	28.7	23.0	16.0	1.9
33.6	27.4	21.3	14.8	1.9
32.2	26.5	19.4	12.9	1.9
25.7	21.5	13.2	10.1	1.9
24.2	16.7	11.9	9.8	1.9
20.9	14.9	10.6	9.5	1.9
29.2	22.0	16.3	11.1	1.9
28.7	24.2	19.9	13.7	1.9
30.8	25.8	20.5	14.5	1.9
41.6	34.5	30.2	23.0	1.9
43.7	38.7	32.9	25.0	1.9
34.2	29.0	23.5	16.4	1.9
30.8	25.6	21.0	14.5	1.9
20.9	15.2	11.3	9.6	1.9
25.7	20.1	15.1	10.9	1.9
30.4	24.7	19.2	13.1	1.9
21.1	15.8	11.5	9.7	1.9
31.4	15.1	13.9	9.7	1.9
22.7	11.6	10.0	9.1	1.9

14.5	11.3	9.3	9.3	1.9
18.0	12.9	9.9	9.3	1.9
37.5	34.5	31.5	25.3	1.9
36.3	31.6	27.4	20.8	1.9
34.6	29.2	24.2	17.2	1.9
35.1	29.4	24.1	19.8	1.9
34.1	27.9	22.5	16.2	1.9
29.0	22.6	16.8	10.8	1.9
27.0	21.4	17.8	12.3	1.9
30.6	25.2	20.0	13.9	1.9
29.0	23.5	17.9	11.9	1.9
29.4	24.0	17.9	11.7	1.9
30.0	25.4	18.7	12.0	1.9
30.2	25.5	18.8	12.0	1.9
31.4	25.9	19.1	12.3	1.9
34.1	29.7	23.3	16.2	1.9
37.6	33.6	28.6	21.2	1.9
38.5	33.2	28.3	22.0	1.9
33.7	28.8	24.3	18.1	1.9
37.5	32.5	29.2	22.1	1.9
36.4	31.5	28.5	21.3	1.9
20.5	15.9	12.3	9.5	1.9
31.5	25.9	20.5	13.8	1.9
35.6	30.4	25.2	18.3	1.9
35.8	30.4	25.1	17.9	1.9
36.3	31.6	25.8	17.7	1.9
33.5	28.0	25.0	14.7	1.9
31.3	25.4	20.4	13.9	1.9
31.3	16.3	12.0	9.2	1.9
25.5	15.5	10.9	8.8	1.9
22.1	16.2	11.0	8.8	1.9
28.9	24.2	18.0	12.0	1.9
30.1	25.6	24.5	16.9	1.9
52.3	46.6	43.8	38.2	1.9
51.1	46.8	43.7	37.1	1.9
35.0	29.5	25.7	18.2	1.9
30.4	24.2	18.4	12.6	1.9
37.5	32.8	31.5	20.1	1.9
42.9	37.3	32.0	24.5	1.9
37.5	32.3	27.5	20.6	1.9
33.2	30.1	23.4	15.8	1.9
27.7	23.6	16.4	10.5	1.9
33.7	27.7	22.3	15.5	1.9
29.1	21.8	15.8	10.8	1.9
29.8	24.9	19.4	12.4	1.9
37.4	32.0	26.8	20.1	1.9
32.8	27.7	22.8	16.3	1.9
35.3	29.9	24.6	17.8	1.9

28.6	21.9	15.9	10.7	1.9
33.5	27.5	21.6	14.4	1.9
32.2	26.3	20.4	13.7	1.9
35.6	30.5	25.2	18.7	1.9
27.4	19.5	15.4	10.8	1.9
25.0	19.4	15.5	10.7	1.9
24.2	19.4	14.7	10.5	1.9
23.9	18.9	14.7	10.6	1.9
24.3	19.2	15.2	10.9	1.9
28.0	23.1	17.9	14.3	1.9
28.3	22.9	17.1	33.1	1.9
32.2	28.7	23.8	40.6	1.9
42.6	38.8	33.3	33.5	1.9
40.8	36.2	31.1	25.0	1.9
38.1	32.3	27.0	19.7	1.9
32.3	25.9	20.4	14.4	1.9
19.3	14.5	11.0	9.5	1.9
18.6	14.7	10.7	19.7	1.9
21.4	16.5	11.5	11.2	1.9
23.4	20.2	15.1	11.1	1.9
35.4	29.4	23.7	17.1	1.9
32.2	25.5	19.7	13.9	1.9
36.3	30.4	24.6	17.7	1.9
32.2	26.4	20.5	14.0	1.9
33.3	26.6	21.2	14.6	1.9
33.9	28.3	23.4	16.2	1.9

1/3 LASmax 8.0	1/3 LASmax 10.0	1/3 LASmax 12.5	1/3 LASmax 16.0	1/3 LASmax 20.0
0.9	6.5	12.4	19.8	21.6
0.9	3.6	10.6	14.0	15.7
0.9	9.5	12.8	19.7	23.4
3.0	4.9	11.0	16.9	18.6
0.9	5.2	15.0	22.4	23.4
0.9	8.1	14.5	19.4	21.2
0.9	7.8	13.7	17.6	23.8
0.9	4.9	11.4	18.0	20.8
0.9	3.6	8.3	12.6	19.4
0.9	5.3	8.0	14.2	19.2
0.9	2.0	6.8	10.9	14.9
0.9	0.3	-0.8	2.9	11.8
0.9	0.3	-0.5	7.3	11.9
0.9	0.3	4.8	8.5	12.3
0.9	0.3	-0.6	5.4	13.5
0.9	0.3	4.3	14.4	16.6
0.9	0.3	1.8	8.3	10.5
0.9	0.3	-0.8	3.9	7.9
0.9	0.3	-0.8	6.5	11.2
0.9	0.3	6.2	8.2	14.5
0.9	0.3	1.5	6.5	12.6
0.9	0.3	0.7	9.1	11.8
0.9	0.3	5.4	10.5	15.7
0.9	0.3	1.7	5.9	8.5
0.9	0.3	-0.8	0.1	10.8
0.9	0.3	-0.8	3.0	12.3
0.9	0.3	-0.8	6.5	14.7
0.9	0.3	-0.8	5.6	14.8
0.9	0.3	3.0	6.8	13.4
0.9	0.3	-0.8	5.2	12.6
0.9	0.3	-0.8	1.8	10.3
0.9	0.3	-0.8	4.3	11.2
0.9	0.3	-0.8	2.7	10.2
0.9	0.3	-0.6	3.9	10.8
0.9	1.4	5.3	7.1	15.8
2.4	11.0	16.5	24.5	24.5
1.6	5.0	10.0	16.1	16.8
0.9	0.3	2.7	18.9	19.7
0.9	0.3	4.4	13.8	15.8
0.9	0.3	-0.8	3.7	14.2
0.9	0.3	1.9	5.7	10.4
0.9	0.3	1.6	7.5	13.8
0.9	0.3	-0.4	7.7	14.1
0.9	0.3	-0.8	5.4	12.5
0.9	0.3	-0.8	5.4	11.7
0.9	0.3	-0.8	-0.5	9.9

0.9	0.3	-0.8	4.6	11.3
0.9	0.3	7.1	13.5	15.7
0.9	2.4	8.1	12.3	15.9
0.9	0.3	5.9	10.2	15.7
0.9	2.9	9.1	10.8	16.8
0.9	5.0	13.7	17.9	21.8
0.9	3.5	12.3	15.9	19.9
0.9	0.3	7.9	12.1	18.0
0.9	0.3	7.3	11.4	18.9
0.9	0.3	7.1	13.2	18.0
0.9	5.7	9.4	17.0	17.9
0.9	4.3	9.0	15.5	15.2
0.9	0.3	11.9	14.2	18.4
0.9	5.0	8.1	14.3	19.0
0.9	2.9	8.1	12.5	20.7
0.9	8.4	14.6	16.0	22.9
0.9	5.1	10.8	12.9	21.9
0.9	6.6	13.1	14.2	19.8
0.9	5.6	13.3	18.9	21.4
0.9	6.4	13.3	17.7	19.8
0.9	0.3	10.1	14.8	17.5
0.9	3.9	11.1	18.3	22.1
1.0	5.6	13.8	17.3	23.9
0.9	7.3	14.2	20.3	23.1
1.9	6.3	13.6	20.7	24.4
5.9	7.2	11.5	20.7	24.5
0.9	6.5	9.5	15.0	19.1
0.9	0.8	6.6	11.0	17.9
0.9	2.2	10.8	15.2	18.1
1.3	3.2	8.6	13.7	22.2
1.8	2.7	5.0	10.8	15.0
0.9	0.3	-0.8	0.8	13.8
0.9	0.3	-0.8	0.3	11.0
0.9	0.3	0.8	1.0	14.1
0.9	0.3	1.2	9.3	14.4
0.9	0.3	7.5	12.9	17.8
2.9	10.2	11.4	18.3	26.5
3.8	11.7	16.3	23.1	27.2
0.9	1.4	4.6	10.1	15.8
0.9	1.4	9.4	14.3	20.3
0.9	0.3	2.1	7.1	11.8
0.9	0.3	1.0	8.8	9.8
0.9	0.3	-0.3	4.2	12.1
0.9	0.3	-0.6	9.2	13.3
0.9	0.3	0.4	4.6	11.6
0.9	0.3	4.0	7.8	14.2
0.9	0.3	4.7	7.4	16.1
0.9	0.3	4.7	10.8	16.4

0.9	0.3	1.3	7.9	11.3
0.9	0.3	4.7	10.3	18.4
0.9	0.3	4.2	9.6	13.9
0.9	0.3	12.0	21.3	26.2
0.9	6.8	7.5	11.6	18.7
0.9	1.5	1.1	5.3	12.3
0.9	0.3	-0.8	7.5	15.0
0.9	0.3	5.8	13.0	21.0
0.9	4.9	12.5	14.3	22.8
0.9	0.8	9.3	12.9	18.9
0.9	0.3	-0.1	5.5	16.9
0.9	0.8	7.3	13.4	21.5
1.3	2.2	5.7	14.7	22.0
0.9	2.3	9.6	14.6	18.4
0.9	0.3	3.2	5.9	13.7
0.9	0.3	3.8	9.3	14.0
0.9	2.4	3.8	11.3	17.3
0.9	1.2	2.1	8.1	11.3
0.9	0.3	0.5	7.1	9.9
0.9	0.3	3.5	7.4	10.9
0.9	0.3	3.4	7.4	8.5
0.9	0.3	-0.8	1.8	9.4
0.9	0.3	0.0	8.5	12.6
0.9	0.3	4.6	8.8	14.0
0.9	0.3	1.0	6.8	14.5
0.9	0.3	0.0	10.0	12.9

1/3 LASmax 25.0	1/3 LASmax 31.5	1/3 LASmax 40.0	1/3 LASmax 50.0	1/3 LASmax 63.0
26.4	29.5	34.4	38.8	44.0
24.7	25.7	29.6	31.9	41.3
26.8	28.1	29.4	31.5	34.5
22.7	25.2	24.2	31.3	32.5
28.6	30.5	33.7	37.6	38.7
25.1	30.0	33.0	36.0	38.0
27.0	29.3	33.5	36.8	38.6
24.9	27.4	39.5	37.6	39.7
25.5	35.9	41.5	40.7	40.1
24.3	31.5	39.0	40.5	43.0
22.7	25.7	30.4	38.7	40.1
19.2	27.5	36.0	35.4	37.4
21.8	29.8	34.5	34.7	38.0
20.8	30.5	30.3	33.9	38.2
21.2	26.8	28.4	34.6	38.5
22.6	38.7	34.8	39.7	45.4
21.3	30.8	36.4	45.2	45.1
21.8	34.3	39.7	41.3	50.0
25.0	30.9	41.1	41.6	48.0
20.9	28.3	41.9	41.4	46.9
17.2	25.2	36.5	36.2	41.1
18.7	25.6	35.4	39.8	45.4
19.8	25.7	33.8	37.9	45.6
17.8	22.5	31.9	35.2	38.1
14.1	20.8	27.2	35.0	40.6
17.0	24.3	32.7	45.6	55.5
20.8	28.7	40.8	47.0	54.3
19.8	28.6	42.0	41.3	41.9
21.0	31.0	41.1	39.5	42.5
18.8	30.0	39.7	40.7	41.8
16.1	27.2	37.6	38.2	41.3
15.2	26.6	36.3	40.5	39.5
16.1	26.3	39.2	36.5	38.9
16.8	28.1	37.3	41.6	41.5
20.8	31.1	36.6	40.3	44.0
34.1	35.1	40.4	42.4	43.2
32.7	31.0	38.7	52.9	57.5
29.8	31.0	54.5	56.3	51.5
23.1	30.5	52.8	52.2	50.6
26.7	27.3	41.8	52.1	44.1
20.1	23.7	42.2	42.4	44.6
17.5	22.4	31.5	40.2	35.8
16.7	22.5	30.1	33.2	35.1
17.6	21.1	34.4	31.2	33.8
16.9	20.9	34.6	36.0	32.1
18.2	20.3	27.8	36.4	31.1

18.4	26.7	26.1	31.6	30.8
21.3	25.4	26.0	31.5	32.7
25.1	23.8	34.3	37.4	38.6
24.7	24.8	34.2	35.0	42.9
24.3	29.6	39.2	38.0	47.5
29.2	31.9	37.3	37.0	43.9
23.7	27.8	32.6	36.5	42.4
25.2	25.7	29.1	33.8	40.8
26.7	35.1	38.1	43.5	46.0
29.9	35.4	37.5	41.9	46.3
31.4	36.4	38.1	41.2	43.8
30.1	36.3	37.2	41.5	48.9
31.4	35.3	36.7	40.2	47.7
31.2	34.5	32.2	40.2	43.8
30.4	35.2	31.5	43.7	43.5
31.5	35.7	40.4	50.8	55.4
25.6	31.1	36.9	44.0	50.8
24.5	29.3	36.2	38.5	45.9
25.9	30.7	36.6	42.2	46.1
23.5	27.8	36.0	36.4	44.6
24.4	28.6	31.1	35.2	35.3
26.4	29.1	31.9	33.7	34.2
27.3	30.7	32.7	38.4	37.8
26.6	30.5	33.4	39.7	38.5
32.6	37.9	38.7	40.0	40.4
28.4	32.3	40.7	39.7	46.0
25.8	29.2	32.5	36.0	45.7
25.7	28.3	37.8	35.5	38.2
25.2	28.6	30.1	35.2	33.5
27.1	24.6	30.3	33.6	35.9
24.6	25.4	30.2	33.2	38.3
21.1	23.8	30.6	31.9	38.3
20.7	25.0	27.9	32.8	37.1
20.6	24.6	32.7	34.9	38.2
21.9	26.5	34.6	34.8	37.2
25.1	26.5	30.9	36.7	37.3
32.8	34.3	38.6	42.1	46.5
32.5	33.8	38.3	41.7	49.3
24.8	29.8	34.1	44.8	50.7
23.7	38.2	37.1	51.9	54.6
19.6	29.9	39.3	50.4	47.1
18.8	29.0	37.7	39.3	42.4
20.7	29.2	33.7	40.5	38.7
19.9	25.7	31.0	42.3	43.4
20.0	25.3	28.1	36.1	39.8
22.7	26.0	32.8	36.3	40.3
22.2	27.0	32.5	37.6	42.7
20.8	32.4	34.1	45.9	48.5

19.4	25.9	28.8	39.3	45.3
22.4	30.8	38.0	40.2	45.9
21.8	30.0	33.8	35.7	43.9
26.5	31.0	34.9	35.2	43.1
22.8	27.1	32.2	33.7	39.5
22.2	30.3	32.1	34.7	44.0
23.5	29.3	27.5	31.9	37.7
26.3	30.8	33.7	33.5	41.7
27.2	29.1	34.9	35.3	42.1
25.9	29.8	36.2	35.4	39.7
25.6	29.5	35.8	38.0	45.5
26.5	30.7	37.5	47.4	49.5
26.2	34.0	37.5	48.4	53.3
23.6	27.4	34.1	41.0	47.9
19.3	26.1	30.0	36.4	47.0
19.7	26.4	29.9	34.6	46.3
20.9	26.8	30.2	33.9	36.8
19.5	25.2	30.2	33.2	37.1
22.0	23.7	29.6	33.5	37.4
20.4	21.2	24.5	30.8	35.6
20.3	23.0	28.2	31.4	36.0
21.0	21.7	28.7	33.6	34.5
22.4	24.8	30.3	39.5	40.2
23.2	26.2	30.5	37.9	39.9
21.7	23.0	29.8	36.5	41.7
21.5	21.9	27.7	35.8	36.0

1/3 LASmax 80.0	1/3 LASmax 100	1/3 LASmax 125	1/3 LASmax 160	1/3 LASmax 200
42.3	44.6	49.1	51.5	53.6
39.5	43.7	46.7	47.1	49.7
36.1	40.9	43.4	44.5	42.8
36.3	41.4	49.6	45.0	49.2
41.7	51.8	50.8	49.7	53.1
40.8	44.9	58.6	51.2	51.7
44.6	48.2	64.0	52.8	58.6
44.3	47.3	62.6	53.1	54.6
44.6	47.0	47.8	52.6	53.1
42.2	47.0	47.2	51.2	54.2
40.1	45.1	46.8	46.4	53.3
39.1	44.3	46.8	45.8	47.7
38.5	47.5	46.6	46.5	46.6
39.2	47.3	44.3	41.9	46.2
39.3	46.5	51.3	47.3	48.7
45.3	53.7	65.3	66.3	59.5
47.6	53.7	66.9	73.2	61.1
48.9	54.0	63.4	64.1	57.1
51.6	72.4	78.1	69.4	65.4
48.5	72.2	75.9	64.3	63.9
42.4	61.5	62.7	55.3	55.3
50.4	54.4	73.9	72.6	64.3
46.0	54.4	71.3	68.6	60.1
38.7	49.7	57.3	53.3	51.1
40.4	41.0	42.9	44.8	46.9
43.1	47.5	50.8	57.9	61.6
46.1	54.6	50.8	56.9	58.9
47.8	55.2	52.4	55.7	58.8
42.9	45.8	49.2	50.5	52.0
41.9	43.5	46.5	48.8	51.2
43.0	43.2	45.3	46.6	47.3
41.0	46.6	44.0	45.9	49.4
41.4	46.9	53.4	45.7	49.1
45.0	54.1	59.3	49.4	53.7
53.5	54.6	55.4	54.4	54.1
50.6	56.2	62.5	64.7	62.9
76.3	77.9	76.3	82.6	86.0
67.8	75.2	73.9	75.2	80.7
55.3	59.4	66.7	62.1	66.3
50.9	55.1	63.1	51.1	54.3
51.3	47.9	49.2	49.4	49.0
40.6	44.6	47.9	48.3	47.9
40.3	44.9	56.3	50.6	54.3
39.7	41.2	58.0	47.7	51.0
37.2	44.6	51.7	48.9	46.9
34.5	45.8	49.4	44.9	44.7

36.3	39.0	41.8	40.5	42.1
35.2	40.3	43.7	42.7	43.1
40.7	42.9	46.2	49.2	53.7
41.5	46.8	47.2	52.3	55.4
47.5	44.6	50.5	49.6	52.1
44.1	44.5	48.8	51.4	54.6
43.0	46.8	50.6	52.4	53.2
47.6	53.2	54.8	47.9	51.3
48.4	50.1	47.5	47.4	48.8
42.6	44.5	48.7	46.0	47.6
42.0	44.5	49.6	45.9	45.5
42.1	44.6	51.0	46.0	45.3
40.9	47.0	49.4	48.1	50.8
45.6	53.1	56.5	58.2	62.0
45.2	52.8	56.2	56.9	61.8
51.2	56.2	55.8	55.2	59.1
51.3	57.0	56.1	52.9	58.2
46.5	53.6	55.9	50.9	60.0
47.4	52.1	52.9	47.6	54.7
46.9	48.9	54.3	54.0	53.5
48.1	46.7	54.3	53.6	53.5
37.8	42.8	47.5	43.5	47.3
42.3	45.4	48.2	51.9	51.8
42.4	45.3	47.9	50.0	53.0
45.3	46.1	53.0	54.8	53.4
43.6	47.7	55.6	56.0	54.1
47.1	46.9	52.4	51.2	53.7
45.6	42.0	48.8	48.3	52.8
37.0	40.9	50.1	45.8	47.9
37.9	41.5	52.5	50.9	45.7
43.0	42.0	51.1	49.0	45.7
42.6	42.8	46.9	45.4	48.2
40.8	42.6	48.5	46.3	49.1
49.0	44.9	51.7	49.9	58.1
49.8	45.4	51.0	49.5	57.8
42.6	48.4	50.4	48.7	49.9
43.6	48.2	49.4	54.3	53.7
48.3	55.2	53.7	54.9	57.3
46.1	56.0	59.2	63.4	58.7
48.9	56.7	59.4	63.4	60.4
50.1	54.5	60.9	57.8	58.7
42.8	46.1	49.5	51.4	51.0
42.9	46.8	46.9	50.3	49.8
43.8	45.2	45.7	48.1	49.2
40.6	43.4	48.0	48.7	54.7
49.8	54.0	58.1	62.3	61.6
47.9	56.3	54.6	57.3	57.0
56.0	57.9	53.6	57.2	60.6

49.1	54.9	50.6	52.6	52.1
45.3	52.2	56.2	51.2	53.5
45.4	48.8	49.6	50.2	53.4
43.3	44.6	48.5	53.2	55.7
47.0	47.2	52.3	50.6	53.5
48.7	53.6	53.5	49.7	49.5
41.9	50.8	49.5	43.8	46.6
41.2	43.8	51.0	42.1	42.2
41.5	45.7	50.8	48.2	46.5
43.7	48.8	56.7	56.1	56.1
46.4	51.3	53.1	56.1	56.9
52.1	58.1	59.5	57.1	54.2
53.7	63.4	71.8	70.1	65.7
51.9	59.8	65.5	61.4	59.7
49.8	53.3	54.2	51.8	53.6
43.0	49.1	51.9	48.4	54.5
42.4	44.7	44.6	42.1	48.4
39.1	49.8	52.9	56.7	64.4
42.3	47.7	54.8	58.0	66.4
38.4	48.0	53.0	55.1	60.3
42.5	46.0	48.7	52.0	54.6
44.9	57.4	47.3	51.6	52.3
47.6	57.4	51.1	52.8	56.5
49.6	51.2	51.1	52.9	56.2
44.3	42.1	45.1	48.2	52.4
39.2	44.7	44.4	49.3	49.6

1/3 LASmax 250	1/3 LASmax 315	1/3 LASmax 400	1/3 LASmax 500	1/3 LASmax 630
55.9	52.6	53.1	55.5	58.2
49.1	51.3	52.1	54.5	55.4
40.3	40.9	41.7	43.5	45.9
52.2	51.6	53.0	57.9	58.8
54.0	54.3	55.5	59.1	60.8
55.4	54.6	56.1	59.0	60.9
58.5	59.3	58.2	60.1	62.6
55.9	57.6	55.6	59.1	62.9
53.9	53.6	55.5	59.7	61.7
53.9	53.1	55.8	60.1	61.3
48.7	50.2	52.6	53.4	56.7
47.8	46.7	48.1	50.1	52.9
46.6	46.1	46.9	48.7	50.8
40.5	40.1	42.6	43.3	45.7
47.9	45.6	47.6	51.1	51.4
60.1	59.6	52.8	54.0	56.2
60.9	66.4	58.5	57.5	59.1
60.3	56.4	58.4	62.4	59.8
70.9	66.7	65.2	63.3	64.8
68.6	65.4	62.8	61.7	61.5
56.4	58.0	56.6	55.7	58.5
72.2	69.0	67.3	61.9	63.0
68.3	64.4	62.7	58.4	59.6
55.1	51.7	52.4	55.3	56.2
46.4	46.9	45.3	47.7	46.5
63.6	72.6	68.3	71.0	68.2
63.5	69.4	64.7	67.9	65.8
61.8	61.8	61.2	62.3	64.0
54.5	58.0	59.2	62.1	64.7
53.3	58.0	59.1	61.5	63.1
49.1	50.2	50.5	54.9	56.0
47.3	50.4	50.0	53.2	56.2
47.7	47.8	49.4	51.3	53.2
57.1	53.9	53.0	55.8	60.8
56.8	53.7	55.9	55.6	59.8
56.4	57.9	55.0	60.5	58.5
82.4	83.2	80.7	79.6	77.1
78.3	78.2	76.4	75.9	73.7
66.5	65.4	64.3	64.2	62.6
62.7	59.2	58.6	61.2	60.5
49.7	50.5	50.7	53.9	55.5
49.1	49.5	51.2	53.9	57.8
58.1	53.9	54.5	58.4	59.4
52.5	49.5	49.7	53.0	56.1
48.5	49.7	51.8	51.9	54.3
44.4	47.6	48.3	48.6	50.1

43.1	41.0	40.7	43.7	45.5
43.9	45.3	45.9	48.6	51.5
53.9	55.6	57.8	61.9	64.6
54.4	55.7	57.1	61.8	64.5
54.3	54.7	57.1	60.5	64.3
57.1	55.8	61.4	65.8	65.6
56.3	58.1	59.6	61.9	65.2
53.7	55.5	53.5	56.6	60.8
51.0	51.1	49.4	52.9	55.4
49.4	48.2	49.0	53.8	52.0
48.8	47.8	46.8	51.6	50.6
48.2	46.8	47.3	52.6	51.4
49.6	48.3	47.3	54.7	50.6
53.2	50.8	51.1	55.1	53.5
53.0	52.3	53.7	57.1	59.5
58.6	60.9	55.7	59.9	61.0
57.4	58.1	57.2	58.9	60.4
58.9	56.5	56.9	59.0	60.1
54.4	55.0	56.6	59.5	61.3
56.5	58.7	58.0	61.4	61.8
56.1	58.5	57.7	61.2	61.7
47.8	45.4	45.5	47.6	50.2
53.6	53.6	55.8	58.7	62.0
54.6	55.1	57.7	65.2	67.1
57.6	57.1	59.8	62.8	66.0
59.3	60.5	61.1	60.4	64.9
56.3	56.4	58.9	60.4	63.7
52.9	52.7	54.4	57.3	61.9
46.2	48.6	48.1	51.5	56.4
45.5	46.5	47.9	50.1	53.0
45.9	46.6	47.6	50.2	53.3
49.4	47.0	48.1	49.6	51.8
49.7	48.1	48.9	50.1	52.3
56.7	57.5	56.9	55.4	59.4
55.6	56.9	56.6	55.0	58.2
51.1	52.2	53.6	55.0	55.3
50.5	52.3	54.9	56.4	58.4
54.3	55.9	55.1	57.1	58.2
58.8	58.6	56.8	60.2	60.7
60.5	60.5	57.1	58.3	60.3
57.4	56.8	55.3	57.5	59.6
52.4	52.8	52.2	54.9	58.3
53.5	55.8	55.4	59.6	62.3
53.0	51.3	52.5	56.6	59.0
55.1	55.9	59.3	59.8	63.2
65.3	72.1	69.5	69.7	75.6
61.5	65.0	62.9	65.9	69.2
62.1	61.8	62.7	64.2	66.9

54.9	58.7	56.6	61.7	64.0
55.5	58.8	56.8	61.7	64.5
59.7	57.3	55.2	62.8	65.7
63.9	60.8	59.5	66.7	66.1
53.8	52.6	52.1	56.7	58.6
56.4	52.7	49.2	49.6	51.3
52.2	49.9	48.3	47.6	48.8
42.7	43.0	47.8	45.7	47.1
44.8	44.9	49.6	49.1	49.5
56.7	53.2	55.0	57.1	59.3
56.5	54.2	53.9	54.8	59.0
58.5	58.6	56.7	55.8	57.3
67.7	66.6	63.4	65.8	63.9
61.3	59.2	58.7	60.3	61.0
53.8	56.5	55.8	58.9	60.0
50.7	52.1	53.3	55.3	56.6
45.8	45.4	45.0	47.1	49.3
61.3	55.1	58.0	51.9	50.5
63.6	59.4	61.7	53.8	54.4
55.6	56.6	56.5	51.2	54.3
58.2	54.5	57.9	62.2	64.6
55.8	51.9	54.6	60.6	62.1
58.6	56.4	56.1	60.4	65.2
58.2	56.3	55.9	60.5	65.0
55.9	55.5	55.6	59.8	65.7
53.0	51.8	54.7	58.7	64.3

1/3 LASmax 800	1/3 LASmax 1000	1/3 LASmax 1250	1/3 LASmax 1600	1/3 LASmax 2000
59.4	61.2	61.9	59.2	55.6
57.1	57.3	54.0	51.1	47.3
47.3	49.0	47.4	44.7	42.0
62.4	64.7	62.5	62.2	60.6
63.8	67.6	65.1	63.9	62.1
65.3	67.4	66.4	65.9	64.2
65.6	68.0	66.7	66.5	64.2
65.6	66.4	65.0	64.8	61.8
64.9	66.3	64.5	63.9	60.7
64.0	65.1	64.0	63.1	59.4
60.0	59.8	58.5	56.9	54.3
54.5	54.9	53.5	51.6	49.8
52.3	52.5	51.8	51.0	48.5
46.7	47.4	46.4	44.6	51.6
52.7	52.2	54.0	51.7	50.7
58.0	59.5	57.3	55.2	53.8
61.6	60.7	58.5	55.7	53.6
61.1	60.2	57.3	57.9	56.6
63.1	63.1	62.0	60.7	60.1
63.4	63.7	62.7	60.9	59.9
59.6	60.8	60.5	58.6	56.3
60.7	60.8	59.0	57.4	58.7
59.4	59.4	59.5	59.6	57.3
59.6	62.0	61.4	60.4	59.2
52.0	53.2	51.3	48.7	47.1
67.8	70.1	72.7	70.0	66.1
66.5	69.4	70.6	69.0	65.8
66.4	67.8	68.4	66.5	64.8
66.4	67.6	67.8	66.1	62.9
67.3	67.8	66.1	63.6	61.1
60.2	61.4	60.4	59.5	56.5
58.6	58.7	57.5	56.7	52.9
55.2	56.7	54.9	54.1	51.4
62.9	63.3	59.1	55.8	52.7
61.8	62.0	59.2	56.7	54.6
59.7	60.9	58.2	56.1	54.4
73.8	70.0	65.7	63.4	61.5
70.3	73.1	67.9	67.8	68.7
64.0	66.5	64.0	62.1	62.6
61.1	63.5	62.0	60.6	58.4
58.2	59.6	58.7	58.3	55.4
60.3	61.4	60.7	60.1	59.3
62.5	66.1	64.4	64.1	61.9
58.7	63.2	62.9	60.5	57.8
56.6	56.4	55.3	55.6	51.6
51.7	51.9	50.7	49.0	45.3

46.9	51.1	49.2	47.2	43.9
54.5	57.6	57.6	58.1	54.5
66.0	67.2	66.6	66.1	64.5
67.9	68.7	66.8	65.5	63.1
68.1	69.0	67.7	66.6	64.2
68.7	69.4	67.7	67.3	64.6
68.0	70.5	69.1	67.8	65.5
62.8	64.7	64.0	63.1	61.0
56.5	58.5	57.3	57.8	55.5
53.3	54.8	54.0	52.9	50.4
51.9	51.9	50.3	49.4	51.0
50.6	51.0	48.8	48.8	47.9
50.8	52.5	51.0	50.5	49.4
54.2	55.3	54.0	53.8	52.0
60.9	58.4	56.7	56.0	52.1
62.1	62.2	59.0	57.5	55.5
61.8	63.3	61.6	59.5	58.0
62.1	63.5	62.4	61.1	59.4
63.7	63.5	61.8	60.4	58.5
63.4	63.9	62.7	61.5	59.4
62.9	63.7	62.3	61.0	58.9
52.2	52.5	51.4	48.4	46.2
64.4	67.8	67.7	66.4	64.7
67.3	69.2	68.6	67.7	65.6
68.5	68.4	67.8	66.2	63.9
67.3	69.0	68.6	67.1	64.7
66.2	68.4	67.4	66.3	64.4
64.4	66.7	65.4	63.7	61.7
58.6	61.4	60.1	57.5	55.0
59.0	60.8	57.2	56.2	53.8
59.1	60.9	58.2	57.1	54.5
54.1	54.2	53.7	53.2	51.5
53.6	54.7	53.4	53.0	51.7
61.4	62.7	71.1	74.9	71.7
59.4	61.0	70.3	74.8	70.5
56.5	57.3	57.1	63.5	55.0
58.8	58.5	56.8	57.7	53.8
60.1	61.3	61.4	62.3	60.1
62.5	64.2	63.2	62.9	61.5
62.6	63.9	62.5	61.1	60.1
62.2	63.9	62.5	60.9	59.0
62.3	63.9	62.3	61.3	60.1
64.5	66.7	65.6	65.1	64.2
63.4	64.7	63.5	62.4	60.4
64.8	66.6	65.0	63.2	60.6
73.4	70.1	69.1	67.2	65.2
69.3	68.3	68.9	67.0	65.1
70.6	71.6	69.5	67.4	65.6

67.2	67.8	66.6	65.2	63.5
67.4	68.9	67.1	66.0	64.0
66.8	67.1	66.4	66.2	63.9
68.2	68.2	66.1	64.9	63.6
59.5	60.1	58.2	57.1	55.4
52.9	54.5	52.7	50.4	49.0
50.7	51.4	49.9	48.4	46.2
48.7	49.9	49.4	47.2	45.0
51.6	52.7	51.3	50.0	48.0
63.1	60.7	56.8	54.3	51.9
61.2	59.7	56.1	53.5	51.9
60.7	62.6	58.4	56.0	55.7
64.1	63.3	62.6	61.4	60.4
63.3	63.0	62.4	60.7	59.7
62.7	63.6	62.5	60.3	58.9
59.0	60.6	59.9	58.6	56.9
52.7	55.9	55.7	53.6	52.1
52.6	50.5	49.4	45.3	42.2
55.4	52.0	51.0	47.3	44.3
56.6	59.5	59.5	59.3	57.9
68.1	68.9	68.1	67.7	66.4
64.8	68.0	67.0	65.8	63.3
67.7	68.1	66.2	63.5	61.9
67.5	68.1	66.1	63.4	62.1
66.1	66.9	67.4	65.2	61.5
64.9	65.8	65.6	64.8	61.4

1/3 LASmax 2500	1/3 LASmax 3150	1/3 LASmax 4000	1/3 LASmax 5000	1/3 LASmax 6300
52.8	50.5	47.5	43.8	41.0
44.5	42.8	39.3	37.5	32.5
38.9	37.3	36.0	36.8	33.7
57.4	52.8	48.3	44.4	39.8
59.0	56.0	52.5	49.3	44.8
60.7	56.5	52.5	48.2	44.4
60.5	56.7	52.7	48.9	45.3
57.9	54.1	50.2	46.7	44.4
56.9	53.6	50.3	47.0	43.3
56.5	53.6	50.3	47.0	43.3
51.1	47.2	43.7	40.1	35.5
49.4	46.1	43.0	40.2	36.3
46.8	43.5	40.8	38.1	34.0
50.9	50.0	35.9	38.7	34.2
50.0	46.0	43.1	41.0	35.7
53.5	51.3	47.5	45.5	41.1
52.3	49.4	46.1	43.6	39.7
55.0	52.4	49.9	48.4	45.4
59.1	57.5	54.2	51.8	49.0
58.8	57.3	54.0	51.6	48.9
54.1	51.8	49.2	46.4	43.9
59.0	52.4	51.1	47.4	43.5
55.6	50.8	48.4	44.2	40.2
55.9	51.8	47.8	44.0	39.5
43.2	39.2	35.0	31.2	26.6
67.1	63.4	61.8	58.7	55.1
64.5	61.3	59.3	55.6	51.9
61.1	57.3	53.8	50.2	46.0
59.5	56.4	52.4	49.8	45.9
58.6	55.7	51.8	50.4	46.1
52.9	48.9	44.5	40.7	36.3
49.6	45.9	42.8	39.6	34.7
48.0	44.0	40.4	37.6	33.3
50.1	47.1	43.0	40.3	36.4
54.1	51.0	49.1	46.3	40.6
53.7	51.2	48.0	45.9	42.2
60.6	57.9	54.8	54.2	51.8
68.2	64.7	60.6	59.6	55.6
59.7	55.9	52.2	49.9	45.4
55.6	52.1	48.9	45.7	41.5
51.8	47.1	42.5	37.8	33.2
56.4	52.7	48.1	43.3	38.5
57.9	53.9	50.3	46.4	42.6
53.0	49.0	45.0	40.8	35.8
48.2	45.0	42.4	45.5	35.1
42.2	40.5	38.6	38.6	31.2

40.1	37.3	32.9	29.2	24.7
50.9	46.9	42.0	37.1	32.2
61.5	58.1	56.5	53.6	49.6
59.8	56.0	53.9	50.4	47.1
60.6	56.4	52.7	48.9	44.9
61.7	56.5	53.5	50.7	47.1
62.1	57.6	54.4	50.9	46.9
57.8	53.8	50.1	46.2	41.0
51.6	48.3	44.7	40.4	38.2
48.2	45.7	43.2	40.1	39.2
47.2	43.8	41.6	38.7	38.6
47.7	43.1	41.0	37.2	37.2
48.3	44.7	42.5	39.4	38.8
51.5	48.6	45.2	42.6	40.1
51.1	48.7	46.6	43.6	40.4
54.2	52.3	49.3	46.3	44.4
55.6	53.2	51.0	48.4	45.1
56.7	54.3	52.1	50.7	47.8
55.6	52.3	49.2	48.2	44.7
57.3	55.7	53.3	52.1	49.3
56.8	55.3	53.1	51.6	48.6
43.0	40.1	36.3	33.8	30.6
61.6	57.0	53.0	48.9	44.5
61.7	57.2	53.5	49.2	45.4
60.7	56.8	53.0	48.9	45.6
61.8	58.6	54.8	52.4	49.2
61.1	57.4	53.1	49.8	46.1
58.5	54.0	50.5	46.6	42.1
52.2	49.2	45.1	40.2	34.9
51.4	47.6	44.2	39.9	35.0
51.9	48.3	44.3	40.1	35.3
51.5	48.8	46.6	45.1	43.2
55.0	57.3	46.9	45.1	43.1
67.0	68.5	67.0	67.9	64.1
66.5	68.1	66.5	67.3	63.6
53.9	54.2	52.2	52.1	48.8
53.1	51.3	47.1	45.1	41.4
59.0	56.4	54.4	53.5	49.4
60.3	59.1	57.5	55.8	52.6
57.9	56.7	54.2	51.8	48.0
56.5	54.0	51.1	47.7	43.6
56.2	52.3	48.6	44.4	39.9
60.1	55.9	52.4	48.5	44.6
56.9	52.0	48.8	45.3	41.6
57.5	53.4	49.5	46.1	41.4
62.8	59.4	57.8	56.8	49.9
62.3	58.5	54.8	51.0	46.3
62.3	58.2	55.3	51.7	48.0

60.0	55.9	52.2	48.9	46.3
60.5	56.5	52.8	49.8	46.9
60.1	56.3	52.1	48.1	43.4
60.3	56.6	54.6	52.4	47.2
52.7	49.2	45.2	42.2	37.7
47.4	45.0	41.5	39.1	34.8
44.8	42.5	39.2	36.4	33.3
42.6	40.6	37.8	35.1	31.4
46.6	44.4	41.7	38.6	34.9
49.8	46.8	44.5	41.6	38.1
49.3	47.0	44.9	41.3	37.4
54.3	52.0	49.8	46.9	44.9
59.6	57.1	55.5	53.5	50.5
58.9	56.7	54.6	53.1	50.1
56.3	53.4	51.1	48.3	46.2
54.6	52.1	49.7	46.6	44.3
47.2	42.9	39.0	35.4	32.9
41.4	39.4	36.3	34.8	31.7
44.4	40.9	37.1	35.5	33.2
53.5	49.3	45.6	41.9	37.7
63.2	59.3	55.3	50.9	46.4
59.7	55.4	51.8	48.4	44.4
59.4	56.0	52.8	49.8	46.7
59.5	56.0	52.3	49.4	46.1
58.6	54.5	51.6	48.4	44.8
58.9	55.2	52.3	49.0	45.4

1/3 LASmax 8000	1/3 LASmax 10000	1/3 LASmax 12500	1/3 LASmax 16000	1/3 LASmax 20000
37.2	33.3	27.9	23.5	16.8
28.5	24.8	20.5	16.1	11.1
28.5	24.2	23.4	18.0	11.7
35.7	30.6	24.3	18.9	12.3
41.2	36.2	29.8	24.0	16.9
40.7	36.5	31.0	24.8	17.8
41.4	36.9	31.3	25.3	18.1
39.2	34.5	29.1	24.6	18.6
39.0	34.1	30.6	23.9	18.6
39.0	34.1	29.6	23.8	18.7
30.7	25.1	19.9	14.8	10.3
34.0	30.6	26.9	23.4	15.6
31.7	26.5	23.3	19.6	12.8
32.7	24.8	17.9	14.1	9.6
30.8	25.9	19.6	14.0	9.7
38.1	33.4	28.6	22.9	15.7
36.2	31.3	26.4	20.8	14.4
44.9	39.8	35.1	29.6	24.2
45.8	44.0	41.2	33.5	28.6
45.6	43.7	38.8	33.4	28.6
41.3	38.2	34.2	29.4	22.0
40.4	37.2	32.7	29.6	22.2
37.3	34.8	29.5	24.7	17.8
35.4	32.0	27.5	23.1	17.3
22.1	18.6	14.8	11.5	9.5
52.2	47.0	42.8	39.3	32.1
48.4	43.5	39.2	35.2	28.2
43.0	37.6	32.1	26.6	19.3
39.7	34.9	29.2	23.7	17.2
41.2	35.7	30.0	23.6	16.4
34.4	27.5	25.6	13.9	10.6
34.0	28.1	18.8	13.4	10.3
28.6	24.8	17.3	11.8	9.6
33.7	31.0	23.7	18.9	12.7
36.3	30.9	25.9	21.7	14.8
38.7	34.8	29.5	24.5	17.9
48.6	45.0	37.3	33.6	26.5
51.0	47.6	42.6	37.1	29.4
41.1	36.8	31.0	25.3	18.4
37.4	33.8	29.5	25.2	18.3
29.4	24.8	19.0	14.3	10.5
33.7	29.4	23.9	18.9	13.2
38.7	34.0	28.6	23.1	16.2
31.4	26.3	20.3	14.8	10.7
28.7	38.1	16.9	18.7	10.7
24.3	29.0	13.1	12.1	9.4

20.3	16.5	12.2	9.5	9.4
27.1	21.4	15.3	10.8	9.6
45.2	42.2	39.7	37.3	31.1
42.1	37.4	34.5	31.5	25.5
40.9	36.2	31.2	26.4	19.5
42.4	38.0	32.8	27.9	25.2
42.3	37.5	31.4	26.2	19.9
36.4	31.4	25.0	19.4	13.0
36.3	29.9	24.3	21.4	15.2
37.5	31.6	26.0	21.4	15.6
36.8	30.6	24.8	18.6	12.2
37.1	30.7	25.0	18.5	12.2
37.7	30.9	26.5	19.0	12.1
37.7	31.2	26.8	19.3	12.1
38.2	32.0	26.9	19.5	12.8
40.8	38.4	34.7	28.3	21.0
42.0	38.5	34.7	30.2	22.9
42.8	40.1	35.0	29.7	23.8
39.6	35.5	30.5	26.9	21.0
47.6	43.3	38.6	35.9	28.9
46.9	42.7	37.9	35.0	27.9
28.3	24.0	19.2	15.8	11.0
40.7	36.0	30.4	25.1	18.0
41.5	38.1	33.1	28.4	21.7
41.8	37.5	32.3	27.3	20.3
43.8	37.5	34.0	28.5	20.2
40.9	35.9	31.0	29.6	17.1
38.0	33.8	28.1	23.0	16.1
30.0	34.0	19.3	14.5	10.2
30.1	30.8	18.7	12.4	9.1
30.7	25.0	18.8	12.4	9.1
37.0	32.8	28.4	21.5	13.7
36.9	32.6	28.0	29.3	24.2
61.8	57.3	53.4	50.3	44.9
61.3	56.8	52.8	49.7	43.5
45.4	39.7	34.8	31.4	24.1
37.1	32.2	25.6	19.4	13.0
45.5	42.1	37.1	36.2	23.5
49.8	44.7	39.2	33.4	26.1
43.9	39.6	34.3	29.5	23.0
40.1	36.3	31.7	26.7	19.7
35.9	31.3	27.3	19.3	12.1
40.5	36.2	30.8	26.0	19.1
38.7	33.9	26.1	19.8	13.5
36.5	31.6	28.1	22.2	16.0
45.5	41.6	36.3	31.4	24.8
42.2	37.3	32.4	27.8	21.1
43.8	39.0	34.0	28.9	22.2

41.5	35.5	29.7	23.8	16.3
42.2	36.7	30.8	25.0	17.5
39.7	36.0	30.2	24.6	17.4
42.6	39.7	34.9	29.7	23.1
33.1	31.3	22.2	17.4	12.1
30.3	26.5	20.1	17.4	11.1
29.6	24.7	20.3	15.3	10.6
27.8	24.1	19.2	15.0	10.9
30.7	26.0	20.7	16.1	11.0
34.4	28.8	24.3	19.1	18.2
33.8	29.3	24.6	17.8	40.0
42.7	38.9	35.2	30.2	45.9
47.1	44.3	40.5	35.2	39.0
46.6	42.9	39.5	34.8	29.1
43.8	40.2	34.1	29.4	22.0
42.0	38.1	31.5	25.9	18.3
29.0	23.9	18.2	13.7	10.9
27.2	22.0	16.9	11.6	25.3
28.4	22.7	18.1	12.9	14.7
33.8	27.4	23.3	17.2	12.1
42.3	37.1	31.2	25.8	19.7
40.1	35.5	29.2	23.4	17.5
42.7	38.2	32.4	26.2	19.2
41.1	35.9	30.5	24.7	17.7
41.2	36.9	29.7	24.9	17.7
41.8	37.5	32.4	28.0	20.6

1/3 LASmin 6.3	1/3 LASmin 8.0	1/3 LASmin 10.0	1/3 LASmin 12.5	1/3 LASmin 16.0
1.9	0.9	0.4	7.0	11.4
1.9	0.9	0.3	4.4	7.7
1.9	0.9	0.3	3.9	5.7
1.9	0.9	0.3	4.9	10.7
1.9	0.9	0.3	4.4	10.8
1.9	0.9	1.5	5.5	11.0
1.9	0.9	2.1	5.6	13.7
1.9	0.9	0.9	7.0	10.3
1.9	0.9	0.3	4.1	7.9
1.9	0.9	0.3	4.0	10.5
1.9	0.9	0.3	-0.8	2.3
1.9	0.9	0.3	-0.8	-0.8
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	0.2
1.9	0.9	0.3	-0.8	-1.0
1.9	0.9	0.3	-0.8	0.3
1.9	0.9	0.3	-0.8	1.0
1.9	0.9	0.3	-0.8	0.1
1.9	0.9	0.3	-0.8	0.5
1.9	0.9	0.3	-0.8	4.7
1.9	0.9	0.3	-0.8	-0.4
1.9	0.9	0.3	-0.8	3.4
1.9	0.9	0.3	0.6	2.6
1.9	0.9	0.3	-0.8	-1.0
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	0.4
1.9	0.9	0.3	-0.8	-0.1
1.9	0.9	0.3	-0.8	-1.4
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-0.7
1.9	0.9	0.3	-0.8	1.5
1.9	0.9	0.3	4.8	6.6
1.9	0.9	0.3	-0.8	6.4
1.9	0.9	0.3	-0.8	4.8
1.9	0.9	0.3	-0.8	2.9
1.9	0.9	0.3	-0.8	1.1
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-0.3
1.9	0.9	0.3	-0.8	-1.1
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-0.9
1.9	0.9	0.3	-0.8	-1.6

1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	1.7
1.9	0.9	0.3	0.3	4.9
1.9	0.9	0.3	0.4	5.1
1.9	0.9	0.3	0.7	5.4
1.9	0.9	0.3	0.5	4.9
1.9	0.9	0.3	2.3	7.8
1.9	0.9	0.3	0.5	4.9
1.9	0.9	0.3	2.9	6.0
1.9	0.9	0.3	1.1	6.2
1.9	0.9	0.3	2.6	10.6
1.9	0.9	0.3	0.6	6.3
1.9	0.9	0.3	3.8	8.8
1.9	0.9	0.3	4.6	9.1
1.9	0.9	0.3	1.6	6.7
1.9	0.9	1.1	7.3	9.8
1.9	0.9	0.3	5.7	8.6
1.9	0.9	0.3	4.3	7.7
1.9	0.9	0.5	5.9	11.6
1.9	0.9	0.3	5.9	7.1
1.9	0.9	0.3	5.6	9.5
1.9	0.9	0.3	7.0	12.7
1.9	0.9	0.3	0.8	5.4
1.9	0.9	0.3	6.0	13.5
1.9	0.9	2.0	5.4	10.9
1.9	0.9	0.3	4.9	10.0
1.9	0.9	0.3	-0.8	3.8
1.9	0.9	0.3	-0.8	3.3
1.9	0.9	0.3	4.1	9.2
1.9	0.9	0.3	2.1	5.2
1.9	0.9	0.3	-0.8	0.8
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	0.7	4.4
1.9	0.9	0.3	1.9	9.6
1.9	0.9	1.5	4.7	9.9
1.9	0.9	0.3	-0.8	1.7
1.9	0.9	0.3	-0.8	4.9
1.9	0.9	0.3	-0.8	1.0
1.9	0.9	0.3	-0.8	0.7
1.9	0.9	0.3	-0.8	0.0
1.9	0.9	0.3	-0.8	2.3
1.9	0.9	0.3	-0.8	0.0
1.9	0.9	0.3	-0.8	2.0
1.9	0.9	0.3	-0.8	4.8
1.9	0.9	0.3	-0.8	2.7

1.9	0.9	0.3	-0.8	1.0
1.9	0.9	0.3	-0.8	3.3
1.9	0.9	0.3	-0.8	5.0
1.9	0.9	0.3	-0.8	5.3
1.9	0.9	0.3	-0.3	4.2
1.9	0.9	0.3	-0.8	-0.3
1.9	0.9	0.3	-0.8	1.7
1.9	0.9	0.3	-0.8	1.7
1.9	0.9	0.3	3.2	10.0
1.9	0.9	0.3	-0.8	3.6
1.9	0.9	0.3	-0.8	1.7
1.9	0.9	0.3	-0.8	0.9
1.9	0.9	0.3	0.3	6.8
1.9	0.9	0.3	1.1	5.0
1.9	0.9	0.3	-0.8	3.5
1.9	0.9	0.3	-0.8	2.6
1.9	0.9	0.3	1.6	5.2
1.9	0.9	0.3	-0.8	1.7
1.9	0.9	0.3	-0.8	1.4
1.9	0.9	0.3	-0.8	0.4
1.9	0.9	0.3	-0.8	-0.5
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	3.6
1.9	0.9	0.3	-0.8	1.9
1.9	0.9	0.3	-0.8	1.7

1/3 LASmin 20.0	1/3 LASmin 25.0	1/3 LASmin 31.5	1/3 LASmin 40.0	1/3 LASmin 50.0
14.6	19.7	24.9	26.0	29.6
10.4	18.6	18.0	23.4	28.2
11.8	18.4	20.4	22.7	28.4
11.2	16.7	19.9	21.9	26.8
11.6	15.6	19.2	23.5	31.5
17.9	20.7	26.8	28.7	32.8
18.3	21.2	25.7	30.3	34.1
14.0	20.0	22.3	30.0	34.4
14.6	21.9	26.0	30.7	33.8
13.2	20.2	25.7	30.1	35.6
8.5	18.2	21.2	25.1	33.6
7.2	16.2	22.2	26.4	32.0
7.6	16.8	22.8	28.5	30.2
7.4	16.6	25.4	26.7	29.2
9.0	17.6	24.6	25.6	30.4
7.9	17.0	25.2	26.3	34.1
7.8	17.4	27.1	32.3	38.9
4.3	16.4	29.2	35.3	35.6
6.2	20.3	25.0	36.1	37.4
8.7	17.0	22.6	36.5	36.2
6.8	14.5	21.4	30.3	33.1
7.1	13.0	22.1	27.8	34.2
8.1	13.9	22.1	28.9	32.7
5.1	12.3	19.7	24.5	32.8
6.0	11.5	18.7	24.1	31.6
7.5	12.1	18.6	26.8	31.9
8.6	15.2	23.8	30.0	39.2
8.9	16.0	22.8	33.0	37.7
10.1	15.8	22.2	33.3	36.1
7.4	14.6	22.3	31.7	36.3
7.9	11.5	21.3	30.4	34.2
6.7	11.8	21.4	27.6	35.2
7.8	12.9	21.0	35.5	32.5
7.0	12.5	24.5	31.7	35.3
7.5	13.5	26.0	33.6	34.6
15.8	20.2	29.2	34.1	37.4
9.8	20.0	27.0	33.2	39.6
14.1	21.0	25.8	33.4	47.1
10.4	19.9	24.1	39.7	41.4
10.2	19.5	22.6	34.3	39.1
6.6	15.8	19.3	31.3	34.4
8.0	15.3	19.8	25.7	32.0
7.9	13.8	18.9	23.3	30.4
7.8	14.2	18.0	26.5	29.4
8.5	11.7	17.5	24.7	28.5
6.9	14.0	15.9	21.7	29.6

6.5	14.8	19.3	23.1	29.2
9.4	16.6	20.2	22.7	28.3
11.4	20.7	21.2	23.8	30.2
12.4	19.9	20.8	30.7	31.8
11.5	20.2	22.1	30.8	32.6
13.3	20.5	27.7	32.5	32.5
14.5	19.8	23.0	27.5	32.3
12.6	20.5	20.1	25.6	31.4
13.4	23.0	22.0	27.4	31.1
13.0	26.7	31.4	31.6	37.2
13.7	27.6	34.5	32.1	38.6
11.2	27.7	34.3	30.0	38.0
14.7	27.3	34.1	29.9	36.9
14.7	28.0	32.4	28.4	36.9
17.8	28.5	33.1	28.1	37.4
17.8	25.0	31.1	31.0	40.9
16.7	21.8	27.4	34.1	38.3
14.7	20.8	24.9	31.6	35.4
17.0	22.1	25.8	30.8	35.1
13.2	19.3	22.2	30.8	30.9
13.9	20.7	24.1	28.7	31.1
15.9	22.0	24.6	27.3	28.4
12.2	17.9	24.4	24.7	27.8
17.3	23.2	25.7	29.3	35.1
16.5	23.7	25.4	29.6	37.4
17.2	23.4	26.7	32.3	32.8
12.4	23.1	24.9	29.2	32.1
13.1	21.4	25.9	28.6	32.8
12.2	21.7	21.6	23.6	31.2
12.3	23.6	21.1	23.2	29.8
9.9	19.5	21.0	26.9	30.3
6.6	18.0	21.6	26.8	28.5
6.0	18.2	20.1	25.4	30.0
8.7	17.4	21.4	27.2	32.3
10.5	19.2	22.0	28.2	32.3
13.7	21.2	23.9	27.2	33.4
17.0	22.7	24.7	29.4	35.0
14.9	23.2	25.3	32.3	37.4
9.8	17.2	23.7	30.9	37.0
10.9	17.1	26.4	31.5	43.1
6.5	16.7	25.0	33.7	38.9
7.0	16.3	24.2	32.2	35.2
5.5	17.0	24.5	28.9	35.8
10.1	15.6	21.9	26.4	34.7
7.1	16.8	21.0	25.8	32.5
9.3	15.6	21.4	26.6	32.8
10.2	16.1	21.7	26.7	33.7
9.9	15.7	22.8	26.6	33.1

8.1	17.3	19.7	25.5	32.3
10.1	18.1	22.5	28.6	34.5
10.1	17.2	23.0	29.0	30.2
11.0	19.6	25.4	30.2	32.1
9.8	18.5	23.2	27.5	30.3
9.2	16.1	26.3	26.6	29.1
10.4	20.4	27.3	23.7	28.5
12.3	22.0	26.6	24.3	29.5
17.6	23.3	25.4	31.4	31.7
12.5	23.4	26.6	32.1	31.9
11.6	22.9	26.1	32.6	32.5
15.1	22.6	27.7	32.1	36.4
15.5	21.0	26.9	32.1	41.0
11.1	18.4	24.0	28.7	33.4
8.0	15.7	21.8	27.0	31.5
11.0	16.1	22.5	27.1	30.9
11.3	15.2	23.6	26.4	29.8
8.1	16.7	22.0	26.7	28.4
7.2	17.8	20.0	23.2	28.9
5.7	16.2	17.0	21.6	26.1
4.5	17.5	19.2	22.1	25.8
5.6	17.2	18.8	23.8	29.6
5.4	19.0	20.3	24.8	32.3
9.5	18.0	21.7	27.9	34.1
8.8	17.2	19.3	27.0	31.5
9.2	15.1	18.5	24.8	30.2

1/3 LASmin 63.0	1/3 LASmin 80.0	1/3 LASmin 100	1/3 LASmin 125	1/3 LASmin 160
36.0	38.8	41.5	44.2	44.5
33.3	33.0	39.3	40.2	40.2
30.7	33.5	38.1	40.3	38.0
30.0	32.7	36.3	39.9	40.4
31.9	35.5	41.3	44.9	44.9
35.4	37.5	40.5	42.9	43.8
35.7	40.6	41.9	58.7	48.0
35.7	39.4	43.2	47.7	45.5
37.1	41.6	43.2	43.6	48.4
38.6	39.7	41.4	42.9	46.3
36.2	36.5	41.9	41.9	43.6
34.7	36.8	39.6	41.7	43.6
33.9	36.4	44.1	42.2	39.8
33.9	37.2	45.0	41.6	39.4
34.8	34.1	43.1	43.6	40.6
36.5	37.8	46.3	50.9	47.3
40.4	43.7	50.4	60.9	64.2
38.5	41.6	49.2	58.3	52.2
43.9	46.9	52.2	63.4	54.7
39.8	40.8	60.4	62.7	54.7
36.9	37.4	49.2	53.9	51.9
37.2	37.4	47.8	53.0	51.9
37.8	37.3	49.8	57.3	53.3
32.4	35.3	38.7	43.0	43.5
34.2	35.6	37.7	40.2	41.9
39.7	35.7	38.0	40.0	39.1
40.8	41.2	47.6	44.8	51.2
38.3	41.8	45.7	47.7	49.6
38.1	39.6	42.1	44.5	47.3
36.7	36.8	38.2	43.4	42.9
35.2	36.2	39.8	41.5	44.1
34.3	37.2	38.1	40.4	42.7
34.2	37.5	39.9	40.9	40.9
36.9	37.0	40.2	50.3	42.9
39.5	43.2	45.5	51.1	49.2
37.8	44.8	45.5	50.9	53.5
43.0	51.7	56.4	61.3	64.9
45.3	55.4	59.4	57.9	62.1
43.8	45.5	47.5	60.2	50.5
37.1	37.1	47.9	47.7	45.0
35.6	38.5	41.1	45.5	45.9
31.0	34.3	38.6	42.6	42.9
31.6	37.2	41.3	41.3	44.3
30.0	33.1	38.9	48.1	42.7
28.7	33.6	39.5	46.6	41.5
27.6	31.0	36.2	39.8	37.8

27.8	31.6	36.2	40.0	37.1
30.1	33.6	37.3	38.3	38.8
32.3	33.6	38.4	43.5	42.4
32.7	37.6	40.8	43.0	46.7
42.5	40.1	41.2	43.3	45.6
36.9	38.8	41.0	42.7	45.3
35.4	38.5	42.0	46.0	47.3
33.1	39.1	43.0	46.1	45.7
36.5	39.0	41.0	43.0	44.6
40.3	38.1	41.6	44.5	43.7
38.8	39.3	42.3	44.4	43.0
39.4	39.0	41.3	45.0	42.3
37.5	38.1	40.6	44.7	39.8
38.8	40.3	46.6	49.0	47.8
39.7	42.7	45.3	54.0	53.6
42.5	42.4	45.9	51.4	50.7
42.8	45.5	51.1	49.9	50.4
39.6	40.2	48.9	52.9	47.3
34.9	39.4	48.9	46.5	45.5
34.1	37.8	43.1	45.4	45.6
31.0	36.8	39.1	45.5	43.3
31.1	33.0	37.2	40.6	37.9
30.4	31.9	38.8	44.0	37.5
34.5	37.3	39.6	43.9	46.0
35.2	38.3	40.9	44.4	45.7
37.1	38.8	42.4	52.2	49.5
36.6	40.0	40.5	46.1	46.7
31.6	36.7	39.5	44.3	45.6
29.8	33.6	38.9	44.6	43.0
31.1	34.1	38.1	46.4	43.0
33.5	34.0	38.8	46.9	41.8
33.4	37.7	39.9	43.9	42.3
33.8	37.4	39.9	44.0	44.0
34.3	39.2	40.3	45.7	44.3
35.1	39.6	41.5	43.1	42.0
34.8	38.0	42.1	44.5	42.5
36.6	41.7	43.8	47.1	48.1
44.6	42.0	46.0	49.0	51.2
42.9	43.0	51.5	51.4	53.2
46.4	42.1	53.0	53.9	54.6
41.6	42.8	45.2	49.6	51.4
35.0	37.0	40.0	42.5	45.1
33.1	37.2	41.7	44.2	45.8
33.7	36.3	41.2	43.3	45.0
36.2	37.9	39.1	43.0	47.0
35.3	38.5	41.6	45.0	47.2
37.9	43.0	49.6	48.6	50.7
38.3	41.1	47.0	47.8	49.1

37.8	43.7	44.3	47.8	48.2
40.5	42.2	45.6	47.4	45.7
35.5	40.9	42.7	47.2	45.9
35.9	39.7	41.5	46.2	48.2
36.0	41.0	43.3	45.3	47.1
35.6	40.6	42.1	46.4	43.3
33.0	39.2	42.6	43.3	41.5
35.4	36.6	37.6	44.5	40.3
36.4	36.6	40.0	45.5	41.4
35.9	39.5	43.3	44.9	44.3
39.2	41.5	46.8	49.5	48.1
40.2	42.1	46.2	48.3	47.5
47.3	51.1	57.6	59.5	56.9
41.4	48.4	49.7	54.2	51.8
39.6	40.3	47.7	47.9	47.9
36.9	37.5	42.2	43.3	42.1
30.5	37.7	41.3	41.3	38.7
30.7	34.5	44.8	40.5	39.1
33.5	37.3	45.1	46.4	49.2
29.6	35.4	39.0	44.4	48.0
31.4	36.2	38.3	42.3	46.4
29.8	36.7	42.8	41.8	45.2
31.7	36.6	51.2	41.9	45.6
35.0	44.3	40.8	43.4	46.6
36.0	36.5	39.4	41.9	45.0
32.5	36.3	39.1	42.8	46.0

1/3 LASmin 200	1/3 LASmin 250	1/3 LASmin 315	1/3 LASmin 400	1/3 LASmin 500
47.8	47.3	46.8	48.1	50.6
40.9	39.7	40.2	41.8	43.5
40.0	37.5	38.9	38.9	41.3
39.8	38.8	40.3	39.2	42.0
49.3	52.2	51.6	53.0	56.7
48.6	52.6	51.4	51.5	55.3
51.6	53.3	53.7	54.8	57.1
49.0	51.9	52.9	53.6	57.2
49.8	51.3	50.6	52.1	55.6
51.8	46.8	48.3	51.5	53.4
46.7	46.4	46.7	48.1	50.1
45.5	45.6	45.1	46.0	48.0
42.8	40.6	39.8	42.3	43.2
43.1	38.8	38.2	41.3	41.7
43.2	39.5	40.0	41.5	42.6
48.8	47.9	45.8	47.7	51.0
56.5	55.4	56.4	52.4	53.9
50.4	53.9	51.1	49.9	52.8
54.9	60.2	54.4	57.5	61.2
55.4	56.3	58.0	56.7	55.7
51.0	54.5	52.2	50.9	52.7
52.2	55.1	51.9	50.6	53.0
49.3	54.6	50.6	49.5	51.0
45.9	45.1	44.7	43.9	45.9
43.5	44.3	44.0	43.1	44.2
46.0	44.6	44.9	43.5	47.7
53.7	60.4	59.8	60.5	61.2
50.6	52.5	53.4	54.0	57.8
48.8	51.1	53.4	54.8	59.3
44.1	48.1	49.1	50.2	54.9
44.8	47.1	47.4	49.4	51.7
44.1	45.4	46.4	47.8	49.4
44.3	45.8	46.1	47.5	49.8
46.1	47.5	47.7	48.1	50.7
51.6	51.9	51.3	50.3	52.2
52.4	50.7	50.4	49.8	50.9
62.5	56.2	58.0	54.5	60.6
66.3	64.7	65.4	64.4	64.3
52.4	61.4	59.2	58.6	61.2
48.6	49.5	48.3	48.9	50.9
45.4	47.2	47.2	48.4	49.0
45.2	45.2	45.7	48.2	51.5
46.0	45.6	46.2	47.1	50.7
44.8	43.9	42.4	44.6	46.6
44.3	44.0	42.9	44.5	46.8
38.4	38.0	37.6	39.4	40.9

39.3	38.9	37.7	39.3	41.2
40.4	40.4	40.0	40.2	42.7
42.7	44.0	45.3	45.9	48.7
50.5	51.1	52.5	54.6	58.4
47.5	50.7	52.5	53.5	57.0
47.7	50.7	52.0	52.9	57.3
49.5	51.7	52.2	53.5	55.6
47.9	49.7	50.1	49.4	53.0
46.3	48.0	48.0	47.4	51.2
44.0	47.5	46.6	46.5	50.0
42.3	46.5	45.6	45.3	48.5
42.3	46.1	45.6	45.0	49.5
42.2	46.9	46.0	45.7	49.1
50.5	49.4	47.8	47.1	52.5
54.6	50.7	50.2	50.9	54.3
49.9	51.4	51.0	51.4	54.6
56.1	54.9	55.7	54.0	57.3
54.7	53.6	54.4	54.0	56.6
50.5	51.8	52.1	53.0	56.0
47.5	50.8	51.6	52.7	55.3
46.5	47.8	45.3	45.3	47.5
42.2	41.2	41.2	40.8	43.8
42.7	40.8	40.8	40.4	43.5
49.0	51.0	51.7	54.1	57.9
49.5	52.2	51.9	55.4	58.2
51.1	55.1	53.9	55.5	57.1
50.1	52.9	52.2	53.1	56.5
47.9	46.2	48.6	48.1	51.5
44.8	43.1	44.1	45.3	47.3
43.0	42.4	43.9	45.9	46.9
41.6	42.9	43.6	46.4	46.2
41.5	43.8	44.3	46.4	46.3
45.2	47.3	46.6	47.8	46.6
45.5	46.8	47.3	48.0	46.7
46.6	46.9	49.8	48.9	49.3
46.4	46.9	49.1	50.1	49.3
48.5	48.5	50.3	51.5	52.2
53.5	48.8	49.1	51.7	53.4
54.4	53.7	54.7	53.7	56.7
55.9	56.9	55.9	55.1	57.2
51.0	52.4	52.1	52.0	54.5
46.4	48.4	49.2	49.1	51.4
47.2	50.4	51.3	51.7	54.6
45.1	46.5	46.1	47.1	49.7
47.9	51.1	49.4	50.1	53.2
53.9	53.4	55.7	59.1	59.8
51.7	53.9	55.2	54.5	57.5
52.1	52.4	52.3	53.5	55.2

48.5	50.3	51.1	51.7	52.6
48.8	50.6	52.5	54.1	56.7
48.0	51.0	50.8	50.8	54.6
50.6	53.8	52.6	52.0	56.7
46.6	45.6	46.1	45.5	49.3
44.6	45.4	46.0	45.0	47.3
40.7	42.3	42.0	45.8	45.1
39.9	41.3	40.6	45.9	44.2
40.5	41.9	41.2	47.2	44.5
46.2	44.3	44.7	49.3	48.9
51.8	52.4	50.7	51.8	53.1
48.9	52.1	49.4	50.6	51.4
54.3	58.5	58.5	56.6	55.9
53.2	52.9	54.2	55.4	58.8
50.9	50.4	52.1	53.1	55.3
48.0	45.8	45.4	45.0	46.6
44.4	42.9	41.9	41.9	42.0
44.5	42.9	41.8	41.3	41.9
60.4	55.6	55.1	56.5	51.0
50.6	46.7	45.2	47.5	48.8
49.2	48.0	45.8	47.5	50.6
45.3	47.5	48.3	51.2	55.0
47.7	50.1	49.1	51.9	55.4
49.6	51.1	49.9	50.2	56.0
47.5	48.2	49.2	51.9	56.7
46.6	47.8	46.6	48.7	55.3

1/3 LASmin 630	1/3 LASmin 800	1/3 LASmin 1000	1/3 LASmin 1250	1/3 LASmin 1600
52.1	53.1	54.7	54.0	51.1
45.7	47.3	49.0	47.5	44.7
43.1	44.8	46.9	45.2	43.3
43.7	45.8	47.8	45.9	44.1
58.8	62.3	64.6	62.6	62.3
58.0	61.9	64.6	63.8	62.7
59.4	62.4	64.3	63.3	62.5
59.2	61.7	63.6	63.1	62.2
58.3	62.0	62.9	61.3	59.6
56.2	58.7	59.8	57.9	56.7
52.3	54.5	54.9	53.5	51.0
50.8	52.2	52.3	51.7	49.7
45.7	46.4	46.6	45.8	44.1
42.9	45.1	45.9	45.1	43.5
43.5	46.0	47.0	45.9	44.2
51.4	52.7	52.3	53.9	51.7
54.9	58.0	58.5	56.7	54.9
53.8	55.9	56.6	55.0	53.9
59.9	59.2	58.5	57.2	57.8
58.6	59.6	60.8	60.4	58.4
54.4	56.5	58.7	58.1	55.9
54.2	56.8	58.3	58.0	55.9
52.3	56.1	57.4	56.1	54.1
46.5	51.7	52.8	51.2	48.7
43.1	47.4	48.4	48.5	45.9
44.6	47.4	48.9	49.3	48.6
61.0	63.7	66.2	67.3	65.6
61.5	63.9	65.7	66.8	64.4
61.4	64.0	66.1	64.8	63.0
55.9	60.2	61.3	60.4	59.3
53.7	57.5	58.7	57.4	56.7
51.8	54.4	55.5	53.7	52.6
51.8	53.4	55.1	53.5	52.7
52.8	55.1	56.6	54.8	53.6
55.0	56.3	57.9	57.4	55.5
52.7	54.8	56.3	54.6	53.1
58.5	59.7	58.8	57.4	55.7
62.6	64.1	66.3	63.4	62.0
59.9	60.4	63.2	61.9	60.0
52.7	55.6	58.3	58.5	56.7
52.1	55.2	57.8	56.6	56.2
53.5	54.7	56.0	56.0	54.8
53.4	55.6	57.9	56.7	57.0
48.6	51.6	55.4	55.3	53.2
48.7	51.7	51.9	50.7	49.0
42.9	45.7	47.6	45.9	44.0

43.3	44.9	47.4	45.5	43.9
44.8	46.7	51.1	49.0	47.2
51.7	54.6	57.6	57.7	58.0
60.8	63.5	64.9	64.4	63.9
60.5	64.3	65.7	64.6	63.4
60.4	63.9	65.6	64.7	63.5
59.5	62.4	64.7	64.0	63.1
55.4	56.0	58.1	57.3	57.8
51.9	53.2	54.8	53.9	52.9
50.5	51.0	51.7	50.3	49.5
48.6	49.5	49.9	48.6	47.6
48.7	48.8	49.5	48.2	47.4
48.6	49.1	49.5	48.3	47.4
50.6	50.8	52.3	50.8	50.4
52.9	54.0	54.8	53.8	52.8
55.4	57.7	56.4	54.8	53.6
58.3	58.9	60.1	57.9	56.8
58.3	60.4	61.9	60.9	59.5
57.5	59.9	61.0	60.0	58.9
57.7	60.3	62.3	60.6	59.1
49.9	52.2	52.5	51.4	48.5
45.7	48.1	49.2	48.6	46.0
45.5	48.4	49.9	50.1	47.5
60.6	62.4	66.2	65.5	64.1
60.8	63.1	66.3	65.4	64.5
61.7	65.0	67.9	66.8	65.5
59.1	61.7	65.4	63.9	62.1
56.5	58.7	61.4	60.0	57.5
49.4	52.8	55.1	53.7	50.8
49.0	51.8	53.0	53.0	51.3
49.4	52.1	53.4	53.6	52.6
49.4	51.8	53.0	52.6	51.0
47.8	51.0	51.6	51.2	50.2
47.8	50.3	51.1	51.8	50.6
50.2	52.2	52.8	56.1	61.4
51.3	53.5	53.1	54.7	57.2
53.9	55.7	56.4	55.4	55.0
54.8	56.8	57.8	55.5	54.6
57.9	59.8	61.1	61.0	61.1
58.8	60.9	62.3	61.2	60.5
57.5	60.3	61.0	59.8	58.1
55.6	57.8	59.4	58.3	56.9
58.2	61.6	63.5	62.3	61.3
52.4	56.1	58.0	57.1	55.2
56.2	58.9	61.4	60.9	59.7
63.0	64.7	65.8	64.6	61.7
59.8	61.8	62.2	61.5	59.1
58.4	62.2	64.3	62.6	61.2

56.6	60.1	62.5	61.0	59.8
59.0	63.2	65.3	63.5	62.0
57.0	59.7	61.5	61.0	59.7
58.4	59.5	60.1	58.2	57.1
51.3	52.9	54.6	52.6	50.3
48.9	50.8	51.2	49.9	48.3
45.8	47.6	49.7	48.7	47.1
45.4	47.3	49.2	48.3	46.0
45.6	47.2	49.4	47.9	45.9
49.6	51.6	52.7	51.3	50.0
55.8	57.5	57.6	54.4	51.9
53.2	55.3	57.1	54.6	53.4
55.8	57.5	58.5	56.0	56.0
59.3	61.3	62.2	61.4	59.9
56.7	59.0	60.6	59.9	58.6
49.3	52.7	55.2	54.5	52.1
44.0	46.9	48.5	47.6	45.3
43.4	45.9	46.7	45.8	43.2
50.5	52.6	50.5	49.3	44.5
51.9	54.0	50.8	49.6	46.9
54.3	56.6	59.5	59.6	59.3
57.1	60.5	64.8	62.5	61.0
56.9	60.8	64.1	62.1	60.6
59.9	61.5	65.5	64.4	61.6
61.5	62.4	63.1	63.2	60.8
60.8	59.2	62.0	61.7	60.4

1/3 LASmin 2000	1/3 LASmin 2500	1/3 LASmin 3150	1/3 LASmin 4000	1/3 LASmin 5000
47.3	44.6	42.8	39.3	37.6
41.2	37.3	33.8	30.5	27.6
40.0	36.8	33.8	30.4	27.4
41.7	37.0	33.7	30.5	27.0
60.7	57.2	52.8	48.4	44.5
60.9	57.4	53.1	48.8	44.7
60.3	56.7	52.9	49.0	45.0
59.2	55.6	52.0	48.2	44.4
56.9	54.1	51.1	47.9	44.0
54.0	51.0	47.3	43.7	40.1
48.7	45.9	43.9	40.9	37.1
48.0	45.3	43.1	40.7	37.0
42.9	41.2	37.6	34.0	31.0
42.5	40.9	37.4	33.9	31.3
42.6	41.4	38.1	34.1	31.3
50.7	50.0	46.0	43.2	41.1
52.6	50.8	48.0	44.7	42.2
52.0	49.7	46.5	43.6	40.7
56.6	55.0	52.5	49.9	48.3
56.4	54.1	51.6	49.2	46.4
53.3	50.8	48.1	44.8	41.1
54.0	51.4	48.8	45.1	42.2
52.6	50.4	47.4	44.4	41.0
47.1	43.2	39.2	35.0	31.2
42.5	38.8	34.3	30.1	25.9
43.7	41.9	36.7	32.5	29.0
63.3	60.0	56.0	52.8	48.5
62.1	58.7	54.4	50.6	46.5
60.2	57.2	54.5	49.5	45.8
56.5	52.9	49.0	44.4	40.8
52.9	49.5	45.9	42.8	39.5
49.5	46.0	42.0	38.7	35.0
49.5	45.9	42.1	38.7	35.2
50.8	47.7	43.7	40.4	37.5
52.2	49.7	45.4	42.1	39.0
50.3	49.0	46.7	42.8	39.9
54.3	53.6	51.2	48.0	45.8
61.2	59.8	55.9	52.3	49.9
58.4	55.6	52.1	48.9	45.3
53.6	49.8	45.5	41.7	37.8
52.7	48.8	44.3	39.4	34.7
51.2	46.7	42.5	38.3	33.9
55.9	51.5	47.5	43.2	38.8
49.3	43.6	39.1	34.9	30.6
45.3	42.2	39.2	35.4	31.6
40.8	36.7	33.3	30.0	26.6

40.6	36.6	32.8	28.6	25.4
43.9	40.1	37.3	32.9	29.2
54.5	50.9	46.9	42.1	37.2
61.2	57.9	54.4	51.9	48.0
61.1	57.3	53.4	49.6	45.6
61.2	57.2	53.4	49.7	45.3
60.7	56.7	53.0	48.8	44.4
55.5	51.6	48.3	44.7	40.4
50.1	48.0	44.8	41.1	38.1
48.6	46.6	43.8	40.8	38.2
46.7	44.3	41.3	38.1	36.5
46.2	43.9	40.6	37.8	36.0
45.1	44.8	41.6	39.7	36.8
49.3	48.2	44.7	42.4	39.3
50.8	49.9	47.3	44.6	41.8
51.0	49.5	46.0	43.2	40.4
54.8	53.4	51.5	48.8	46.2
57.8	55.4	52.1	49.1	48.2
56.1	53.5	50.2	46.9	44.8
56.5	53.8	50.8	47.8	44.6
46.2	43.0	40.1	36.3	33.8
43.2	38.9	35.4	31.6	28.4
44.1	39.1	35.2	31.7	28.7
61.8	57.8	53.7	49.9	45.6
62.3	58.8	54.4	50.7	46.7
63.0	59.4	55.6	52.0	47.8
60.0	57.0	52.7	49.0	44.4
55.0	52.2	49.2	45.1	40.2
47.7	44.7	41.2	37.4	33.0
48.2	44.8	41.1	36.8	33.0
49.2	44.8	41.3	37.3	33.5
48.8	45.3	41.6	38.3	34.3
48.5	46.9	44.5	42.5	39.0
48.9	51.3	52.4	44.9	41.1
54.9	53.8	54.2	52.2	51.8
52.1	51.5	49.9	46.5	44.4
52.8	50.7	48.7	45.3	42.0
52.7	51.3	48.7	46.0	42.1
59.5	57.7	56.2	54.0	51.8
58.7	56.1	53.4	50.9	47.5
55.3	52.1	49.4	46.2	42.4
53.7	50.0	46.6	43.1	39.0
59.3	55.7	52.0	48.6	44.3
51.9	48.1	44.7	41.2	37.4
57.8	54.5	50.0	46.1	41.6
58.9	56.2	52.8	49.2	45.3
56.7	53.3	50.0	45.8	41.6
59.1	55.3	50.9	47.3	43.3

57.4	53.2	48.7	44.5	40.3
58.8	55.4	51.6	48.2	44.4
56.9	53.2	49.6	45.5	41.0
55.4	52.4	48.6	45.2	42.2
48.9	46.9	44.0	40.0	36.5
46.2	44.8	42.5	39.1	36.4
44.7	42.1	40.4	37.4	34.4
43.9	41.4	39.9	37.0	34.5
44.1	42.0	40.0	37.1	34.9
48.0	46.7	44.4	41.7	38.6
50.2	48.3	45.8	43.1	40.0
51.2	47.4	44.7	40.7	37.9
55.7	54.3	52.0	49.8	47.0
58.4	55.9	53.3	50.7	48.1
56.9	54.6	52.1	49.7	46.7
50.2	46.4	42.9	39.0	35.5
42.2	38.3	34.7	31.5	28.1
39.9	36.6	33.2	30.3	27.2
41.9	41.5	39.3	35.7	32.5
44.1	42.3	38.6	34.2	30.3
58.0	53.5	49.3	45.6	41.9
58.6	54.7	51.0	47.3	43.5
58.0	54.7	51.1	47.8	44.0
58.8	55.4	51.6	47.8	44.0
56.9	54.1	50.8	47.5	43.9
56.2	53.4	49.7	46.2	42.3

1/3 LASmin 6300	1/3 LASmin 8000	1/3 LASmin 10000	1/3 LASmin 12500	1/3 LASmin 16000
32.6	28.6	24.8	20.5	16.1
24.0	20.2	17.2	13.6	10.5
24.1	20.7	17.6	13.9	10.7
22.9	19.5	16.7	13.6	10.7
39.8	35.7	30.6	24.3	18.9
40.1	35.5	30.4	24.1	17.9
41.0	36.4	31.2	25.6	19.7
39.9	35.4	31.0	25.9	19.9
40.0	36.1	30.4	24.8	18.8
35.5	30.7	25.2	19.1	13.9
32.7	27.6	22.2	16.7	11.9
32.7	29.1	24.4	19.9	14.8
27.6	23.7	19.6	15.4	12.1
27.5	23.2	18.8	14.9	11.3
27.5	23.2	18.9	14.9	11.4
35.8	30.9	25.8	19.6	14.0
38.1	34.7	29.3	25.1	20.2
36.5	33.7	28.5	24.3	20.0
45.2	43.0	38.4	34.1	28.9
43.8	40.9	38.0	32.6	27.4
37.4	34.3	31.3	27.3	24.3
38.9	35.6	32.6	28.2	24.6
37.0	33.2	29.6	24.0	18.8
26.6	22.1	18.7	14.8	11.5
21.0	16.8	14.2	11.7	9.5
23.9	18.5	14.8	11.7	9.4
43.8	39.0	33.5	27.8	22.5
41.8	37.8	32.0	24.9	19.0
41.3	37.2	32.1	25.5	18.8
35.5	30.2	24.5	18.8	12.4
34.4	30.0	24.3	18.6	12.3
30.5	26.1	19.4	14.2	10.4
30.6	25.9	19.4	14.1	10.1
33.3	28.7	24.8	17.3	11.9
34.9	30.9	26.6	21.5	17.5
35.8	31.3	26.5	21.1	16.2
42.1	38.6	34.6	29.4	24.4
45.4	41.1	36.8	31.0	25.3
40.6	36.6	32.3	26.9	20.8
33.2	29.4	24.8	19.0	14.3
29.2	24.2	18.9	13.4	10.1
29.1	23.5	18.2	13.3	9.9
33.7	28.9	24.2	18.5	13.6
24.9	20.1	16.0	12.1	9.6
25.5	20.2	16.2	12.1	9.5
21.7	17.2	14.9	11.1	9.1

20.8	16.6	14.0	11.0	9.1
24.8	20.3	16.5	12.2	9.5
32.2	27.2	21.5	15.3	10.8
44.1	39.6	34.7	28.8	23.3
41.0	36.7	31.8	26.0	20.2
40.6	36.1	31.3	25.3	19.2
40.1	35.5	30.1	23.5	17.9
36.4	31.9	26.6	20.2	14.2
34.2	30.4	25.0	19.1	13.7
37.2	34.8	29.6	23.9	18.6
35.5	34.1	27.8	22.3	17.6
35.5	34.1	28.3	23.1	17.6
36.5	34.9	28.6	24.5	18.4
38.2	35.9	29.4	24.5	18.4
38.9	36.4	30.8	24.6	18.5
38.8	36.1	30.3	24.1	18.1
43.6	39.9	36.5	32.4	26.3
44.7	38.5	34.8	30.1	24.4
41.1	35.8	31.6	26.5	21.2
40.2	36.8	31.9	26.4	21.2
30.6	28.3	24.1	19.2	15.8
25.3	22.3	18.8	14.5	10.9
25.7	22.3	18.7	14.2	10.5
41.7	37.5	33.5	28.3	22.4
42.2	38.1	34.0	28.2	22.4
43.8	39.6	34.9	29.9	23.4
40.2	35.6	30.3	24.1	18.8
34.9	30.1	26.5	19.3	14.5
28.4	24.4	25.9	14.4	10.5
28.5	23.5	21.0	13.1	9.9
29.0	23.9	18.8	13.9	9.9
30.9	26.5	21.9	17.2	12.2
36.4	32.2	27.4	23.1	20.5
39.1	33.7	28.8	22.9	23.9
48.8	45.4	39.8	34.8	31.4
40.9	36.8	31.5	25.5	19.4
38.3	34.5	29.3	23.4	17.9
38.3	34.3	29.7	23.5	18.3
48.0	43.9	39.6	34.3	29.6
43.5	40.1	36.3	31.0	25.8
38.8	34.5	30.0	27.4	19.4
34.7	31.3	24.1	20.3	13.7
39.9	35.7	31.1	24.8	18.5
33.0	29.2	23.7	16.8	11.7
36.4	31.6	26.4	20.7	15.4
40.9	35.4	30.1	24.9	18.4
37.0	32.6	27.6	21.5	16.2
38.6	33.7	28.2	22.5	17.1

34.7	29.5	23.6	16.9	11.4
40.4	35.1	29.9	23.9	17.9
36.3	31.2	26.1	20.0	14.2
37.5	33.0	28.5	22.2	17.3
32.4	27.6	23.9	18.3	13.9
32.7	28.0	24.3	18.9	14.6
31.0	27.7	23.8	18.7	14.4
30.8	27.2	23.6	18.7	14.4
30.9	27.3	23.4	18.5	14.6
34.9	30.7	26.0	20.7	16.1
36.1	31.9	27.4	21.6	16.3
34.5	30.5	25.7	21.4	16.5
44.9	42.7	38.9	35.2	30.2
45.0	41.7	37.4	32.2	26.8
43.7	40.2	35.8	30.6	24.9
33.0	29.1	23.9	18.3	13.7
24.3	20.3	16.5	12.8	10.1
23.9	20.0	16.3	12.4	9.7
29.2	25.2	20.1	15.6	10.8
27.2	23.0	20.3	17.4	13.0
37.8	33.8	27.4	22.0	16.0
38.8	34.4	29.0	22.2	16.6
39.8	37.2	32.5	26.1	21.2
40.0	34.7	28.9	22.5	16.3
39.7	35.1	29.4	22.8	17.3
37.6	33.0	28.0	21.7	15.8

1/3 LASmin 20000	LAIeq-LAeq	OVLD	OBA OVLD	Marker
11.1	1.0	No	No	
8.9	0.7	No	No	
9.1	0.4	No	No	
9.2	1.8	No	No	
12.3	0.7	No	No	
11.7	0.0	No	No	
13.2	0.3	No	No	
13.3	0.7	No	No	
13.0	1.8	No	No	
10.3	0.4	No	No	
9.3	0.3	No	No	
10.3	0.2	No	No	
9.3	1.2	No	No	
9.0	1.2	No	No	
9.0	0.8	No	No	
9.6	1.5	No	No	
13.8	1.6	No	No	
13.8	0.5	No	No	
22.6	1.5	No	No	
21.1	1.4	No	No	
17.5	0.9	No	No	
16.5	6.6	No	No	
12.4	0.0	No	No	
9.5	0.0	No	No	
8.8	0.2	No	No	
8.7	2.7	No	No	
15.5	1.1	No	No	
12.9	0.4	No	No	
12.3	0.3	No	No	
9.6	0.6	No	No	
9.6	0.3	No	No	
9.4	0.1	No	No	
9.3	0.8	No	No	
9.5	1.2	No	No	
12.8	0.9	No	No	
11.6	0.9	No	No	
17.9	10.2	No	No	
17.8	1.1	No	No	
13.9	0.7	No	No	
10.5	0.5	No	No	
9.2	2.7	No	No	
9.1	1.4	No	No	
10.2	4.7	No	No	
9.2	0.3	No	No	
9.2	0.0	No	No	
9.0	0.2	No	No	

9.2	0.5	No	No
9.2	0.4	No	No
9.5	0.2	No	No
16.0	-0.2	No	No
13.4	0.1	No	No
12.7	0.6	No	No
12.3	3.2	No	No
9.6	0.3	No	No
9.5	1.7	No	No
12.2	1.5	No	No
11.7	3.1	No	No
11.6	-0.2	No	No
11.8	1.0	No	No
11.9	2.4	No	No
11.9	0.4	No	No
12.1	3.4	No	No
18.6	0.5	No	No
17.6	0.3	No	No
15.2	0.2	No	No
14.4	1.2	No	No
11.1	0.4	No	No
8.9	0.1	No	No
8.8	0.2	No	No
15.2	0.5	No	No
15.1	0.6	No	No
15.7	0.1	No	No
12.4	0.3	No	No
10.2	1.1	No	No
8.8	1.2	No	No
8.6	1.2	No	No
8.5	0.1	No	No
9.0	0.2	No	No
12.7	7.8	No	No
19.6	8.4	No	No
24.1	0.9	No	No
12.7	0.1	No	No
12.3	0.1	No	No
12.6	1.0	No	No
23.0	0.7	No	No
18.6	0.6	No	No
12.1	0.7	No	No
9.3	0.6	No	No
12.0	4.7	No	No
9.1	0.5	No	No
10.1	0.5	No	No
12.3	1.5	No	No
11.2	0.2	No	No
11.7	2.5	No	No

9.1	0.2	No	No
11.2	0.6	No	No
9.9	0.7	No	No
12.1	0.8	No	No
10.3	1.6	No	No
10.3	3.0	No	No
10.3	0.6	No	No
10.4	0.8	No	No
10.8	0.3	No	No
10.9	2.1	No	No
12.3	0.6	No	No
30.9	0.5	No	No
28.6	0.7	No	No
20.4	0.0	No	No
17.9	2.0	No	No
10.9	1.7	No	No
9.0	0.3	No	No
9.0	0.6	No	No
9.8	0.5	No	No
10.4	0.1	No	No
10.8	0.4	No	No
11.5	0.7	No	No
15.0	1.4	No	No
11.1	0.2	No	No
11.8	0.4	No	No
10.9	0.8	No	No

Summary

File Name on Meter	EF_HS.056
File Name on PC	SLM_0003788_EF_HS_056.00.ldbin
Serial Number	0003788
Model	SoundExpert® LxT
Firmware Version	2.301
User	
Location	
Job Description	
Note	

Measurement

Description	EF Academy Project
Start	2017-06-27 17:48:43
Stop	2017-06-27 17:58:43
Duration	00:10:00.0
Run Time	00:10:00.0
Pause	00:00:00.0
Pre Calibration	2017-06-27 16:21:22
Post Calibration	None
Calibration Deviation	---

Overall Settings

RMS Weight	A Weighting	
Peak Weight	A Weighting	
Detector	Slow	
Preamp	PRMLxT1L	
Microphone Correction	Off	
Integration Method	Exponential	
OBA Range	Normal	
OBA Bandwidth	1/1 and 1/3	
OBA Freq. Weighting	A Weighting	
OBA Max Spectrum	At LMax	
Overload	120.3 dB	
	A	**C**
Under Range Peak	**76.6**	73.6
Under Range Limit	**25.3**	24.8
Noise Floor	15.9	15.7

Results

LASeq	69.9 dB	
LASE	97.7 dB	
EAS	652.799 µPa²h	
LASpeak (max)	2017-06-27 17:58:31	105.8
LASmax	2017-06-27 17:58:31	91.4
LASmin	2017-06-27 17:52:34	55.0
SEA	-99.9 dB	

LAS > 85.0 dB (Exceedance Counts / Duration)	1	2.9
LAS > 115.0 dB (Exceedance Counts / Duration)	0	0.0
LA_{Speak} > 135.0 dB (Exceedance Counts / Duration)	0	0.0
LA_{Speak} > 137.0 dB (Exceedance Counts / Duration)	0	0.0
LA_{Speak} > 140.0 dB (Exceedance Counts / Duration)	0	0.0

Community Noise	**Ldn**	**LDay 07:00-23:00**
	69.9	69.9

LC_{Seq}	80.0	dB
LA_{Seq}	69.9	dB
LCS_{eq} - LA_{Seq}	10.0	dB
LAI_{eq}	73.1	dB
LA_{eq}	69.9	dB
LAI_{eq} - LA_{eq}	3.2	dB

	A	
	dB	**Time Stamp**
L_{eq}	69.9	
$L_{S(max)}$	91.4	2017/06/27 17:58:31
$L_{S(min)}$	55.0	2017/06/27 17:52:34
$L_{Peak(max)}$	105.8	2017/06/27 17:58:31

# Overloads	0	
Overload Duration	0.0	s
# OBA Overloads	0	
OBA Overload Duration	0.0	s

Statistics

LAS5.00	73.2	dB
LAS10.00	71.3	dB
LAS33.30	66.8	dB
LAS50.00	64.6	dB
LAS66.60	62.5	dB
LAS90.00	58.4	dB

Calibration History

Preamp	**Date**	**dB re. 1V/Pa**
Direct	2017-01-03 10:54:35	-27.0
Direct	2017-01-03 10:30:13	-26.0
Direct	2014-07-01 09:45:44	-27.0
PRMLxT1L	2017-06-27 16:21:22	-26.6
PRMLxT1L	2017-06-26 11:13:28	-26.6
PRMLxT1L	2017-06-20 10:09:05	-26.6
PRMLxT1L	2017-06-12 12:50:10	-26.6
PRMLxT1L	2017-06-06 15:05:30	-26.6
PRMLxT1L	2017-05-05 15:45:44	-26.6

PRMLxT1L	2017-04-29 09:09:14	-26.6
PRMLxT1L	2017-04-21 11:23:22	-26.5
PRMLxT1L	2017-03-31 13:13:53	-26.6
PRMLxT1L	2017-03-14 08:18:51	-26.6
PRMLxT1L	2017-03-10 10:18:04	-26.5

Z
78.6 dB
31.3 dB
21.4 dB

dB
dB
dB

s
s
s
s
s

LNight 23:00-07:00	Lden	LDay 07:00-19:00	LEvening 19:00-23:00	LNight 23:00-07:00
-99.9	69.9	69.9	-99.9	-99.9

C		Z	
dB	Time Stamp	dB	Time Stamp

6.3	**8.0**	**10.0**	**12.5**
2.5	1.9	3.3	7.7
61.7	59.8	59.2	54.2
64.6	55.5	59.0	60.8
61.3	59.9	62.9	60.0
61.9	63.5	53.7	67.2
48.3	50.2	49.4	58.8
48.5	42.2	44.8	43.0
51.3	59.2	56.0	47.6

39.5	40.2	49.9	42.2
37.9	45.8	40.7	31.9
48.6	50.1	57.0	56.7
42.4	46.2	50.2	47.7
39.5	42.0	44.7	43.1

dB

16.0	**20.0**	**25.0**	**31.5**	**40.0**	**50.0**	**63.0**	**80.0**	**100**	**125**	**160**	**200**	**250**	**315**	**400**	**500**
-1.0	2.3	0.5	3.1	2.3	0.9	2.9	4.5	6.7	17.0	7.3	3.9	12.5	9.3	7.1	3.6
61.0	44.5	36.3	44.2	35.5	41.3	42.1	33.4	39.3	37.9	29.0	27.5	26.0	24.1	19.7	20.0
56.7	50.3	53.1	46.7	42.7	47.4	40.0	41.2	44.2	46.7	45.4	44.6	39.9	34.1	34.7	33.9
65.2	53.8	52.2	50.6	50.7	52.6	45.8	44.1	41.8	44.0	42.5	41.5	38.5	35.7	32.7	29.0
67.9	53.0	49.2	51.6	57.3	49.4	45.7	39.6	47.2	42.3	41.2	46.7	48.5	50.6	52.0	52.6
56.7	47.6	39.9	34.8	38.1	45.6	39.2	37.3	40.3	35.3	35.2	42.1	40.0	45.1	45.4	46.2
58.8	54.4	33.4	42.3	46.2	55.6	46.5	32.9	42.4	39.2	36.9	40.1	40.7	33.7	38.1	29.8
45.2	40.7	49.8	45.0	52.4	46.9	41.8	43.5	35.1	39.5	37.8	37.0	35.6	32.8	30.4	25.8

45.9	36.9	38.3	43.8	40.7	37.6	37.8	33.8	31.5	32.4	25.3	25.4	27.3	21.4	22.2	16.4
36.8	39.9	42.4	45.7	48.9	45.8	39.0	52.1	54.6	47.0	39.7	35.5	37.4	33.6	27.9	20.6
53.2	49.6	43.0	43.6	51.3	49.2	46.0	36.2	40.9	37.3	40.1	37.5	41.7	38.4	36.1	31.9
43.3	32.8	41.8	42.5	43.5	40.8	40.8	37.3	31.2	30.3	22.9	15.8	17.3	15.7	15.4	15.3
44.6	36.6	31.4	30.2	38.4	45.3	53.3	44.1	43.4	43.7	42.7	49.0	55.1	45.6	51.4	53.3

630	800	1000	1250	1600	2000	2500	3150	4000	5000	6300	8000	10000	12500
8.0	9.0	7.3	10.0	9.2	9.8	11.6	12.5	13.2	40.2	17.7	16.3	18.1	20.4
17.4	28.0	113.0	48.1	19.6	62.7	18.7	56.6	25.5	27.7	20.7	22.0	23.6	25.3
21.4	29.3	114.0	49.1	19.8	66.0	18.7	57.5	29.4	28.0	21.3	22.9	24.6	26.4
17.4	28.6	114.0	49.1	19.1	65.8	18.9	57.4	29.4	27.8	21.7	22.9	24.2	26.2
43.9	30.1	114.0	49.1	20.9	65.8	19.0	57.4	29.5	27.9	21.5	22.7	24.6	26.3
32.4	30.2	114.0	49.2	19.3	65.9	19.4	57.4	29.6	28.0	21.5	22.9	24.4	26.2
22.0	28.8	114.0	49.1	19.1	66.0	19.0	57.5	29.5	27.8	21.4	22.7	24.5	26.4
20.4	28.5	113.9	49.0	19.0	66.0	19.2	57.4	29.7	27.7	21.7	22.8	24.6	26.3

16.8	28.8	113.9	49.0	18.9	65.7	19.4	57.2	29.4	27.9	21.1	22.5	24.3	26.0
18.1	28.8	114.1	49.2	19.2	65.9	19.0	56.7	28.8	27.3	21.5	23.0	24.6	26.4
20.9	28.6	114.0	49.1	19.4	65.9	19.3	57.5	29.5	27.9	21.5	22.6	24.3	26.5
18.2	29.5	113.9	49.1	19.3	65.7	19.4	57.2	29.6	28.1	21.7	22.8	24.3	26.0
45.3	30.8	114.1	49.2	21.1	66.1	19.5	57.6	29.8	28.3	21.9	22.9	24.6	26.3

16000	20000
20.2	21.5
28.1	30.6
28.8	31.4
28.8	31.5
28.9	31.5
28.8	31.9
28.8	31.6
28.7	31.2

28.7	31.2
28.9	31.6
28.7	31.3
28.7	31.3
28.8	31.6

1/1 Octave

Frequency (Hz)	8.0	16.0	31.5	63.0	125	250	500	1000	2000	4000	8000	16000
Overall 1/1 Spectra	6.0	15.6	32.6	48.4	61.9	63.1	64.1	64.0	59.6	51.9	42.6	31.0
Max 1/1 Spectra	5.9	20.6	35.9	47.2	80.0	86.8	88.1	83.7	71.5	62.9	55.4	44.3
Min 1/1 Spectra	5.9	4.7	25.4	36.6	41.2	43.0	46.4	50.4	46.3	38.0	27.1	16.1

1/3 Octave

Frequency (Hz)	6.3	8.0	10.0	12.5	16.0	20.0	25.0	31.5	40.0	50.0	63.0	80.0
Overall 1/3 Spectra	1.9	1.0	1.2	4.2	8.9	14.1	21.0	25.5	31.4	36.6	41.9	46.9
Max 1/3 Spectra	1.9	0.9	0.7	10.3	11.7	19.6	25.8	29.0	34.6	39.4	40.5	45.8
Min 1/3 Spectra	1.9	0.9	0.3	-0.8	-1.6	3.1	12.4	16.9	21.6	27.2	30.8	31.9

1/1 OBA Ref. Spectra

Frequency (Hz)	8.0	16.0	31.5	63.0	125	250	500	1000	2000	4000	8000	16000
1	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
2	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
3	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
4	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

1/3 OBA Ref. Spectra

Frequency (Hz)	6.3	8.0	10.0	12.5	16.0	20.0	25.0	31.5	40.0	50.0	63.0	80.0
1	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
2	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
3	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
4	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

1/1 OBA Under Range

Frequency (Hz)	8.0	16.0	31.5	63.0	125	250	500	1000	2000	4000	8000	16000
Under Range Limit	20.3	17.6	15.7	13.9	12.3	13.0	14.3	16.5	19.1	22.3	24.9	28.1
Noise Floor	15.9	13.2	11.1	9.2	7.6	7.4	8.6	10.6	13.0	16.0	18.7	21.7

1/3 OBA Under Range

Frequency (Hz)	6.3	8.0	10.0	12.5	16.0	20.0	25.0	31.5	40.0	50.0	63.0	80.0
Under Range Limit	21.9	20.9	20.3	19.2	18.4	17.6	16.9	16.3	15.7	14.9	14.5	13.9
Noise Floor	11.9	10.9	10.3	9.2	8.4	7.6	6.9	6.3	5.7	4.9	4.5	3.9

100	125	160	200	250	315	400	500	630	800	1000	1250	1600	2000	2500	3150
52.5	57.3	59.2	58.9	59.8	54.6	55.7	60.1	60.6	59.7	59.6	58.2	56.8	54.5	52.1	49.5
61.3	69.2	79.8	82.8	85.0	71.4	79.0	85.2	85.2	81.4	78.2	72.3	70.1	65.0	62.3	60.0
33.8	36.2	37.4	37.4	38.0	36.1	39.1	41.5	42.9	44.6	46.0	45.5	43.6	40.6	38.3	35.7

100	125	160	200	250	315	400	500	630	800	1000	1250	1600	2000	2500	3150
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

100	125	160	200	250	315	400	500	630	800	1000	1250	1600	2000	2500	3150
13.3	12.7	12.3	12.4	12.5	13.0	13.4	13.8	14.3	15.1	15.7	16.5	17.3	18.2	19.1	20.1
3.3	2.7	2.3	2.4	2.5	3.0	3.4	3.8	4.3	5.1	5.7	6.5	7.3	8.2	9.1	10.1

4000	5000	6300	8000	10000	12500	16000	20000
46.5	43.6	40.5	37.0	33.0	28.5	23.1	25.1
57.2	56.1	53.0	49.7	46.9	42.8	37.4	30.5
32.3	28.3	25.3	21.0	17.3	12.8	9.7	10.0

4000	5000	6300	8000	10000	12500	16000	20000
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

4000	5000	6300	8000	10000	12500	16000	20000
21.0	22.3	22.8	23.8	24.9	25.8	26.7	28.1
11.0	12.3	12.8	13.8	14.9	15.8	16.7	18.1

Record #	Date	Time	Record Type	Cause	#	TH Record	Sound Record
1	2017-06-27	17:48:43	Run	Key	1	1	
2	2017-06-27	17:58:43	Stop	Timer	1	122	

Statistics		
Level (dB)	**Count**	**Percent**
Under	0	0.00
55.0	16	0.03
55.1	38	0.06
55.2	24	0.04
55.3	23	0.04
55.4	22	0.04
55.5	55	0.09
55.6	108	0.18
55.7	214	0.36
55.8	165	0.28
55.9	127	0.21
56.0	141	0.23
56.1	110	0.18
56.2	330	0.55
56.3	286	0.48
56.4	376	0.63
56.5	188	0.31
56.6	164	0.27
56.7	160	0.27
56.8	144	0.24
56.9	160	0.27
57.0	333	0.56
57.1	468	0.78
57.2	261	0.44
57.3	157	0.26
57.4	146	0.24
57.5	155	0.26
57.6	231	0.38
57.7	155	0.26
57.8	213	0.35
57.9	110	0.18
58.0	148	0.25
58.1	200	0.33
58.2	215	0.36
58.3	334	0.56
58.4	242	0.40
58.5	313	0.52
58.6	287	0.48
58.7	287	0.48
58.8	193	0.32
58.9	185	0.31
59.0	171	0.28
59.1	96	0.16
59.2	84	0.14
59.3	83	0.14
59.4	78	0.13

59.5	83	0.14
59.6	96	0.16
59.7	139	0.23
59.8	235	0.39
59.9	242	0.40
60.0	239	0.40
60.1	130	0.22
60.2	154	0.26
60.3	229	0.38
60.4	249	0.41
60.5	339	0.56
60.6	450	0.75
60.7	357	0.60
60.8	279	0.47
60.9	434	0.72
61.0	519	0.87
61.1	490	0.82
61.2	609	1.02
61.3	750	1.25
61.4	487	0.81
61.5	344	0.57
61.6	410	0.68
61.7	691	1.15
61.8	670	1.12
61.9	573	0.95
62.0	717	1.20
62.1	722	1.20
62.2	586	0.98
62.3	433	0.72
62.4	364	0.61
62.5	536	0.89
62.6	390	0.65
62.7	392	0.65
62.8	460	0.77
62.9	540	0.90
63.0	482	0.80
63.1	396	0.66
63.2	317	0.53
63.3	350	0.58
63.4	486	0.81
63.5	338	0.56
63.6	366	0.61
63.7	451	0.75
63.8	493	0.82
63.9	435	0.72
64.0	549	0.92
64.1	483	0.81
64.2	442	0.74

64.3	597	1.00
64.4	645	1.08
64.5	645	1.08
64.6	628	1.05
64.7	486	0.81
64.8	559	0.93
64.9	453	0.75
65.0	529	0.88
65.1	368	0.61
65.2	354	0.59
65.3	440	0.73
65.4	443	0.74
65.5	480	0.80
65.6	506	0.84
65.7	505	0.84
65.8	482	0.80
65.9	533	0.89
66.0	556	0.93
66.1	389	0.65
66.2	305	0.51
66.3	390	0.65
66.4	404	0.67
66.5	430	0.72
66.6	424	0.71
66.7	450	0.75
66.8	573	0.95
66.9	640	1.07
67.0	485	0.81
67.1	447	0.75
67.2	434	0.72
67.3	471	0.78
67.4	455	0.76
67.5	317	0.53
67.6	279	0.47
67.7	200	0.33
67.8	195	0.33
67.9	217	0.36
68.0	244	0.41
68.1	351	0.58
68.2	388	0.65
68.3	429	0.71
68.4	367	0.61
68.5	355	0.59
68.6	327	0.55
68.7	231	0.38
68.8	194	0.32
68.9	215	0.36
69.0	259	0.43

69.1	218	0.36
69.2	280	0.47
69.3	222	0.37
69.4	272	0.45
69.5	325	0.54
69.6	221	0.37
69.7	206	0.34
69.8	296	0.49
69.9	183	0.31
70.0	240	0.40
70.1	209	0.35
70.2	201	0.33
70.3	200	0.33
70.4	215	0.36
70.5	207	0.34
70.6	298	0.50
70.7	274	0.46
70.8	358	0.60
70.9	355	0.59
71.0	355	0.59
71.1	304	0.51
71.2	287	0.48
71.3	285	0.47
71.4	281	0.47
71.5	312	0.52
71.6	165	0.28
71.7	164	0.27
71.8	191	0.32
71.9	150	0.25
72.0	176	0.29
72.1	158	0.26
72.2	131	0.22
72.3	152	0.25
72.4	175	0.29
72.5	201	0.33
72.6	238	0.40
72.7	127	0.21
72.8	78	0.13
72.9	73	0.12
73.0	87	0.14
73.1	97	0.16
73.2	103	0.17
73.3	119	0.20
73.4	58	0.10
73.5	48	0.08
73.6	54	0.09
73.7	55	0.09
73.8	61	0.10

73.9	71	0.12
74.0	62	0.10
74.1	66	0.11
74.2	72	0.12
74.3	55	0.09
74.4	53	0.09
74.5	59	0.10
74.6	34	0.06
74.7	43	0.07
74.8	46	0.08
74.9	55	0.09
75.0	41	0.07
75.1	32	0.05
75.2	26	0.04
75.3	29	0.05
75.4	28	0.05
75.5	27	0.04
75.6	28	0.05
75.7	26	0.04
75.8	28	0.05
75.9	24	0.04
76.0	29	0.05
76.1	28	0.05
76.2	26	0.04
76.3	24	0.04
76.4	28	0.05
76.5	24	0.04
76.6	29	0.05
76.7	23	0.04
76.8	19	0.03
76.9	34	0.06
77.0	36	0.06
77.1	42	0.07
77.2	24	0.04
77.3	26	0.04
77.4	26	0.04
77.5	25	0.04
77.6	25	0.04
77.7	31	0.05
77.8	26	0.04
77.9	31	0.05
78.0	25	0.04
78.1	33	0.05
78.2	32	0.05
78.3	40	0.07
78.4	35	0.06
78.5	13	0.02
78.6	14	0.02

78.7	11	0.02
78.8	14	0.02
78.9	15	0.03
79.0	15	0.03
79.1	14	0.02
79.2	14	0.02
79.3	13	0.02
79.4	16	0.03
79.5	14	0.02
79.6	12	0.02
79.7	18	0.03
79.8	19	0.03
79.9	17	0.03
80.0	25	0.04
80.1	26	0.04
80.2	15	0.03
80.3	16	0.03
80.4	15	0.03
80.5	16	0.03
80.6	17	0.03
80.7	20	0.03
80.8	22	0.04
80.9	43	0.07
81.0	29	0.05
81.1	8	0.01
81.2	8	0.01
81.3	7	0.01
81.4	9	0.02
81.5	9	0.02
81.6	9	0.02
81.7	10	0.02
81.8	10	0.02
81.9	10	0.02
82.0	13	0.02
82.1	12	0.02
82.2	21	0.04
82.3	3	0.00
82.4	3	0.00
82.5	4	0.01
82.6	3	0.00
82.7	4	0.01
82.8	4	0.01
82.9	4	0.01
83.0	4	0.01
83.1	4	0.01
83.2	3	0.00
83.3	3	0.00
83.4	3	0.00

83.5	3	0.00
83.6	3	0.00
83.7	3	0.00
83.8	4	0.01
83.9	3	0.00
84.0	2	0.00
84.1	4	0.01
84.2	3	0.00
84.3	4	0.01
84.4	3	0.00
84.5	3	0.00
84.6	4	0.01
84.7	3	0.00
84.8	4	0.01
84.9	3	0.00
85.0	3	0.00
85.1	3	0.00
85.2	3	0.00
85.3	4	0.01
85.4	3	0.00
85.5	4	0.01
85.6	2	0.00
85.7	3	0.00
85.8	3	0.00
85.9	3	0.00
86.0	4	0.01
86.1	2	0.00
86.2	2	0.00
86.3	4	0.01
86.4	3	0.00
86.5	4	0.01
86.6	2	0.00
86.7	3	0.00
86.8	4	0.01
86.9	3	0.00
87.0	4	0.01
87.1	3	0.00
87.2	3	0.00
87.3	5	0.01
87.4	3	0.00
87.5	5	0.01
87.6	3	0.00
87.7	4	0.01
87.8	3	0.00
87.9	2	0.00
88.0	3	0.00
88.1	3	0.00
88.2	3	0.00

88.3	3	0.00
88.4	3	0.00
88.5	3	0.00
88.6	3	0.00
88.7	3	0.00
88.8	4	0.01
88.9	3	0.00
89.0	2	0.00
89.1	4	0.01
89.2	3	0.00
89.3	4	0.01
89.4	4	0.01
89.5	4	0.01
89.6	3	0.00
89.7	3	0.00
89.8	4	0.01
89.9	3	0.00
90.0	5	0.01
90.1	4	0.01
90.2	3	0.00
90.3	3	0.00
90.4	3	0.00
90.5	4	0.01
90.6	3	0.00
90.7	3	0.00
90.8	5	0.01
90.9	3	0.00
91.0	5	0.01
91.1	5	0.01
91.2	6	0.01
91.3	7	0.01
91.4	12	0.02
Over	0	0.00
Total Count	60000	

Record #	Date	Time	Run Duration	Run Time	Pause	LASeq	LASE	LASmin
1	2017-06-27	17:48:43	00:10:00.0	00:10:00.0	00:00:00.0	69.9	97.7	55.0

LASmin Time	LASmax	LASmax Time	LApeak (max)	LApeak (max) Time	SPL 1 Count
17:52:34	91.4	17:58:31	105.8	17:58:31	1

SPL 1 Duration	SPL 2 Count	SPL 2 Duration	Peak 1 Count	Peak 1 Duration	Peak 2 Count
2.9	0	0.0	0	0.0	0

Peak 2 Duration	Peak 3 Count	Peak 3 Duration	LAS5.00	LAS10.00	LAS33.30	LAS50.00
0.0	0	0.0	73.2	71.3	66.8	64.6

LAS66.60	LAS90.00	SEA	LCSeq	LASeq	LCSeq - LASeq	LAIeq	LAeq	LAIeq - LAeq
62.5	58.4	-99.9	80.0	69.9	10.0	73.1	69.9	3.2

# Overloads	Overloads Duration	# OBA Overloads	OBA Overloads Duration	1/1 LASeq 8.0
0	0.0	0	0.0	6.0

1/1 LASeq 16.0	1/1 LASeq 31.5	1/1 LASeq 63.0	1/1 LASeq 125	1/1 LASeq 250	1/1 LASeq 500
15.6	32.6	48.4	61.9	63.1	64.1

1/1 LASeq 1000	1/1 LASeq 2000	1/1 LASeq 4000	1/1 LASeq 8000	1/1 LASeq 16000
64.0	59.6	51.9	42.6	31.0

1/1 LASmax 8.0	1/1 LASmax 16.0	1/1 LASmax 31.5	1/1 LASmax 63.0	1/1 LASmax 125
5.9	20.6	35.9	47.2	80.0

1/1 LASmax 250	1/1 LASmax 500	1/1 LASmax 1000	1/1 LASmax 2000	1/1 LASmax 4000
86.8	88.1	83.7	71.5	62.9

1/1 LASmax 8000	1/1 LASmax 16000	1/1 LASmin 8.0	1/1 LASmin 16.0	1/1 LASmin 31.5
55.4	44.3	5.9	4.7	25.4

1/1 LASmin 63.0	1/1 LASmin 125	1/1 LASmin 250	1/1 LASmin 500	1/1 LASmin 1000
36.6	41.2	43.0	46.4	50.4

1/1 LASmin 2000	1/1 LASmin 4000	1/1 LASmin 8000	1/1 LASmin 16000	1/3 LASeq 6.3
46.3	38.0	27.1	16.1	1.9

1/3 LASeq 8.0	1/3 LASeq 10.0	1/3 LASeq 12.5	1/3 LASeq 16.0	1/3 LASeq 20.0	1/3 LASeq 25.0
1.0	1.2	4.2	8.9	14.1	21.0

1/3 LASeq 31.5	1/3 LASeq 40.0	1/3 LASeq 50.0	1/3 LASeq 63.0	1/3 LASeq 80.0	1/3 LASeq 100
25.5	31.4	36.6	41.9	46.9	52.5

1/3 LASeq 125	1/3 LASeq 160	1/3 LASeq 200	1/3 LASeq 250	1/3 LASeq 315	1/3 LASeq 400
57.3	59.2	58.9	59.8	54.6	55.7

1/3 LASeq 500	1/3 LASeq 630	1/3 LASeq 800	1/3 LASeq 1000	1/3 LASeq 1250	1/3 LASeq 1600
60.1	60.6	59.7	59.6	58.2	56.8

1/3 LASeq 2000	1/3 LASeq 2500	1/3 LASeq 3150	1/3 LASeq 4000	1/3 LASeq 5000
54.5	52.1	49.5	46.5	43.6

1/3 LASeq 6300	1/3 LASeq 8000	1/3 LASeq 10000	1/3 LASeq 12500	1/3 LASeq 16000
40.5	37.0	33.0	28.5	23.1

1/3 LASeq 20000	1/3 LASmax 6.3	1/3 LASmax 8.0	1/3 LASmax 10.0	1/3 LASmax 12.5
25.1	1.9	0.9	0.7	10.3

1/3 LASmax 16.0	1/3 LASmax 20.0	1/3 LASmax 25.0	1/3 LASmax 31.5	1/3 LASmax 40.0
11.7	19.6	25.8	29.0	34.6

1/3 LASmax 50.0	1/3 LASmax 63.0	1/3 LASmax 80.0	1/3 LASmax 100	1/3 LASmax 125
39.4	40.5	45.8	61.3	69.2

1/3 LASmax 160	1/3 LASmax 200	1/3 LASmax 250	1/3 LASmax 315	1/3 LASmax 400
79.8	82.8	85.0	71.4	79.0

1/3 LASmax 500	1/3 LASmax 630	1/3 LASmax 800	1/3 LASmax 1000	1/3 LASmax 1250
85.2	85.2	81.4	78.2	72.3

1/3 LASmax 1600	1/3 LASmax 2000	1/3 LASmax 2500	1/3 LASmax 3150	1/3 LASmax 4000
70.1	65.0	62.3	60.0	57.2

1/3 LASmax 5000	1/3 LASmax 6300	1/3 LASmax 8000	1/3 LASmax 10000	1/3 LASmax 12500
56.1	53.0	49.7	46.9	42.8

1/3 LASmax 16000	1/3 LASmax 20000	1/3 LASmin 6.3	1/3 LASmin 8.0	1/3 LASmin 10.0
37.4	30.5	1.9	0.9	0.3

1/3 LASmin 12.5	1/3 LASmin 16.0	1/3 LASmin 20.0	1/3 LASmin 25.0	1/3 LASmin 31.5
-0.8	-1.6	3.1	12.4	16.9

1/3 LASmin 40.0	1/3 LASmin 50.0	1/3 LASmin 63.0	1/3 LASmin 80.0	1/3 LASmin 100
21.6	27.2	30.8	31.9	33.8

1/3 LASmin 125	1/3 LASmin 160	1/3 LASmin 200	1/3 LASmin 250	1/3 LASmin 315
36.2	37.4	37.4	38.0	36.1

1/3 LASmin 400	1/3 LASmin 500	1/3 LASmin 630	1/3 LASmin 800	1/3 LASmin 1000
39.1	41.5	42.9	44.6	46.0

1/3 LASmin 1250	1/3 LASmin 1600	1/3 LASmin 2000	1/3 LASmin 2500	1/3 LASmin 3150
45.5	43.6	40.6	38.3	35.7

1/3 LASmin 4000	1/3 LASmin 5000	1/3 LASmin 6300	1/3 LASmin 8000	1/3 LASmin 10000
32.3	28.3	25.3	21.0	17.3

1/3 LASmin 12500	1/3 LASmin 16000	1/3 LASmin 20000
12.8	9.7	10.0

Record #	Record Type	Date	Time	LASeq	LApeak	LASmax	LASmin	Battery
1	Run	2017-06-27	17:48:43					
2		2017-06-27	17:48:43	68.4	81.9	70.1	65.4	4.9
3		2017-06-27	17:48:48	62.1	77.0	65.4	58.8	4.9
4		2017-06-27	17:48:53	58.4	72.0	58.8	58.0	4.9
5		2017-06-27	17:48:58	61.1	76.3	62.4	58.7	4.9
6		2017-06-27	17:49:03	62.3	77.1	63.0	61.1	4.9
7		2017-06-27	17:49:08	67.3	85.0	71.6	62.7	4.9
8		2017-06-27	17:49:13	78.6	94.7	82.2	71.6	4.9
9		2017-06-27	17:49:18	70.4	79.6	76.3	60.9	4.9
10		2017-06-27	17:49:23	58.0	72.7	60.9	56.0	4.9
11		2017-06-27	17:49:28	55.8	70.3	56.3	55.5	4.9
12		2017-06-27	17:49:33	57.7	72.7	59.4	56.3	4.9
13		2017-06-27	17:49:38	60.9	79.7	61.4	59.5	4.9
14		2017-06-27	17:49:43	61.2	80.4	61.6	60.3	4.9
15		2017-06-27	17:49:48	61.4	84.4	62.6	60.3	4.9
16		2017-06-27	17:49:53	65.7	81.7	68.5	62.5	4.9
17		2017-06-27	17:49:58	66.1	80.3	67.0	64.8	4.9
18		2017-06-27	17:50:03	63.2	76.5	64.8	61.9	4.9
19		2017-06-27	17:50:08	65.9	81.7	69.7	62.2	4.9
20		2017-06-27	17:50:13	78.4	92.1	81.0	69.8	4.9
21		2017-06-27	17:50:18	73.6	85.5	78.4	68.3	4.9
22		2017-06-27	17:50:23	68.2	82.1	68.5	67.1	4.9
23		2017-06-27	17:50:28	66.9	80.0	67.3	66.4	4.9
24		2017-06-27	17:50:33	65.4	79.3	66.8	61.7	4.9
25		2017-06-27	17:50:38	58.7	71.6	61.7	56.8	4.9
26		2017-06-27	17:50:43	57.7	81.8	58.6	56.7	4.9
27		2017-06-27	17:50:48	62.0	78.7	65.5	56.9	4.9
28		2017-06-27	17:50:53	64.6	78.5	66.2	61.7	4.9
29		2017-06-27	17:50:58	67.8	84.6	70.2	61.5	4.9
30		2017-06-27	17:51:03	70.6	86.0	72.3	69.4	4.9
31		2017-06-27	17:51:08	72.2	85.8	73.4	70.4	4.9
32		2017-06-27	17:51:13	70.7	86.7	71.3	69.8	4.9
33		2017-06-27	17:51:18	68.8	83.1	71.3	65.2	4.9
34		2017-06-27	17:51:23	66.2	81.4	67.4	64.1	4.9
35		2017-06-27	17:51:28	63.6	77.9	65.1	61.5	4.9
36		2017-06-27	17:51:33	66.2	87.3	67.9	62.0	4.9
37		2017-06-27	17:51:38	64.0	76.8	64.7	63.0	4.9
38		2017-06-27	17:51:43	62.9	76.4	64.6	61.6	4.9
39		2017-06-27	17:51:48	63.9	79.1	65.6	63.0	4.9
40		2017-06-27	17:51:53	64.6	78.0	65.7	63.8	4.9
41		2017-06-27	17:51:58	66.1	80.6	67.1	65.2	4.9
42		2017-06-27	17:52:03	66.4	80.5	67.5	65.2	4.9
43		2017-06-27	17:52:08	66.0	83.4	67.0	63.5	4.9
44		2017-06-27	17:52:13	64.8	85.7	70.4	61.7	4.9
45		2017-06-27	17:52:18	68.0	80.9	70.4	65.8	4.9
46		2017-06-27	17:52:23	64.6	78.9	65.9	61.7	4.9
47		2017-06-27	17:52:28	58.1	71.5	61.7	55.5	4.9

48	2017-06-27	17:52:33	57.3	76.4	61.3	55.0	4.9
49	2017-06-27	17:52:38	62.9	79.4	65.4	57.7	4.9
50	2017-06-27	17:52:43	59.8	76.1	62.6	56.2	4.9
51	2017-06-27	17:52:48	66.4	82.9	70.3	62.5	4.9
52	2017-06-27	17:52:53	70.1	83.1	71.1	68.5	4.9
53	2017-06-27	17:52:58	67.3	80.5	68.4	66.6	4.9
54	2017-06-27	17:53:03	70.1	84.9	72.2	66.7	4.9
55	2017-06-27	17:53:08	61.6	72.0	66.7	56.1	4.9
56	2017-06-27	17:53:13	56.5	71.6	57.6	55.6	4.9
57	2017-06-27	17:53:18	58.8	73.2	60.1	57.5	4.9
58	2017-06-27	17:53:23	59.9	73.3	61.2	58.5	4.9
59	2017-06-27	17:53:28	61.9	78.8	62.4	61.1	4.9
60	2017-06-27	17:53:33	60.9	74.3	62.0	60.2	4.9
61	2017-06-27	17:53:38	61.7	74.9	62.3	60.2	4.9
62	2017-06-27	17:53:43	61.4	74.1	62.5	60.6	4.9
63	2017-06-27	17:53:48	62.0	75.3	62.9	61.6	4.9
64	2017-06-27	17:53:53	65.9	82.5	67.2	62.9	4.9
65	2017-06-27	17:53:58	67.3	81.4	67.8	66.3	4.9
66	2017-06-27	17:54:03	65.2	80.0	66.5	63.9	4.9
67	2017-06-27	17:54:08	65.1	78.2	65.6	64.3	4.9
68	2017-06-27	17:54:13	65.2	78.3	65.8	64.4	4.9
69	2017-06-27	17:54:18	62.3	75.5	64.8	60.5	4.9
70	2017-06-27	17:54:23	60.1	74.5	60.7	59.7	4.9
71	2017-06-27	17:54:28	62.4	76.9	63.4	60.5	4.9
72	2017-06-27	17:54:33	65.7	79.3	66.8	63.3	4.9
73	2017-06-27	17:54:38	71.5	90.2	77.7	64.3	4.9
74	2017-06-27	17:54:43	75.4	90.6	78.4	70.9	4.9
75	2017-06-27	17:54:48	69.5	82.9	70.9	68.0	4.9
76	2017-06-27	17:54:53	64.3	81.6	68.0	61.0	4.9
77	2017-06-27	17:54:58	70.8	87.0	73.3	66.8	4.9
78	2017-06-27	17:55:03	72.2	88.1	74.5	69.6	4.9
79	2017-06-27	17:55:08	67.6	78.1	73.1	62.1	4.9
80	2017-06-27	17:55:13	64.0	81.2	68.6	61.7	4.9
81	2017-06-27	17:55:18	69.0	81.8	69.8	68.0	4.9
82	2017-06-27	17:55:23	64.1	75.7	68.1	62.0	4.9
83	2017-06-27	17:55:28	68.7	85.1	71.0	62.8	4.9
84	2017-06-27	17:55:33	66.2	78.7	68.5	64.0	4.9
85	2017-06-27	17:55:38	62.3	75.6	64.9	61.1	4.9
86	2017-06-27	17:55:43	69.4	88.0	74.2	61.0	4.9
87	2017-06-27	17:55:48	70.4	84.2	74.0	67.8	4.9
88	2017-06-27	17:55:53	66.3	79.8	67.7	65.3	4.9
89	2017-06-27	17:55:58	66.7	80.7	67.1	65.8	4.9
90	2017-06-27	17:56:03	64.7	76.6	65.8	64.2	4.9
91	2017-06-27	17:56:08	63.4	76.5	64.6	61.4	4.9
92	2017-06-27	17:56:13	60.9	74.0	61.4	60.5	4.9
93	2017-06-27	17:56:18	62.5	76.2	64.1	60.9	4.9
94	2017-06-27	17:56:23	66.5	82.8	68.5	63.4	4.9
95	2017-06-27	17:56:28	62.9	75.8	67.4	58.3	4.9

96		2017-06-27	17:56:33	58.5	72.0	59.1	57.7	4.9
97		2017-06-27	17:56:38	57.2	70.5	57.7	57.0	4.9
98		2017-06-27	17:56:43	56.7	69.6	57.2	56.3	4.9
99		2017-06-27	17:56:48	56.3	68.5	56.5	56.1	4.9
100		2017-06-27	17:56:53	61.5	80.1	66.8	56.4	4.9
101		2017-06-27	17:56:58	68.8	83.4	70.9	66.8	4.9
102		2017-06-27	17:57:03	71.2	85.4	71.8	70.5	4.9
103		2017-06-27	17:57:08	71.3	86.4	72.1	70.8	4.9
104		2017-06-27	17:57:13	72.4	85.5	72.7	71.1	4.9
105		2017-06-27	17:57:18	72.6	88.3	75.0	70.6	4.9
106		2017-06-27	17:57:23	67.2	81.5	71.8	61.3	4.9
107		2017-06-27	17:57:28	63.4	77.5	66.1	61.3	4.9
108		2017-06-27	17:57:33	65.2	78.6	66.8	63.7	4.9
109		2017-06-27	17:57:38	73.0	92.9	78.4	66.9	4.9
110		2017-06-27	17:57:43	72.5	83.7	76.7	67.5	4.9
111		2017-06-27	17:57:48	64.7	80.1	67.4	62.9	4.9
112		2017-06-27	17:57:53	64.6	80.7	66.4	63.4	4.9
113		2017-06-27	17:57:58	65.3	80.1	67.1	61.8	4.9
114		2017-06-27	17:58:03	62.4	78.6	65.0	60.4	4.9
115		2017-06-27	17:58:08	63.0	75.9	65.1	61.7	4.9
116		2017-06-27	17:58:13	62.6	76.8	64.0	61.9	4.9
117		2017-06-27	17:58:18	67.5	84.4	70.4	64.1	4.9
118		2017-06-27	17:58:23	70.2	84.8	71.5	68.7	4.9
119		2017-06-27	17:58:28	86.1	105.8	91.4	68.0	4.9
120		2017-06-27	17:58:33	76.0	80.5	82.7	63.6	4.9
121		2017-06-27	17:58:38	66.7	89.9	72.6	59.7	4.9
122	Stop	2017-06-27	17:58:43					

Int. Temp (°F)	LCSeq-LASeq	1/1 LASeq 8.0	1/1 LASeq 16.0	1/1 LASeq 31.5	1/1 LASeq 63.0
100.9	11.9	5.9	20.4	33.8	45.6
101.0	11.2	5.9	13.0	32.3	40.3
100.9	13.1	5.9	13.8	31.9	42.3
100.9	11.1	5.9	14.1	31.0	44.4
100.9	10.5	5.9	13.8	32.5	41.5
101.0	11.8	5.9	14.3	31.4	50.0
100.9	14.6	5.9	11.6	32.3	63.5
100.9	14.4	5.9	14.0	32.7	55.6
100.6	14.0	5.9	13.5	30.6	42.4
100.8	15.5	5.9	13.8	31.4	40.2
100.9	15.5	5.9	16.7	32.0	45.1
100.9	14.3	5.9	19.6	32.2	48.0
100.8	12.9	7.3	20.2	33.8	44.5
100.8	12.7	5.9	15.3	31.8	44.5
100.8	12.8	5.9	16.4	34.1	48.1
100.9	11.0	5.9	13.8	31.5	45.3
101.0	12.0	5.9	14.6	33.0	45.0
100.8	13.1	5.9	17.2	32.8	45.3
101.0	12.3	5.9	12.5	32.7	51.1
100.9	12.4	5.9	12.0	30.2	52.7
100.6	8.5	5.9	13.6	31.1	46.5
100.5	10.9	5.9	14.5	31.2	46.3
100.6	11.3	5.9	16.4	32.6	47.1
100.6	13.3	5.9	17.3	34.9	42.0
100.6	15.6	6.1	18.9	32.6	43.6
100.6	13.4	5.9	13.5	33.2	44.3
100.8	10.7	5.9	13.8	32.8	45.0
100.6	7.3	5.9	16.0	32.3	44.9
100.6	10.0	5.9	14.5	32.9	51.1
100.6	13.1	5.9	16.9	33.9	54.9
100.6	7.1	7.2	18.7	33.3	48.9
100.5	6.2	5.9	11.4	32.6	45.2
100.6	7.0	5.9	8.8	31.5	45.1
100.5	7.9	5.9	8.0	31.4	41.8
100.5	7.6	5.9	12.7	34.0	42.4
100.5	9.9	5.9	8.8	33.4	42.9
100.5	9.7	5.9	8.4	34.5	41.6
100.5	8.8	5.9	13.3	30.8	41.9
100.5	8.5	5.9	9.3	34.1	42.2
100.5	8.0	5.9	14.4	35.2	42.4
100.6	7.3	5.9	15.9	32.1	43.7
100.5	7.0	5.9	12.5	33.2	42.2
100.5	8.2	5.9	14.2	29.9	41.5
100.5	6.6	5.9	11.6	29.7	42.1
100.5	6.6	5.9	11.6	30.4	41.2
100.5	13.0	5.9	16.0	30.3	39.1

100.5	15.9	5.9	16.3	30.2	44.2
100.5	9.2	5.9	14.5	31.8	42.0
100.5	11.4	5.9	13.3	29.1	41.3
100.5	7.2	6.2	17.4	28.8	42.1
100.5	5.9	5.9	13.8	30.1	43.6
100.5	8.5	5.9	12.4	38.2	45.2
100.5	6.1	5.9	14.8	34.5	45.9
100.5	10.1	6.3	18.8	32.8	39.8
100.5	12.3	5.9	14.4	28.2	37.6
100.5	13.3	5.9	12.9	29.5	44.6
100.5	12.1	5.9	11.5	29.3	42.9
100.5	11.9	5.9	8.0	29.4	46.3
100.5	15.0	5.9	9.6	28.9	51.5
100.5	13.1	5.9	15.9	32.8	47.5
100.5	15.8	6.2	22.3	33.7	43.4
100.5	16.6	10.4	27.0	37.9	45.9
100.5	11.1	5.9	14.0	33.1	49.0
100.5	8.0	5.9	12.1	32.8	45.2
100.5	7.4	5.9	10.8	31.5	42.0
100.5	8.1	5.9	10.9	32.6	43.6
100.5	6.6	5.9	12.0	31.8	39.6
100.5	15.1	10.6	25.6	35.7	41.0
100.5	12.4	7.9	19.5	33.0	41.1
100.5	9.9	5.9	14.7	32.1	42.2
100.5	9.7	5.9	19.0	33.4	42.2
100.5	10.1	5.9	16.3	33.4	47.8
100.5	10.8	5.9	15.5	35.2	51.7
100.5	7.0	5.9	14.6	35.7	44.2
100.5	10.0	5.9	15.5	32.3	42.7
100.5	13.1	5.9	13.4	38.7	57.0
100.5	6.7	5.9	15.9	34.4	49.8
100.5	8.2	5.9	17.2	32.3	46.1
100.5	13.6	5.9	17.8	31.8	44.7
100.5	14.5	5.9	14.9	32.4	47.4
100.4	14.8	5.9	9.8	31.8	51.1
100.2	10.9	5.9	8.3	35.1	51.8
100.2	12.2	5.9	13.9	31.3	50.3
100.5	11.2	5.9	10.2	27.2	43.5
100.2	5.6	5.9	12.2	28.9	44.2
100.3	5.7	5.9	12.8	30.8	44.7
100.2	6.8	5.9	10.0	28.7	44.8
100.2	6.1	5.9	10.7	28.3	44.3
100.0	6.1	5.9	11.0	28.9	40.7
100.2	8.1	5.9	9.0	29.6	42.9
100.2	12.4	5.9	10.9	34.3	45.7
100.2	11.3	5.9	10.8	33.0	47.5
100.0	8.1	5.9	15.1	33.1	45.5
100.0	9.2	5.9	14.2	30.9	42.5

100.0	12.9	5.9	12.5	31.1	41.9
100.0	14.6	5.9	16.0	31.5	42.7
100.0	13.9	5.9	12.7	31.3	40.4
100.0	13.4	5.9	12.8	31.0	39.4
100.0	11.0	5.9	12.9	31.4	43.0
100.0	8.9	5.9	14.8	32.1	51.3
100.0	8.1	5.9	14.6	33.0	49.6
100.0	7.6	5.9	16.0	32.0	49.1
100.0	5.8	5.9	14.4	34.5	49.4
100.0	6.3	5.9	11.1	34.9	49.1
100.0	7.1	5.9	9.0	31.8	46.3
100.0	12.6	5.9	7.0	30.1	42.9
100.0	10.7	5.9	7.2	32.7	45.3
100.0	11.9	5.9	12.2	31.9	51.1
100.0	10.3	5.9	13.0	29.5	52.2
100.0	7.8	5.9	10.7	27.5	44.9
100.0	5.8	5.9	10.5	28.7	40.0
100.0	4.7	5.9	9.4	29.5	37.9
100.0	7.3	5.9	13.0	28.8	39.2
100.0	7.4	5.9	14.1	29.1	39.7
100.0	9.8	5.9	13.6	31.9	41.3
100.0	8.4	5.9	14.3	32.7	43.1
100.0	9.3	5.9	15.8	34.2	53.4
100.0	7.4	5.9	17.5	34.4	47.3
100.0	7.0	5.9	13.6	32.2	44.2
100.0	5.7	5.9	9.6	31.1	40.4

1/1 LASeq 125	1/1 LASeq 250	1/1 LASeq 500	1/1 LASeq 1000	1/1 LASeq 2000	1/1 LASeq 4000
61.6	61.3	60.7	63.2	58.7	50.4
52.7	53.6	53.3	57.9	54.5	47.8
45.4	48.4	51.1	53.6	51.8	46.5
46.8	50.6	53.8	56.9	54.3	48.3
49.9	52.0	54.9	58.6	54.6	47.7
59.1	58.8	59.9	61.2	58.9	55.0
76.5	70.4	66.4	68.4	64.3	58.3
68.2	62.6	59.3	62.4	58.1	51.2
51.3	49.1	48.7	53.0	49.7	45.3
47.0	44.2	47.0	51.0	48.6	45.2
47.5	47.0	49.6	53.1	50.3	45.7
49.8	51.4	53.4	56.4	53.6	47.4
51.1	50.8	54.6	56.9	53.3	45.9
51.1	50.7	53.8	57.4	53.9	45.5
60.9	56.7	58.0	59.1	55.9	49.0
60.5	56.9	57.6	60.5	57.9	50.9
56.2	54.2	55.2	58.5	54.6	46.3
62.3	59.2	55.1	57.0	52.6	44.5
75.9	72.8	67.3	65.3	60.2	54.1
70.5	66.9	64.6	66.2	61.2	52.3
58.2	57.0	60.4	64.9	60.4	51.5
57.8	55.8	59.4	63.1	59.3	50.0
57.6	53.3	57.0	61.9	57.7	47.8
47.0	45.3	50.5	55.9	51.0	40.1
51.8	45.9	48.5	53.2	49.4	39.0
56.9	52.9	53.7	56.2	51.8	46.4
55.6	56.2	58.1	60.3	55.2	48.4
52.3	55.7	59.4	64.9	60.6	54.0
59.7	58.8	62.5	66.8	63.7	55.2
66.7	63.3	64.5	66.5	62.9	56.3
55.2	58.4	62.2	67.8	64.3	54.8
51.8	56.5	60.1	66.1	62.5	52.7
48.4	52.6	58.3	63.0	60.0	52.2
47.3	52.1	56.1	60.3	56.7	48.0
47.9	56.1	62.3	61.6	57.3	46.2
52.8	53.9	57.5	60.1	55.9	46.7
49.9	52.2	56.8	59.1	55.4	44.8
51.1	53.4	56.5	60.5	56.7	46.2
48.4	53.1	57.5	61.3	57.7	47.6
48.4	52.4	58.1	63.4	59.2	49.7
49.3	53.8	57.7	63.6	60.3	50.4
46.4	52.3	57.2	63.5	59.6	49.6
50.1	58.1	57.8	60.6	55.9	47.2
53.0	59.7	61.1	64.2	60.3	53.0
45.4	51.3	56.3	62.3	57.4	48.1
42.1	45.9	50.4	55.3	50.5	40.9

44.1	49.8	51.3	51.9	48.3	41.4
47.0	51.8	56.2	59.2	55.9	49.7
44.6	48.6	52.7	56.4	52.2	45.3
51.6	54.9	58.9	62.8	59.1	53.4
55.1	58.7	62.7	66.5	63.6	56.5
49.7	55.0	60.0	64.1	60.7	52.0
52.5	57.5	61.5	66.3	64.5	58.6
45.5	49.6	54.0	58.5	54.9	47.9
43.4	45.4	49.1	53.1	49.7	39.9
48.4	49.2	51.4	54.7	51.4	40.8
48.7	53.5	54.0	54.3	50.2	42.0
51.8	55.0	56.2	55.9	52.2	44.8
51.7	53.8	53.5	55.1	51.1	43.9
52.7	55.5	53.8	56.6	51.1	43.2
54.5	52.9	54.5	56.3	51.0	43.1
56.1	52.0	55.1	56.4	52.9	44.8
55.4	55.3	58.2	62.2	58.1	50.0
54.1	55.9	60.1	64.1	59.6	51.8
49.6	53.9	58.1	62.3	57.5	48.4
49.0	52.5	58.3	62.1	57.3	49.1
48.2	51.4	56.9	62.4	58.5	49.1
48.7	48.9	54.6	59.1	55.8	47.0
48.5	48.9	53.7	56.2	52.5	44.2
49.8	50.6	55.0	59.0	55.2	47.2
52.0	57.0	60.0	61.1	56.9	50.9
62.4	62.6	64.8	65.8	63.4	58.5
68.9	67.4	68.2	69.6	66.2	60.7
55.1	57.4	62.6	66.0	62.8	55.7
51.3	51.9	56.4	60.8	57.9	49.9
62.3	60.1	61.7	65.7	64.5	57.1
56.8	57.6	63.9	69.6	65.3	55.2
53.8	54.9	60.2	64.9	59.5	50.3
58.2	58.0	54.5	56.5	53.2	47.6
66.3	63.9	56.3	57.0	53.4	46.5
59.2	58.7	54.3	56.7	53.4	45.7
60.5	56.6	59.3	65.1	61.6	51.1
61.1	56.8	57.0	60.9	57.4	48.4
55.7	51.6	54.1	58.2	54.3	45.3
52.6	58.8	60.7	65.6	63.3	58.3
55.6	57.5	62.8	66.7	64.3	58.1
52.0	54.2	58.5	63.3	59.2	50.3
49.0	54.0	58.7	63.9	60.0	51.2
46.6	52.5	55.8	61.8	58.6	48.1
45.8	51.3	54.2	60.8	56.8	46.3
47.8	50.0	52.2	57.9	53.7	42.8
49.7	51.5	54.7	59.1	55.2	46.2
51.1	57.7	59.6	62.4	59.3	52.4
48.9	53.5	56.3	58.8	55.9	48.3

48.1	48.3	51.1	54.2	51.5	43.5
47.8	46.6	49.6	52.9	49.6	43.2
47.1	46.5	48.9	52.2	49.7	43.0
45.9	46.2	48.3	51.9	49.2	42.6
47.9	50.3	53.6	56.8	55.9	49.8
52.3	56.4	60.5	65.0	63.1	56.5
59.6	61.6	63.1	67.3	64.2	56.0
59.6	59.9	62.5	68.0	65.0	56.1
54.4	58.9	63.6	69.4	66.5	56.1
58.5	59.3	65.1	69.7	65.4	55.8
51.9	54.5	58.9	64.7	60.0	50.8
58.2	55.6	54.3	57.3	53.6	45.6
57.5	55.4	56.5	61.1	57.2	48.8
66.6	68.7	64.3	65.0	61.1	52.2
64.9	68.3	64.9	66.2	61.1	51.0
52.1	53.8	56.0	61.9	57.4	46.3
46.2	49.7	55.1	62.1	58.6	47.8
45.1	49.5	56.8	63.1	58.5	46.7
45.4	50.4	55.3	59.0	56.1	48.0
46.3	50.4	55.9	59.5	56.9	48.9
50.7	52.6	54.0	59.1	55.8	46.3
56.1	58.7	60.1	62.9	60.5	53.3
56.4	59.2	62.3	65.8	64.3	58.8
73.7	81.2	82.7	78.1	66.8	59.2
62.7	71.3	72.6	68.9	59.8	50.6
48.1	53.1	57.7	63.1	61.9	49.3

1/1 LASeq 8000	1/1 LASeq 16000	1/1 LASmax 8.0	1/1 LASmax 16.0	1/1 LASmax 31.5
52.5	29.6	5.9	23.0	36.4
46.5	28.9	5.9	15.4	33.7
41.2	28.4	5.9	17.2	33.1
40.6	28.6	5.9	15.8	32.0
39.7	27.5	5.9	17.7	33.6
45.9	33.1	5.9	17.5	32.8
49.2	37.8	5.9	14.7	35.3
42.0	34.5	5.9	16.2	35.0
39.1	28.1	5.9	16.0	31.5
39.0	28.1	5.9	15.1	32.9
39.0	27.7	5.9	21.5	34.0
38.7	26.0	6.1	22.5	36.0
35.6	20.2	9.8	24.2	35.9
34.4	20.1	5.9	17.2	33.1
38.5	21.6	6.5	19.3	35.5
37.9	21.4	5.9	16.0	33.0
34.0	19.3	5.9	16.6	34.2
32.8	18.6	6.0	19.1	33.9
44.2	29.9	5.9	14.9	34.6
40.3	25.3	5.9	12.7	31.5
40.2	26.7	5.9	14.8	33.0
38.1	21.3	5.9	16.1	32.7
38.9	26.0	5.9	19.6	35.3
30.4	19.6	5.9	20.4	36.7
30.4	16.9	7.7	23.0	34.1
37.4	22.4	5.9	15.0	34.6
39.5	23.7	5.9	15.2	33.6
45.5	31.2	5.9	20.4	34.2
44.9	30.4	5.9	19.1	34.2
46.0	32.5	5.9	22.8	35.4
43.9	29.3	10.7	21.7	35.3
41.5	30.1	5.9	14.4	33.8
43.9	27.7	5.9	10.2	35.7
37.4	25.2	5.9	9.9	35.2
33.5	18.1	5.9	15.3	36.1
35.4	19.0	5.9	11.0	36.8
32.6	18.1	5.9	9.9	37.2
34.1	19.9	5.9	16.5	33.4
34.7	23.6	5.9	11.1	36.3
37.2	24.6	5.9	19.0	37.1
37.4	28.7	5.9	19.1	33.2
36.7	21.6	5.9	13.7	34.8
33.2	17.9	5.9	16.7	31.2
41.1	26.3	5.9	13.0	31.6
35.9	21.2	5.9	14.0	32.5
29.6	17.1	5.9	18.5	31.2

30.9	19.0	5.9	17.9	32.3
38.3	24.1	5.9	17.6	34.1
35.0	21.0	5.9	15.9	31.1
44.6	32.6	8.4	21.2	31.0
46.9	34.2	5.9	14.9	33.6
41.1	28.3	5.9	13.8	41.2
48.9	33.0	5.9	22.0	37.6
37.7	22.1	8.6	22.8	37.1
28.5	17.6	5.9	15.9	29.6
28.5	16.8	5.9	15.0	31.9
31.3	17.7	5.9	13.2	31.4
37.5	26.7	5.9	9.3	31.1
33.7	20.7	5.9	11.5	30.8
34.4	18.1	5.9	21.5	34.7
32.2	19.0	7.7	26.3	37.8
36.8	20.1	12.4	30.2	40.6
39.7	24.7	7.7	18.3	35.3
40.6	24.7	5.9	13.8	34.7
35.9	21.6	5.9	11.7	33.0
37.3	26.5	5.9	14.2	34.0
36.7	21.7	5.9	14.4	33.6
34.9	20.7	14.7	29.9	39.5
32.2	18.1	12.5	23.1	35.5
36.4	23.9	5.9	16.8	33.8
41.9	26.9	6.2	22.7	34.6
50.0	38.1	5.9	20.8	34.7
52.9	40.7	5.9	18.0	36.2
46.2	32.5	5.9	16.8	38.8
38.4	24.5	5.9	16.6	33.6
47.5	35.1	5.9	15.0	42.4
44.4	31.9	5.9	17.1	37.6
39.5	24.7	5.9	20.0	33.6
36.1	20.4	5.9	20.5	33.3
35.7	20.3	5.9	16.7	33.4
34.1	18.8	5.9	12.7	33.5
39.3	23.8	5.9	10.9	37.7
37.0	20.8	5.9	17.4	35.6
33.3	18.0	5.9	12.5	28.5
48.8	34.8	5.9	16.1	31.0
47.9	33.4	5.9	15.5	32.0
40.6	27.7	5.9	11.1	31.8
40.1	27.9	5.9	12.4	30.3
35.9	20.8	5.9	12.4	30.4
34.5	19.4	5.9	13.2	31.5
33.6	33.5	5.9	12.7	38.6
40.7	39.6	5.9	13.3	34.7
42.0	30.5	5.9	18.0	34.6
37.5	26.4	5.9	16.7	31.6

32.3	22.0	5.9	13.8	32.1
32.3	22.1	5.9	17.4	32.5
32.0	26.6	5.9	14.3	32.7
31.6	18.7	5.9	15.5	32.1
40.8	28.0	5.9	16.4	32.9
47.6	36.3	5.9	17.2	33.8
46.5	34.3	5.9	16.3	34.1
45.3	31.3	5.9	18.3	34.1
44.2	30.2	5.9	18.5	36.3
44.5	31.3	5.9	13.0	36.4
39.2	24.0	5.9	10.6	33.0
34.9	19.7	5.9	9.2	32.2
38.0	23.9	5.9	9.8	34.3
39.7	23.4	5.9	16.2	33.4
38.9	22.7	5.9	16.0	31.6
34.7	19.7	5.9	12.4	28.6
34.3	19.1	5.9	11.9	32.2
33.1	18.6	5.9	10.4	32.0
36.4	21.8	5.9	16.8	30.0
37.1	21.4	5.9	16.3	30.7
37.3	23.1	5.9	15.1	34.2
45.2	43.5	5.9	16.3	34.5
49.0	42.3	5.9	18.2	35.2
51.2	39.9	5.9	20.6	35.9
41.8	29.7	5.9	17.5	33.7
37.7	22.8	5.9	10.9	32.3

1/1 LASmax 63.0	1/1 LASmax 125	1/1 LASmax 250	1/1 LASmax 500	1/1 LASmax 1000
58.1	64.5	63.8	62.5	65.0
41.7	57.8	57.9	56.6	60.8
47.1	46.8	49.8	51.6	54.5
47.4	48.3	51.7	55.3	58.7
42.6	55.6	53.1	55.8	59.5
54.0	67.2	63.2	63.0	64.1
67.7	80.4	74.3	68.7	71.2
61.9	74.6	68.5	64.5	67.3
45.3	56.0	53.0	51.5	55.3
41.9	48.1	45.4	47.4	51.6
47.1	48.7	49.4	51.4	55.2
49.2	51.4	52.3	54.9	57.0
46.6	52.3	51.8	55.5	57.5
47.9	52.8	52.5	54.9	58.8
49.4	65.8	60.3	62.0	60.7
47.2	61.9	58.4	59.9	61.6
46.7	58.3	57.4	56.5	60.2
47.2	67.6	62.1	56.5	57.3
55.7	78.2	76.9	70.4	68.1
55.5	76.2	72.5	68.6	68.2
48.4	60.2	58.6	61.3	65.7
48.5	59.7	56.8	60.4	64.1
49.9	61.0	56.1	57.9	62.9
43.7	49.3	48.0	54.1	59.0
46.1	54.0	47.2	49.7	54.2
45.5	58.7	58.4	59.0	60.2
47.1	58.0	58.7	60.4	61.4
46.0	55.6	57.9	61.9	67.3
53.5	67.0	62.3	63.5	67.5
56.7	68.7	65.5	65.7	67.3
51.5	60.0	60.0	63.3	68.5
46.6	54.9	59.4	62.3	68.6
47.6	49.6	53.7	59.5	64.2
43.6	48.5	53.9	58.0	61.9
43.2	49.1	57.5	65.1	63.2
44.6	55.3	54.8	60.1	60.8
42.9	52.3	54.6	59.9	60.4
43.0	52.4	54.9	59.2	62.0
43.2	50.1	55.3	59.5	62.6
44.8	50.7	54.6	58.6	64.4
45.6	50.9	54.9	58.8	64.7
43.5	48.2	54.0	58.6	64.4
43.8	53.7	64.2	63.7	66.5
44.0	55.6	64.3	63.6	66.5
43.0	48.5	52.6	57.7	63.7
41.9	43.0	49.1	53.3	59.1

47.5	45.8	52.2	55.1	56.6
45.3	50.0	53.0	58.7	61.9
44.4	46.8	50.5	55.3	59.7
44.2	57.4	59.3	63.6	66.4
46.5	57.3	60.1	63.9	67.5
46.3	52.0	56.2	61.1	65.3
48.9	55.8	59.4	63.2	68.3
43.1	49.5	54.4	58.8	63.5
38.9	44.7	46.4	49.5	54.1
47.0	50.8	50.7	53.6	55.7
44.3	49.6	56.9	56.0	54.7
50.0	56.1	56.9	57.2	56.5
53.7	55.6	54.9	54.9	55.7
52.2	54.5	57.7	54.8	58.2
44.5	56.9	54.1	55.0	58.1
47.0	59.2	52.5	55.8	57.9
50.6	56.6	56.8	59.9	63.9
47.1	55.9	56.7	60.7	64.5
43.0	51.7	55.9	59.1	63.7
44.7	50.1	54.0	59.0	62.7
42.4	49.1	52.6	58.2	63.3
42.5	49.3	49.9	56.5	62.0
42.1	49.4	49.7	54.2	57.2
43.1	50.5	52.7	56.2	60.3
43.9	52.9	58.9	61.6	62.1
53.9	70.4	68.9	70.3	71.9
54.6	73.2	70.3	70.9	72.1
48.2	59.4	60.6	64.4	67.1
44.9	56.9	55.1	60.2	64.9
60.6	66.4	63.1	64.3	70.5
52.6	58.2	59.3	67.0	72.3
47.1	56.6	58.3	65.6	70.9
45.3	64.2	63.9	55.4	57.0
48.9	67.7	65.4	57.0	57.5
53.1	65.0	64.2	56.0	57.6
52.9	63.5	58.1	61.4	67.8
52.8	63.2	59.2	59.5	64.1
45.3	61.1	54.3	56.3	59.2
45.9	54.9	61.9	65.6	70.8
46.5	57.7	60.4	65.8	70.4
46.6	55.2	55.9	60.2	64.4
45.9	50.5	55.4	59.6	64.4
42.5	47.4	53.6	56.7	63.2
45.2	46.5	52.2	55.6	61.7
47.8	49.2	50.9	52.7	58.8
49.8	50.6	53.7	56.3	60.8
47.3	52.4	59.7	62.0	64.3
44.5	51.9	58.5	60.8	63.2

42.8	49.3	48.8	51.5	54.9
43.5	48.5	47.4	50.6	53.3
41.5	48.0	47.5	49.3	52.9
40.4	46.6	46.7	48.8	52.3
47.6	50.5	55.2	58.7	62.2
52.4	53.8	58.4	62.8	67.3
51.9	62.5	66.0	64.4	68.2
50.4	63.1	63.2	63.2	69.3
51.0	57.3	59.8	64.3	69.9
52.9	61.7	60.7	67.6	72.3
48.0	55.0	58.2	63.5	69.5
44.2	63.6	57.9	54.9	57.8
47.3	61.5	56.4	58.4	63.2
55.5	71.5	75.8	70.1	67.7
54.5	70.6	73.8	69.2	67.4
49.9	58.2	59.7	59.1	63.8
41.9	47.3	51.5	56.8	64.1
39.3	46.6	51.6	59.0	64.9
40.1	47.3	52.2	58.4	61.5
41.3	47.4	52.2	58.4	61.5
42.6	53.9	56.0	55.6	59.9
44.4	58.5	59.4	63.3	65.8
56.3	57.7	60.8	63.4	66.9
50.1	80.0	86.8	88.1	83.7
46.4	69.3	78.2	79.5	75.2
42.2	50.7	57.4	63.6	69.5

1/1 LASmax 2000	1/1 LASmax 4000	1/1 LASmax 8000	1/1 LASmax 16000	1/1 LASmin 8.0
60.4	52.5	56.1	31.6	5.9
56.5	48.9	52.2	29.3	5.9
52.3	46.7	41.6	28.8	5.9
55.4	49.0	41.6	29.7	5.9
55.5	48.0	39.9	27.8	5.9
61.1	57.8	48.6	36.4	5.9
66.8	60.0	51.2	39.9	5.9
63.0	56.3	46.2	38.7	5.9
51.6	45.8	39.4	29.0	5.9
49.2	45.4	39.2	28.5	5.9
51.8	46.6	39.7	28.1	5.9
54.4	48.0	39.9	28.1	5.9
54.0	47.5	37.7	22.8	5.9
54.9	47.5	40.2	23.7	5.9
57.8	50.6	39.8	23.1	5.9
59.1	52.3	39.1	22.2	5.9
56.8	49.0	36.6	22.0	5.9
54.0	45.6	36.2	21.3	5.9
61.9	56.8	46.2	31.6	5.9
62.3	54.5	43.3	29.3	5.9
60.9	52.0	40.7	29.6	5.9
60.2	50.7	38.9	23.7	5.9
58.9	49.5	42.7	31.1	5.9
53.9	43.7	34.2	22.0	5.9
51.7	40.6	32.0	18.4	5.9
54.7	48.8	40.0	25.5	5.9
55.8	49.2	40.7	25.4	5.9
63.1	57.1	48.9	35.4	5.9
64.3	55.9	46.1	32.0	5.9
63.8	57.0	47.0	34.4	5.9
65.3	55.9	46.3	32.3	5.9
65.2	54.5	42.9	33.2	5.9
61.8	54.6	47.1	30.9	5.9
58.4	50.5	40.2	28.7	5.9
58.5	47.0	34.7	18.5	5.9
56.3	47.7	37.0	20.2	5.9
56.6	45.9	34.5	19.7	5.9
59.1	48.1	35.8	20.7	5.9
58.8	48.3	36.0	29.5	5.9
60.9	51.5	39.1	28.4	5.9
61.1	51.6	39.0	34.8	5.9
60.6	50.9	37.7	23.4	5.9
59.6	54.0	39.4	23.0	5.9
61.6	54.2	42.8	28.5	5.9
58.8	50.1	38.3	24.2	5.9
54.6	44.9	32.8	18.1	5.9

54.0	47.9	37.6	25.5	5.9
58.5	52.8	41.0	26.4	5.9
55.4	48.1	37.8	23.6	5.9
62.7	57.3	49.1	36.9	5.9
64.6	57.9	48.6	36.2	5.9
61.7	53.7	43.4	31.4	5.9
67.0	61.8	52.6	36.7	5.9
60.5	53.8	44.0	27.8	5.9
51.6	40.9	29.2	18.4	5.9
52.2	41.1	29.3	17.5	5.9
50.9	43.0	32.6	18.3	5.9
53.1	46.3	40.4	32.0	5.9
52.1	45.1	36.9	25.2	5.9
51.8	43.6	37.7	18.8	5.9
51.6	44.2	33.3	20.4	5.9
54.6	46.0	42.2	21.4	5.9
59.8	52.1	41.2	26.3	5.9
60.2	52.4	41.4	25.7	5.9
58.7	50.2	38.3	25.9	5.9
58.2	49.5	37.9	29.8	5.9
59.1	49.5	37.6	23.6	5.9
58.6	49.4	37.5	23.4	5.9
53.4	45.7	34.4	20.4	5.9
56.0	48.1	37.5	25.6	5.9
57.9	52.1	43.3	29.0	5.9
69.2	63.8	55.6	44.4	5.9
69.4	63.8	55.6	44.5	5.9
63.8	57.1	48.4	34.3	5.9
61.7	54.7	44.0	29.4	5.9
67.7	60.6	51.5	39.1	5.9
67.5	57.9	47.9	37.4	5.9
65.1	54.9	44.0	29.3	5.9
54.0	49.4	37.3	21.9	5.9
54.1	47.1	36.5	20.8	5.9
54.2	46.5	34.9	19.5	5.9
64.1	53.4	41.6	27.0	5.9
60.6	50.9	39.3	23.3	5.9
55.9	47.5	35.8	19.8	5.9
68.6	63.7	53.9	39.6	5.9
68.3	62.8	52.3	37.3	5.9
60.6	52.8	44.6	33.4	5.9
60.4	51.8	41.0	31.5	5.9
59.7	50.0	37.6	22.8	5.9
58.7	47.7	36.2	21.0	5.9
54.4	43.6	37.3	38.7	5.9
56.6	48.0	45.0	44.8	5.9
61.3	55.2	44.8	33.9	5.9
60.2	53.0	42.5	32.4	5.9

52.6	44.0	33.0	26.8	5.9
50.1	44.3	34.4	26.3	5.9
50.2	43.5	32.7	30.2	5.9
49.4	42.8	32.0	21.3	5.9
61.3	55.8	47.8	36.1	5.9
65.3	57.3	49.4	38.7	5.9
65.7	57.8	48.9	37.3	5.9
66.5	57.1	46.6	32.5	5.9
67.2	56.9	46.1	33.1	5.9
67.3	58.0	46.9	34.6	5.9
64.4	55.3	43.7	29.3	5.9
54.1	47.1	35.6	20.5	5.9
60.1	51.1	39.3	26.0	5.9
62.4	53.6	42.7	27.0	5.9
62.3	53.6	42.7	27.0	5.9
59.1	47.6	36.6	21.6	5.9
59.9	49.1	35.9	20.9	5.9
60.2	49.2	36.0	21.0	5.9
58.7	51.8	40.6	25.7	5.9
58.7	51.7	40.3	24.7	5.9
56.8	48.2	41.6	27.3	5.9
64.9	58.7	49.7	48.9	5.9
66.0	60.4	50.3	46.7	5.9
71.5	62.9	55.4	44.3	5.9
65.0	56.0	47.6	35.9	5.9
68.3	56.1	45.2	30.3	5.9

1/1 LASmin 16.0	1/1 LASmin 31.5	1/1 LASmin 63.0	1/1 LASmin 125	1/1 LASmin 250
15.4	26.4	41.7	57.6	57.4
10.0	30.6	38.8	46.8	49.5
11.0	30.9	38.7	44.5	47.2
12.6	29.9	41.2	44.8	48.4
11.8	31.0	39.9	48.2	51.2
12.6	29.6	41.3	53.0	51.9
8.6	29.5	54.0	67.1	63.1
10.9	30.0	45.3	56.1	53.0
9.7	29.7	39.6	46.8	45.3
11.4	30.5	39.3	45.7	43.0
13.2	30.2	41.5	46.8	44.3
18.0	30.2	45.0	48.5	49.3
16.3	32.0	42.9	50.4	49.6
12.5	30.6	42.2	49.9	49.2
13.3	32.4	47.1	51.3	51.8
11.5	30.3	43.2	58.3	55.7
11.7	31.9	43.1	54.7	51.8
14.6	31.0	43.2	56.5	52.6
11.1	30.3	46.2	67.5	62.0
11.0	28.9	47.2	60.3	58.6
12.4	29.6	44.8	55.8	55.5
13.0	29.5	44.7	54.7	55.1
11.6	31.0	43.4	49.4	48.0
13.1	31.7	40.6	45.2	43.4
14.8	30.2	40.7	47.8	43.3
11.5	30.5	42.5	49.4	45.6
12.4	31.8	43.4	49.4	50.9
12.0	30.6	43.9	48.3	50.8
10.1	31.5	45.4	52.8	56.5
8.4	32.3	51.6	60.1	59.9
13.3	30.7	46.1	51.8	56.5
8.4	30.2	43.0	47.7	52.1
5.2	28.4	42.7	47.2	51.3
6.4	26.9	40.3	45.7	49.9
5.9	27.9	41.0	46.9	51.9
5.4	29.9	41.2	49.0	52.4
5.2	29.6	40.0	47.6	50.5
9.2	29.2	40.9	49.8	52.4
7.8	31.8	41.3	47.3	51.2
8.4	32.4	40.1	46.8	51.2
11.6	30.4	41.6	47.2	53.2
10.7	31.2	40.7	44.7	50.0
10.4	27.4	38.9	44.4	48.8
10.0	28.9	39.2	48.5	52.4
9.7	28.3	39.4	43.0	49.0
10.7	28.4	37.9	41.4	44.2

13.6	28.4	41.3	41.2	44.3
11.4	29.2	38.0	43.8	48.7
12.0	27.2	38.6	42.8	46.9
14.2	26.3	40.6	45.1	49.9
12.4	26.6	40.9	52.0	56.1
10.9	32.9	42.8	47.9	54.3
10.1	32.5	41.6	47.9	54.5
15.6	28.1	37.0	42.1	45.4
10.9	27.2	36.6	42.2	44.7
10.2	26.1	37.9	44.2	45.8
9.1	27.2	41.6	47.3	49.8
5.6	27.5	43.5	48.7	53.1
7.6	27.8	46.6	49.3	52.9
9.7	29.8	42.9	51.1	53.1
15.0	31.0	42.2	52.4	51.9
18.3	33.9	43.6	53.5	51.5
10.9	30.9	46.6	54.0	52.5
10.6	30.2	42.2	51.7	55.1
9.4	30.2	40.7	47.8	51.1
7.7	31.5	41.3	47.7	50.7
7.2	29.9	37.3	47.6	49.5
11.1	29.8	38.2	48.0	47.7
12.7	30.0	40.0	48.0	48.3
11.7	30.8	40.3	49.2	48.8
15.4	31.8	40.4	50.2	52.6
12.2	31.9	43.2	52.0	54.7
13.0	33.9	46.8	59.5	60.6
12.6	32.4	41.8	50.0	54.5
13.4	29.9	40.1	49.3	48.9
12.1	30.7	44.4	55.6	55.1
14.1	32.6	47.1	55.4	56.4
14.5	31.1	44.6	50.9	53.0
13.7	29.9	43.9	52.3	54.6
12.7	29.5	45.1	64.3	63.2
7.0	29.3	46.4	54.1	53.8
4.7	31.9	50.8	55.0	53.7
9.5	26.8	45.2	58.3	53.8
8.3	25.7	42.0	50.2	49.2
8.1	26.4	41.8	49.7	51.6
8.7	29.5	43.6	53.6	55.8
9.0	25.4	43.1	48.3	52.9
9.1	26.2	42.0	46.9	51.8
9.5	27.3	39.6	45.8	51.4
6.1	27.4	40.2	45.1	49.5
8.6	27.6	42.2	44.9	49.1
9.2	30.1	44.2	48.2	50.0
10.8	31.1	44.1	49.3	53.7
12.0	29.9	40.4	46.3	48.3

10.6	29.6	40.9	47.0	47.5
12.4	30.3	41.5	46.8	46.0
11.4	29.7	39.5	45.6	45.7
9.5	29.5	38.1	45.3	45.4
10.7	29.7	39.5	46.1	46.7
12.8	30.5	47.5	50.6	55.2
12.1	31.5	47.7	53.8	57.3
13.6	29.7	47.5	54.7	57.7
10.2	30.9	47.8	52.0	57.6
8.8	32.0	45.3	53.6	57.8
7.2	30.9	43.8	49.5	51.5
5.1	28.9	41.5	49.7	51.6
5.2	30.7	42.0	55.6	54.2
8.2	30.0	46.1	56.2	55.9
9.9	27.0	49.4	58.3	59.7
8.7	25.9	37.5	45.2	48.1
9.4	26.8	37.2	45.1	48.1
7.5	27.2	36.6	43.9	47.5
9.7	27.1	38.0	43.9	48.0
12.0	27.3	38.7	45.4	49.4
12.2	29.3	40.3	46.3	49.7
12.2	31.3	40.8	53.8	56.0
11.5	31.9	43.0	54.3	56.6
14.7	32.5	45.5	54.2	55.9
9.0	30.1	39.8	50.6	57.4
7.7	29.4	39.0	46.1	49.3

1/1 LASmin 500	1/1 LASmin 1000	1/1 LASmin 2000	1/1 LASmin 4000	1/1 LASmin 8000
56.6	60.8	56.4	48.8	45.2
50.1	54.3	52.0	46.5	41.5
50.1	53.0	51.3	46.3	40.6
51.1	53.3	52.2	46.7	39.8
53.8	56.9	53.8	47.4	39.4
54.5	57.8	54.6	48.0	39.6
63.0	64.1	61.1	56.3	46.2
51.5	55.3	51.6	45.8	39.4
47.2	51.1	48.6	44.9	38.7
46.4	50.6	48.4	45.0	38.8
46.5	51.6	49.1	45.2	38.7
51.4	55.2	51.8	46.4	36.6
53.0	56.4	52.5	44.0	32.5
52.9	56.3	52.5	43.7	31.9
54.8	58.4	54.9	47.4	37.4
56.3	59.2	56.3	48.7	36.4
53.9	56.8	52.2	43.8	32.2
54.2	56.8	52.1	43.7	32.1
56.5	57.3	54.0	45.6	36.1
60.1	63.8	59.8	50.3	38.2
58.5	64.1	60.0	50.4	38.7
57.9	61.9	58.2	48.8	36.8
54.2	59.0	53.9	43.7	34.3
47.6	53.5	49.4	38.0	27.1
47.3	52.2	48.1	38.1	28.5
49.2	52.2	48.0	39.5	30.1
54.7	58.1	54.1	46.6	37.4
53.7	58.1	53.9	46.0	36.5
61.1	66.3	62.5	55.0	44.2
62.6	65.9	62.3	55.2	44.8
60.6	67.0	63.3	53.2	41.4
56.0	61.9	59.7	50.0	39.2
55.9	61.1	57.2	48.4	38.6
54.1	58.1	54.7	44.1	31.5
54.6	58.5	54.7	44.1	31.3
56.3	59.3	55.2	45.6	33.4
54.6	57.8	54.3	43.7	31.4
55.0	59.5	55.8	45.5	32.9
56.1	60.6	56.9	46.8	33.7
57.3	62.6	58.0	48.2	36.1
56.5	62.2	59.1	48.9	36.1
55.0	60.9	57.1	46.3	33.5
53.2	58.2	54.4	44.0	31.1
57.6	62.8	58.8	50.1	38.3
53.3	59.2	54.7	44.9	32.8
48.4	52.2	47.6	38.4	28.1

47.7	50.4	46.3	38.3	27.6
50.0	54.1	50.6	43.6	31.9
48.9	51.9	48.8	41.3	29.7
54.4	59.4	55.4	48.1	37.0
61.1	65.3	61.7	53.7	43.4
59.1	63.2	59.9	50.9	39.7
58.9	63.3	60.5	53.7	41.7
48.8	52.9	48.5	40.3	29.1
48.6	52.2	47.8	39.2	27.9
49.5	53.9	50.9	40.5	27.8
51.4	53.9	50.0	41.0	29.3
55.0	54.5	50.1	43.0	32.5
52.5	54.3	50.5	43.0	31.9
52.6	54.3	50.6	42.8	32.3
53.9	55.0	50.6	42.4	31.5
54.1	55.0	51.6	43.9	32.9
55.5	58.0	54.6	46.0	37.8
59.1	63.2	58.5	50.2	38.3
56.9	61.0	56.0	46.8	34.5
57.3	61.1	56.6	48.6	35.9
55.3	61.4	58.2	48.4	35.9
53.6	56.8	53.0	44.5	32.4
53.2	55.3	51.8	43.3	31.2
53.3	56.3	53.3	45.7	34.4
55.9	59.8	55.5	47.4	36.7
57.8	59.5	55.6	50.0	40.0
64.1	67.1	63.3	57.1	48.1
60.2	64.8	61.6	53.6	42.6
53.1	57.2	54.1	45.4	33.3
57.1	59.9	60.9	53.0	42.9
60.9	66.6	62.9	53.3	41.5
54.2	57.0	53.3	46.8	36.5
53.2	56.1	52.4	46.2	35.2
55.0	56.3	52.9	46.0	34.9
53.4	56.1	53.0	45.3	33.7
54.6	57.6	54.2	46.5	34.5
55.0	58.7	55.4	47.0	35.4
53.1	57.5	53.7	44.2	31.8
52.3	56.5	53.8	45.3	33.0
60.2	64.4	60.6	52.8	44.6
57.4	62.3	58.1	48.6	37.5
56.7	63.2	59.7	50.0	37.6
55.2	61.0	57.8	47.0	35.1
52.4	58.7	54.4	43.6	31.1
51.6	57.0	53.0	42.1	30.6
51.8	57.4	53.9	42.6	33.2
55.6	59.5	56.0	46.9	35.4
51.1	54.1	50.8	43.1	31.7

50.6	53.2	50.1	42.9	31.7
49.0	52.5	49.1	42.5	31.2
48.4	51.6	49.2	42.4	31.4
47.9	51.6	49.1	42.4	31.3
48.4	52.2	49.2	42.4	31.3
58.6	62.2	61.3	55.8	46.2
62.2	66.4	62.6	54.8	44.3
61.8	66.5	63.0	54.9	43.4
62.6	68.1	64.6	54.5	42.7
62.5	67.2	63.9	53.9	41.8
53.7	57.4	53.8	45.3	34.0
53.7	56.9	53.2	45.0	34.0
54.2	57.3	54.1	47.1	34.7
58.3	63.1	60.0	51.2	38.3
59.1	63.8	58.9	47.5	34.2
53.4	60.2	56.4	44.8	31.8
53.9	60.6	57.8	46.8	32.2
53.3	59.3	55.3	42.7	29.3
52.4	56.9	53.4	42.6	29.1
54.0	58.2	55.4	46.7	34.8
52.8	57.9	54.6	44.5	33.7
55.8	59.9	56.5	47.6	37.7
61.1	64.5	62.5	57.0	47.6
59.5	63.2	60.5	54.8	46.0
58.9	58.5	53.1	41.8	31.2
52.7	55.5	50.9	39.6	30.1

1/1 LASmin 16000	1/3 LASeq 6.3	1/3 LASeq 8.0	1/3 LASeq 10.0	1/3 LASeq 12.5
28.8	1.9	0.9	0.3	1.1
28.4	1.9	0.9	0.3	-0.8
28.0	1.9	0.9	0.3	0.0
27.7	1.9	0.9	0.3	-0.7
27.1	1.9	0.9	0.3	-0.8
27.2	1.9	0.9	0.3	2.8
34.3	1.9	0.9	0.3	-0.2
29.0	1.9	0.9	0.3	1.0
27.6	1.9	0.9	0.3	2.0
27.7	1.9	0.9	0.3	1.2
27.5	1.9	0.9	0.6	2.2
22.4	1.9	0.9	1.7	7.2
17.7	1.9	1.0	6.2	10.9
17.2	1.9	0.9	0.6	4.7
20.8	1.9	0.9	1.9	6.5
20.8	1.9	0.9	1.7	3.6
18.0	1.9	0.9	0.3	3.2
17.8	1.9	0.9	2.7	4.4
21.3	1.9	0.9	1.0	3.1
22.3	1.9	0.9	0.3	-0.8
23.7	1.9	0.9	0.3	-0.8
19.6	1.9	0.9	0.3	-0.7
19.0	1.9	0.9	0.3	1.0
16.8	1.9	0.9	1.3	5.9
16.3	1.9	0.9	2.5	4.5
16.8	1.9	0.9	1.0	0.6
20.0	1.9	0.9	0.3	-0.7
19.5	1.9	0.9	0.3	0.2
29.4	1.9	0.9	0.3	3.6
30.5	1.9	0.9	0.3	3.0
25.7	1.9	1.0	5.3	11.0
25.1	1.9	0.9	0.7	1.1
23.5	1.9	0.9	0.3	-0.8
18.5	1.9	0.9	0.3	-0.8
17.7	1.9	0.9	0.3	2.0
17.5	1.9	0.9	0.3	-0.4
17.1	1.9	0.9	0.3	-0.8
18.9	1.9	0.9	0.3	0.3
19.3	1.9	0.9	0.3	-0.5
21.7	1.9	0.9	0.4	0.6
21.1	1.9	0.9	0.9	5.9
19.1	1.9	0.9	0.3	-0.8
17.0	1.9	0.9	0.3	3.0
23.0	1.9	0.9	0.3	-0.8
18.1	1.9	0.9	0.3	-0.8
16.7	1.9	0.9	0.9	5.3

16.3	1.9	0.9	0.4	5.8
17.9	1.9	0.9	0.3	4.2
17.0	1.9	0.9	0.3	-0.8
22.2	1.9	0.9	3.3	7.4
31.4	1.9	0.9	0.3	1.1
26.1	1.9	0.9	0.4	0.9
26.5	1.9	0.9	0.3	-0.8
16.8	1.9	2.1	1.5	8.7
16.9	1.9	0.9	0.3	3.8
16.4	1.9	0.9	0.3	-0.8
16.9	1.9	0.9	0.3	-0.7
18.0	1.9	0.9	0.3	-0.8
17.7	1.9	0.9	0.3	-0.8
17.7	1.9	0.9	0.3	0.9
18.0	1.9	0.9	2.1	10.1
19.3	1.9	4.1	8.3	16.8
19.8	1.9	2.6	3.5	7.2
23.1	1.9	0.9	0.3	-0.7
19.9	1.9	0.9	0.3	-0.8
21.9	1.9	0.9	0.3	-0.1
19.8	1.9	0.9	0.3	-0.8
18.4	1.9	0.9	7.5	14.2
17.6	3.6	3.7	7.4	11.9
20.5	1.9	1.0	0.3	1.5
22.9	1.9	0.9	0.9	4.9
24.2	1.9	0.9	1.7	7.8
34.3	1.9	0.9	0.3	-0.7
29.5	1.9	0.9	0.3	-0.8
19.0	1.9	0.9	0.3	2.2
28.4	1.9	0.9	0.3	-0.7
27.4	1.9	0.9	0.3	1.9
21.9	1.9	0.9	0.3	3.2
19.3	1.9	0.9	1.6	6.8
19.6	1.9	0.9	0.6	3.1
18.4	1.9	0.9	0.3	1.2
18.9	1.9	0.9	0.3	-0.8
19.4	1.9	0.9	0.3	0.3
17.2	1.9	0.9	0.3	-0.6
18.2	1.9	0.9	0.3	-0.7
30.0	1.9	0.9	0.3	2.4
22.7	1.9	0.9	0.3	-0.8
22.8	1.9	0.9	0.3	-0.8
20.0	1.9	0.9	0.3	-0.8
17.2	1.9	0.9	0.3	-0.8
16.9	1.9	0.9	0.3	-0.6
30.8	1.9	0.9	0.3	-0.8
26.6	1.9	0.9	0.3	-0.8
18.5	1.9	0.9	0.3	-0.8

17.9	1.9	0.9	0.3	-0.8
19.5	1.9	0.9	0.3	1.9
20.3	1.9	0.9	0.3	2.8
17.7	1.9	0.9	0.3	0.0
17.7	1.9	0.9	0.3	-0.8
34.3	1.9	0.9	0.5	2.5
31.5	1.9	0.9	0.3	3.5
28.4	1.9	0.9	0.3	-0.5
27.5	1.9	0.9	0.3	0.3
26.3	1.9	0.9	0.3	-0.8
18.9	1.9	0.9	0.3	-0.8
18.8	1.9	0.9	0.3	-0.8
19.6	1.9	0.9	0.3	-0.8
21.7	1.9	0.9	0.3	-0.1
18.7	1.9	0.9	0.3	4.4
17.1	1.9	0.9	0.3	-0.8
17.3	1.9	0.9	0.3	-0.8
16.1	1.9	0.9	0.3	-0.8
16.1	1.9	0.9	0.3	-0.8
18.8	1.9	0.9	0.3	-0.7
19.5	1.9	0.9	0.3	-0.8
23.9	1.9	0.9	0.3	0.2
38.0	1.9	0.9	0.3	3.6
34.7	1.9	0.9	0.3	5.6
18.8	1.9	0.9	0.3	5.5
16.4	1.9	0.9	0.3	-0.8

1/3 LASeq 16.0	1/3 LASeq 20.0	1/3 LASeq 25.0	1/3 LASeq 31.5	1/3 LASeq 40.0	1/3 LASeq 50.0
13.9	18.5	23.2	28.5	33.0	33.1
3.1	12.0	22.9	27.4	29.9	31.2
1.1	11.9	20.9	28.7	28.1	31.0
3.6	12.7	21.6	28.0	27.0	31.8
-1.4	12.0	21.1	28.3	29.9	32.4
4.9	13.8	20.9	27.2	28.9	34.0
3.0	10.3	20.0	27.0	30.0	46.0
8.3	12.6	19.8	27.3	31.2	40.9
6.3	12.0	19.2	26.9	27.4	34.6
6.7	12.0	22.0	28.1	26.9	33.3
8.7	14.9	22.7	26.7	29.7	35.6
11.8	18.1	21.1	27.0	29.1	35.2
14.7	18.5	23.3	27.6	32.0	35.7
9.7	13.4	18.7	26.6	29.9	35.3
12.0	13.7	22.0	29.4	31.9	40.6
8.6	12.6	19.1	24.2	30.1	36.7
8.3	12.5	20.4	24.6	32.0	34.4
10.0	15.6	21.1	22.4	32.1	36.5
8.2	11.4	18.0	21.8	32.3	38.3
1.9	11.5	17.4	24.4	28.6	38.8
3.4	13.1	18.1	25.0	29.6	35.1
2.4	14.2	18.2	24.0	29.6	35.7
5.6	14.7	20.8	25.1	31.1	33.7
11.6	16.2	20.5	26.6	34.0	32.5
10.4	18.1	19.0	26.6	31.2	31.4
4.4	13.5	19.3	26.3	31.7	31.6
3.3	13.4	20.8	26.7	30.9	33.9
5.4	14.1	20.3	26.8	30.5	36.5
9.6	14.4	17.9	24.6	31.8	34.6
6.6	12.8	20.5	25.6	32.9	36.0
14.9	17.2	23.0	26.7	31.6	36.3
4.8	10.9	18.3	24.7	31.7	37.4
-1.0	8.6	17.0	20.9	30.8	33.5
1.7	7.0	16.3	24.9	30.4	34.7
2.9	11.5	17.2	22.0	33.5	35.3
0.6	8.7	18.2	23.5	32.5	36.4
-0.6	7.3	17.5	27.2	33.5	34.4
7.6	11.3	18.2	23.4	29.3	33.8
3.7	7.6	21.1	25.2	33.2	33.7
4.4	12.1	23.5	24.4	34.5	34.6
8.9	15.1	22.2	23.7	30.5	38.0
2.4	12.0	19.5	21.6	32.6	38.2
3.4	13.1	21.2	22.0	28.1	35.4
1.3	10.7	22.4	22.2	27.5	32.9
2.0	10.8	21.1	22.0	29.2	34.0
7.9	13.6	22.6	24.1	28.1	33.1

10.8	14.6	21.8	23.5	28.1	34.8
8.8	13.9	19.9	22.6	30.7	37.1
0.9	12.6	20.6	23.8	26.9	32.7
12.5	14.8	22.9	23.7	27.0	34.3
4.2	13.0	21.6	21.3	28.2	33.5
5.2	11.4	22.3	22.0	38.7	41.5
3.2	12.1	21.4	23.0	34.0	36.7
13.6	17.3	24.4	26.3	31.2	34.3
7.0	13.6	21.7	23.4	25.2	32.0
3.7	12.0	20.8	22.7	27.8	34.9
2.4	11.0	18.8	24.0	27.6	35.5
2.2	6.7	16.5	20.8	28.8	34.7
1.6	8.2	17.2	20.4	28.1	35.2
7.9	12.7	18.6	26.0	31.2	34.3
14.6	20.6	22.5	28.1	32.1	34.5
22.0	24.9	29.9	32.3	36.6	38.5
11.3	13.3	21.8	24.6	32.4	40.9
3.7	11.4	21.3	24.6	32.3	35.8
0.0	10.7	20.2	23.0	30.3	35.0
0.8	10.5	21.4	24.0	31.6	34.1
-0.7	11.6	20.8	22.3	30.8	33.8
19.0	23.4	26.6	29.3	34.2	34.6
17.3	18.1	22.8	24.8	31.6	34.6
4.8	13.8	20.4	24.0	30.8	33.5
9.6	17.6	23.5	27.3	31.8	37.1
11.0	15.7	23.1	26.9	31.7	38.3
4.4	14.9	23.4	29.0	33.8	42.7
2.4	14.3	21.3	25.0	35.4	40.5
6.9	14.9	21.2	24.8	31.9	37.2
4.2	12.9	23.5	31.9	37.6	43.9
7.8	14.6	21.9	25.9	33.8	39.8
10.1	15.4	20.9	23.3	31.5	36.7
11.3	16.8	20.6	24.2	30.7	36.4
8.0	13.9	19.4	24.2	31.8	37.1
3.0	9.1	15.7	24.2	30.7	38.7
-0.7	7.1	15.1	23.5	34.6	42.8
10.0	11.4	17.8	23.8	30.7	37.4
5.6	8.5	15.7	19.7	26.1	33.6
3.7	10.0	18.4	21.5	27.1	33.6
9.1	10.9	17.4	22.6	29.9	34.1
2.4	8.9	16.4	21.3	27.5	31.8
3.6	9.5	16.7	20.4	26.6	33.1
4.1	10.3	17.7	19.9	28.0	31.8
-0.6	7.8	16.3	21.1	29.1	33.7
0.8	10.9	20.1	24.2	34.3	34.6
3.5	9.1	18.3	27.4	31.5	35.3
6.0	13.7	20.3	28.8	31.3	34.5
8.3	13.7	19.8	27.8	27.4	34.4

1.1	12.1	20.2	27.7	28.3	34.0
6.6	14.9	22.2	26.2	29.4	33.1
5.7	11.8	21.7	27.2	29.0	33.4
2.7	12.0	20.9	25.4	29.6	32.8
-0.1	12.6	20.3	26.3	29.2	35.1
6.4	13.2	21.6	26.1	30.3	36.4
9.6	12.9	23.1	23.8	31.1	38.6
7.4	15.3	22.6	25.0	30.6	38.7
7.9	13.6	21.5	25.0	33.7	38.9
3.4	10.0	20.7	24.0	34.4	38.7
1.1	8.0	19.2	20.5	31.3	35.5
1.4	5.9	16.1	19.8	29.3	34.8
-0.3	5.8	17.9	22.0	32.2	35.6
3.5	9.7	17.3	24.2	30.9	35.6
6.8	11.9	18.9	23.5	27.7	37.3
0.3	10.3	18.3	21.3	25.4	33.3
2.9	9.8	18.3	20.5	26.8	31.3
0.3	8.7	18.3	21.8	28.3	31.6
2.8	11.4	18.3	22.9	26.6	28.9
7.0	13.9	18.9	23.8	26.4	30.5
1.8	13.3	20.5	23.1	30.5	34.5
4.9	13.6	20.5	26.9	30.9	37.3
8.7	14.1	22.2	25.3	33.3	37.5
9.7	16.2	23.7	27.0	33.2	38.1
8.4	13.3	22.7	26.4	30.4	35.1
0.1	8.8	21.7	24.9	29.5	32.8

1/3 LASeq 63.0	1/3 LASeq 80.0	1/3 LASeq 100	1/3 LASeq 125	1/3 LASeq 160	1/3 LASeq 200
40.9	47.6	54.3	60.0	51.0	57.7
34.4	38.2	49.5	49.0	44.3	51.4
34.9	41.3	40.8	39.4	41.8	45.0
39.8	42.6	40.3	41.8	43.3	44.9
37.3	38.6	43.4	44.9	46.3	48.5
41.8	49.1	50.2	56.4	53.5	55.5
52.2	62.8	67.5	73.3	71.9	67.4
49.5	54.7	62.7	64.6	63.7	60.0
34.6	40.7	45.9	46.4	48.3	46.8
33.7	38.0	41.0	42.4	43.4	40.1
40.8	42.4	42.6	42.9	42.7	41.3
39.0	47.1	43.4	44.9	45.8	44.5
38.8	42.6	43.7	47.5	47.3	44.8
39.6	41.2	45.8	47.3	45.9	44.8
44.5	44.1	47.0	54.0	59.5	52.6
40.8	42.8	45.9	53.8	59.2	52.0
38.7	43.4	47.1	51.1	54.0	50.4
38.0	43.5	47.3	55.9	60.7	57.3
47.0	47.6	57.1	66.6	75.3	70.2
43.6	52.1	53.4	68.5	66.7	63.7
40.2	45.4	47.5	55.5	54.2	52.6
41.4	44.2	55.1	52.2	51.4	52.8
40.6	45.8	50.6	55.6	50.4	50.2
34.8	40.8	41.6	42.8	42.4	41.3
36.4	42.2	44.8	49.2	46.6	43.6
38.6	42.4	50.7	49.5	54.5	48.1
40.3	42.6	50.0	52.2	50.3	52.1
38.0	43.1	44.3	50.3	45.4	48.2
48.9	46.2	53.9	56.8	51.5	54.7
51.0	52.2	63.8	62.9	56.9	60.2
46.3	44.9	51.2	50.8	50.3	52.2
42.7	40.1	44.0	47.7	48.4	48.5
40.1	43.1	40.1	44.6	44.5	46.1
38.2	37.9	41.0	43.9	43.0	46.1
37.8	38.9	41.4	43.9	44.8	49.1
38.1	39.9	41.5	49.5	49.7	48.6
38.3	37.6	43.1	44.4	47.3	45.9
38.9	37.6	41.5	44.2	49.6	46.4
38.4	38.7	41.7	43.2	45.4	47.2
37.6	38.6	42.9	43.7	44.8	46.4
38.1	40.1	44.5	44.9	45.0	46.0
37.8	37.4	39.4	41.1	43.3	45.1
37.9	37.1	38.9	42.8	48.6	52.6
37.2	39.3	46.6	45.9	51.0	53.8
37.9	36.3	38.7	40.6	42.4	45.3
35.5	33.7	34.9	37.3	39.0	40.8

42.7	36.2	35.7	38.3	41.5	47.6
39.8	34.4	38.2	44.3	42.3	46.9
35.5	38.1	38.9	38.3	41.5	43.3
37.2	39.1	41.9	47.0	48.8	48.7
39.6	40.8	45.1	52.6	50.8	53.2
40.3	40.2	40.6	46.4	46.3	47.6
36.1	44.7	44.7	46.6	50.6	52.8
35.2	36.6	39.1	40.9	42.5	44.2
33.8	33.2	36.6	39.6	39.0	38.9
40.6	41.8	42.6	42.2	44.9	42.7
37.7	40.1	44.6	43.6	44.1	46.1
40.5	44.4	45.4	48.9	45.2	48.0
38.6	51.1	46.8	48.3	45.9	47.4
38.2	47.1	45.0	48.9	48.9	52.8
38.1	40.7	45.5	51.2	50.7	49.7
39.6	43.6	47.5	54.7	48.0	47.9
40.3	47.5	50.6	50.4	51.2	50.8
40.1	43.2	48.6	51.2	48.3	49.6
36.3	39.2	43.7	46.0	45.0	46.5
39.3	39.9	44.2	43.1	45.0	46.5
35.7	35.8	42.0	43.2	44.7	45.4
37.4	36.4	42.6	44.2	44.8	44.2
36.7	37.1	42.1	44.0	45.1	43.3
36.5	40.1	43.1	44.4	46.7	45.0
36.7	38.1	43.8	46.5	49.5	54.4
43.4	44.2	54.6	58.2	57.7	56.5
45.2	49.8	59.4	68.0	59.1	61.8
37.4	39.9	50.6	51.4	49.8	52.7
39.4	37.0	47.4	46.5	44.4	46.9
45.2	56.7	60.1	54.6	55.2	55.6
43.8	48.3	52.7	53.1	49.8	51.9
41.4	43.0	48.6	51.4	46.3	49.1
40.4	41.1	46.5	56.9	48.5	55.7
41.7	45.5	52.7	65.8	53.4	62.3
46.0	49.0	53.0	57.6	50.3	56.9
40.3	51.3	50.1	57.7	56.1	52.4
39.9	49.9	49.4	56.5	58.7	51.9
38.6	41.4	45.8	54.4	49.4	46.1
36.4	43.2	45.3	48.6	48.7	50.7
39.5	42.9	49.4	50.1	52.7	51.7
40.3	42.5	43.5	45.0	50.3	48.8
38.7	42.8	42.1	46.2	44.0	47.1
36.1	37.9	39.4	42.9	43.6	45.5
40.5	38.1	40.1	41.1	42.2	45.7
40.9	43.1	41.5	43.9	43.8	43.2
39.6	46.3	42.8	46.8	44.0	44.2
41.3	42.9	41.7	45.5	48.6	52.0
39.1	39.1	41.8	43.3	46.0	48.0

37.2	38.7	43.5	43.7	42.9	41.5
38.0	39.9	41.8	43.4	44.0	40.5
35.1	37.4	42.7	41.7	42.0	39.5
35.1	36.5	39.0	41.7	42.1	38.6
37.6	39.6	42.2	42.6	43.6	41.2
45.7	49.5	47.2	46.7	48.3	49.4
46.8	46.2	47.1	57.2	55.0	51.2
46.0	45.3	46.3	55.2	57.4	51.8
46.5	45.5	45.5	49.5	51.7	52.0
43.6	47.7	44.3	57.3	52.3	51.9
42.0	43.7	43.4	49.6	47.1	47.3
38.8	39.7	43.2	57.4	48.8	49.9
39.8	43.0	48.9	55.3	52.5	51.0
47.6	47.8	62.7	55.4	63.7	60.2
49.1	49.7	59.6	55.8	63.6	62.2
35.1	43.9	47.6	45.5	49.7	48.7
33.1	38.3	40.5	40.4	42.9	43.9
32.5	35.2	39.4	39.8	42.1	43.2
35.2	36.2	37.4	40.4	42.6	43.8
34.9	37.5	38.2	42.4	42.8	44.7
33.8	38.7	42.5	48.6	44.0	45.6
37.0	39.6	46.8	51.5	53.4	49.7
45.1	52.6	51.0	49.7	53.6	52.3
41.5	45.3	56.8	63.3	73.4	77.1
38.9	41.8	46.8	52.8	62.6	66.3
35.4	36.8	39.8	43.4	45.2	47.2

1/3 LASeq 250	1/3 LASeq 315	1/3 LASeq 400	1/3 LASeq 500	1/3 LASeq 630	1/3 LASeq 800
54.4	54.4	53.3	55.2	58.2	57.3
45.2	48.1	46.4	49.1	49.8	51.0
42.1	43.7	44.2	47.5	46.5	47.9
44.9	47.1	47.2	49.4	50.1	51.5
46.0	47.1	49.0	50.9	50.6	53.1
52.0	53.6	53.3	55.5	56.0	56.4
65.4	63.1	61.0	62.4	61.8	63.1
57.5	55.1	53.3	55.4	55.2	56.6
42.4	41.4	42.5	43.8	45.2	47.4
38.9	38.4	40.4	42.4	43.5	46.0
41.8	43.3	43.8	45.1	45.4	47.3
46.4	48.0	47.8	48.1	49.6	51.1
46.4	46.6	47.9	50.0	50.9	52.0
46.8	45.7	47.7	49.2	50.3	52.8
50.8	50.8	52.8	54.6	52.6	54.1
52.1	51.7	52.0	53.5	52.9	55.5
49.5	48.4	49.4	50.1	51.6	53.9
51.5	52.5	50.1	50.1	50.9	52.4
63.7	66.2	62.1	62.6	62.1	62.1
61.5	60.9	58.5	60.1	61.0	62.0
53.0	50.9	52.5	55.5	57.5	59.8
50.2	49.2	50.2	54.4	56.8	57.3
48.5	46.2	48.1	51.0	55.0	56.4
40.5	39.8	42.1	44.2	48.4	50.2
40.3	38.2	41.7	44.2	44.9	47.9
48.9	46.0	46.8	49.5	50.1	50.8
51.8	50.7	51.1	53.2	54.7	55.2
52.9	50.5	53.2	54.8	55.8	58.6
53.6	54.1	55.9	57.2	59.2	61.4
57.3	57.9	58.2	59.2	61.4	61.8
53.2	55.1	55.3	57.2	59.2	62.1
53.2	52.1	53.0	55.4	56.9	60.0
48.6	48.4	50.7	53.0	55.8	58.2
48.7	47.2	48.9	50.8	53.5	55.7
50.6	52.9	57.4	56.7	58.5	56.1
49.8	48.7	50.8	52.6	54.1	55.5
47.7	48.2	48.4	52.9	53.4	54.9
50.0	48.1	49.4	50.9	53.5	55.9
49.1	48.7	50.4	52.2	54.5	56.3
48.6	48.0	50.8	52.9	55.3	58.1
50.4	49.8	50.6	52.6	54.7	57.6
48.8	48.4	49.4	52.0	54.3	57.4
52.7	53.9	52.6	51.9	53.9	54.7
56.8	54.3	54.8	55.2	58.2	59.1
47.4	47.1	48.0	50.8	54.0	57.2
41.0	41.7	43.9	46.6	46.5	49.3

42.0	42.9	46.3	48.0	45.2	45.9
47.8	46.2	50.2	52.3	51.8	52.1
44.1	44.3	46.4	47.1	49.7	52.0
50.6	51.0	52.1	54.0	55.7	57.1
54.1	54.5	55.1	58.4	59.5	60.6
50.6	51.5	53.6	55.0	56.7	59.2
53.5	51.6	54.7	55.9	58.8	60.3
45.7	44.9	46.7	48.6	51.3	53.1
40.6	41.7	41.5	44.4	45.8	47.9
43.7	45.9	44.8	47.3	46.9	49.1
50.5	48.0	48.7	48.9	50.1	49.6
50.0	51.9	50.9	51.6	51.9	51.3
50.9	48.3	47.3	48.8	50.1	50.5
50.8	47.2	47.7	49.3	50.2	51.8
47.7	46.3	48.4	49.6	50.8	51.9
47.2	46.8	48.8	50.7	51.1	51.9
50.1	50.6	51.8	53.4	54.6	56.8
51.4	52.1	53.0	55.2	56.9	59.8
48.6	51.0	50.5	53.8	54.6	57.3
48.8	48.2	49.8	54.1	54.9	57.8
47.5	46.6	49.1	51.9	54.4	57.1
44.7	43.5	45.9	48.6	52.6	54.3
45.3	43.3	44.3	47.8	51.8	51.6
46.3	46.5	48.5	50.4	51.4	53.6
51.5	50.2	52.2	55.6	56.7	56.9
57.6	58.5	56.0	58.9	62.5	62.2
61.8	64.1	62.9	62.0	65.0	65.9
52.3	53.4	55.2	56.6	60.0	61.3
46.9	47.7	50.4	50.9	53.1	55.3
54.6	55.9	54.0	57.2	58.6	60.1
52.5	53.6	57.5	58.2	61.1	65.1
48.7	51.8	54.4	54.1	57.4	60.9
51.6	49.3	49.3	49.0	50.5	51.7
57.3	52.7	50.6	51.3	52.4	52.6
53.0	49.5	48.5	49.5	50.6	51.8
52.4	50.3	52.1	54.1	56.1	59.4
53.0	50.6	50.9	52.0	53.1	55.4
48.5	45.4	48.3	49.5	50.0	52.8
57.0	51.2	52.6	56.0	57.6	59.7
53.2	53.2	55.8	57.4	60.0	62.1
49.6	50.1	53.1	53.2	55.1	58.5
50.1	49.9	51.5	53.8	56.0	58.9
48.3	49.0	49.2	50.6	52.8	56.1
47.0	46.9	47.6	49.0	51.2	54.3
46.8	44.6	45.6	47.8	48.5	51.9
48.4	46.2	47.8	50.0	51.1	53.9
52.0	54.1	54.6	54.7	55.1	57.0
48.7	50.2	50.9	51.8	52.1	53.4

44.7	43.6	46.4	45.8	47.1	48.6
42.8	42.1	43.9	44.8	45.7	47.4
42.7	43.0	43.6	44.6	44.8	46.4
42.3	42.5	43.2	43.6	44.2	46.9
45.8	47.4	48.1	48.2	49.8	51.8
52.4	52.8	53.2	56.2	57.0	59.2
56.4	59.2	55.8	59.2	59.0	62.1
55.2	56.9	56.0	57.6	59.1	61.7
55.3	54.3	57.0	59.0	60.4	63.4
54.4	56.1	56.8	61.3	61.5	63.7
50.7	50.7	51.7	54.7	55.4	58.2
52.5	49.2	48.9	49.8	50.3	52.2
50.8	49.6	49.5	51.0	53.4	55.5
64.6	65.1	58.7	59.0	60.0	60.3
63.8	64.6	59.8	59.8	60.5	62.1
50.1	48.4	49.1	50.5	53.3	56.9
45.7	44.8	46.0	49.5	52.7	56.6
46.0	44.8	46.7	50.6	55.0	57.6
46.6	46.0	47.8	51.3	51.5	53.3
45.5	46.6	49.3	51.1	52.7	53.7
49.4	47.3	46.7	49.0	51.2	53.1
54.9	55.1	53.9	55.6	55.9	57.7
55.0	55.4	56.6	57.4	58.4	59.8
78.8	65.7	72.8	79.0	79.2	75.8
69.8	54.5	62.3	69.8	68.6	66.2
50.2	47.2	50.3	53.6	54.2	56.9

1/3 LASeq 1000	1/3 LASeq 1250	1/3 LASeq 1600	1/3 LASeq 2000	1/3 LASeq 2500
59.0	57.7	56.3	53.2	50.1
54.2	53.6	51.7	49.5	47.0
49.3	49.1	48.7	47.1	44.5
52.3	52.8	51.3	49.1	47.0
54.6	53.6	51.9	49.7	46.9
56.9	56.1	54.5	54.4	53.5
64.8	62.6	61.1	59.4	57.4
58.7	57.2	55.2	52.9	50.7
48.9	48.6	46.5	44.6	43.2
46.7	46.5	44.8	43.8	42.7
49.0	48.4	46.9	45.3	43.6
52.2	51.6	50.4	48.6	46.8
52.9	51.2	50.4	48.3	45.8
53.4	52.0	51.0	48.5	45.7
54.9	54.2	52.9	50.7	48.7
56.3	55.7	54.6	53.2	51.0
54.5	53.0	51.7	49.3	47.2
53.0	51.2	49.6	47.5	45.0
60.4	58.5	56.7	55.1	53.8
62.1	60.2	58.6	55.9	53.5
60.5	59.8	57.8	55.1	52.2
58.9	58.5	56.9	54.0	50.8
57.5	57.5	55.8	51.8	48.3
51.6	51.6	49.2	45.0	41.1
48.7	48.3	47.3	44.0	40.0
51.9	51.6	49.2	46.1	44.6
56.4	55.1	52.3	49.9	48.1
61.4	59.6	57.0	55.7	54.2
62.9	62.0	60.7	58.7	56.1
61.8	61.3	59.8	58.1	55.5
63.9	63.1	61.7	59.1	56.0
62.2	61.2	59.9	57.4	54.0
58.6	58.1	57.2	55.1	51.8
55.9	55.3	53.9	51.8	48.7
57.1	56.7	54.9	52.0	48.2
55.9	54.6	53.1	50.6	47.9
54.7	53.6	52.9	50.1	46.4
56.3	54.8	54.3	51.7	47.7
57.2	56.0	55.3	52.5	49.0
59.5	58.1	56.6	54.0	51.0
59.8	58.8	57.6	55.4	52.2
59.7	58.7	57.1	54.5	51.0
57.2	55.1	53.7	50.5	47.2
60.7	58.5	57.8	54.3	53.1
58.4	56.9	54.9	52.1	49.1
51.5	50.8	48.4	44.8	41.5

48.0	47.2	45.1	43.2	41.1
56.1	54.3	52.7	51.0	49.1
52.1	50.5	49.4	46.9	45.0
59.2	57.8	55.9	53.6	52.6
62.9	61.5	60.2	58.8	56.6
59.8	59.4	58.2	55.3	52.5
61.8	62.4	61.9	58.0	58.2
54.1	54.0	52.2	49.0	48.3
49.0	48.1	46.9	44.4	41.9
50.4	50.2	49.0	46.1	42.9
50.0	49.0	47.4	45.0	42.9
51.3	50.4	49.3	47.0	44.8
50.6	49.8	48.3	45.7	43.8
52.4	51.1	48.6	45.5	43.0
52.2	50.4	48.5	45.6	43.1
52.1	50.9	50.3	47.5	45.4
58.4	56.8	55.4	53.0	50.1
59.8	58.6	57.1	54.1	51.6
58.3	56.9	55.1	51.9	49.0
57.9	56.4	54.8	52.0	48.9
58.6	57.3	56.1	53.2	50.2
54.7	54.1	53.0	50.5	48.4
51.4	51.2	49.5	47.2	45.2
55.2	53.6	52.6	49.8	47.8
56.8	55.8	54.0	51.6	49.9
60.1	60.3	58.4	59.1	58.1
64.6	64.1	62.7	61.3	60.0
61.7	60.9	59.1	58.1	56.6
57.1	55.9	55.0	52.8	50.8
61.1	61.0	61.4	59.7	57.4
65.3	64.1	63.0	60.0	56.4
60.5	59.4	57.3	53.7	50.7
52.2	51.5	50.0	48.3	46.1
52.5	51.3	50.4	48.3	46.3
52.6	51.6	50.3	48.4	46.0
61.1	60.5	58.9	56.3	53.0
56.9	55.9	54.9	51.9	49.2
54.3	52.8	51.5	49.2	46.4
61.4	60.9	59.4	58.8	57.1
62.6	61.8	60.7	59.5	57.6
59.1	57.9	56.3	54.3	51.3
59.6	58.6	57.4	54.9	51.9
58.0	57.3	56.1	53.3	49.4
56.9	56.4	54.8	51.0	47.1
53.9	53.5	51.6	48.1	44.4
54.9	54.4	52.8	49.7	46.7
58.5	57.3	55.5	54.6	53.4
54.9	54.3	52.5	51.4	49.3

50.1	49.6	48.7	46.2	44.1
48.9	47.9	46.2	44.3	43.3
48.1	47.9	46.2	44.3	43.6
47.4	47.3	45.9	44.0	43.0
52.2	51.9	51.7	51.7	49.6
60.9	60.3	59.6	58.3	56.6
63.3	62.5	61.4	59.1	56.4
63.8	63.5	62.4	59.9	56.7
65.3	65.1	64.0	61.5	58.0
66.3	64.8	62.9	60.3	57.1
61.2	60.1	57.6	54.5	51.6
53.2	52.3	50.7	48.4	46.1
57.5	56.1	54.5	52.1	49.1
60.7	60.0	58.5	55.8	52.6
61.4	61.0	58.8	55.8	52.3
57.4	57.3	55.2	52.1	47.8
58.3	56.7	56.4	53.4	49.3
59.6	57.8	56.3	53.2	48.8
54.8	54.3	53.3	51.0	48.5
55.6	54.9	53.7	51.9	49.8
55.1	54.5	53.3	50.5	47.6
58.1	58.4	57.3	55.5	53.4
61.5	61.7	61.0	59.0	58.0
72.5	66.8	64.8	60.8	58.5
63.9	60.0	57.7	54.1	51.1
58.2	59.0	59.6	56.5	52.5

1/3 LASeq 3150	1/3 LASeq 4000	1/3 LASeq 5000	1/3 LASeq 6300	1/3 LASeq 8000
48.7	45.5	41.5	50.5	47.7
45.2	42.5	39.4	45.1	40.3
43.6	41.7	38.5	38.9	36.3
45.8	43.1	40.0	38.2	35.5
45.0	42.7	39.4	37.1	34.6
51.4	49.8	48.9	43.8	39.6
55.4	52.8	50.9	46.7	43.8
48.7	45.7	42.9	39.4	36.9
42.3	40.5	37.7	36.1	34.4
42.1	40.4	37.6	36.1	34.3
42.7	41.0	37.7	36.2	34.3
44.5	42.7	39.4	36.3	33.2
43.0	41.1	37.7	34.1	28.8
44.1	39.6	36.1	32.5	29.1
46.7	43.6	40.1	36.1	33.5
49.0	44.9	40.9	36.1	31.7
44.3	40.5	36.9	32.3	27.8
42.2	38.7	35.6	31.2	26.2
51.8	48.4	45.7	42.1	38.7
50.0	46.6	43.2	38.6	34.1
49.0	46.2	42.8	38.3	33.9
47.6	44.5	41.2	36.4	31.4
45.2	42.2	39.9	37.3	32.0
37.7	34.6	31.4	28.7	24.2
36.7	33.8	30.7	28.6	24.9
42.3	42.6	39.0	35.1	32.2
45.5	43.4	40.5	37.3	34.3
51.3	48.8	46.4	43.6	39.3
52.7	49.8	46.8	43.1	38.7
53.1	51.8	48.5	44.2	39.8
52.7	49.1	45.8	41.9	38.2
50.6	47.0	43.6	39.4	35.7
49.1	47.4	44.7	42.4	37.7
45.2	42.7	39.9	35.3	31.7
44.1	40.5	36.4	32.0	26.9
44.4	41.2	37.8	33.7	29.2
42.6	39.1	35.4	31.0	26.0
44.2	40.4	36.7	32.3	27.6
45.6	41.9	37.8	33.0	28.4
47.4	44.1	40.6	35.5	30.8
48.4	44.6	40.6	35.7	31.0
47.4	44.0	40.2	35.0	30.3
45.3	41.5	36.7	31.7	26.3
50.8	47.5	43.8	39.5	34.4
46.0	42.6	38.4	34.2	29.8
38.6	35.5	31.8	27.8	23.3

38.9	36.2	32.5	29.1	24.6
47.5	44.3	40.6	36.5	32.1
43.0	39.7	36.9	32.8	29.5
50.6	48.4	45.5	42.6	38.7
53.8	51.3	48.3	44.8	40.9
50.0	46.0	42.5	38.8	35.6
56.9	51.5	50.0	45.7	44.5
46.0	41.5	39.1	35.1	32.8
38.0	33.9	30.2	26.5	22.7
39.1	34.4	30.3	26.7	22.1
39.7	36.4	33.3	29.6	24.9
42.2	39.2	37.5	35.9	31.4
41.6	38.2	35.4	32.0	27.4
40.7	37.8	34.6	32.2	30.0
40.7	37.6	34.6	30.4	26.2
42.5	39.1	36.0	31.9	33.2
47.7	44.7	40.9	37.5	34.1
49.6	46.2	42.8	39.2	33.8
46.4	42.4	38.7	34.2	29.6
46.7	43.6	39.9	35.5	31.2
46.8	43.5	39.8	35.0	30.3
45.0	41.0	37.5	33.0	28.9
42.1	37.8	35.1	30.6	25.6
45.0	41.5	38.4	34.5	30.4
47.3	46.4	44.0	39.9	36.4
55.5	53.8	50.2	47.2	44.9
58.1	55.5	52.6	50.7	47.3
53.3	49.9	47.3	44.7	39.4
47.7	44.2	40.9	36.5	32.3
54.7	51.6	48.8	44.5	42.8
52.8	49.5	46.7	42.2	39.1
48.0	44.6	41.6	37.7	33.3
45.8	41.6	38.2	34.2	30.0
44.1	41.1	37.8	33.9	29.3
43.4	40.2	36.7	32.5	27.6
48.8	45.6	42.1	37.5	33.1
46.0	42.9	39.6	35.4	30.7
43.0	39.8	36.4	31.7	26.8
55.7	52.8	50.2	46.8	42.9
55.7	52.8	49.4	46.1	41.9
47.9	44.7	42.2	39.0	33.9
48.9	45.5	42.9	38.4	33.6
45.9	42.4	39.1	34.4	29.0
43.9	41.0	37.0	33.0	27.7
40.5	37.3	33.3	29.5	24.7
43.7	41.1	37.1	33.4	29.9
49.8	46.8	44.2	40.1	35.7
45.7	43.0	39.8	35.2	31.3

41.0	37.8	35.9	30.4	26.6
40.5	37.4	36.1	30.9	26.0
40.3	37.2	36.1	30.1	26.3
39.9	36.8	35.5	29.7	25.7
47.1	44.3	42.3	38.8	34.9
54.0	50.9	48.5	45.3	41.9
53.4	51.0	47.3	44.3	40.9
53.7	50.7	46.7	43.4	39.4
53.9	50.3	46.6	42.3	38.2
53.6	50.1	46.6	42.5	38.6
48.5	45.4	41.5	37.4	33.0
43.3	40.0	37.1	33.4	28.4
46.1	43.4	40.9	36.3	31.7
50.2	46.4	42.7	38.2	33.0
49.0	45.1	41.1	37.3	32.5
44.1	40.2	37.4	33.0	28.1
45.8	42.1	37.5	32.8	27.9
44.8	40.9	36.2	31.2	27.1
45.7	42.2	39.4	34.8	29.7
46.5	43.2	40.2	35.6	30.4
43.8	40.7	38.2	35.5	31.2
50.8	47.7	44.8	41.6	39.9
56.2	53.4	50.7	46.6	43.5
56.5	53.6	52.0	48.8	45.7
48.1	45.1	42.7	39.6	36.1
47.5	42.7	39.0	36.0	31.4

1/3 LASeq 10000	1/3 LASeq 12500	1/3 LASeq 16000	1/3 LASeq 20000	1/3 LASmax 6.3
32.8	27.8	23.7	16.0	1.9
31.5	27.2	22.8	16.0	1.9
30.5	26.8	22.1	15.3	1.9
31.8	27.0	22.2	15.1	1.9
31.1	25.7	21.3	14.8	1.9
37.0	31.2	27.2	19.9	1.9
40.4	36.0	31.8	25.4	1.9
33.3	34.3	24.0	17.7	1.9
30.9	26.4	21.9	15.6	1.9
31.0	26.4	22.0	15.3	1.9
30.9	25.9	21.7	15.2	1.9
29.7	24.4	19.5	13.4	1.9
24.0	18.3	13.2	10.5	1.9
22.8	18.4	12.3	11.0	1.9
28.7	19.6	13.9	11.4	1.9
27.2	19.7	13.3	11.6	1.9
22.9	17.5	11.7	10.6	1.9
21.4	16.0	12.5	10.6	1.9
34.0	28.5	22.4	15.3	1.9
29.4	23.9	18.0	12.4	1.9
29.9	24.7	21.3	12.0	1.9
27.1	19.5	13.7	10.6	1.9
27.6	24.2	20.4	13.1	1.9
19.5	18.4	11.9	10.3	1.9
19.6	14.1	10.5	10.2	1.9
27.3	20.7	14.7	11.3	1.9
29.4	22.1	15.9	11.5	1.9
34.8	29.9	23.9	16.7	1.9
33.9	29.1	23.1	16.3	1.9
35.1	30.9	26.0	20.0	1.9
33.5	27.6	22.4	16.2	1.9
31.2	27.0	26.0	20.2	1.9
30.7	26.3	21.0	14.6	1.9
27.6	23.4	18.7	14.1	1.9
21.3	15.7	11.3	10.6	1.9
23.5	16.9	12.0	10.5	1.9
20.9	15.7	11.4	10.6	1.9
23.9	17.8	13.0	11.1	1.9
23.4	17.3	12.3	22.0	1.9
25.4	19.7	14.8	22.2	1.9
25.5	18.8	28.1	11.5	1.9
25.3	19.1	15.7	12.8	1.9
20.5	15.4	10.9	11.2	1.9
29.4	25.1	17.9	11.5	1.9
25.1	19.5	13.4	10.8	1.9
18.7	14.3	10.9	10.7	1.9

20.6	16.8	12.3	10.9	1.9
27.1	22.4	17.0	12.6	1.9
24.6	19.1	13.9	11.4	1.9
34.7	30.9	26.4	19.3	1.9
37.1	32.5	27.5	21.8	1.9
31.4	26.6	21.4	16.7	1.9
40.1	31.6	25.9	18.2	1.9
27.9	20.3	15.3	11.7	1.9
18.6	14.8	11.7	10.7	1.9
18.1	13.8	10.7	10.4	1.9
21.0	15.1	11.3	10.5	1.9
26.3	25.7	18.7	11.1	1.9
22.1	18.9	13.5	11.5	1.9
20.7	15.7	11.6	10.6	1.9
21.1	16.3	13.5	10.9	1.9
30.9	17.4	14.8	11.1	1.9
30.5	23.3	16.3	12.1	2.2
28.8	23.1	17.5	12.2	1.9
24.7	19.6	15.1	12.0	1.9
26.9	23.5	21.7	18.3	1.9
25.3	20.0	14.5	11.4	1.9
23.6	18.6	13.7	12.0	1.9
20.7	15.8	11.2	10.8	5.9
26.5	22.3	16.9	12.0	1.9
30.1	25.5	20.0	13.4	1.9
41.8	36.4	31.4	24.3	1.9
43.8	39.0	34.3	27.2	1.9
35.3	30.9	25.8	19.3	1.9
28.3	22.8	17.7	12.9	1.9
38.9	33.5	28.4	21.5	1.9
34.1	30.6	24.7	18.7	1.9
28.5	23.0	18.1	12.9	1.9
25.6	18.6	12.9	10.7	1.9
25.4	18.5	12.5	10.7	1.9
22.5	16.8	11.4	10.3	1.9
27.9	22.2	16.6	11.8	1.9
25.1	19.0	13.2	10.8	1.9
21.4	15.6	11.1	10.4	1.9
39.0	33.3	27.6	22.1	1.9
37.5	31.4	25.1	25.8	1.9
30.4	24.4	17.8	23.8	1.9
28.9	26.4	21.8	15.6	1.9
24.3	19.0	13.7	11.0	1.9
22.4	17.5	12.4	10.6	1.9
29.9	34.1	10.8	10.3	1.9
39.6	39.5	17.6	11.7	1.9
32.9	29.6	21.5	12.8	1.9
29.1	25.6	14.1	11.0	1.9

20.6	20.9	13.9	10.5	1.9
20.0	20.8	14.7	10.6	1.9
20.5	16.2	26.0	10.7	1.9
20.2	15.5	14.2	10.4	1.9
31.2	26.8	20.4	14.1	1.9
39.1	34.4	30.0	25.4	1.9
36.6	32.4	28.4	22.0	1.9
34.5	30.1	23.6	16.4	1.9
33.6	28.8	23.0	16.4	1.9
34.5	29.5	24.8	18.8	1.9
28.1	22.4	17.0	12.4	1.9
23.1	17.9	12.2	10.6	1.9
26.8	22.2	17.5	12.0	1.9
27.8	21.9	15.5	11.6	1.9
27.2	21.0	15.3	11.4	1.9
23.8	17.7	12.2	10.7	1.9
22.5	16.9	12.2	10.8	1.9
22.3	16.5	11.5	10.7	1.9
25.8	20.0	14.6	11.4	1.9
25.6	19.8	13.6	11.0	1.9
26.7	21.2	17.3	11.0	1.9
39.3	30.4	29.5	43.2	1.9
40.6	35.9	31.6	40.7	1.9
42.6	38.3	33.1	27.4	1.9
32.4	28.1	22.8	16.7	1.9
27.0	21.0	15.5	12.0	1.9

1/3 LASmax 8.0	1/3 LASmax 10.0	1/3 LASmax 12.5	1/3 LASmax 16.0	1/3 LASmax 20.0
0.9	0.3	3.6	16.9	21.0
0.9	0.3	-0.8	7.8	15.5
0.9	0.3	2.5	3.2	15.7
0.9	0.3	0.5	6.6	15.3
0.9	0.3	-0.8	0.0	16.4
0.9	0.3	6.3	7.4	16.8
0.9	0.3	1.6	4.3	13.8
0.9	0.3	3.1	11.7	14.0
0.9	0.4	5.7	10.1	14.2
0.9	0.3	5.0	9.1	13.4
0.9	3.3	4.7	11.0	20.7
0.9	5.0	10.6	13.3	20.8
2.1	9.0	14.4	17.0	22.6
0.9	2.5	7.4	12.0	15.5
0.9	6.0	9.4	15.3	15.7
0.9	5.3	5.9	12.1	14.4
0.9	0.3	5.3	11.4	14.6
0.9	4.9	6.1	13.7	18.1
0.9	3.2	7.8	13.7	13.7
0.9	0.3	-0.8	3.0	12.4
0.9	0.3	-0.8	4.8	14.5
0.9	0.3	0.1	7.3	15.4
0.9	0.3	3.1	8.6	17.9
0.9	3.4	9.4	14.9	19.3
0.9	6.8	9.1	14.8	21.9
0.9	4.7	5.1	9.6	15.5
0.9	0.3	0.4	6.3	14.8
0.9	0.3	3.0	10.6	19.3
0.9	0.3	6.4	14.4	19.2
0.9	0.9	10.3	14.0	18.1
2.0	9.9	14.9	19.1	19.9
0.9	3.1	5.6	8.9	13.5
0.9	0.3	-0.8	1.7	10.1
0.9	0.3	-0.8	5.5	8.3
0.9	1.2	5.9	6.7	13.9
0.9	0.3	2.7	4.4	11.2
0.9	0.3	-0.5	1.0	9.7
0.9	0.3	1.9	11.6	14.4
0.9	0.3	1.0	7.3	10.4
0.9	1.8	5.5	11.4	16.0
0.9	2.7	9.6	12.3	17.7
0.9	0.3	0.0	3.9	13.5
0.9	0.3	6.9	5.5	15.6
0.9	0.3	0.2	5.3	12.3
0.9	0.3	-0.8	3.9	13.4
0.9	3.7	10.8	13.0	16.4

0.9	1.6	8.1	13.8	16.1
0.9	1.4	8.1	13.3	16.6
0.9	0.3	-0.2	4.5	14.2
0.9	7.7	12.0	17.4	17.5
0.9	1.0	3.7	8.4	13.9
0.9	1.4	4.2	7.3	13.2
0.9	0.3	-0.8	5.8	17.7
5.1	4.3	13.0	17.0	20.6
1.6	0.7	7.1	8.6	15.8
0.9	0.3	-0.4	5.9	14.3
0.9	0.3	0.1	4.5	12.5
0.9	0.3	-0.8	3.6	9.3
0.9	0.3	-0.8	5.0	10.6
0.9	0.3	8.5	12.2	18.6
0.9	5.0	15.9	20.0	23.9
8.6	11.0	19.5	25.7	27.9
6.0	9.5	13.8	17.9	17.9
0.9	0.3	0.2	6.1	13.2
0.9	0.3	-0.8	2.6	11.5
0.9	0.3	2.4	4.9	13.4
0.9	0.3	-0.8	1.7	14.3
0.9	13.2	20.9	24.6	27.5
7.1	11.9	17.5	22.5	22.4
2.5	0.3	6.4	10.1	16.0
0.9	4.5	8.3	16.0	21.3
0.9	4.7	10.9	15.4	19.4
0.9	0.3	-0.2	6.7	17.9
0.9	0.3	-0.8	5.3	16.6
0.9	0.3	3.9	8.9	15.8
0.9	0.3	0.0	7.0	14.5
0.9	0.9	6.0	10.3	16.3
0.9	1.0	6.3	14.2	17.6
0.9	3.9	8.8	14.1	19.7
0.9	2.1	5.4	10.4	15.8
0.9	0.3	4.2	5.5	12.4
0.9	0.3	-0.8	1.6	10.0
0.9	0.3	3.3	14.4	14.0
0.9	0.3	1.1	8.1	10.1
0.9	0.3	0.3	5.2	14.5
0.9	0.3	5.1	11.8	14.2
0.9	0.3	-0.8	4.5	10.7
0.9	0.3	-0.8	6.8	11.2
0.9	0.3	-0.8	6.9	11.8
0.9	0.3	-0.8	1.3	11.0
0.9	0.3	0.9	4.3	12.4
0.9	0.3	-0.8	6.8	11.8
0.9	0.3	-0.8	12.3	16.8
0.9	0.3	-0.1	12.6	15.9

0.9	0.3	-0.8	2.9	13.6
0.9	0.3	6.8	11.6	16.9
0.9	0.3	8.1	11.1	13.6
0.9	0.3	2.4	7.2	15.2
0.9	0.3	-0.8	1.1	15.3
0.9	1.4	4.2	9.1	15.3
0.9	1.1	5.9	12.3	15.4
0.9	0.3	1.1	8.9	17.8
0.9	0.3	2.7	11.2	16.9
0.9	0.3	-0.8	4.6	11.7
0.9	0.3	-0.8	3.8	9.6
0.9	0.3	-0.8	4.0	8.3
0.9	0.3	-0.8	1.7	9.1
0.9	0.3	8.3	11.1	13.2
0.9	0.3	9.5	10.7	14.3
0.9	0.3	-0.8	3.3	12.1
0.9	0.3	-0.8	4.3	11.0
0.9	0.3	-0.8	1.7	9.6
0.9	0.3	-0.8	9.0	15.0
0.9	0.3	-0.1	9.4	16.4
0.9	0.3	-0.3	4.5	14.6
0.9	0.3	4.2	11.0	15.2
0.9	0.5	6.8	11.8	17.3
0.9	0.3	8.4	12.2	19.6
0.9	0.7	10.3	11.3	17.3
0.9	0.3	-0.8	2.2	10.3

1/3 LASmax 25.0	1/3 LASmax 31.5	1/3 LASmax 40.0	1/3 LASmax 50.0	1/3 LASmax 63.0
25.4	31.1	35.2	35.6	45.3
23.8	29.6	31.7	32.5	36.7
23.4	29.8	30.1	32.6	37.5
22.7	29.6	28.3	33.5	43.3
22.5	29.2	32.1	33.7	39.2
22.6	29.0	30.0	36.3	46.3
22.3	28.9	34.3	51.5	57.6
22.4	28.6	34.0	45.4	55.9
20.2	28.2	28.5	37.1	37.3
24.6	29.3	29.7	37.7	34.7
24.3	28.5	31.0	37.9	42.7
23.4	29.6	34.0	36.9	43.0
27.6	30.2	33.6	37.6	40.0
21.1	28.4	31.4	39.1	45.4
25.8	31.5	33.6	43.6	46.1
21.3	27.3	32.1	38.2	44.1
22.3	26.7	33.2	37.3	40.8
24.7	24.3	33.7	39.2	40.4
21.1	23.3	34.5	41.9	50.9
18.8	26.9	30.2	41.6	47.8
19.0	26.4	31.5	37.0	41.6
19.2	25.1	31.4	37.4	45.6
23.4	26.6	33.1	34.7	44.9
24.2	27.4	35.7	33.8	37.1
21.3	29.0	32.6	32.5	38.5
20.0	27.7	33.1	32.5	41.8
21.9	28.0	32.3	35.6	43.4
22.5	28.4	32.2	38.9	39.1
20.2	27.2	32.9	37.0	52.2
24.8	27.4	34.6	38.4	52.9
26.7	28.4	33.3	37.8	48.7
19.5	27.4	33.4	39.9	44.3
18.6	27.0	34.7	37.8	42.1
17.4	29.1	34.6	38.0	40.8
18.8	26.2	36.0	37.1	40.1
20.0	26.0	36.4	38.8	40.3
20.7	29.9	36.9	36.1	39.9
20.6	25.6	32.5	35.1	41.1
23.5	26.8	35.6	36.3	40.2
25.2	25.8	36.6	39.7	40.0
24.0	26.3	32.6	40.4	40.2
20.6	23.6	34.5	40.4	40.2
22.4	23.5	29.8	37.7	40.0
23.8	23.4	30.4	34.0	39.6
21.9	23.1	31.4	36.3	39.7
24.5	25.6	29.5	34.3	38.8

23.7	24.5	30.6	40.5	47.0
21.5	24.1	33.5	40.5	44.3
25.1	25.8	29.1	34.4	39.4
25.6	26.7	28.7	36.2	39.2
23.9	22.9	32.0	35.2	43.6
23.8	23.1	41.9	44.9	43.2
23.0	29.6	36.7	39.4	37.5
27.0	29.5	36.3	36.5	37.3
22.9	25.1	27.3	33.8	35.5
23.7	24.4	31.7	36.0	44.4
19.8	25.4	30.7	37.0	40.2
19.0	22.5	30.8	36.6	42.7
19.9	23.8	30.2	37.4	40.9
21.7	28.5	32.9	35.9	41.6
25.5	30.9	34.3	38.7	40.2
33.6	35.7	39.5	41.4	42.1
23.3	26.1	34.8	44.1	42.2
22.3	27.1	34.9	37.1	42.2
21.7	24.1	31.7	36.6	38.1
22.6	25.8	33.2	36.9	41.1
22.2	24.3	32.5	37.1	39.6
30.4	33.7	37.8	36.8	39.0
25.4	27.9	33.9	36.4	38.5
21.4	26.8	32.2	35.6	38.3
25.8	29.3	33.5	39.2	38.2
24.5	29.1	33.3	43.9	50.0
25.1	30.7	35.7	45.2	49.8
22.8	27.9	38.5	45.5	39.5
22.3	26.6	33.3	40.4	42.2
26.5	35.9	41.3	48.0	48.9
24.2	28.6	37.2	42.4	45.4
22.8	24.8	33.1	37.6	42.8
21.8	26.2	32.9	37.8	41.7
21.5	25.9	33.6	41.3	43.2
17.7	26.5	32.9	40.6	49.8
16.6	24.8	37.5	45.9	41.6
20.8	26.7	35.6	39.5	41.6
17.4	21.9	27.2	35.3	41.8
19.6	23.5	29.7	35.8	37.9
19.2	24.3	31.6	35.5	41.7
18.8	23.9	31.1	33.0	43.1
20.4	21.8	29.7	34.9	40.7
20.0	22.4	30.0	34.2	37.3
18.3	24.9	31.2	36.0	43.9
22.2	28.3	38.8	37.9	43.0
19.5	31.0	32.8	36.8	42.4
23.1	30.3	33.4	36.6	43.9
22.5	29.4	29.1	36.0	42.8

23.1	29.3	29.6	36.1	38.3
23.2	29.9	30.9	34.3	40.3
22.8	30.1	29.9	34.9	36.5
23.0	26.2	31.3	34.2	36.2
21.9	27.1	31.3	37.8	41.2
23.3	28.1	31.9	38.4	47.7
24.6	25.3	32.5	41.4	48.8
23.8	26.4	32.9	40.7	48.4
23.5	26.8	35.6	41.4	47.5
22.9	26.4	36.3	41.1	46.4
21.9	22.4	32.8	38.6	44.3
17.9	21.3	31.2	36.9	41.1
20.5	24.3	34.1	36.7	41.4
19.1	27.3	32.6	38.0	55.1
19.7	27.3	29.5	39.7	54.8
20.4	23.0	26.3	38.0	39.1
19.5	21.8	30.8	35.2	34.2
19.5	22.6	30.5	35.0	33.9
20.0	25.2	27.6	30.2	36.5
21.0	25.5	28.2	33.3	36.2
21.4	25.1	33.0	35.9	35.1
21.9	29.3	33.4	39.9	38.5
24.3	26.1	34.5	41.2	50.0
25.8	29.0	35.2	40.5	46.5
25.2	28.1	32.1	39.0	40.6
23.2	26.3	31.0	34.1	37.5

1/3 LASmax 80.0	1/3 LASmax 100	1/3 LASmax 125	1/3 LASmax 160	1/3 LASmax 200
58.4	57.8	63.8	63.5	60.9
40.2	54.1	55.3	47.3	55.8
47.0	42.6	40.6	42.4	48.0
47.1	41.0	42.9	45.2	47.9
39.8	45.7	53.4	48.0	50.0
53.8	55.7	66.1	58.7	59.9
67.3	72.6	77.0	77.1	71.6
61.0	69.4	70.6	70.1	66.1
44.0	51.1	52.2	51.7	50.7
39.2	44.3	43.3	45.6	41.6
46.2	43.7	43.9	44.1	43.2
48.7	44.8	47.6	48.1	45.6
45.3	45.6	48.9	49.0	46.9
42.2	48.1	49.0	48.3	47.0
46.6	48.7	58.3	65.0	58.0
44.6	47.3	55.9	61.2	55.9
45.5	48.3	52.8	57.3	53.8
45.8	49.5	61.0	65.9	60.6
54.6	61.0	73.3	78.4	76.2
54.7	57.4	73.3	73.5	70.0
48.0	49.2	59.0	56.5	54.6
46.0	58.1	53.7	53.8	54.4
48.7	56.1	59.5	54.1	53.5
42.6	44.7	46.4	44.3	44.2
45.2	47.4	52.9	49.8	45.6
44.0	53.5	52.4	57.3	53.9
45.8	53.5	55.9	53.3	55.2
44.7	46.8	54.7	47.7	51.1
49.6	61.2	64.6	56.2	59.3
54.6	66.6	65.6	58.9	63.0
50.4	56.7	56.2	53.2	55.1
42.2	47.0	50.6	51.4	50.6
47.1	42.9	46.5	45.7	48.1
39.5	42.7	45.4	45.3	48.5
40.5	43.0	46.2	45.7	52.7
41.3	43.6	52.4	53.0	50.2
39.2	45.5	46.4	51.0	48.1
38.8	43.3	45.5	51.3	48.1
39.6	43.4	44.3	47.9	48.6
40.8	47.3	45.5	47.6	47.4
41.5	47.4	47.6	46.8	47.6
39.0	40.7	42.0	45.2	46.1
39.5	41.9	45.8	53.3	57.5
40.7	49.6	48.1	53.8	58.0
38.1	41.6	43.7	45.5	46.6
35.7	35.8	38.5	40.7	43.9

38.8	37.8	41.9	43.9	51.0
36.3	38.9	48.1	43.9	48.3
41.7	40.9	39.7	44.7	45.0
41.3	45.1	53.0	55.5	53.4
43.8	47.8	54.5	54.4	55.7
43.1	42.3	48.9	48.6	49.5
48.3	47.7	49.3	54.3	54.9
41.3	42.3	44.2	47.6	49.6
34.5	37.5	41.9	40.6	39.7
45.2	47.7	43.2	47.5	45.1
42.2	46.0	45.7	46.0	49.1
49.5	50.9	54.3	46.0	49.2
53.7	51.5	53.3	47.9	49.5
52.6	46.5	51.2	52.1	56.1
42.3	49.2	53.2	52.8	51.5
45.9	51.0	58.2	48.7	49.0
48.6	52.5	53.1	53.9	52.2
46.1	50.4	53.4	49.9	51.2
41.0	45.7	49.5	46.9	48.4
41.7	45.5	44.2	46.7	48.0
37.2	43.7	44.0	45.9	47.0
37.6	43.5	45.1	45.3	45.9
38.9	43.1	45.1	46.8	44.3
42.0	44.3	45.8	48.2	47.9
40.2	45.2	47.5	51.0	56.3
50.4	59.9	68.4	61.9	62.3
52.6	61.5	72.8	61.7	63.9
42.2	56.3	55.9	52.4	56.1
39.4	55.2	49.8	46.0	51.4
60.5	65.1	59.1	58.5	58.8
52.2	55.6	55.8	52.2	53.1
44.3	52.1	54.2	48.4	52.8
43.4	48.4	63.5	51.0	62.3
47.1	59.2	67.4	54.6	64.4
52.6	58.8	63.8	52.4	62.8
52.6	52.0	61.6	59.8	54.3
52.7	51.1	59.8	62.0	53.8
43.4	50.4	59.7	55.0	50.1
46.1	48.2	50.6	52.3	55.5
45.4	50.5	52.2	56.4	54.8
43.9	46.2	47.1	54.1	50.9
44.7	43.6	48.0	45.0	48.4
41.2	40.9	43.7	45.8	46.8
40.2	41.6	42.2	43.2	46.7
45.9	43.7	45.3	46.4	45.0
48.6	43.6	47.9	46.8	46.0
46.2	43.2	47.1	50.2	54.9
40.5	43.6	46.1	50.0	53.6

39.8	45.1	44.8	44.1	41.9
41.6	43.2	45.7	45.6	41.9
39.6	44.1	42.4	43.0	40.4
38.2	40.5	43.0	42.8	39.5
44.4	45.6	45.2	46.6	45.2
51.1	49.4	49.4	49.3	50.7
49.8	49.4	61.7	57.2	53.8
48.1	49.0	59.3	61.3	52.8
49.2	48.3	51.4	55.2	53.6
52.3	46.3	60.9	53.9	54.1
46.1	45.9	53.8	49.8	49.4
41.1	46.7	63.4	51.8	51.8
45.8	50.7	61.4	54.2	52.9
50.4	67.7	58.4	69.8	67.7
53.5	65.9	58.8	69.5	66.5
48.5	54.1	51.0	56.0	54.3
40.6	43.3	41.8	44.0	44.9
36.7	40.9	41.3	43.1	45.6
38.1	38.7	42.1	45.5	45.3
39.8	40.2	43.4	45.6	45.6
39.9	45.0	52.6	46.5	47.5
42.4	49.2	53.3	56.5	52.1
56.1	52.9	50.8	56.3	53.8
47.7	61.8	69.2	79.8	82.8
44.6	52.2	58.6	69.3	73.1
39.0	41.0	44.9	49.3	52.3

1/3 LASmax 250	1/3 LASmax 315	1/3 LASmax 400	1/3 LASmax 500	1/3 LASmax 630
58.5	57.4	55.5	58.3	60.1
49.6	52.2	49.3	52.2	53.3
43.5	44.5	45.3	48.1	47.1
46.6	48.9	48.4	50.8	52.0
46.6	48.0	50.1	52.1	51.9
56.3	57.7	56.1	58.5	59.4
69.1	67.5	63.5	65.1	63.7
63.2	61.1	58.6	60.7	60.1
47.0	45.2	45.6	47.1	47.5
40.0	39.8	41.6	42.9	44.1
44.5	45.8	46.6	46.6	47.4
47.5	49.1	48.9	49.7	51.4
47.6	48.2	49.0	51.1	51.5
48.7	47.4	49.2	50.2	51.1
53.1	53.8	56.6	59.9	55.3
53.4	52.3	54.3	57.1	54.3
52.8	51.0	51.0	51.7	52.3
56.0	57.8	52.5	51.3	51.9
66.6	69.6	65.4	65.9	64.6
66.0	65.9	63.2	64.0	64.3
54.9	52.7	53.6	56.5	58.4
51.3	50.0	51.1	55.4	57.9
51.1	48.3	49.5	52.6	55.9
43.3	43.4	45.6	47.6	52.3
41.2	39.2	42.7	46.4	45.8
54.7	51.9	52.4	55.0	54.7
54.5	53.1	53.2	55.3	57.4
55.7	52.9	55.8	57.7	58.6
55.7	57.0	57.9	58.3	60.4
59.1	59.3	59.3	60.4	62.8
55.2	56.6	57.3	58.5	60.2
55.8	55.8	55.1	57.3	59.4
50.7	49.4	51.7	54.7	57.3
51.1	49.2	50.6	52.3	55.6
53.4	54.5	60.4	59.6	62.3
51.0	50.6	52.8	56.9	56.3
50.0	50.5	49.3	56.9	56.1
50.8	50.6	51.8	52.7	56.4
50.9	51.4	52.2	53.4	56.9
52.2	49.1	51.9	53.4	55.8
52.6	50.8	52.7	54.0	55.9
50.5	50.5	50.6	53.3	55.6
61.9	57.8	55.5	58.5	61.1
62.3	57.9	58.0	58.4	61.0
49.3	48.3	50.2	52.1	55.6
44.8	44.5	45.9	48.9	50.3

47.3	47.3	50.3	51.2	49.2
50.0	48.2	53.2	55.0	54.9
46.3	46.4	48.8	49.6	52.6
55.8	55.3	56.5	58.7	60.6
55.9	56.3	56.8	59.7	60.8
52.0	52.5	54.3	56.5	58.0
55.5	53.3	55.9	57.7	61.0
50.5	49.1	51.9	53.4	56.1
41.4	43.0	42.6	45.1	46.8
45.9	47.7	46.9	50.2	48.2
55.2	49.2	52.5	51.3	52.1
53.5	55.0	52.3	53.5	52.6
53.2	51.6	49.0	50.3	51.7
52.8	48.3	48.5	49.8	51.9
48.9	47.4	49.8	50.2	51.9
48.0	47.5	49.9	51.8	52.1
51.6	52.2	53.0	55.5	56.4
52.3	53.8	53.8	55.8	57.7
50.7	53.8	51.9	54.8	56.0
50.7	49.0	51.0	55.0	55.7
49.1	48.1	50.4	54.1	55.4
45.5	45.4	48.7	50.3	54.1
46.3	44.5	45.9	49.4	52.7
48.4	49.5	49.9	51.8	52.6
54.2	51.6	53.5	58.2	58.2
64.7	63.9	62.9	64.0	68.2
65.6	67.2	66.6	64.4	67.9
54.2	57.4	56.7	58.2	62.2
49.7	50.5	53.6	54.5	57.3
57.7	59.0	56.7	59.8	61.8
53.6	56.7	61.1	60.3	64.3
51.9	55.7	60.0	59.2	62.9
56.5	52.2	50.8	49.8	51.6
59.3	53.5	51.2	52.1	53.6
57.7	52.5	50.5	51.3	51.9
54.6	51.7	54.2	56.0	58.6
55.7	53.3	52.6	54.6	56.1
51.4	48.0	51.9	51.6	51.0
60.9	54.9	57.1	60.2	63.3
56.9	55.0	57.5	60.1	63.7
51.0	52.0	55.5	54.8	56.6
52.1	50.7	52.9	54.7	57.0
49.3	50.5	49.9	51.6	54.0
47.6	48.9	48.9	50.3	52.5
48.3	45.3	46.7	48.4	49.1
50.8	48.2	49.7	51.9	53.0
53.8	56.7	57.5	57.1	57.3
53.1	55.1	55.9	56.2	56.2

45.3	44.2	47.0	46.5	47.9
43.6	42.8	45.5	45.8	46.5
43.8	43.9	44.3	45.2	45.6
43.2	43.3	44.2	44.0	44.9
51.3	52.1	52.8	53.0	55.6
53.4	55.7	53.9	59.3	59.1
60.7	64.1	57.5	61.7	59.8
58.2	61.1	57.9	58.9	59.9
56.4	56.1	58.6	60.2	60.9
55.3	58.1	59.0	64.1	63.8
54.1	55.4	55.6	59.6	60.0
55.3	51.9	50.1	50.3	50.9
53.5	51.1	50.2	52.8	55.9
71.1	73.0	65.5	65.0	65.2
69.1	71.0	64.7	64.1	64.0
56.1	54.0	53.4	53.5	55.9
48.3	47.0	47.2	51.6	54.3
48.3	47.5	48.6	52.8	57.5
47.8	48.5	51.3	54.3	54.5
47.7	48.5	51.4	54.1	54.6
53.5	51.1	48.1	51.0	52.5
55.8	56.3	57.3	59.5	58.1
57.4	57.0	57.7	59.3	59.5
85.0	71.4	79.0	85.2	85.2
76.7	60.7	69.1	76.7	75.5
55.7	52.2	56.9	58.6	60.4

1/3 LASmax 800	1/3 LASmax 1000	1/3 LASmax 1250	1/3 LASmax 1600	1/3 LASmax 2000
58.8	61.0	59.2	58.4	55.0
54.7	56.9	56.4	53.5	51.5
48.7	50.5	50.2	49.4	47.5
53.4	53.8	55.0	52.7	50.0
54.1	55.8	54.5	53.1	50.5
59.9	59.1	58.9	57.5	56.5
65.3	68.0	65.0	63.5	62.0
61.6	63.9	61.7	59.9	58.0
49.4	51.5	50.9	48.7	46.2
46.7	47.5	46.9	45.5	44.5
49.3	50.9	50.6	48.8	46.9
51.9	52.7	52.4	51.3	49.7
52.6	53.4	51.7	51.2	49.0
54.2	54.5	53.7	52.0	49.7
55.7	56.5	55.9	54.7	53.0
56.5	57.6	56.8	55.8	54.5
55.3	56.3	54.8	54.1	51.4
52.9	53.4	51.7	51.0	49.0
65.3	63.7	60.8	58.9	56.9
65.0	64.0	61.3	59.3	57.0
60.4	61.6	61.0	58.3	55.5
58.5	60.1	59.7	57.8	54.8
58.1	58.4	58.5	57.0	52.8
53.8	54.6	54.3	52.0	48.1
48.7	49.6	49.2	48.9	47.3
55.5	55.8	55.0	51.6	49.5
57.0	57.3	55.9	53.1	50.5
61.5	64.0	62.0	59.6	58.5
62.2	63.7	63.0	61.6	59.6
62.6	62.7	62.4	61.0	58.9
63.0	64.9	64.0	62.7	60.2
62.4	65.2	64.0	62.7	60.2
59.5	60.2	59.3	58.8	57.4
57.8	57.4	56.6	55.5	53.6
57.4	58.9	58.7	56.2	52.9
56.6	56.7	55.1	53.6	51.1
56.6	56.0	54.9	54.1	51.8
57.2	57.6	56.6	57.0	54.1
57.3	58.4	57.1	56.7	53.9
58.7	60.8	59.4	57.8	55.9
58.5	61.1	59.8	58.3	56.3
58.9	60.6	59.8	58.0	55.7
61.8	64.0	58.7	56.7	54.6
61.7	64.0	59.6	59.6	55.3
58.9	60.1	58.0	56.1	53.3
53.5	55.4	54.5	52.5	49.1

50.0	52.8	51.4	50.0	49.4
54.1	58.9	56.9	55.2	53.7
55.8	55.5	54.4	52.7	50.1
60.9	63.2	61.1	59.0	57.5
61.4	64.0	62.3	61.2	59.9
60.2	61.5	60.3	58.8	56.9
61.8	63.7	64.7	64.6	60.3
58.0	59.0	59.1	57.8	54.5
49.0	49.9	49.8	48.9	46.8
49.7	51.5	51.3	50.0	46.7
50.1	50.6	49.6	48.2	45.6
52.4	51.9	51.2	50.2	48.0
51.1	51.4	50.5	49.2	46.8
53.7	54.4	52.4	49.3	46.3
53.8	54.3	52.0	49.1	46.3
52.6	54.2	52.6	52.0	49.1
59.0	60.1	58.8	57.3	54.6
60.6	60.3	59.0	57.9	54.9
58.7	59.8	58.4	56.6	54.3
59.2	58.9	57.6	55.9	53.3
58.2	59.7	57.9	56.7	53.8
57.5	57.8	56.7	56.1	53.2
52.6	52.2	52.5	50.7	48.1
55.0	56.6	55.3	53.5	50.8
58.5	57.9	57.3	54.8	53.0
68.6	66.4	66.1	65.6	64.2
68.8	67.0	66.5	65.7	64.7
63.1	62.9	61.7	60.0	59.2
59.7	61.2	59.7	58.5	56.6
65.4	66.3	65.2	64.7	63.4
68.5	67.9	66.4	64.9	62.7
66.9	66.5	65.2	63.0	59.2
52.5	52.6	52.3	50.5	49.2
53.3	53.0	52.3	51.3	49.1
52.8	53.4	52.6	51.1	49.0
62.4	64.2	63.2	61.3	59.1
58.7	60.3	59.3	58.2	55.3
54.0	55.0	54.0	53.1	50.5
64.8	66.8	66.6	64.8	64.0
65.3	66.3	66.0	64.7	63.6
59.8	60.4	58.8	57.3	56.1
59.8	60.0	59.4	57.9	55.1
57.5	59.2	58.5	57.1	54.6
55.6	57.9	57.4	57.0	52.8
52.4	55.1	54.7	52.5	48.5
55.5	56.7	56.1	54.2	51.3
59.1	60.9	59.5	57.2	56.9
57.5	59.5	58.8	56.4	55.9

49.2	50.9	50.7	50.1	47.1
48.0	49.3	48.3	46.8	45.1
47.1	49.2	48.3	46.7	44.8
47.3	48.1	47.8	46.3	44.2
57.3	57.8	57.0	56.9	57.5
61.8	62.8	62.5	62.0	60.8
63.2	64.0	63.9	62.7	60.9
62.9	64.7	65.0	64.4	61.4
64.2	65.9	65.7	64.5	62.6
66.3	69.5	66.7	64.7	62.6
62.9	66.0	64.6	61.8	59.0
52.8	53.9	52.7	51.3	49.3
57.1	59.7	58.8	57.4	55.1
63.8	63.2	62.0	60.1	56.9
63.6	63.0	61.8	59.9	57.1
59.4	59.1	59.5	56.9	53.9
58.3	60.9	58.7	57.8	54.6
59.6	61.4	59.5	57.9	55.0
55.8	57.6	57.1	55.4	53.9
55.6	57.6	57.1	55.5	53.9
54.8	56.3	55.7	54.2	51.8
59.7	61.5	61.9	61.0	60.4
60.6	62.3	63.6	63.1	60.8
81.4	78.2	72.3	70.1	65.0
72.8	69.9	65.0	62.9	59.1
63.6	64.9	65.0	65.8	63.0

1/3 LASmax 2500	1/3 LASmax 3150	1/3 LASmax 4000	1/3 LASmax 5000	1/3 LASmax 6300
52.0	50.3	47.3	44.2	55.6
48.7	46.3	43.6	40.2	51.1
44.9	44.3	42.4	38.9	39.5
47.9	46.6	43.8	40.8	39.1
47.4	45.4	43.3	40.0	37.5
56.2	53.9	52.7	52.5	46.7
59.8	57.3	54.5	52.7	48.7
56.0	54.0	50.5	48.0	43.7
44.3	42.9	41.1	38.2	36.5
42.9	42.3	40.9	37.9	36.4
44.9	43.6	42.0	38.7	37.0
47.6	45.2	43.2	39.9	37.2
46.9	44.6	42.7	39.3	36.2
47.5	46.8	41.1	38.5	37.0
50.4	48.6	45.0	42.1	37.6
52.2	50.5	46.4	42.1	37.4
49.9	47.1	42.9	39.6	34.8
46.6	43.2	39.7	37.4	34.7
56.0	54.6	51.0	48.4	44.4
55.4	52.3	49.0	45.7	41.5
52.5	49.5	46.7	43.5	38.9
51.6	48.2	45.5	42.1	37.2
49.8	47.0	44.1	42.7	41.1
44.4	41.2	38.0	35.6	32.5
42.8	39.2	34.6	32.2	30.3
48.4	45.7	44.1	41.6	37.6
49.1	46.3	44.4	41.8	38.4
57.2	54.3	52.2	49.9	47.1
56.4	53.3	50.6	47.8	44.3
56.4	53.9	52.9	49.8	45.4
57.2	53.7	50.5	48.0	44.2
56.4	52.7	48.5	44.9	40.8
54.0	51.3	50.0	47.7	45.7
51.0	47.6	45.4	42.8	38.0
49.1	44.9	41.3	37.3	33.3
48.9	45.3	42.2	39.0	35.2
47.7	43.8	40.3	36.6	32.9
50.1	46.1	42.0	38.3	34.0
49.9	46.3	42.8	39.2	34.4
53.2	49.2	45.7	42.3	37.5
53.2	49.6	45.9	42.1	37.4
52.5	48.6	45.1	41.4	36.0
52.2	52.1	48.4	43.8	38.1
54.6	52.0	48.7	45.4	41.4
51.4	47.9	44.4	40.7	36.5
45.5	42.5	39.6	35.4	31.2

47.5	45.4	42.9	39.3	35.9
51.7	50.7	47.3	43.3	39.2
48.0	45.8	42.5	39.8	35.7
56.6	54.6	52.3	49.9	47.1
58.0	55.1	52.9	49.6	46.6
54.0	52.3	48.2	44.9	41.2
61.2	60.2	54.5	53.5	49.3
54.0	51.9	47.3	45.3	41.2
43.1	39.6	34.4	30.9	27.1
43.5	39.6	35.1	31.2	27.4
43.3	40.5	37.5	34.9	30.9
46.2	43.6	40.4	39.8	38.9
45.1	42.6	39.4	37.4	35.4
43.3	41.3	38.3	35.4	34.9
44.0	41.9	38.6	35.7	31.7
47.0	43.7	40.2	37.3	33.2
51.5	49.9	46.6	42.9	39.4
52.1	50.3	46.8	43.6	40.0
50.6	48.1	44.3	40.9	36.9
49.7	47.1	44.3	40.6	35.9
50.7	47.2	44.1	40.3	35.6
50.6	47.2	43.8	39.9	35.5
46.7	43.3	39.6	37.1	32.7
48.5	46.1	42.5	39.3	35.3
51.2	48.6	47.8	45.5	41.3
63.0	61.1	58.4	55.5	52.8
63.4	61.2	58.4	55.5	53.0
58.0	54.9	51.2	48.8	47.0
55.4	52.4	49.2	45.2	41.5
59.8	58.1	55.4	52.5	48.5
59.6	55.5	52.1	49.7	45.3
55.6	52.6	49.0	46.2	42.3
47.2	48.0	43.1	39.6	35.4
46.7	45.1	41.8	38.5	34.7
46.5	44.3	40.9	37.3	33.4
55.6	51.0	47.9	44.5	39.8
52.1	48.5	45.5	42.0	37.6
48.1	45.1	42.1	38.7	34.3
62.7	61.4	58.2	55.1	51.8
62.0	60.5	57.4	54.0	50.4
53.0	50.2	47.6	44.7	42.8
52.3	49.5	46.2	43.8	39.2
50.9	47.7	44.5	41.1	36.0
48.8	45.3	42.3	38.9	34.9
44.9	41.3	38.4	34.3	31.4
48.0	45.7	43.2	38.6	35.5
56.5	52.6	49.3	47.2	42.9
54.2	50.4	47.6	44.6	40.2

44.7	41.6	38.3	36.8	31.2
44.0	41.7	38.1	37.4	33.5
44.2	40.8	37.6	36.7	31.1
43.7	40.3	37.1	35.9	30.0
55.0	53.1	50.3	48.2	45.7
58.0	54.7	51.7	49.8	47.0
58.3	55.0	52.8	49.4	46.7
57.9	54.9	51.7	47.8	44.8
58.7	54.6	51.3	48.0	44.2
59.5	55.8	52.2	49.1	44.9
56.2	52.9	49.8	46.1	41.8
46.9	44.0	41.5	40.1	34.1
51.7	49.0	45.3	41.8	37.4
54.2	51.5	47.9	44.3	41.0
54.4	51.5	47.8	44.2	41.0
49.2	45.5	41.8	39.2	34.9
50.9	47.3	43.1	38.8	34.2
51.1	47.3	43.2	39.0	34.2
52.2	49.4	45.9	43.4	38.9
52.1	49.4	46.0	43.4	38.8
48.9	45.5	42.8	41.4	39.6
58.7	56.2	53.1	50.6	46.7
59.9	58.0	54.8	52.6	48.1
62.3	60.0	57.2	56.1	53.0
56.4	53.4	50.4	48.5	45.3
58.8	54.3	49.9	46.7	43.3

1/3 LASmax 8000	1/3 LASmax 10000	1/3 LASmax 12500	1/3 LASmax 16000	1/3 LASmax 20000
50.6	34.1	30.2	25.3	16.8
45.3	32.4	27.7	23.3	16.5
36.9	30.8	27.2	22.8	16.1
36.6	32.9	28.3	22.9	15.4
34.9	31.5	26.1	21.6	15.0
42.4	40.0	34.5	30.4	23.1
45.9	42.5	38.1	33.7	28.1
40.9	37.2	38.9	28.0	21.6
34.6	31.1	27.8	22.2	15.9
34.6	31.2	27.1	22.2	15.5
34.8	31.6	26.4	22.1	15.4
34.8	31.6	26.4	22.0	15.4
31.1	26.8	21.2	15.5	11.0
37.4	29.7	21.5	16.6	13.0
36.8	30.5	20.7	16.0	12.6
33.0	29.1	20.3	14.1	14.2
30.6	26.0	20.6	13.5	12.4
29.0	23.1	19.4	15.4	11.8
40.5	36.0	30.3	23.7	16.8
37.6	32.6	28.0	21.7	15.2
34.6	30.6	26.5	26.1	12.7
32.6	28.7	22.2	15.9	11.0
35.0	31.7	29.1	26.0	16.3
27.8	22.8	20.7	14.9	11.0
26.5	21.6	16.0	11.9	10.5
34.8	30.5	24.1	17.8	12.5
35.5	31.1	24.0	17.6	12.4
42.7	38.4	34.1	28.1	20.2
39.9	35.5	30.8	24.7	18.4
40.8	36.3	32.6	28.4	22.8
41.0	36.2	30.6	26.0	19.4
37.3	32.8	29.2	31.8	24.6
41.0	33.6	29.5	24.2	16.9
34.6	31.0	26.9	22.5	17.1
28.0	22.0	16.1	12.1	11.0
31.1	25.2	18.2	13.4	10.8
28.2	22.7	17.6	12.9	11.4
29.4	26.3	18.7	14.2	11.5
29.7	25.2	18.8	14.3	29.3
32.6	26.8	20.7	16.7	27.8
32.4	26.9	20.2	34.6	13.5
31.3	26.3	20.0	20.2	16.8
32.1	25.2	21.5	15.2	13.3
36.2	31.3	27.4	20.2	12.2
32.1	27.9	22.9	16.0	11.5
26.2	20.9	15.6	11.4	11.2

31.2	27.4	24.0	18.6	13.4
35.0	29.5	24.7	19.9	14.7
32.4	27.5	21.9	16.6	12.9
43.3	39.3	35.2	31.0	23.7
42.7	38.8	34.5	30.1	23.8
37.7	34.3	29.6	24.4	21.0
48.2	44.1	35.3	29.8	21.4
39.2	34.4	26.3	20.8	14.7
23.9	19.4	16.4	12.9	11.2
22.9	19.0	14.7	11.5	10.9
26.0	23.2	15.9	11.9	10.5
35.0	30.2	31.5	21.7	13.9
30.7	25.2	23.9	17.7	13.6
34.3	21.5	16.4	13.1	10.9
26.9	22.1	17.8	15.1	11.7
39.6	37.9	17.9	18.0	11.7
35.1	32.6	25.0	17.9	12.9
34.5	29.7	24.0	19.1	12.9
31.5	26.8	23.1	21.1	16.7
32.0	28.4	26.2	25.6	22.6
31.7	27.1	22.1	16.3	12.4
31.6	27.0	21.9	16.0	13.2
28.3	23.4	18.6	13.4	11.4
31.5	28.2	24.2	18.8	12.9
37.8	31.8	27.5	22.2	15.0
50.4	47.7	42.5	38.3	31.5
50.4	47.8	42.6	38.4	31.5
41.8	37.4	33.0	28.3	21.5
38.3	35.0	27.8	23.1	16.9
46.6	43.3	37.4	32.7	25.5
43.0	38.7	36.1	30.1	24.1
37.7	32.9	27.7	22.8	16.3
31.1	26.5	20.1	15.2	11.4
30.3	26.7	19.2	13.1	10.8
28.2	23.5	17.7	11.9	10.6
35.7	30.6	25.4	20.2	13.9
33.0	27.8	21.7	15.8	11.7
29.4	23.9	18.0	13.1	10.5
48.2	44.2	38.1	32.3	26.8
46.4	42.1	35.6	29.6	30.6
38.1	35.6	29.4	22.9	30.4
35.1	30.9	29.9	25.8	18.9
30.8	25.6	21.2	16.0	11.9
29.4	24.3	19.3	13.8	10.9
25.6	35.7	39.3	11.1	10.5
32.1	45.0	44.7	23.8	12.6
38.6	36.1	33.4	23.3	15.0
36.2	34.6	31.9	18.9	12.5

27.3	21.0	26.2	18.1	10.6
27.2	20.7	25.6	17.7	10.8
27.3	21.2	16.9	30.0	10.9
26.3	20.6	15.9	19.1	10.6
42.1	39.1	34.7	28.9	21.8
43.9	41.5	37.0	32.2	28.9
43.4	39.1	35.2	31.9	25.3
40.8	36.0	31.5	24.8	17.6
40.0	35.8	31.8	25.9	18.7
41.3	37.4	32.8	28.4	22.6
37.6	32.8	27.7	22.5	16.1
29.2	23.8	18.8	13.1	11.0
33.3	28.2	24.2	20.3	13.5
36.6	31.7	25.5	19.3	13.0
36.6	31.6	25.4	19.3	13.0
30.1	26.1	19.9	13.9	11.0
29.7	24.9	19.2	13.6	11.1
29.8	25.0	19.3	13.6	11.1
33.8	30.0	24.2	18.4	12.9
33.5	29.4	23.2	16.9	11.9
35.9	31.2	25.2	22.5	12.0
44.3	43.4	36.0	34.5	48.7
44.6	42.6	37.6	33.2	46.2
49.7	46.9	42.8	37.4	30.5
41.9	38.7	34.4	29.1	22.4
39.3	35.0	28.8	23.2	17.2

1/3 LASmin 6.3	1/3 LASmin 8.0	1/3 LASmin 10.0	1/3 LASmin 12.5	1/3 LASmin 16.0
1.9	0.9	0.3	-0.8	7.8
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	0.0
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	0.6
1.9	0.9	0.3	-0.8	3.1
1.9	0.9	0.3	-0.8	1.9
1.9	0.9	0.3	-0.8	3.9
1.9	0.9	0.3	-0.8	7.1
1.9	0.9	0.3	2.8	8.6
1.9	0.9	2.5	6.1	10.9
1.9	0.9	0.3	1.3	6.6
1.9	0.9	0.3	1.4	8.8
1.9	0.9	0.3	0.8	4.3
1.9	0.9	0.3	0.2	4.3
1.9	0.9	0.3	2.2	6.3
1.9	0.9	0.3	-0.8	1.1
1.9	0.9	0.3	-0.8	0.4
1.9	0.9	0.3	-0.8	1.2
1.9	0.9	0.3	-0.8	-0.6
1.9	0.9	0.3	-0.8	3.6
1.9	0.9	0.3	-0.8	4.1
1.9	0.9	0.3	-0.8	3.8
1.9	0.9	0.3	-0.8	-1.2
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	1.0
1.9	0.9	0.3	-0.8	3.1
1.9	0.9	0.3	-0.8	0.4
1.9	0.9	0.3	5.6	8.9
1.9	0.9	0.3	-0.8	1.4
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	0.7
1.9	0.9	0.3	-0.8	0.8
1.9	0.9	0.3	-0.8	-1.3
1.9	0.9	0.3	-0.8	3.3
1.9	0.9	0.3	-0.8	0.9
1.9	0.9	0.3	-0.8	1.0
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	0.2
1.9	0.9	0.3	-0.8	-0.2

1.9	0.9	0.3	1.6	7.1
1.9	0.9	0.3	-0.8	4.2
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	1.0
1.9	0.9	0.3	-0.8	0.7
1.9	0.9	0.3	-0.8	2.8
1.9	0.9	0.3	-0.8	0.8
1.9	0.9	0.3	-0.8	3.2
1.9	0.9	0.3	-0.4	4.7
1.9	0.9	0.3	-0.8	1.6
1.9	0.9	0.3	-0.8	0.1
1.9	0.9	0.3	-0.8	0.0
1.9	0.9	0.3	-0.8	-1.2
1.9	0.9	0.3	-0.8	2.9
1.9	0.9	0.3	4.0	5.0
1.9	0.9	4.1	13.9	16.6
1.9	0.9	0.3	-0.8	4.0
1.9	0.9	0.3	-0.8	1.3
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	3.6	8.1
1.9	0.9	0.3	-0.8	-1.2
1.9	0.9	0.3	1.7	6.2
1.9	0.9	0.3	-0.8	2.6
1.9	0.9	0.3	-0.8	2.0
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	4.6
1.9	0.9	0.3	-0.8	0.6
1.9	0.9	0.3	-0.8	-1.1
1.9	0.9	0.3	-0.4	6.4
1.9	0.9	0.3	2.9	6.0
1.9	0.9	0.3	0.8	5.5
1.9	0.9	0.3	-0.8	0.7
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	1.3
1.9	0.9	0.3	-0.8	2.5
1.9	0.9	0.3	-0.8	0.6
1.9	0.9	0.3	-0.8	4.0
1.9	0.9	0.3	-0.8	-0.7
1.9	0.9	0.3	-0.8	-0.9
1.9	0.9	0.3	-0.8	0.9
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	2.2
1.9	0.9	0.3	-0.8	1.4

1.9	0.9	0.3	-0.8	-1.1
1.9	0.9	0.3	-0.8	-0.6
1.9	0.9	0.3	-0.8	0.5
1.9	0.9	0.3	-0.8	-1.5
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-0.3
1.9	0.9	0.3	0.8	6.2
1.9	0.9	0.3	-0.8	6.0
1.9	0.9	0.3	-0.8	3.5
1.9	0.9	0.3	-0.8	2.4
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.4
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.4
1.9	0.9	0.3	-0.8	1.0
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-1.2
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	-0.9
1.9	0.9	0.3	-0.8	3.6
1.9	0.9	0.3	-0.8	-1.1
1.9	0.9	0.3	-0.8	-1.6
1.9	0.9	0.3	-0.8	5.4
1.9	0.9	0.3	2.2	7.2
1.9	0.9	0.3	-0.8	2.2
1.9	0.9	0.3	-0.8	-1.6

1/3 LASmin 20.0	1/3 LASmin 25.0	1/3 LASmin 31.5	1/3 LASmin 40.0	1/3 LASmin 50.0
15.5	21.5	25.3	31.4	31.2
8.4	21.1	24.6	28.3	28.9
9.2	19.0	27.1	26.3	29.0
11.1	20.5	26.4	25.6	29.5
10.3	20.0	27.0	26.9	30.6
11.5	19.2	25.5	26.3	30.5
7.0	18.5	24.7	26.0	36.0
10.9	18.1	26.4	26.3	37.1
8.4	18.1	25.8	26.2	32.3
10.0	19.2	25.9	25.3	32.0
11.3	21.5	24.5	28.4	32.9
15.8	18.0	25.6	27.2	33.6
13.8	17.4	25.4	30.5	34.1
10.9	15.4	24.8	28.3	33.4
10.8	19.4	27.3	29.7	36.9
10.1	17.7	21.1	28.9	35.1
10.0	17.1	22.5	30.6	31.9
12.4	18.5	19.3	29.9	33.5
9.9	14.7	18.9	29.5	35.7
10.4	15.7	21.8	26.5	35.5
11.5	17.4	23.8	27.0	33.4
13.0	16.7	22.7	27.5	33.8
10.0	17.6	22.3	29.5	31.4
12.5	17.2	25.5	30.4	31.2
14.0	15.5	24.7	28.9	30.3
11.1	18.3	24.8	29.0	30.7
12.1	19.4	25.2	29.4	30.8
11.6	17.0	25.5	28.8	32.6
10.4	15.4	22.3	30.5	33.1
7.5	16.7	23.5	31.1	33.1
13.2	17.8	24.5	28.2	33.8
7.2	16.5	22.3	28.8	32.3
4.9	15.0	17.6	28.1	30.9
5.4	14.6	19.1	25.6	31.9
4.8	15.7	17.3	25.6	33.9
5.2	16.0	21.2	28.5	33.6
3.9	15.3	21.7	27.3	32.9
6.3	15.8	20.5	27.1	33.0
5.4	17.5	23.2	31.0	32.3
7.3	21.1	22.8	30.1	33.3
11.2	20.5	20.9	28.8	34.9
10.5	18.6	20.2	29.8	36.3
9.9	20.1	20.1	25.9	32.2
9.7	20.7	20.9	24.8	32.0
8.5	20.0	20.9	26.7	31.9
9.8	18.9	21.5	26.8	31.1

11.4	19.3	22.4	25.7	32.4
10.6	18.2	21.1	27.1	31.5
11.6	17.8	22.1	24.2	29.9
12.3	18.6	19.9	25.6	32.8
11.2	17.0	19.8	24.1	32.4
10.0	20.5	19.9	32.0	35.3
8.9	19.3	19.8	31.9	34.3
13.7	21.1	22.5	25.3	31.2
10.6	20.6	22.2	23.7	29.3
9.0	18.0	21.6	21.6	32.7
9.1	17.2	21.9	24.9	33.5
3.5	15.0	18.6	25.5	32.2
6.4	14.5	17.9	26.1	32.4
8.3	15.9	21.7	28.6	33.0
14.4	19.9	23.2	29.2	31.8
17.9	23.3	24.3	33.3	34.5
10.4	19.4	22.6	30.1	35.2
9.6	20.2	21.8	28.8	33.6
9.1	18.5	21.2	28.7	33.2
7.7	19.5	22.5	29.5	31.7
6.0	18.5	19.5	29.1	31.6
10.0	21.6	19.7	29.1	32.1
11.1	20.7	19.6	28.7	32.4
11.5	19.4	19.6	29.2	31.5
14.5	21.2	25.3	30.2	32.8
11.5	20.9	23.8	30.1	34.1
11.7	21.7	27.4	32.5	38.9
12.2	19.7	22.4	32.2	35.1
13.6	19.8	21.7	29.2	34.6
11.5	19.5	21.2	30.2	36.1
12.1	19.3	23.3	31.8	36.8
12.7	18.2	21.6	30.3	35.6
12.4	18.9	21.6	28.2	35.2
12.3	16.8	22.1	28.6	34.1
5.9	13.7	21.1	28.1	36.7
3.4	13.5	21.6	30.6	38.3
8.5	15.8	19.3	25.0	34.7
6.1	14.0	17.0	24.4	32.0
7.1	16.6	18.7	24.1	31.9
7.9	15.4	21.2	27.8	32.2
6.9	14.0	18.4	23.9	30.0
7.7	12.4	19.0	24.3	31.1
9.0	15.1	18.5	26.1	29.4
4.9	14.1	16.9	26.6	31.4
8.6	15.5	19.4	25.8	31.7
7.2	16.9	21.8	29.3	32.7
9.8	17.2	26.7	28.7	33.2
11.6	16.9	25.5	25.8	32.1

10.3	18.1	26.1	27.0	31.3
11.4	20.8	24.4	26.9	31.5
10.9	20.6	24.4	27.7	31.2
8.8	19.2	24.2	27.7	30.9
10.4	17.3	24.5	27.2	32.3
11.4	20.2	23.4	29.2	33.4
10.2	21.2	22.3	29.7	36.5
12.7	21.3	23.8	28.3	36.4
9.7	19.0	22.7	29.2	36.2
8.6	18.1	21.4	31.7	35.7
5.7	16.9	19.2	29.8	32.0
3.1	14.3	18.4	27.2	31.8
3.7	15.6	18.7	30.0	33.6
6.2	15.7	21.4	29.6	32.8
9.1	17.5	20.6	24.9	32.6
8.1	15.9	19.2	24.3	28.2
7.9	16.7	19.2	24.2	28.1
6.7	16.3	20.2	25.5	27.8
9.1	15.7	19.8	25.4	27.2
11.0	15.9	22.6	24.4	27.6
12.1	18.6	22.1	27.0	32.5
11.8	18.8	25.0	29.2	32.8
9.9	19.9	24.3	30.9	33.8
13.7	22.2	23.2	30.8	36.0
9.7	19.9	24.8	27.7	31.8
7.0	19.9	24.0	27.6	31.4

1/3 LASmin 63.0	1/3 LASmin 80.0	1/3 LASmin 100	1/3 LASmin 125	1/3 LASmin 160
36.5	40.2	46.3	52.5	45.9
33.0	35.9	42.6	40.5	41.7
32.8	36.1	39.3	38.1	41.4
35.5	38.4	39.6	39.1	41.8
35.5	37.2	41.1	42.8	44.0
35.6	38.5	41.5	50.7	44.2
43.0	53.2	55.2	66.1	58.4
37.4	44.0	51.2	52.2	51.7
32.3	38.1	40.3	41.5	43.8
32.6	36.6	39.7	41.4	41.7
34.7	37.9	41.8	41.6	40.6
35.4	40.6	42.1	42.3	43.0
37.1	41.1	42.5	46.4	44.5
35.5	40.0	43.9	46.0	43.8
42.4	40.5	44.7	47.1	46.9
38.1	40.8	44.4	50.3	55.7
35.9	41.5	45.5	49.9	50.7
34.4	41.4	45.8	52.9	52.1
38.2	43.4	46.4	60.4	65.9
40.6	46.3	48.6	59.0	54.5
38.4	43.4	45.9	51.4	50.0
38.3	43.1	46.2	50.9	49.3
35.2	42.1	43.3	46.4	43.9
32.9	39.2	40.3	39.4	40.7
34.0	38.8	42.1	43.0	42.0
35.0	40.0	42.0	46.1	44.1
37.1	39.4	43.5	45.3	45.7
36.4	41.6	42.6	43.6	43.6
38.0	43.7	46.7	49.1	46.3
45.4	48.9	56.8	56.3	53.1
44.3	39.8	45.7	46.7	48.0
41.1	37.3	37.9	44.3	43.6
36.8	36.8	37.1	42.8	43.3
34.2	36.0	39.6	41.9	41.0
34.3	35.8	40.2	41.2	43.2
36.1	38.4	39.4	46.1	44.6
35.4	36.1	39.7	43.2	44.4
36.0	36.1	39.6	43.0	47.2
36.3	36.9	40.3	42.1	43.4
34.5	35.9	41.1	41.4	43.2
34.2	38.4	40.4	41.4	43.1
34.8	35.2	38.0	40.1	40.9
34.0	33.5	37.6	39.9	40.6
33.9	35.9	41.6	43.7	45.6
35.9	33.9	35.6	38.1	40.5
33.0	32.4	33.8	36.2	37.6

36.2	32.9	33.9	36.3	37.9
34.6	32.9	36.7	39.8	39.6
33.1	34.0	35.5	36.6	39.1
35.4	36.9	38.3	38.6	42.2
36.6	37.4	42.2	48.5	48.4
37.0	37.6	38.3	43.8	45.1
35.1	37.9	38.1	43.6	45.6
33.3	33.4	36.2	37.4	38.4
31.9	31.9	35.1	37.2	37.4
33.9	32.9	35.4	41.0	39.4
36.0	37.7	43.1	41.1	42.4
38.0	39.3	41.8	43.3	44.5
36.2	45.8	42.5	44.8	44.4
34.9	41.0	43.3	45.0	46.5
36.2	38.8	43.7	48.5	47.2
36.5	40.3	44.5	50.0	47.0
39.1	44.1	47.6	48.6	47.8
37.2	40.0	44.3	49.1	46.0
35.0	37.4	42.4	43.1	43.4
35.0	37.1	42.2	42.3	42.9
32.3	34.3	40.7	42.5	43.8
32.7	34.5	41.3	43.0	44.3
34.5	35.4	40.9	43.1	44.2
34.0	37.8	41.9	43.5	45.2
35.5	36.4	41.3	44.1	47.5
35.8	39.9	43.9	47.2	48.0
39.5	41.9	56.1	55.9	52.4
35.1	37.1	44.3	45.9	46.0
34.8	34.9	42.7	43.7	41.6
39.2	39.5	50.6	47.8	46.3
40.9	44.2	49.0	48.9	48.0
39.9	40.6	44.8	47.5	45.1
38.4	39.3	44.4	50.1	46.6
38.6	43.0	45.3	63.4	50.9
41.3	42.7	47.1	48.7	48.7
38.4	50.4	48.1	48.7	49.2
37.9	42.6	46.8	53.9	55.0
35.7	39.9	41.3	47.7	44.5
34.5	40.2	41.3	45.9	44.5
36.1	40.1	46.2	47.0	47.4
37.0	40.6	41.5	42.9	44.9
36.1	40.0	40.2	43.3	42.8
33.5	35.0	38.1	41.9	41.5
36.0	35.3	38.6	40.2	41.0
37.6	34.3	39.1	41.0	40.0
35.6	43.1	40.9	44.4	42.2
38.2	39.4	39.8	42.5	46.5
35.3	37.0	39.9	40.8	42.3

35.4	37.6	41.6	42.2	41.5
34.6	36.7	40.4	42.3	41.0
33.9	35.5	39.0	40.8	41.3
34.0	35.1	37.7	40.5	41.5
34.5	35.9	39.1	41.0	42.0
41.0	43.7	45.0	44.5	46.3
44.7	42.3	44.1	48.9	49.2
43.6	42.6	43.8	49.7	51.7
44.1	40.7	42.1	47.8	48.8
40.1	42.9	42.2	50.1	49.1
39.6	41.1	41.5	46.4	43.8
36.6	38.4	40.9	47.5	44.0
37.3	38.3	46.4	48.8	50.4
35.8	44.0	48.2	48.1	53.5
39.1	42.6	54.1	51.0	56.0
31.9	34.8	38.9	39.5	42.4
30.8	34.3	38.6	39.4	42.0
31.1	33.9	37.2	37.5	40.8
33.4	35.0	36.2	37.7	40.1
33.1	35.6	36.6	41.6	40.8
32.5	37.4	39.4	40.8	42.3
35.0	37.0	44.7	49.8	46.7
35.7	41.5	49.0	47.9	50.9
38.2	42.6	47.5	46.8	51.3
36.2	35.9	41.0	43.9	49.4
32.5	35.2	38.0	42.2	42.2

1/3 LASmin 200	1/3 LASmin 250	1/3 LASmin 315	1/3 LASmin 400	1/3 LASmin 500
53.5	43.3	49.6	49.1	52.2
47.0	41.6	44.4	43.3	46.0
41.9	40.9	42.9	43.3	45.8
41.4	42.9	44.3	45.2	47.1
46.7	44.7	45.8	48.1	48.9
45.5	46.3	47.1	48.8	50.5
59.6	56.3	57.8	56.4	58.5
50.7	47.0	45.2	45.5	47.1
41.6	39.0	38.7	40.2	41.6
38.9	38.0	36.8	39.1	41.5
39.5	38.6	38.0	39.6	41.8
42.7	44.0	45.5	46.4	46.5
43.4	45.1	44.8	46.3	48.3
43.2	45.4	44.2	46.2	48.0
45.6	47.7	47.1	49.0	49.9
48.0	50.5	50.9	50.5	51.2
47.4	46.3	46.0	47.4	48.7
48.6	46.3	46.6	47.3	49.1
57.1	56.0	57.7	52.0	51.1
54.6	54.4	52.6	52.9	55.1
50.3	50.3	49.0	50.4	53.4
51.3	49.1	48.2	49.1	52.5
44.3	43.3	43.4	45.6	47.6
39.8	38.1	36.3	40.3	42.0
39.5	38.4	36.1	40.0	42.0
42.2	40.8	39.0	42.1	45.2
45.8	46.8	45.9	47.1	49.9
45.1	46.9	45.5	47.0	48.8
50.4	52.0	52.2	53.4	56.1
54.9	54.8	55.6	56.3	57.4
49.5	51.1	53.1	53.7	55.6
45.4	48.5	47.5	49.2	51.7
43.7	46.9	46.5	48.8	50.6
43.1	46.0	45.3	46.9	48.8
43.0	46.5	49.2	47.8	49.8
46.6	48.3	47.4	49.3	50.7
43.9	45.4	46.6	47.6	49.6
44.5	48.9	46.7	47.3	50.0
45.3	47.3	46.9	49.4	50.9
45.5	47.2	46.8	49.4	52.4
44.8	49.0	48.6	49.0	51.3
43.5	45.8	45.9	48.5	49.8
41.8	44.0	44.4	47.9	48.0
46.6	48.3	48.3	50.1	51.2
43.9	44.7	44.4	46.0	48.9
38.8	38.7	39.6	42.0	44.6

38.4	39.3	40.1	41.8	43.9
45.0	43.6	42.3	43.7	46.0
42.0	42.2	41.5	42.5	43.8
43.3	45.0	45.6	47.5	48.9
49.5	51.6	52.4	53.4	56.5
46.6	49.8	49.8	52.6	54.2
48.3	50.5	49.2	51.9	53.4
38.4	40.7	41.9	41.4	43.8
38.1	39.8	40.3	40.5	43.7
38.7	40.6	42.5	42.0	44.1
43.0	44.7	45.3	45.2	47.2
45.9	48.0	48.9	49.0	50.2
45.2	49.0	46.0	46.1	47.4
47.3	48.6	45.9	46.0	48.5
47.9	47.0	45.1	46.9	48.9
46.9	46.3	46.1	48.2	49.5
48.8	47.6	47.2	49.3	51.3
47.6	50.4	50.5	51.8	54.3
44.8	47.4	46.0	48.8	52.5
44.7	46.9	46.0	48.7	52.1
43.6	44.6	45.0	47.4	49.8
42.3	44.1	42.0	43.9	47.4
41.7	44.4	42.0	43.5	46.7
43.0	44.0	43.8	45.9	48.7
47.8	47.3	48.3	49.2	50.9
50.0	49.6	48.2	50.4	52.3
56.1	54.1	57.5	56.7	57.9
49.8	49.7	50.0	53.6	54.5
44.0	43.3	44.2	46.5	47.9
50.7	48.1	50.5	50.5	51.0
50.3	51.4	51.1	54.6	55.4
46.6	47.0	48.9	48.6	49.1
52.3	47.5	47.7	48.3	48.0
61.0	55.1	51.6	49.2	49.3
48.3	49.6	46.5	47.5	48.1
48.4	50.2	46.4	48.5	50.3
49.1	49.6	47.4	48.9	50.1
43.1	45.6	43.4	45.9	48.2
43.8	48.5	45.7	45.2	47.9
50.0	49.8	51.7	54.2	54.8
46.6	48.5	48.4	50.7	52.0
44.5	47.9	47.8	49.5	51.6
43.8	47.3	47.2	48.7	49.7
44.9	45.4	44.5	45.8	47.9
42.3	45.3	43.6	44.8	47.2
42.2	46.3	44.7	45.1	46.9
46.0	50.0	47.8	49.3	50.4
41.6	44.2	43.6	46.2	45.5

41.0	43.5	42.8	45.5	45.1
39.1	42.2	41.5	43.1	44.1
38.4	41.6	42.1	42.9	43.9
37.4	41.1	41.5	42.7	43.4
38.8	42.3	42.8	43.0	44.0
45.2	51.2	51.4	52.4	53.1
49.8	52.7	53.7	53.7	57.0
50.9	53.8	53.2	54.4	56.7
49.3	53.3	53.0	54.8	57.4
48.8	53.2	54.1	55.1	57.8
45.3	47.4	46.1	47.4	48.8
46.3	47.3	45.8	47.5	49.1
49.2	49.5	48.0	48.5	49.3
50.0	50.6	50.9	50.1	52.8
54.4	56.1	54.0	53.4	53.5
41.9	43.6	43.5	45.2	47.8
42.8	43.9	43.0	44.9	48.3
41.0	43.6	42.9	44.0	47.6
40.7	44.7	43.4	43.9	47.6
43.8	44.1	45.5	47.7	48.8
43.2	44.7	45.3	45.3	47.9
45.4	53.2	51.2	48.0	51.0
50.5	51.3	52.1	54.6	55.4
51.4	50.7	51.1	52.9	54.3
52.3	55.7	45.2	49.3	55.9
42.6	45.8	43.9	45.7	48.8

1/3 LASmin 630	1/3 LASmin 800	1/3 LASmin 1000	1/3 LASmin 1250	1/3 LASmin 1600
53.3	54.7	56.7	55.6	53.5
45.9	47.8	50.2	50.1	49.2
45.6	47.2	48.5	48.1	48.1
46.3	47.6	48.9	49.1	49.0
49.4	51.7	52.6	51.9	50.8
49.8	52.5	53.5	52.9	51.6
59.4	59.8	59.1	58.9	57.5
47.6	49.4	51.5	50.9	48.7
43.5	46.1	47.1	46.5	44.8
42.9	45.4	46.0	45.8	44.4
42.9	45.4	47.4	46.7	45.4
47.4	49.3	50.9	50.4	48.7
49.7	51.1	52.2	50.6	49.7
49.5	51.6	52.4	50.5	49.8
50.6	53.4	54.1	53.3	51.9
51.6	54.3	54.7	54.3	53.2
50.7	52.5	52.5	50.9	49.4
50.3	51.8	52.3	50.9	49.0
51.9	52.4	53.3	51.7	51.1
57.2	58.9	59.6	58.4	57.4
55.7	58.3	59.7	58.9	57.3
55.3	56.0	57.6	57.4	55.9
52.3	53.8	54.6	54.4	52.0
44.4	47.1	49.6	49.1	47.7
44.1	46.7	47.9	46.9	45.8
45.1	47.0	48.1	46.9	45.7
51.2	52.6	54.2	53.3	51.4
50.3	51.6	54.2	53.1	51.2
57.7	60.1	62.1	60.9	59.6
59.1	61.1	61.2	60.4	59.1
57.4	60.9	62.7	62.3	60.4
52.7	55.4	57.6	57.9	57.1
52.6	55.5	56.5	56.2	54.5
50.8	52.8	53.9	53.3	52.2
51.6	53.1	54.1	53.3	52.2
52.6	54.4	55.3	53.9	52.7
51.3	53.3	53.4	52.7	51.9
51.8	54.8	55.2	53.2	53.1
53.0	55.3	56.6	55.3	54.5
54.8	57.2	58.4	57.0	55.4
53.3	56.3	58.2	57.6	56.4
51.2	54.2	57.3	56.5	55.0
49.0	51.5	54.3	53.8	52.3
55.2	57.3	58.6	57.1	56.1
50.3	53.5	55.4	54.5	52.5
43.9	45.8	48.1	47.9	45.4

43.4	44.6	46.7	45.5	43.6
46.1	47.7	50.5	49.5	47.7
45.2	46.6	47.7	46.9	46.0
51.2	54.2	55.0	54.4	52.7
58.0	59.5	61.4	60.2	58.8
55.3	57.6	58.7	58.6	57.3
55.1	57.5	58.7	59.1	57.8
45.6	47.7	48.8	47.8	45.7
45.1	47.3	48.1	46.6	44.9
45.6	48.5	49.5	49.4	48.2
47.1	49.1	49.7	48.5	47.0
49.9	49.8	50.3	49.1	47.3
48.5	49.7	49.9	48.9	47.7
48.4	49.7	49.9	49.2	47.9
49.8	50.6	50.5	49.2	47.9
49.9	50.9	50.6	49.3	48.9
50.9	52.6	54.4	52.6	52.0
55.7	58.6	59.1	58.0	55.9
52.9	56.2	56.8	55.5	53.6
54.0	57.1	56.8	54.9	53.7
52.8	55.4	57.5	56.5	55.7
51.9	52.3	51.9	51.5	49.9
50.4	50.2	50.6	50.5	48.8
49.7	51.0	51.7	51.1	50.3
52.3	54.2	55.3	54.6	52.3
55.0	55.8	54.2	54.4	52.3
61.6	63.1	62.3	61.7	59.4
57.3	59.7	59.4	59.7	57.8
49.6	51.5	52.7	52.5	51.4
52.7	53.2	54.5	57.1	57.8
57.6	61.5	62.4	61.5	60.5
50.2	52.6	52.4	52.1	50.5
49.1	51.1	51.7	50.9	49.2
51.1	51.5	51.9	50.7	49.6
49.6	51.2	51.8	51.0	49.7
50.7	52.7	53.4	52.6	51.1
50.9	53.4	54.6	53.6	52.7
49.5	51.9	53.6	52.1	50.6
48.6	50.7	52.4	51.7	50.9
56.7	59.8	60.2	58.7	57.3
54.5	56.9	58.4	57.0	55.6
54.0	57.6	59.0	57.9	56.9
52.1	55.0	57.3	56.4	55.3
48.9	52.1	54.9	54.4	52.4
47.9	51.4	52.9	52.5	50.8
48.6	51.8	53.1	52.8	51.6
51.8	54.0	55.6	54.4	53.3
47.1	48.8	49.9	49.0	47.9

46.3	48.0	49.1	48.3	46.8
44.8	46.9	48.5	47.5	45.8
44.2	45.9	47.2	47.3	45.6
43.5	46.4	46.9	47.0	45.5
44.1	47.1	47.9	47.1	45.7
55.6	57.2	57.9	57.0	56.9
58.2	61.0	62.4	61.5	60.0
57.9	60.7	62.4	61.8	60.4
59.8	62.5	63.8	63.9	62.3
59.4	61.5	62.8	63.0	61.4
49.7	51.9	53.7	52.8	51.4
49.7	51.8	52.6	51.8	50.4
50.3	52.0	53.4	52.1	50.9
55.6	56.9	58.9	58.4	57.1
55.9	59.5	58.7	59.2	56.7
50.9	54.5	56.0	55.5	54.2
51.3	54.8	56.6	55.4	54.8
50.9	53.5	55.2	54.8	53.5
49.6	51.6	52.8	52.0	50.8
51.0	52.1	54.1	53.5	52.1
49.8	52.2	53.8	53.2	52.3
52.1	55.0	55.1	54.5	54.0
57.5	58.9	60.3	59.9	59.2
56.1	57.6	59.3	58.4	57.4
55.0	54.0	54.2	53.0	51.1
48.7	50.2	51.4	50.4	48.7

1/3 LASmin 2000	1/3 LASmin 2500	1/3 LASmin 3150	1/3 LASmin 4000	1/3 LASmin 5000
51.3	48.4	46.2	43.6	38.3
46.9	44.7	43.7	41.3	38.5
46.7	44.1	43.2	41.2	38.2
47.3	44.9	44.1	41.3	38.8
48.7	46.5	44.7	42.4	39.0
49.5	47.0	45.1	43.2	40.0
56.3	54.8	53.7	50.5	48.0
46.2	44.3	42.9	41.1	38.2
43.7	42.6	41.7	40.1	37.4
43.4	42.3	41.8	40.1	37.4
44.4	42.7	42.0	40.5	37.4
46.9	44.9	43.5	41.7	38.5
47.3	44.5	41.4	39.0	35.1
47.4	44.4	41.3	38.1	34.7
49.6	47.6	45.3	41.0	38.5
51.0	49.3	46.7	42.8	39.5
47.2	44.3	41.3	38.3	34.9
47.0	44.2	41.3	38.1	34.9
49.0	46.6	43.2	39.7	37.4
54.4	51.6	48.1	44.8	41.2
54.7	51.5	48.0	44.9	41.4
52.7	49.8	46.6	43.1	39.6
48.1	44.4	41.3	38.0	35.6
43.1	38.9	35.8	32.3	28.3
42.3	38.7	35.7	32.8	29.1
42.2	39.5	36.6	34.4	31.5
48.9	46.5	44.0	41.6	38.0
48.5	46.1	43.2	40.8	37.5
57.5	55.5	52.2	49.5	46.2
57.5	54.7	52.4	50.2	46.9
57.9	54.6	51.0	47.4	43.6
54.4	51.1	47.7	44.4	40.8
52.2	48.8	45.8	43.1	39.9
49.5	45.7	41.9	38.4	34.7
49.7	45.9	42.0	38.4	34.4
49.8	46.7	43.3	40.1	36.3
49.0	45.0	41.6	37.9	34.4
50.6	46.9	43.3	39.7	36.0
51.6	48.1	44.7	41.0	36.9
52.7	49.3	45.7	42.8	39.2
53.9	50.9	46.9	42.7	38.9
51.7	47.5	44.1	40.7	36.7
48.8	45.2	42.0	38.0	34.1
53.1	51.4	47.9	44.4	40.8
49.1	45.5	42.5	39.7	35.4
41.6	38.6	36.2	32.8	29.3

40.6	38.3	36.0	32.7	29.2
45.5	43.2	41.5	38.2	34.3
43.4	41.2	39.2	35.6	31.9
50.1	48.0	45.8	42.4	39.5
56.9	54.0	51.4	48.2	44.9
53.9	51.6	48.9	44.5	41.2
54.1	53.4	52.0	46.5	42.4
42.6	41.8	38.3	34.3	30.7
42.0	40.5	37.1	33.4	29.7
45.4	41.8	38.6	33.9	29.9
44.8	42.5	38.9	35.1	31.1
44.9	42.8	40.5	37.5	34.9
44.8	42.9	40.7	37.3	34.1
44.9	42.7	40.3	37.2	34.0
45.1	42.4	40.0	37.0	33.8
46.1	44.0	41.6	38.2	35.1
49.1	47.0	43.6	40.2	37.2
52.8	50.6	48.0	44.3	40.9
50.0	47.5	44.6	41.0	37.1
51.4	48.1	46.2	42.1	38.3
52.6	49.7	46.2	42.5	38.8
47.6	45.6	42.8	37.8	35.0
46.6	44.3	41.3	36.7	34.1
48.1	46.7	43.3	39.6	36.9
50.4	47.8	44.9	42.0	38.9
50.6	48.9	46.9	45.3	42.0
58.7	57.3	54.8	51.2	48.3
56.7	54.9	51.4	48.0	44.8
48.7	46.2	43.0	39.4	36.5
55.5	53.5	50.6	47.3	44.7
57.6	54.4	50.8	47.6	44.4
48.3	46.1	44.7	41.1	38.1
47.4	45.0	44.0	40.7	37.3
47.8	45.9	43.6	40.7	37.2
48.2	45.6	42.9	39.8	36.3
49.0	46.5	44.3	40.9	36.9
49.9	47.6	44.5	41.5	38.0
48.6	45.5	41.9	38.4	35.1
48.6	46.2	43.0	39.8	36.0
56.1	53.0	50.2	47.6	44.7
52.8	50.0	46.2	42.9	40.1
54.4	50.9	47.7	44.5	41.1
52.3	48.5	44.8	41.3	38.0
48.5	44.9	41.3	38.3	34.2
47.4	43.9	39.7	36.5	32.8
48.0	44.5	40.3	37.1	33.3
50.9	47.9	44.5	41.5	37.3
45.8	43.5	40.8	37.4	34.7

45.1	43.2	40.4	37.3	34.5
43.7	42.8	39.8	36.7	35.1
43.8	42.9	39.6	36.7	35.3
43.8	42.6	39.7	36.6	35.1
44.0	42.8	39.8	36.8	35.1
56.9	54.9	53.1	50.1	47.7
57.1	54.7	52.1	49.9	45.8
57.3	54.7	52.2	49.4	45.8
59.2	55.7	52.2	49.0	44.9
58.5	55.1	51.6	48.4	44.2
48.3	45.5	43.0	39.7	36.5
47.8	45.2	42.8	39.3	36.3
49.0	46.8	43.7	41.9	40.1
55.0	51.7	49.0	45.5	41.8
53.7	48.9	45.5	41.6	37.3
50.9	46.4	42.8	38.6	35.1
52.7	48.0	44.8	40.9	36.0
49.5	44.6	40.5	37.1	32.4
47.9	44.1	40.4	36.9	32.4
50.4	47.6	44.3	40.9	37.6
49.2	45.9	42.1	38.7	35.4
51.2	48.4	45.3	42.2	38.7
57.4	56.3	54.4	51.8	48.8
55.4	54.1	52.4	49.1	46.2
47.4	43.4	39.4	36.2	33.2
45.3	41.2	37.4	33.7	30.7

1/3 LASmin 6300	1/3 LASmin 8000	1/3 LASmin 10000	1/3 LASmin 12500	1/3 LASmin 16000
39.8	42.1	32.0	27.1	22.6
39.2	36.9	30.6	26.6	22.4
38.3	35.7	30.0	26.5	21.5
37.2	34.5	30.6	26.0	21.6
36.8	34.4	30.7	25.3	20.9
36.9	34.5	31.0	25.4	21.0
43.8	40.9	37.2	32.6	28.0
36.4	34.7	31.1	27.8	22.1
35.8	34.0	30.6	25.8	21.5
35.9	34.2	30.8	25.9	21.7
35.8	34.0	30.5	25.7	21.4
34.9	30.4	26.3	20.7	15.2
31.2	25.8	20.2	15.1	11.1
30.4	24.9	19.6	14.5	10.6
35.1	31.2	27.1	18.6	12.5
34.7	30.1	25.2	18.6	12.5
30.6	25.6	20.7	15.8	10.8
30.6	25.4	20.5	15.5	11.3
34.7	29.0	23.1	19.4	15.2
36.6	31.7	27.1	20.6	15.0
36.8	32.7	28.6	22.2	15.9
35.0	30.2	25.7	17.5	12.3
32.6	27.8	22.8	16.6	11.7
25.3	21.0	17.4	14.2	10.3
26.7	22.6	17.7	13.2	10.0
27.7	25.1	19.6	14.0	10.2
35.4	32.1	26.3	17.8	11.7
34.5	31.2	25.3	17.4	11.3
42.5	38.0	32.9	28.0	22.1
42.7	38.8	33.5	29.1	23.4
39.6	35.4	30.3	24.1	18.3
37.4	33.2	27.9	23.2	18.6
36.8	32.7	26.9	21.9	16.4
29.7	25.3	20.7	16.1	12.1
29.6	25.1	20.3	15.2	10.8
31.9	26.7	20.9	14.9	10.6
29.9	24.7	19.3	14.5	10.7
31.2	26.4	22.2	16.6	12.0
32.1	27.2	21.8	16.1	11.2
34.5	29.7	24.5	18.9	13.4
34.2	29.9	24.0	17.3	13.3
31.9	26.9	21.9	16.2	11.8
29.5	24.4	19.3	14.2	10.3
36.5	31.9	25.3	21.6	15.3
31.2	26.2	20.9	15.7	11.3
26.1	21.9	17.5	13.5	10.5

25.6	21.5	17.3	13.2	10.0
30.2	25.6	20.4	15.5	11.2
27.9	23.5	18.7	14.3	10.4
35.0	31.2	25.8	20.6	14.8
41.2	37.7	34.3	29.6	24.5
37.3	34.4	29.6	24.5	19.1
39.3	36.7	31.5	25.1	18.3
27.1	23.3	18.8	13.8	10.7
25.9	21.9	17.8	13.8	11.0
26.0	21.4	17.4	13.3	10.2
27.4	22.9	18.8	14.0	10.5
30.9	25.9	21.2	15.7	11.1
30.2	25.4	20.2	15.2	10.9
30.3	26.8	20.3	15.2	10.7
29.6	25.6	20.6	15.4	11.3
31.1	26.6	21.7	16.8	12.6
33.2	32.7	29.2	17.7	12.6
36.9	31.5	26.8	21.6	15.9
32.8	28.3	23.5	18.0	12.7
33.9	29.7	25.0	19.8	15.3
34.3	29.3	23.7	17.9	12.5
30.7	25.9	21.0	15.9	11.7
29.5	24.4	19.7	15.0	10.7
32.7	28.3	23.5	18.6	13.4
34.8	30.6	26.1	21.4	15.6
38.1	34.3	28.3	22.6	16.6
46.4	41.8	37.4	33.0	26.7
40.7	36.4	32.3	27.8	22.7
31.6	26.7	22.2	16.8	12.1
39.7	38.4	33.1	26.9	21.0
39.4	36.2	30.5	26.0	20.1
34.6	30.7	25.8	20.0	15.2
33.2	29.0	24.2	17.3	11.7
33.3	28.2	23.5	17.7	11.9
32.0	27.0	21.9	16.3	11.1
32.9	28.1	22.9	16.9	11.6
33.8	28.8	23.4	17.5	11.8
30.3	25.2	19.9	14.7	10.3
31.3	26.5	21.3	15.4	12.3
42.8	38.1	34.3	28.6	22.2
35.9	30.8	26.2	20.3	14.1
36.0	30.8	25.6	21.2	15.3
33.6	28.1	23.8	18.1	12.8
29.5	24.5	19.0	14.6	10.8
28.6	23.7	18.6	14.2	10.3
28.7	25.5	28.8	29.7	11.0
33.2	28.9	27.0	25.5	18.9
29.6	26.1	21.0	16.4	11.0

29.5	25.9	20.3	15.6	11.0
29.4	25.2	19.6	16.9	13.1
29.4	25.6	20.1	15.6	16.5
29.5	25.0	19.9	15.3	11.1
29.6	25.0	19.9	15.3	11.0
44.1	40.2	36.9	31.9	27.9
42.3	38.4	34.0	29.8	24.2
41.6	37.2	32.4	27.2	20.6
40.8	36.9	31.6	26.1	20.1
40.0	35.7	30.5	24.9	18.7
32.4	27.5	22.5	16.8	11.6
32.5	27.4	22.2	16.7	11.3
33.0	27.6	22.9	17.5	12.5
36.6	31.5	26.2	20.1	13.9
32.8	27.5	22.1	16.4	11.8
30.2	25.0	20.1	14.5	10.4
30.7	25.6	19.9	14.6	10.5
27.7	22.8	17.6	12.9	9.8
27.5	22.5	17.3	12.8	9.7
33.2	28.1	22.8	16.7	11.3
32.0	27.4	22.7	17.3	12.7
35.9	31.4	27.4	22.4	16.4
45.1	42.3	38.6	34.0	29.6
43.5	40.8	37.1	32.8	27.8
29.4	25.0	20.7	16.6	12.2
28.3	21.9	17.4	13.4	9.9

1/3 LASmin 20000	LAIeq-LAeq	OVLD	OBA OVLD	Marker
15.5	0.3	No	No	
15.5	0.7	No	No	
14.8	0.4	No	No	
14.8	0.5	No	No	
14.5	0.4	No	No	
14.6	0.9	No	No	
21.6	8.8	No	No	
15.7	6.3	No	No	
15.2	1.3	No	No	
15.1	0.2	No	No	
14.9	0.1	No	No	
10.8	1.5	No	No	
10.1	0.6	No	No	
10.5	0.8	No	No	
10.5	1.7	No	No	
10.5	0.4	No	No	
10.0	0.3	No	No	
10.1	0.5	No	No	
11.3	3.4	No	No	
11.1	0.3	No	No	
11.0	0.7	No	No	
10.3	0.2	No	No	
10.4	2.6	No	No	
10.1	0.7	No	No	
10.0	1.0	No	No	
10.2	0.7	No	No	
10.4	0.1	No	No	
10.3	1.2	No	No	
15.4	0.1	No	No	
17.2	0.1	No	No	
12.9	0.9	No	No	
14.6	-0.1	No	No	
12.0	0.0	No	No	
10.9	0.2	No	No	
10.3	2.1	No	No	
10.3	2.1	No	No	
10.3	0.3	No	No	
10.7	0.3	No	No	
10.7	0.3	No	No	
13.5	0.3	No	No	
10.5	0.3	No	No	
10.9	1.8	No	No	
10.3	3.3	No	No	
10.7	0.4	No	No	
10.5	3.2	No	No	
10.4	0.3	No	No	

10.3	1.0	No	No
10.6	4.7	No	No
10.3	0.1	No	No
11.7	0.5	No	No
19.9	0.9	No	No
13.6	0.3	No	No
13.0	3.6	No	No
10.5	0.9	No	No
10.4	1.1	No	No
10.2	0.5	No	No
10.2	0.5	No	No
10.3	1.3	No	No
10.6	0.9	No	No
10.4	0.5	No	No
10.5	1.5	No	No
10.5	0.2	No	No
10.7	0.4	No	No
11.5	0.0	No	No
10.7	4.0	No	No
12.4	0.2	No	No
10.8	1.4	No	No
11.2	0.1	No	No
10.5	0.4	No	No
11.1	0.4	No	No
11.3	0.1	No	No
11.8	1.1	No	No
20.9	1.0	No	No
16.6	1.0	No	No
10.6	-0.1	No	No
13.2	0.5	No	No
14.4	5.5	No	No
11.4	1.3	No	No
10.3	0.2	No	No
10.5	3.8	No	No
10.2	0.4	No	No
10.3	1.6	No	No
10.3	2.3	No	No
10.2	0.2	No	No
10.4	1.8	No	No
17.6	0.8	No	No
13.3	0.6	No	No
11.9	1.0	No	No
10.6	0.2	No	No
10.4	0.1	No	No
10.2	0.7	No	No
10.3	-0.1	No	No
10.6	0.9	No	No
10.4	0.0	No	No

10.3	0.4	No	No
10.4	0.2	No	No
10.4	0.1	No	No
10.3	0.2	No	No
10.3	0.2	No	No
21.3	0.1	No	No
17.3	0.0	No	No
14.0	0.6	No	No
14.3	1.0	No	No
13.3	0.3	No	No
10.4	0.1	No	No
10.3	1.8	No	No
10.6	0.0	No	No
11.0	10.2	No	No
10.6	0.6	No	No
10.4	0.0	No	No
10.6	0.7	No	No
10.4	0.5	No	No
10.4	0.6	No	No
10.5	0.6	No	No
10.5	0.2	No	No
12.0	1.2	No	No
29.9	1.2	No	No
22.4	20.8	No	No
10.9	15.8	No	No
10.4	2.1	No	No

Appendix TRAF:
Traffic impact study

Transportation Impact Analysis

Hillcrest Wildflower Station

City of Antioch

Prepared by:
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1875 Olympic Boulevard, Suite 210
Walnut Creek, CA 94596

Abrams Associates
TRAFFIC ENGINEERING, INC.

June 30, 2017

Wildflower Station Project
City of Antioch

TRANSPORTATION AND CIRCULATION

1) EXECUTIVE SUMMARY

This traffic impact study describes the existing and future conditions for transportation with and without the proposed mixed-use development. The study presents information on the regional and local roadway networks, pedestrian and transit conditions, and provides an analysis of the effects on transportation facilities associated with the project.

This study also describes the regulatory setting; the criterion used for determining the significance of environmental impacts; and summarizes potential environmental impacts and appropriate mitigation measures. This study has been conducted in accordance with the requirements and methodologies set forth by the City of Antioch, the Contra Costa County Transportation Authority (CCTA), Caltrans, and the applicable provisions of CEQA. Based on this analysis the project would not cause significant impacts at any intersections in the study area and no off-site vehicular traffic mitigations would be required.

2) PROJECT DESCRIPTION

The proposed project includes a shopping center along with some residential uses. The shopping center is proposed to include 89,422 square feet of building space, 98 condominium units, and 22 single family homes. The project would be located to the east of the intersection of Hillcrest Avenue and Deer Valley Road. The main access to shopping center/condominium portion of the site will be from an existing traffic signal on Hillcrest Avenue just north of Deer Valley Road. There would also be a secondary access to the condominiums and shopping center on Wildflower Drive. In addition, a new roadway serving the 22 single family homes would also connect to Wildflower Drive opposite of Terrace View Drive. **Figure 1** shows the location of the project and the surrounding roadway network. **Figure 2** shows the proposed site plan for the project.

3) ENVIRONMENTAL SETTING

This section of the report describes the roadways, traffic conditions and other existing transportation characteristics in the vicinity of the project. The primary basis of the analysis is the peak hour level of service for the key intersections. The hours identified as the “peak” hours are generally between 7:30 a.m. and 8:30 a.m. and from 4:30 p.m. to 5:30 p.m. for the majority of the transportation facilities described. Throughout this report, these peak hours will be identified as the AM and PM peak hours, respectively.

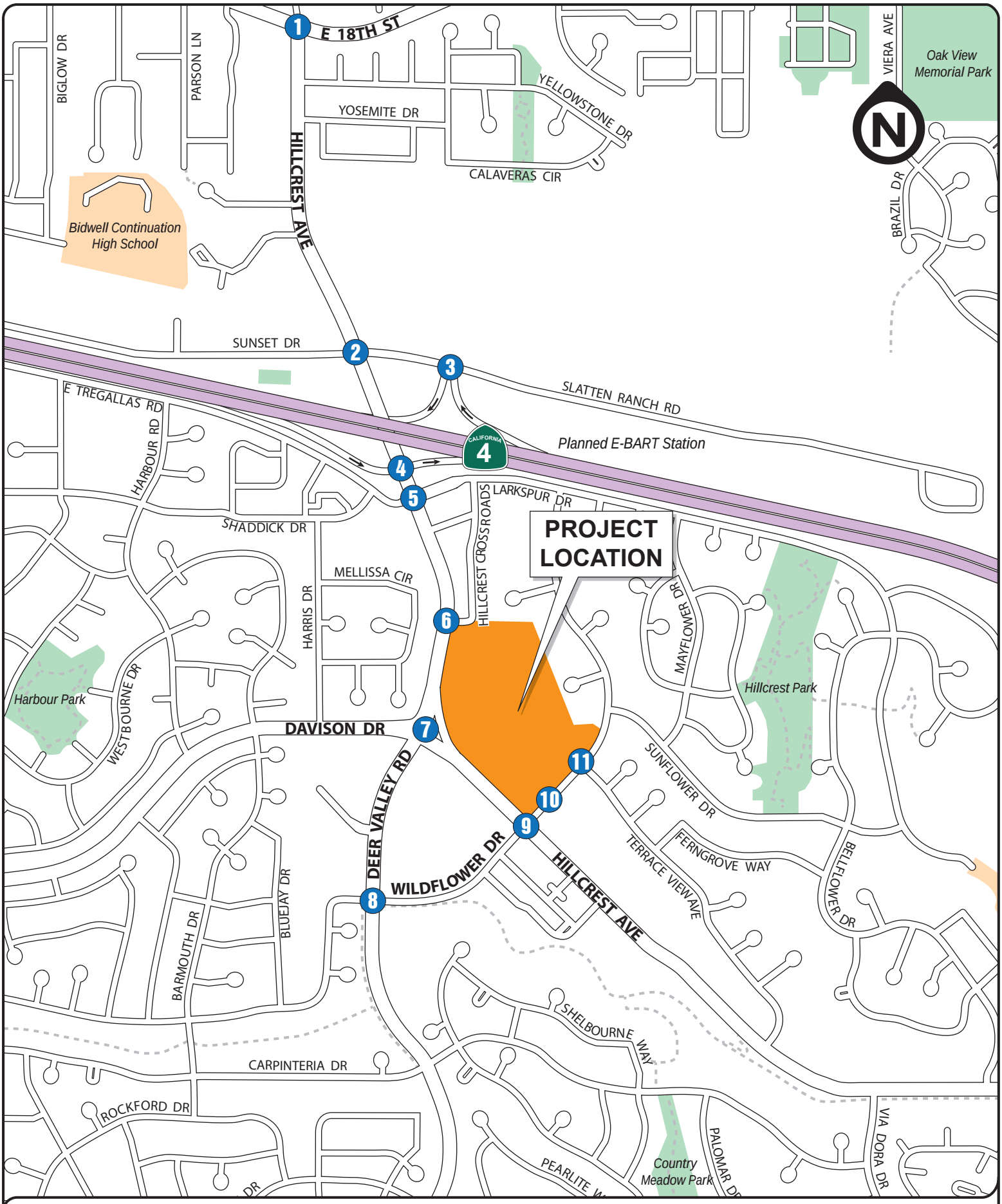

FIGURE 1 | PROJECT LOCATION AND PROPOSED STUDY INTERSECTIONS

TRANSPORTATION IMPACT ANALYSIS

Hillcrest Wildflower Station

City of Antioch

Abrams Associates
TRAFFIC ENGINEERING, INC.

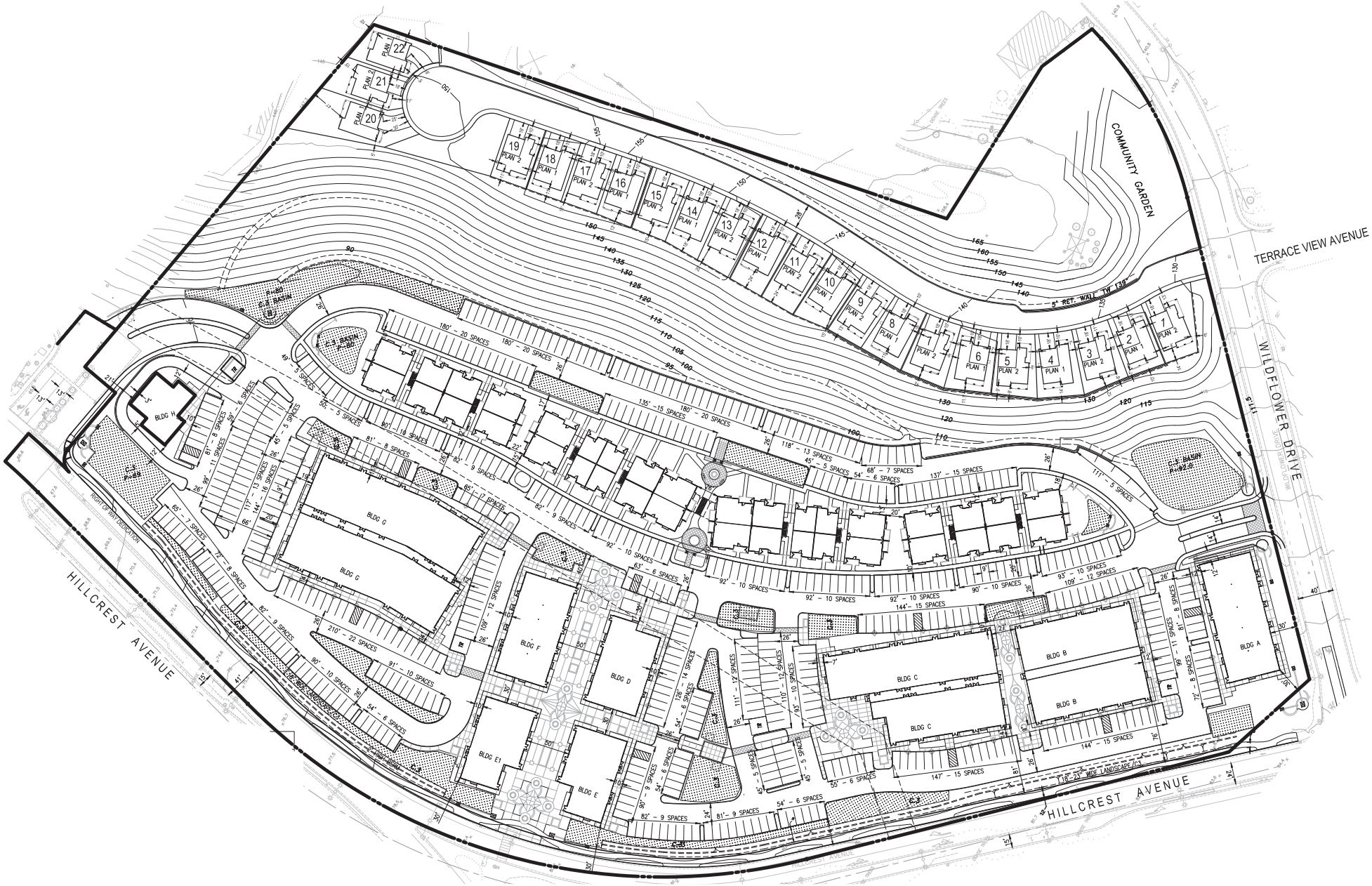

FIGURE 2 | SITE PLAN
TRANSPORTATION IMPACT ANALYSIS
Hillcrest Wildflower Station
City of Antioch

Abrams Associates
TRAFFIC ENGINEERING, INC.

3.1 Project Study Intersections

Based on the project's trip generation, the CCTA Technical Procedures, and the potential for traffic impacts a list of project study intersections was prepared. **Figure 1** shows the location of the project study intersections. As mentioned above, all access to the site will be from an existing signalized intersection on Hillcrest Avenue and two secondary entrances on Wildflower Drive. There are eleven (11) study intersections included in the analysis.

Project Study Intersections

1. Hillcrest Avenue and East 18th Street
2. Hillcrest Avenue and Sunset Drive-Slatten Ranch Road
3. Hillcrest Avenue and the SR 4 Westbound Ramps
4. Hillcrest Avenue and the SR 4 Eastbound Ramps
5. Hillcrest Avenue and E. Tregallas Road/Larkspur Drive
6. Hillcrest Avenue and Hillcrest Crossroads (proposed main project entrance)
7. Hillcrest Avenue and Deer Valley Road/Davison Street
8. Deer Valley Road and Wildflower Drive
9. Hillcrest Avenue and Wildflower Drive
10. Wildflower Drive and the Proposed Secondary Shopping Center Entrance
11. Wildflower Drive and Terrace View Avenue-Proposed Single Family Project Access

Please note this list includes all intersections where over 50 peak hour trips could potentially be added in accordance with the Contra Costa Transportation Authority's Technical Procedures (January, 2013) and Caltrans' Guidelines for the Preparation of Traffic Impact Studies (December, 2002).

3.2 Traffic Analysis Scenarios

The study intersections were evaluated for the following five scenarios:

- Scenario 1: *Existing Conditions* – Level of Service (LOS) based on existing peak hour volumes and existing intersection configurations.
- Scenario 2: *Existing Plus Project* – Existing traffic volumes plus trips from the proposed project.
- Scenario 3: *Cumulative Conditions* – This scenario includes year 2040 cumulative volumes based on planned and approved projects and the most recent release of the Countywide Travel Demand Model.
- Scenario 4: *Cumulative Plus Project Conditions* – This scenario includes year 2040 cumulative volumes based on the most recent release of the Countywide Travel Demand Model plus the trips from the proposed project.

3.3 Existing Roadway Network

As discussed previously, the project location and the surrounding roadway network are illustrated in **Figure 1**. The following is a more detailed description of the roadways that could be affected by the project:

- **State Route 4 –** State Route (SR) 4 is the primary east-west corridor in Contra Costa County. It connects Interstate 80 in the city of Hercules to the west with the cities of Oakley and Brentwood to the east and terminates at SR 89 in South Lake Tahoe. Historically SR 4 has been one of the more congested freeways in Contra Costa County, in particular, the segments between Lone Tree Way and Railroad Avenue in the morning and Bailey Road to Lone Tree Way in the afternoon. However, improvements are being made and in the past few years SR 4 has been widened to eight lanes, four in each direction including High Occupancy Vehicle (HOV) lanes from SR 242 to Contra Loma Boulevard.

- **Hillcrest Avenue –** Hillcrest Avenue is a major north-south arterial that is located in eastern Antioch on both sides of SR 4 linking the area north of E. 18th Street to Prewett Ranch Drive. This roadway would be the primary access road to the proposed Hillcrest Avenue Station. South of SR 4, there are bicycle lanes on both sides of the street that continue to East 18th Street, while north of SR 4, a bicycle lane is only on one side of the road. There are sidewalks on both sides of the street along most of its length, and many segments are landscaped.

- **Deer Valley Road –** is a four-lane major arterial with a landscaped median that runs north-south beginning in the north at the Hillcrest Avenue/Davison Drive junction and ends in the south at Marsh Creek Road, south of the City's boundary in Contra Costa County.

- **Larkspur Drive –** is the east-west roadway running south of and parallel to SR 4. It is a continuation of E. Tregallas Road. At the intersection with Bluebell Circle, Larkspur Drive bends south away from SR 4 and terminates at a cul-de-sac. Bicycle lanes exist along a short segment of the road, connecting to the lanes along Hillcrest Avenue.

- **Wildflower Drive –** is a two-lane collector road that extends south from Larkspur Drive across both Hillcrest Avenue and Deer Valley Road before changing names to Burwood Way. This roadway serves both commercial and residential traffic and sidewalks are on both sides of the road for most of its length.

- **Davison Drive –** is a four-lane major arterial with a landscaped median and turning pockets located south of SR 4 and serves as an east-west connection between Lone Tree Way and Hillcrest Avenue but generally does not have turn pockets.

- **East 18th Street –** is a four-lane east-west major arterial located north of and parallel to SR 4. It continues to the east as Main Street in the City of Oakley. Most segments do not have medians and sidewalks are on both sides of the road for most of its length.

3.4 Intersection Analysis Methodology

Existing operational conditions at the eleven (11) study intersections have been evaluated according to the requirements set forth by Contra Costa County and Caltrans. Analysis of traffic

operations was conducted using the 2010 *Highway Capacity Manual* (*HCM*) Level of Service (LOS) methodology analyzed with Synchro software.[1] Level of service is an expression, in the form of a scale, of the relationship between the capacity of an intersection (or roadway segment) to accommodate the volume of traffic moving through it at any given time. The level of service scale describes traffic flow with six ratings ranging from A to F, with "A" indicating relatively free flow of traffic and "F" indicating stop-and-go traffic and traffic jams.

As the amount of traffic moving through a given intersection or roadway segment increases, the traffic flow conditions that motorists experience rapidly deteriorate as the capacity of the intersection or roadway segment is reached. Under such conditions, there is general instability in the traffic flow, which means that relatively small incidents (e.g., momentary engine stall) can cause considerable fluctuations in speeds and delays that lead to traffic congestion. This near-capacity situation is labeled level of service (LOS) E. Beyond LOS E, the intersection or roadway segment capacity has been exceeded, and arriving traffic will exceed the ability of the intersection to accommodate it.

For signalized intersections, The *HCM* methodology determines the capacity of each lane group approaching the intersection. The LOS is then based on average control delay (in seconds per vehicle) for the various movements within the intersection. A combined weighted average control delay and LOS are presented for the intersection. A summary of the HCM results and copies of the detailed HCM LOS calculations are included in the appendix to this report. **Table 1** summarizes the relationship between LOS, average control delay, and the volume to capacity ratio at signalized intersections. **Table 2** summarizes the relationship between LOS and average control delay at unsignalized intersections.

For unsignalized (all-way stop controlled and two-way stop controlled) intersections, the average control delay and LOS operating conditions are calculated by approach (e.g., northbound) and movement (e.g., northbound left-turn) for those movements that are subject to delay. In general, the operating conditions for unsignalized intersections are presented for the worst approach.

3.5 Existing Intersection Operating Conditions (Scenario 1)

The existing intersection geometry at each of the project study intersections can be seen in **Figure 3.** Traffic counts at the study intersections were conducted in January, 2016 at times when local schools were in session. **Figure 4** presents the existing traffic volumes at the project study intersections. **Table 3** summarizes the associated LOS computation results for the existing weekday AM and PM peak hour conditions. Please note that the corresponding LOS analysis calculation sheets are presented in the Transportation Impact Analysis Technical Appendix. As shown in **Table 3**, all study intersections currently has acceptable operations (LOS D or better) during the weekday AM and PM peak hours.

[1] *2010 Highway Capacity Manual*, Transportation Research Board, Washington D.C., 2011

TABLE 1
SIGNALIZED INTERSECTION LEVEL OF SERVICE DEFINITIONS

Level of Service	Description of Operations	Average Delay (sec/veh)	Volume to Capacity Ratio
A	Insignificant Delays: No approach phase is fully used and no vehicle waits longer than one red indication.	≤ 10	< 0.60
B	Minimal Delays: An occasional approach phase is fully used. Drivers begin to feel restricted.	> 10 to 20	> 0.61 to 0.70
C	Acceptable Delays: Major approach phase may become fully used. Most drivers feel somewhat restricted.	> 20 to 35	> 0.71 to 0.80
D	Tolerable Delays: Drivers may wait through no more than one red indication. Queues may develop but dissipate rapidly without excessive delays.	> 35 to 55	> 0.81 to 0.90
E	Significant Delays: Volumes approaching capacity. Vehicles may wait through several signal cycles and long vehicle queues from upstream.	> 55 to 80	> 0.91 to 1.00
F	Excessive Delays: Represents conditions at capacity, with extremely long delays. Queues may block upstream intersections.	> 80	> 1.00

SOURCES: 2010 *Highway Capacity Manual*, Transportation Research Board, 2011.

TABLE 2
UNSIGNALIZED INTERSECTION LEVEL OF SERVICE DEFINITIONS

Level of Service	Description of Operations	Average Delay (seconds/vehicle)
A	No delay for stop-controlled approaches.	0 to 10
B	Operations with minor delays.	> 10 to 15
C	Operations with moderate delays.	> 15 to 25
D	Operations with some delays.	> 25 to 35
E	Operations with high delays and long queues.	> 35 to 50
F	Operation with extreme congestion, with very high delays and long queues unacceptable to most drivers.	> 50

SOURCE: 2010 *Highway Capacity Manual*, Transportation Research Board, 2011.

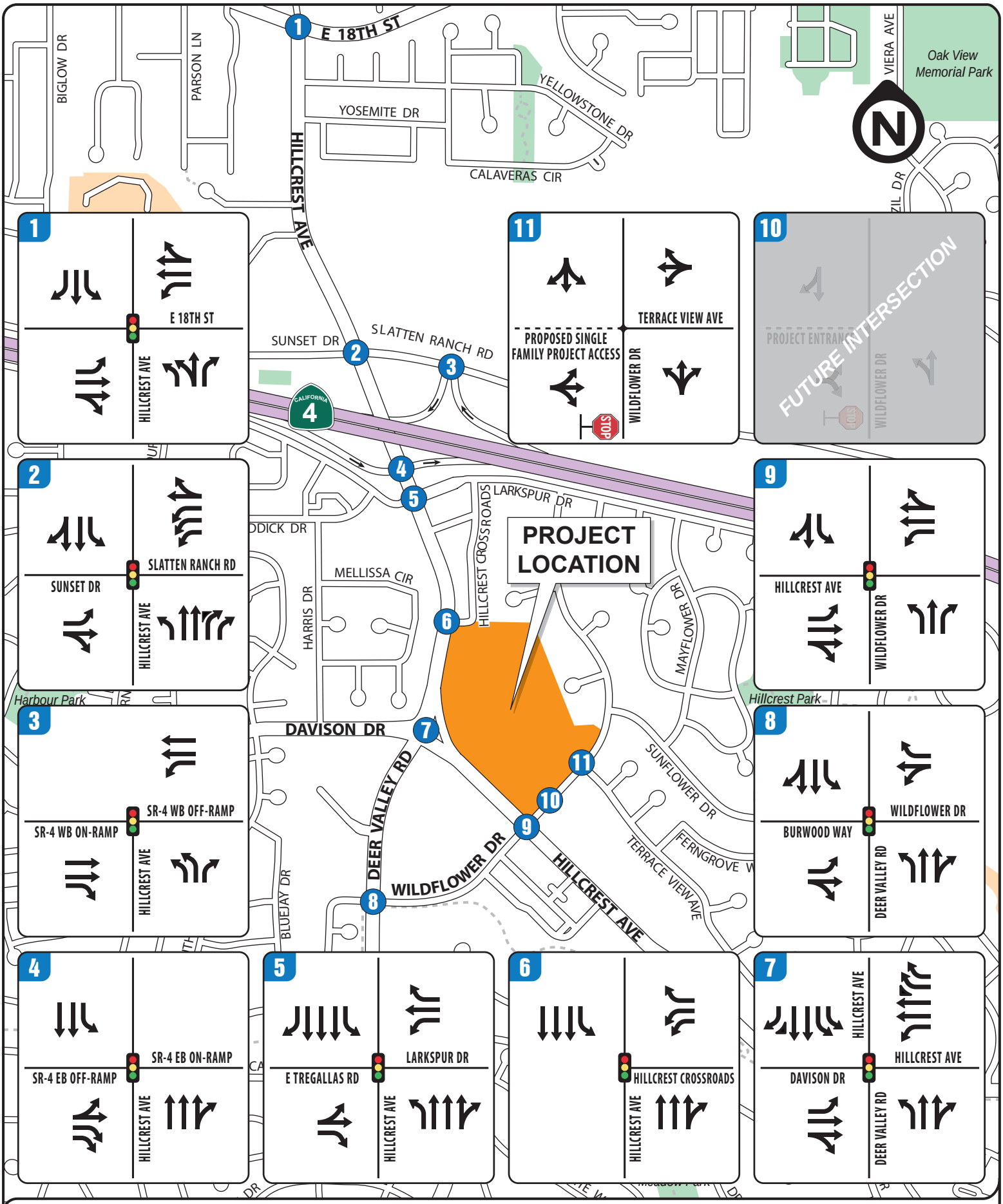

FIGURE 3 | EXISTING LANE CONFIGURATIONS
TRANSPORTATION IMPACT ANALYSIS
Hillcrest Wildflower Station
City of Antioch

Abrams Associates
TRAFFIC ENGINEERING, INC.

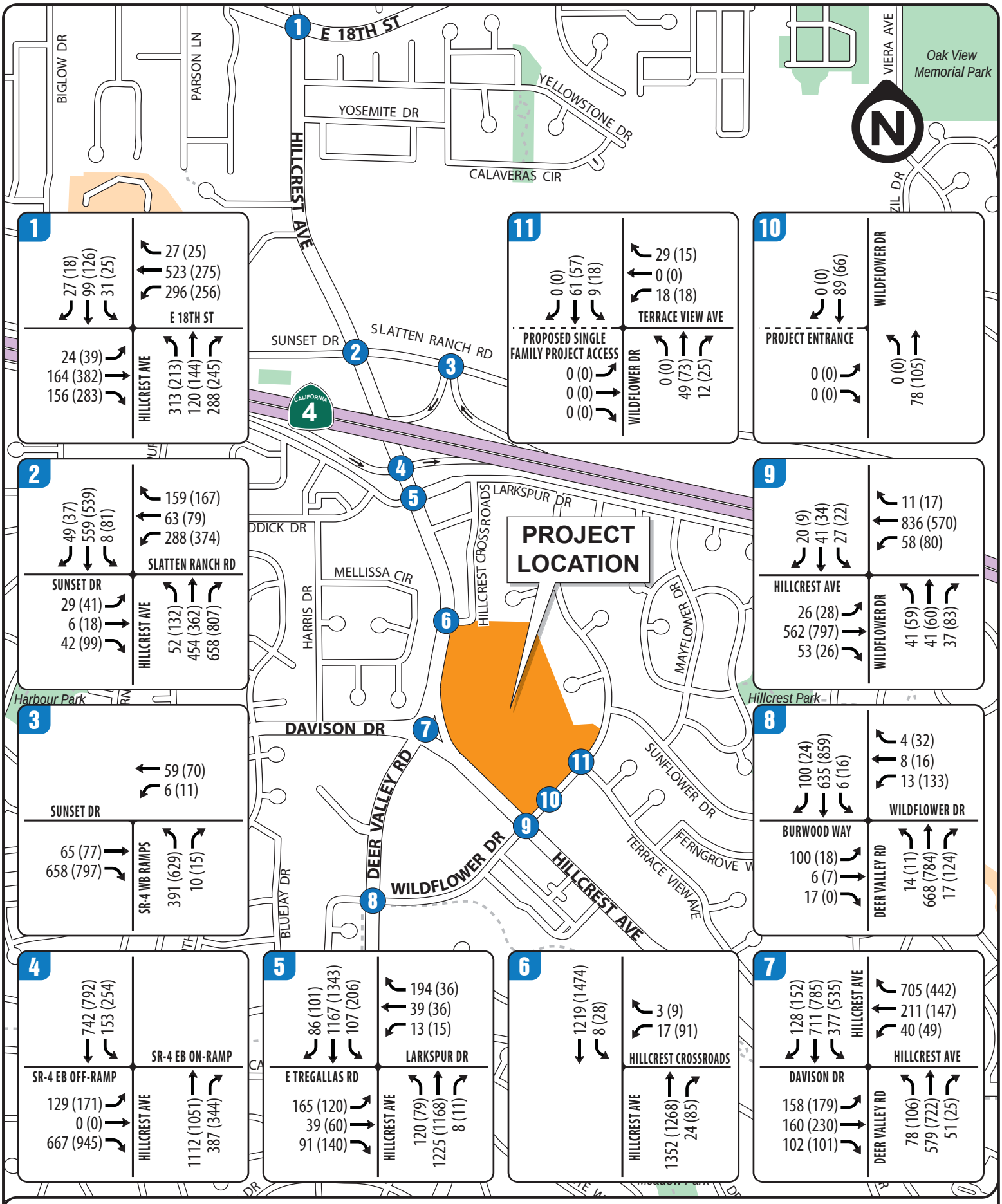

FIGURE 4 | EXISTING AM(PM) PEAK HOUR TRAFFIC VOLUMES

TRANSPORTATION IMPACT ANALYSIS

Hillcrest Wildflower Station

City of Antioch

Abrams Associates
TRAFFIC ENGINEERING, INC.

TABLE 3
EXISTING INTERSECTION LEVEL OF SERVICE CONDITIONS

INTERSECTION		CONTROL	PEAK HOUR	EXISTING	
				Delay	LOS
1	E. 18TH ST & HILLCREST AVE	Signalized	AM	23.3	C
			PM	28.6	C
2	SUNSET DR & HILLCREST AVE	Signalized	AM	13.3	B
			PM	18.7	B
3	SR-4 WESTBOUND RAMPS & HILLCREST AVE	Signalized	AM	13.0	B
			PM	24.5	C
4	SR-4 EASTBOUND RAMPS & HILLCREST AVE	Signalized	AM	14.8	B
			PM	19.1	B
5	LARKSPUR DR / E. TREGALLAS RD & HILLCREST AVE	Signalized	AM	26.2	C
			PM	17.7	B
6	HILLCREST CROSSROADS & HILLCREST AVE	Signalized	AM	2.1	A
			PM	3.8	A
7	DAVISON DR / HILLCREST AVE & DEER VALLEY RD	Signalized	AM	30.9	C
			PM	31.2	C
8	DEER VALLEY RD & WILDFLOWER DR	Signalized	AM	6.6	A
			PM	8.5	A
9	HILLCREST AVE & WILDFLOWER DR	Signalized	AM	8.2	A
			PM	9.4	A
10	PROJECT ENTRANCE & WILDFLOWER DR	Side Street Stop	AM	N/A	N/A
			PM	N/A	N/A
11	SFH ENTRANCE & WILDFLOWER DR	Side Street Stop	AM	9.1	A
			PM	9.5	A

SOURCE: Abrams Associates, 2017

NOTES: HCM LOS results are presented in terms of average intersection delay in seconds per vehicle. For stop controlled intersections the results for the worst side street approach are presented.

3.6 Pedestrian and Bicycle Facilities

Bicycle paths, lanes and routes are typical examples of bicycle transportation facilities, which are defined by Caltrans as being in one of the following three classes:

Class I – Provides a completely separated facility designed for the exclusive use of bicyclists and pedestrians with crossing points minimized.

Class II – Provides a restricted right-of-way designated lane for the exclusive or semi-exclusive use of bicycles with through travel by motor vehicles or pedestrians prohibited, but with vehicle parking and cross-flows by pedestrians and motorists permitted. Please note that the roadways noted as having bike lanes do not allow parking.

Class III – Provides a route designated by signs or permanent markings and shared with pedestrians and motorists.

Please note that most roadways in the project study area have sidewalks and bicycle lanes are provided on Hillcrest Avenue, Deer Valley Road, and also portions of Wildflower Drive and Larkspur Drive.

3.7 Transit Service

Two major public mass transit operators provide service within or adjacent to the study area. These include BART and Tri-Delta Transit. These operators are described below.

Bay Area Rapid Transit (BART) – BART is a rapid mass transit system which provides regional transportation connections to much of the Bay Area. It runs from the East Bay Area in Richmond to the South Bay Area in Fremont. In the east-west direction it runs from Pittsburg to the San Francisco Airport and Milbrae with several connections in Oakland. The Concord BART station can be accessed via Tri Delta Transit Route 201 (described below). BART has trains running from about 4:00 am to 12:30 am daily with a weekday frequency of approximately 15 minutes. An E-BART extension that will connect with BART at the Bay Point Station is currently under construction in the median of SR 4 with a planned station at Hillcrest Avenue.

Tri Delta Transit – Tri Delta Transit serves east Contra Costa County including the cities of Pittsburg, Antioch, Oakley, and Brentwood; and the unincorporated areas of East County, along with Bay Point. Tri Delta Transit operates 16 local bus routes from Monday to Friday, including four express services, and three local bus routes during weekends and holidays. The nearest Tri Delta Transit bus stops to the project are located on Hillcrest Avenue at Larkspur Drive and at Wildflower Drive. Tri Delta Transit bus routes operating adjacent to the proposed project include Routes 379, 380, 383, 385, 388, 390, and 392.

County Connection – The County Connection Transit Service, operated by the Contra Costa County Transit Authority (CCCTA), serves most Contra Costa County cities, with limited service to East County areas. County Connection operates Route 93X through Pittsburg, which originates in Walnut Creek and travels on Ygnacio Valley Road/Kirker Pass Road to Buchanan Road. Its terminus is at the Hillcrest Park-and-Ride Lot in Antioch. Westbound service operates weekday mornings, from 4:45 a.m. to 7:00 a.m., approximately every 30 minutes. Eastbound evening service runs from 3:00 p.m. to 6:45 p.m. at frequencies of 30 to 60 minutes.

4) REGULATORY CONTEXT

Existing policies, laws and regulations that apply to the proposed project are summarized below.

4.1 State

The California Department of Transportation (Caltrans) has jurisdiction over State highways. Therefore, Caltrans controls all construction, modification, and maintenance of State highways, such as SR 4. Any improvements to these roadways would require Caltrans' approval. The Guide for the Preparation of Traffic Impact Studies provides consistent guidance for Caltrans staff who review local development and land use change proposals. The Guide also informs local agencies about the information needed for Caltrans to analyze the traffic impacts to state highway facilities which include freeway segments, on- or off-ramps, and signalized intersections.

4.2 Local

Contra Costa Countywide Transportation Plan - The transportation policies that are currently applicable within Contra Costa County are based on the Contra Costa County Transportation Plan. This document identifies standards and procedures for analyzing transportation impacts in the county and a 2017draft update is currently under review by the CCTA. As noted previously, all traffic studies generating over 100 peak hour trips must be prepared in accordance with the Contra Costa Transportation Authority's Technical Procedures (dated January, 2013).

City of Antioch General Plan - The Transportation and Circulation Element included in the City of Antioch General Plan was prepared pursuant to Section 65302(b) of the California Government Code. The Transportation and Circulation Element addresses the location and extent of existing and planned transportation routes, terminals, and other local public utilities and facilities. The General Plan identifies roadway and transit goals and policies that have been adopted to ensure that the transportation system of the County will have adequate capacity to serve planned growth. These goals and policies are intended to provide a plan and implementation measures for an integrated, multi-modal transportation system that will safely and efficiently meet the transportation needs of all economic and social segments of the City.

4.3 Significance Criteria

The goal of the City of Antioch and TRANSPLAN is to maintain LOS D or better at all intersections in the project study area and the East County Action Plan also establishes LOS D as the standard for Hillcrest Avenue and Deer Valley Road, which are identified as a Routes of Regional Significance. Please note that for the Caltrans freeway facilities being studied the operational standards and significance criteria are established by the CCTA acting as the designated Congestion Management Agency (CMA) representing the jurisdictions of Contra Costa County. As the acting CMA the CCTA establishes the traffic LOS standards for all state highway facilities in Contra Costa County, which supersede the general Caltrans operational standard for all state highways. As the designated CMA, the Contra Costa Transportation Authority (the Authority) is also responsible for updating and adopting a Congestion Management Program (CMP). Consistent with the CMP legislation, the Authority establishes the level-of-service standards for the CMP network.

Intersection Significance Thresholds - Project-related operational impacts on the signalized study intersections in the City of Antioch are considered significant if project-related traffic causes the Level of Service (LOS) rating to deteriorate beyond Level of Service (LOS) D during the peak commute hours.

According to CEQA guidelines, a project would have a significant impact if it would:

- Conflict with an applicable plan, ordinance or policy establishing measures of effectiveness for the performance of the circulation system, taking into account all modes of transportation including mass transit and non-motorized travel and relevant components of the circulation system, including, but not limited to, intersections, streets, highways and freeways, pedestrian and bicycle paths and mass transit.
- Conflict with an applicable congestion management program, including, but not limited to, level-of-service standards, and travel demand measures, or other standards established by a county congestion management agency for designated roadways.
- Result in inadequate emergency vehicle access.

- Conflict with adopted policies, plans, or programs regarding public transit, bicycle, or pedestrian facilities, or otherwise decrease the performance or safety of such facilities.
- Result in a projected future over-capacity freeway condition where current long-range planning studies show an under-capacity condition.
- Result in an internal circulation system design that does not meet City standards.

5) IMPACTS AND MITIGATION MEASURES

5.1 Project Trip Generation

The shopping center portion of the project is proposed to include 89,422 square feet of building space. The residential portion of the project would include 98 condominium units and 22 single family homes. The trip generation calculations are shown in **Table 4**. They are based on rates determined using the regression equations and guidance on reductions for multi-use development and transit usage provided in the Institute of Transportation Engineer's (ITE) Trip Generation Manual, 9th Edition.

TABLE 4
TRIP GENERATION CALCULATIONS

Land Use	*Size*	*ADT*	*AM Peak Hour*			*PM Peak Hour*		
			In	*Out*	*Total*	*In*	*Out*	*Total*
Retail Trip Rates		57.46	0.74	0.55	1.29	2.51	2.61	5.12
Shopping Center Trip Generation	89,422 sq. ft.	5,138	65	50	115	225	233	458
Reduction for Pass-By Trips (34%)		1,747	22	17	39	77	79	156
Net New Shopping Center Trip Generation		***3,391***	***43***	***32***	***75***	***149***	***153***	***302***
Condominium Trip Rates		6.45	0.09	0.43	0.52	0.40	0.20	0.60
Condominium Trip Generation	***98 units***	***632***	***9***	***42***	***51***	***39***	***20***	***59***
Single Family Home Trip Rates		11.85	0.39	0.75	1.14	0.77	0.45	1.22
Single Family Home Trip Generation	***22 units***	***261***	***9***	***16***	***25***	***17***	***10***	***27***
Multi-Use Trip Reduction	*6%*	*257*	*4*	*5*	*9*	*12*	*11*	*23*
Transit Usage Trip Reduction	*3%*	*129*	*2*	*3*	*5*	*6*	*6*	*12*
Total Project Trip Generation		***3,898***	***55***	***82***	***137***	***187***	***166***	***353***

The total trip generation reflects all vehicle trips that would be counted at the project driveways, both inbound and outbound. As shown in **Table 4**, the project is forecast to generate approximately 137 net new vehicle trips on the surrounding roadway system during the AM peak hour and 353 trips during the PM peak hour. For purposes of determining the reasonable worst-case impacts the trips generated by this proposed development are estimated for the peak commute hours of 7:30 a.m. and 8:30 a.m. and 4:30 p.m. and 5:30 p.m., which represent the peak hours of "*adjacent street traffic*". This is the period when the project traffic would generally contribute to the greatest amount of congestion.

5.2 Project Trip Distribution and Assignment

The trip distribution assumptions have been based on the project's proximity to the freeway interchange, the existing directional split at nearby intersections, and the overall land use patterns in the area. **Figure 5** shows the project traffic that is forecast to be added at each of the study intersections. **Figure 6** presents the trip distribution percentages assumed for the study.

5.3 Existing Plus Project Traffic Intersection Operating Conditions (Scenario 2)

This scenario evaluates the existing conditions with the addition of traffic from the proposed project. The main access point to the project on Hillcrest Avenue already has an existing traffic signal and the other two project access intersections are proposed to be controlled with stop signs on the side street (project) approaches. Please note the existing shopping center access road for Hillcrest Crossroads (a.k.a. Lily Court) is proposed to be controlled with a side street stop sign where it intersections with the new project access road which would become the through street at the first internal intersection east of Hillcrest Avenue. The capacity calculations for the Existing Plus Project scenario are shown in **Table 5** and the resulting volumes at the project study intersections are shown in **Figure 7**. Please note that the corresponding LOS analysis calculation sheets are presented in the Transportation Impact Analysis Technical Appendix. As shown in **Table 5**, all intersections would continue to have acceptable operations (LOS D or better) during the weekday AM and PM peak hours with the exception of Hillcrest Avenue at Sunset Drive which would continue to operate at LOS E during the PM peak hour. Please note that this intersection was still under construction at the time of the existing conditions surveys. Additional turn lanes that are currently planned for this intersection are forecast to substantially improve the PM LOS at this intersection, allowing the intersection to meet the established standard with the addition of project traffic.

5.4 Internal Circulation and Access

No internal site circulation or access issues have been identified that would cause a traffic safety problem or any unusual traffic congestion or delay. At the project entrances there were no capacity problems identified with the proposed lane configurations. Please note the main access point to the project on Hillcrest Avenue already has an existing traffic signal and the other two project access intersections are proposed to be controlled with stop signs on the side street (project) approaches. The existing shopping center access road for Hillcrest Crossroads (a.k.a. Lily Court) is proposed to be controlled with a side street stop sign where it intersections with the new project access road which would become the through street at the first internal intersection east of Hillcrest Avenue.

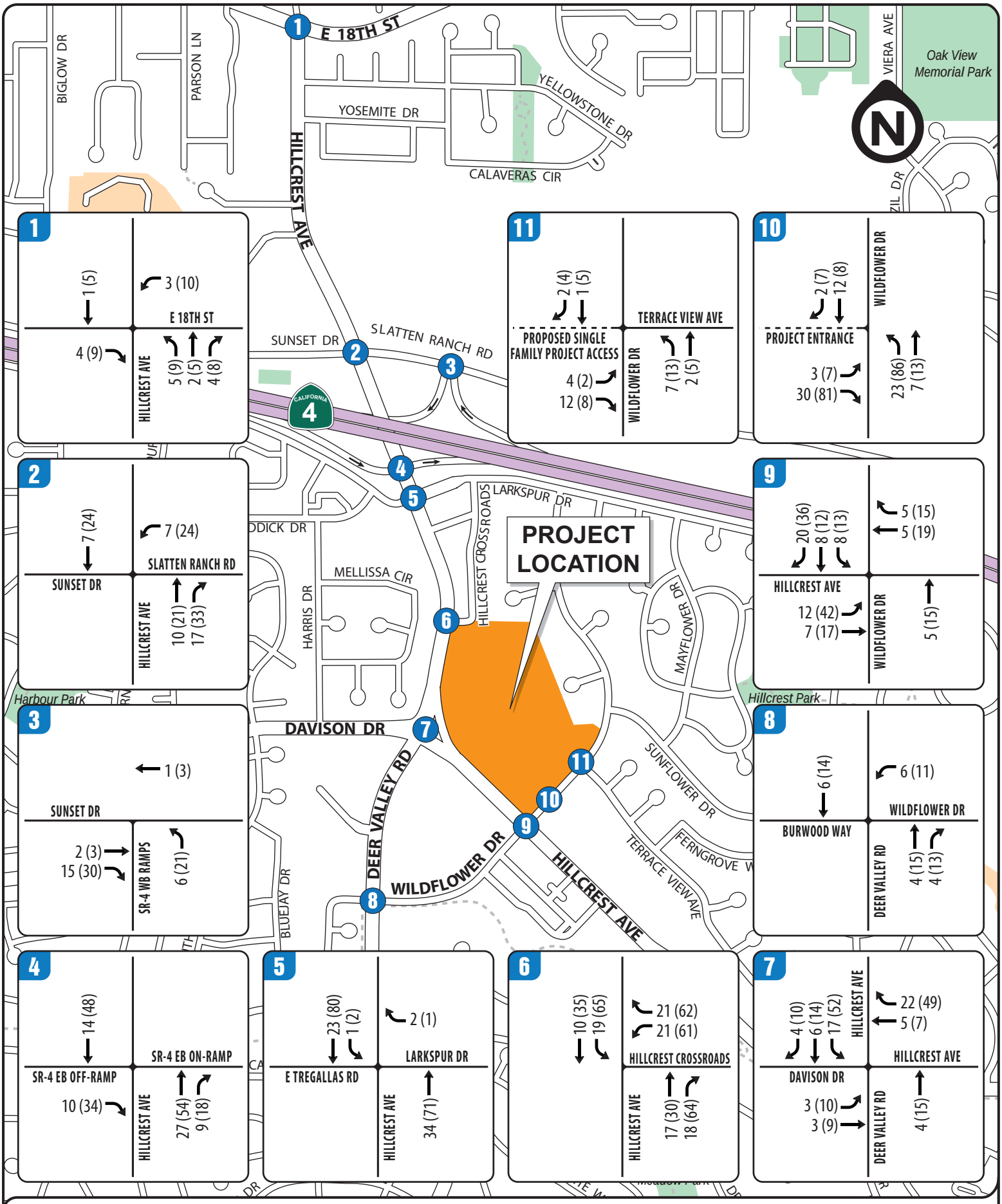

FIGURE 5 | PROJECT AM(PM) PEAK HOUR TRIPS

TRANSPORTATION IMPACT ANALYSIS

Hillcrest Wildflower Station

City of Antioch

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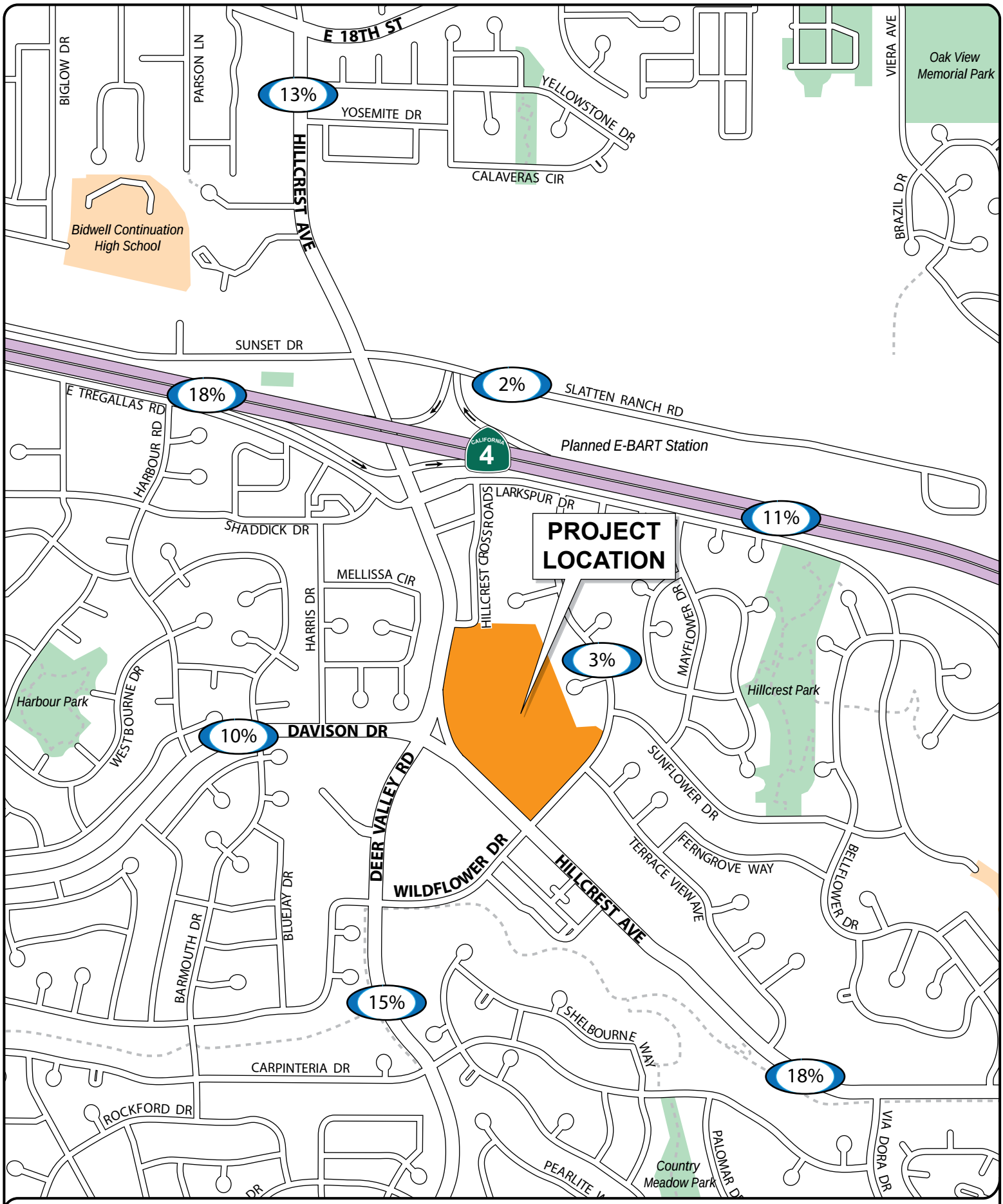

FIGURE 6 | PROJECT TRIP DISTRIBUTION PERCENTAGES

TRANSPORTATION IMPACT ANALYSIS

Hillcrest Wildflower Station

City of Antioch

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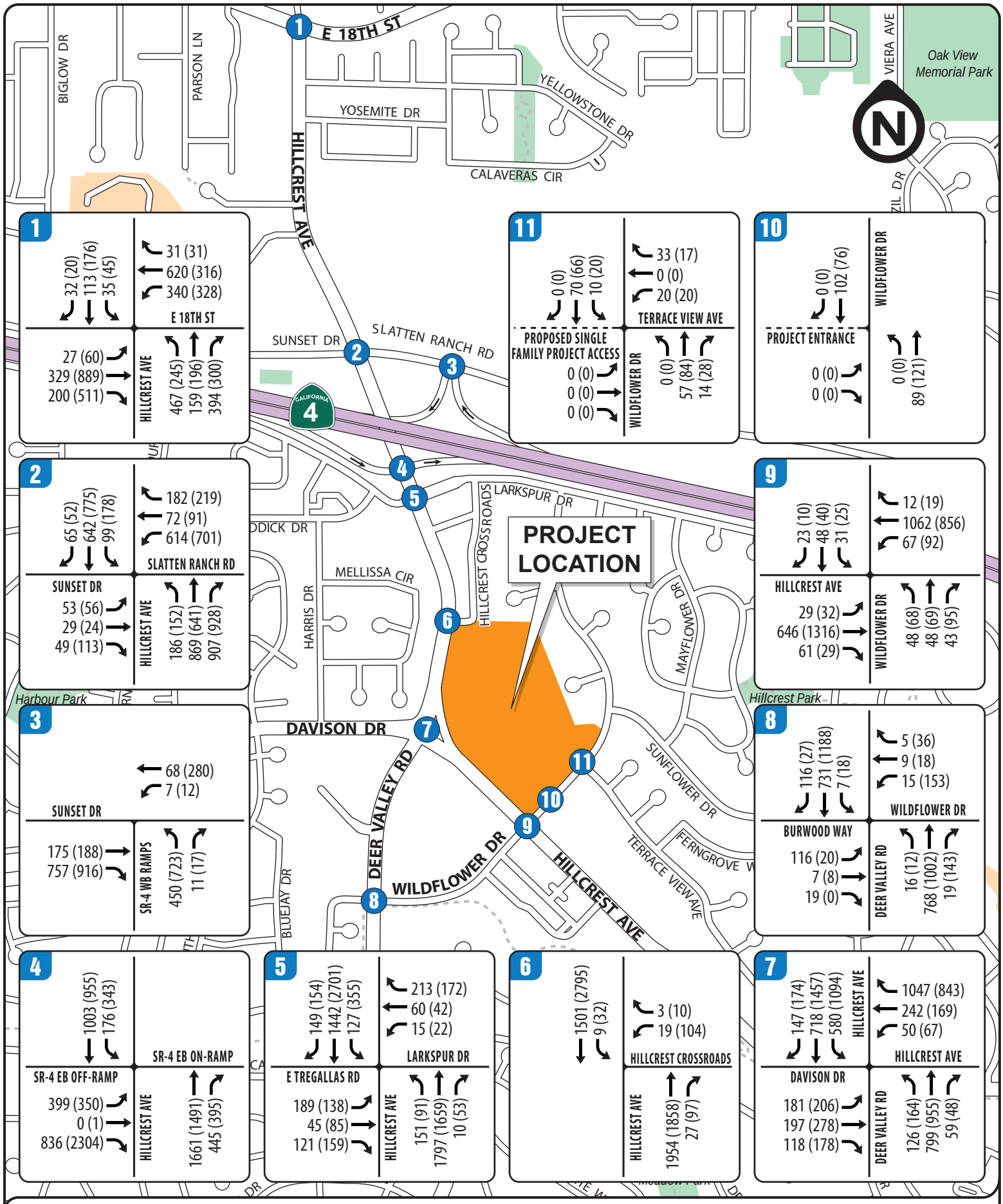

FIGURE 7 | CUMULATIVE AM(PM) PEAK HOUR TRAFFIC VOLUMES

TRANSPORTATION IMPACT ANALYSIS

Hillcrest Wildflower Station

City of Antioch

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TABLE 5
EXISTING PLUS PROJECT INTERSECTION LEVEL OF SERVICE CONDITIONS

INTERSECTION		CONTROL	PEAK HOUR	EXISTING		EXISTING PLUS PROJECT	
				Delay	LOS	Delay	LOS
1	E. 18TH ST & HILLCREST AVE	Signalized	AM	23.3	C	23.6	C
			PM	28.6	C	30.6	C
2	SUNSET DR & HILLCREST AVE	Signalized	AM	13.3	B	13.3	B
			PM	18.7	B	19.1	B
3	SR-4 WESTBOUND RAMPS & HILLCREST AVE	Signalized	AM	13.0	B	13.4	B
			PM	24.5	C	28.4	C
4	SR-4 EASTBOUND RAMPS & HILLCREST AVE	Signalized	AM	14.8	B	15.0	B
			PM	19.1	B	20.0	B
5	LARKSPUR DR / E. TREGALLAS RD & HILLCREST AVE	Signalized	AM	26.2	C	26.6	C
			PM	17.7	B	18.0	B
6	HILLCREST CROSSROADS & HILLCREST AVE	Signalized	AM	2.1	A	3.4	A
			PM	3.8	A	6.8	A
7	DAVISON DR / HILLCREST AVE & DEER VALLEY RD	Signalized	AM	30.9	C	31.9	C
			PM	31.2	C	32.7	C
8	DEER VALLEY RD & WILDFLOWER DR	Signalized	AM	6.6	A	6.8	A
			PM	8.5	A	8.9	A
9	HILLCREST AVE & WILDFLOWER DR	Signalized	AM	8.2	A	9.2	A
			PM	9.4	A	11.2	B
10	PROJECT ENTRANCE & WILDFLOWER DR	Side Street Stop	AM	N/A	N/A	9.1	A
			PM	N/A	N/A	9.4	A
11	SFH ENTRANCE & WILDFLOWER DR	Side Street Stop	AM	9.1	A	9.2	A
			PM	9.5	A	9.7	A

SOURCE: Abrams Associates, 2017

NOTES: HCM LOS results are presented in terms of average intersection delay in seconds per vehicle. For stop controlled intersections the results for the worst side street approach are presented.

5.5 Parking Impacts

The proposed project would provide an adequate supply of off-street parking based on the City's requirements. The project is currently proposing to meet the City's parking requirements (663 spaces) by providing 694 off-street parking spaces. Subject to final City approval of the proposed parking plan there would be no significant parking impacts expected to the surrounding properties.

5.6 Pedestrian and Bicycle Impacts

The project would generate additional pedestrian and bicycle traffic in the area, thereby potentially increasing conflicts between vehicles, bicycles, and pedestrians. However, the project would not conflict with adopted policies, plans, or programs supporting alternative transportation (e.g., bus turnouts, bicycle racks) or generate pedestrian, bicycle, or transit travel demand that would not be accommodated by transit, bicycle, or pedestrian facilities and plans. Based on our review there would be no significant impacts to bicycle or pedestrian safety in the area and no mitigations or improvements are recommended at this time. Please note it is our understanding the project would provide bike racks throughout the commercial areas and also adjacent to the condominiums.

5.7 Transit Impacts

The proposed project would not interfere with any existing bus routes and would not remove or relocate any existing bus stops. The proposed Project could also potentially help support existing bus services with additional transit ridership and would not conflict with any transit plans or goals of the City or Tri Delta Transit. Although the proposed project does have the potential to increase patronage on bus lines in the area, based on this analysis the project would not result in degradation of the level of service (or a significant increase in delay) on any roadway segments currently being utilized by bus transit in the area and, as such, no significant impacts to transit are expected. As a result, the project would not be expected to result in any significant impacts to transit service in the area.

5.8 Cumulative Without Project Traffic Intersection Operating Conditions (Scenario 3)

For the cumulative conditions, the intersection traffic volumes were based on the existing turning movements with the addition of traffic from all planned projects plus the addition of incremental growth in background traffic estimated by the County's traffic model for the area, which includes full development of the E-BART station and the surrounding area. **Figure 8** presents the cumulative build-out traffic volumes for the project study intersections. **Table 6** summarizes the LOS results for the Cumulative (Year 2040) traffic conditions at each of the project study intersections. Please note that the corresponding LOS analysis calculation sheets are presented in the Transportation Impact Analysis Technical Appendix.

TABLE 6
CUMULATIVE INTERSECTION LEVEL OF SERVICE CONDITIONS

INTERSECTION		CONTROL	PEAK HOUR	CUMULATIVE		CUMULATIVE PLUS PROJECT	
				Delay	LOS	Delay	LOS
1	E. 18TH ST & HILLCREST AVE	Signalized	AM	38.2	D	38.5	D
			PM	**>80**	**F**	**>80**	**F**
2	SUNSET DR & HILLCREST AVE	Signalized	AM	22.7	C	22.7	C
			PM	28.6	C	28.7	C
3	SR-4 WESTBOUND RAMPS & HILLCREST AVE	Signalized	AM	15.2	B	15.4	B
			PM	40.9	D	41.6	D
4	SR-4 EASTBOUND RAMPS & HILLCREST AVE	Signalized	AM	20.7	C	21.0	C
			PM	**71.3**	**E**	**71.9**	**E**
5	LARKSPUR DR / E. TREGALLAS RD & HILLCREST AVE	Signalized	AM	35.2	D	35.7	D
			PM	**56.2**	**E**	**57.4**	**E**
6	HILLCREST CROSSROADS & HILLCREST AVE	Signalized	AM	2.3	A	3.0	A
			PM	4.6	A	5.7	A
7	DAVISON DR / HILLCREST AVE & DEER VALLEY RD	Signalized	AM	49.9	D	50.2	D
			PM	**61.0**	**E**	**61.3**	**E**
8	DEER VALLEY RD & WILDFLOWER DR	Signalized	AM	7.2	A	7.3	A
			PM	10.1	B	10.2	B
9	HILLCREST AVE & WILDFLOWER DR	Signalized	AM	9.2	A	9.8	A
			PM	11.4	B	11.9	B
10	PROJECT ENTRANCE & WILDFLOWER DR	Side Street Stop	AM	N/A	N/A	9.1	A
			PM	N/A	N/A	9.0	A
11	SFH ENTRANCE & WILDFLOWER DR	Side Street Stop	AM	9.2	A	9.4	A
			PM	9.7	A	9.9	A

SOURCE: Abrams Associates, 2017

NOTES: HCM LOS results are presented in terms of average intersection delay in seconds per vehicle. For stop controlled intersections the results for the worst side street approach are presented.

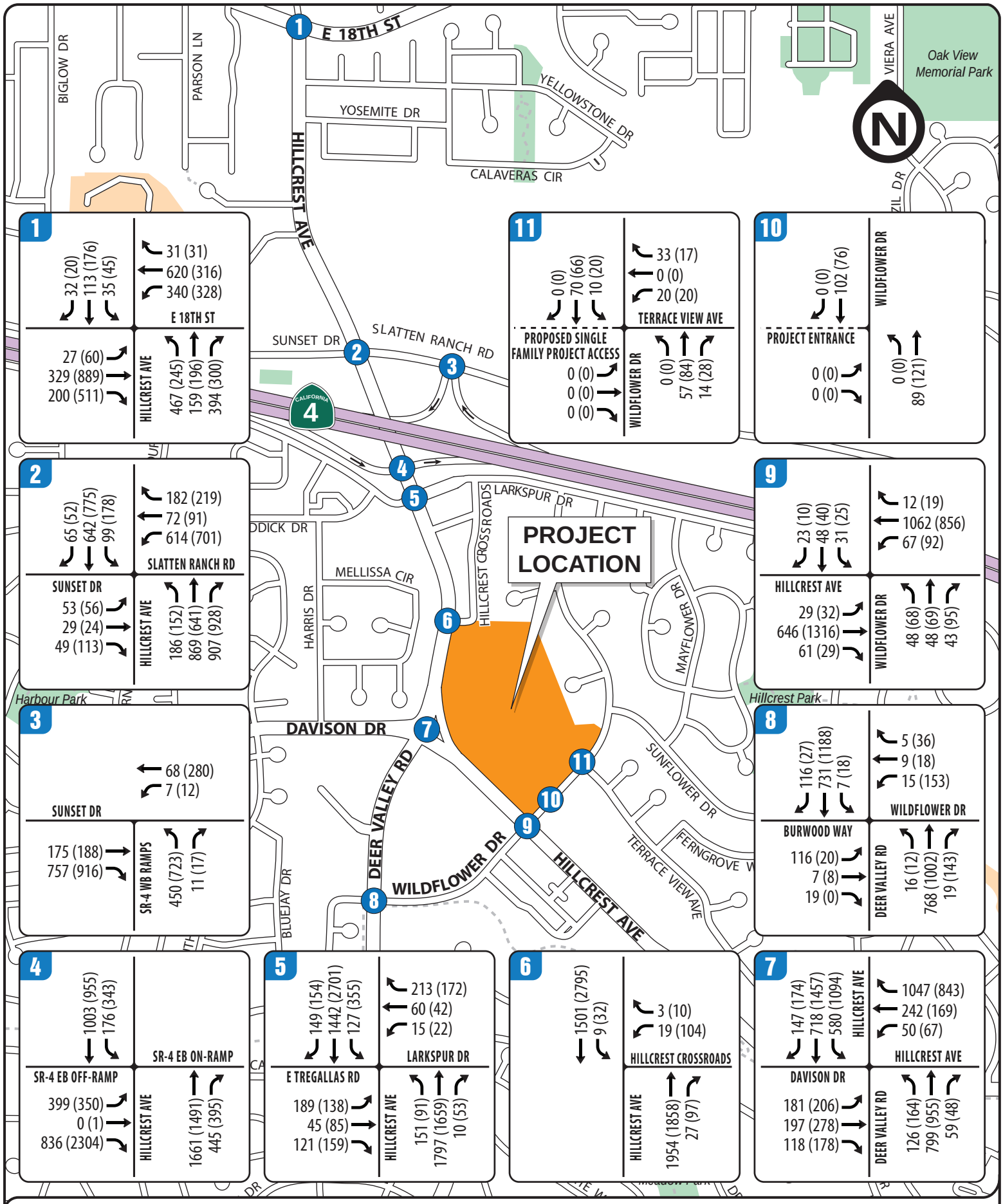

FIGURE 8 | CUMULATIVE AM(PM) PEAK HOUR TRAFFIC VOLUMES

TRANSPORTATION IMPACT ANALYSIS

Hillcrest Wildflower Station

City of Antioch

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TRAFFIC ENGINEERING, INC.

As shown in **Table 6**, all intersections would continue to have acceptable operations (LOS D or better) during the weekday AM and PM peak hours with the exception of Hillcrest Avenue at 18th Street, the SR 4 Eastbound Ramps, Larkspur Drive/Tregallas Road, and Deer Valley Road/Davison Drive. These four intersections are forecast to have unacceptable operations under cumulative buildout conditions regardless of whether or not the proposed project is implemented. Please note these results are all consistent with the final environmental impact report (FEIR) that was prepared for the Hillcrest eBART station[2] and the eBART Corridor EIR Addendum[3]. Below is a discussion about the future traffic operations at each of the four intersections.

Hillcrest Avenue at East 18th Street – The eBART FEIR identified a feasible mitigation for the poor operations forecast for this intersection. The intersection operations could be improved to meet the established standard (LOS D) through the provision of an exclusive right turn lane along the eastbound approach. The eBART project was conditioned to contribute its fair share to implement this mitigation.

Hillcrest Avenue at the SR 4 Eastbound Ramps and at Larkspur Drive/Tregallas Road – The eBART FEIR did not identify any feasible mitigations for the poor operations forecast for these two intersections. It was assumed these intersections would eventually exceed the established standard (LOS D). This is because further improvements to address the conditions at these two intersections have been studied by the City of Antioch but have been determined to be infeasible due the potential displacement of homes and commercial property.

Hillcrest Avenue at Deer Valley Road/Davison Drive – The eBART FEIR identified a feasible mitigation for the poor operations forecast for this intersection. The intersection operations could be improved to meet the established standard (LOS D) could be improved to LOS D through the coordination of the intersection, optimization of signal timing plans, and overlapping of westbound right turning movements. The eBART project was conditioned to contribute its fair share to implement this mitigation.

5.9 Cumulative Plus Project Traffic Intersection Operating Conditions (Scenario 4)

Figure 9 presents the cumulative build-out traffic volumes including the traffic from the proposed commercial project. **Table 6** summarizes the LOS results for the Cumulative Plus Project (Year 2040) traffic conditions at each of the project study intersections. To provide a conservative review of traffic operations the LOS results in Table 6 present the traffic operations with and without the full trip generation from the proposed project. However, it is important to note that development of the proposed site has already been accounted for in the City's General Plan EIR and the County Travel Demand Model assumed the site would be developed under buildout conditions as per its designation in the City's General Plan.

Based on its General Plan designation for commercial uses and the existing topographical constraints the site could potentially accommodate a retail project with about 90,000 square feet of building space. **Table 7** presents a comparison of the potential future project trip generation with and without the proposed general plan amendment being requested as part of the proposed project. As shown in this table, the proposed project is forecast to generate about 60

[2] East Contra Costa BART Extension Final EIR, BART, Oakland, CA, April, 2009.
[3] eBART Corridor EIR Addendum, BART, Oakland, CA, April, 2011.

additional trips during the AM and PM commute hours over and above what the site was already assumed to generate as per the existing zoning in City of Antioch General Plan.

As shown in **Table 6**, all intersection would be forecast to continue to meet the established standards with the addition of project traffic with the exception of Hillcrest Avenue at 18th Street, the SR 4 Eastbound Ramps, Larkspur Drive/Tregallas Road, and at Deer Valley Road/Davison Drive. It should be noted these four intersections are forecast to have unacceptable operations under cumulative plus project conditions regardless of whether or not the proposed project is implemented. These intersections are forecast to continue to exceed the established standards even with the planned interchange improvements, in part due to continuing growth in traffic on SR 4 as well as other parallel routes in the area. Since the proposed project would increase the future traffic volumes at these intersections by less than one percent (1%) the project's contribution would not be considered a significant impact on these conditions. An analysis of project queuing was also conducted at the entrances to the commercial project. The results are shown in **Table 8** and indicate the 95th percentile queues are not forecast to exceed the storage provided.

TABLE 7
TRIP GENERATION CALCULATIONS

Land Use	*Size*	*ADT*	*AM Peak Hour*			*PM Peak Hour*		
			In	*Out*	*Total*	*In*	*Out*	*Total*
Forecast Trip Generation for the Proposed Project								
Retail Trip Rates		57.46	0.74	0.55	1.29	2.51	2.61	5.12
Shopping Center Trip Generation	89,422 sq. ft.	5,138	65	50	115	225	233	458
Reduction for Pass-By Trips (34%)		1,747	22	17	39	77	79	156
Net New Shopping Center Trip Generation		***3,391***	***43***	***32***	***75***	***149***	***153***	***302***
Condominium Trip Rates		6.45	0.09	0.43	0.52	0.40	0.20	0.60
Condominium Trip Generation	***98 units***	***632***	***9***	***42***	***51***	***39***	***20***	***59***
Single Family Home Trip Rates		11.85	0.39	0.75	1.14	0.77	0.45	1.22
Single Family Home Trip Generation	***22 units***	***261***	***9***	***16***	***25***	***17***	***10***	***27***
Multi-Use Trip Reduction	*6%*	*257*	*4*	*5*	*9*	*12*	*11*	*23*
Transit Usage Trip Reduction	*3%*	*129*	*2*	*3*	*5*	*6*	*6*	*12*
Total Project Trip Generation		***3,898***	***55***	***82***	***137***	***187***	***166***	***353***
Forecast Trip Generation Based on the Current Zoning in the City's General Plan								
Retail Trip Rates		57.39	0.74	0.55	1.29	2.50	2.61	5.11
Shopping Center Trip Generation	90,000 sq. ft.	5,164	66	50	116	225	235	460
Reduction for Pass-By Trips (34%)		1,756	22	17	39	76	80	156
Forecast Trip Generation based on the General Plan		***3,408***	***44***	***33***	***77***	***149***	***155***	***304***
Net Change in Future Trip Generation That Would Result From Approval of the Proposed Project								
Net Change in Site Trip Generation with the Project		***490***	***11***	***49***	***60***	***38***	***11***	***49***

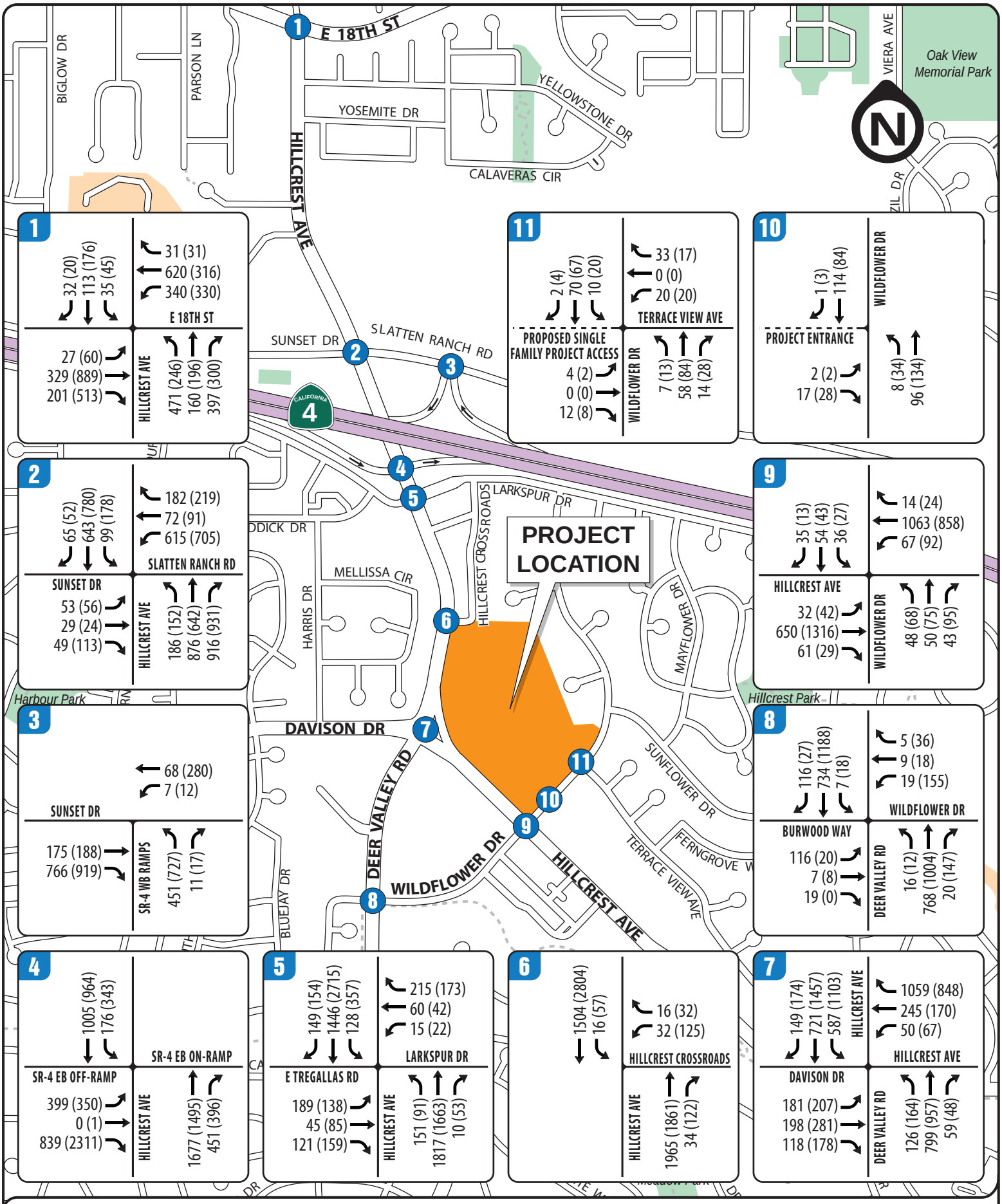

FIGURE 9 | CUMULATIVE PLUS PROJECT AM(PM) PEAK HOUR TRAFFIC VOLUMES

TRANSPORTATION IMPACT ANALYSIS

Hillcrest Wildflower Station

City of Antioch

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TABLE 8
CUMULATIVE PLUS PROJECT PEAK HOUR QUEUING ANALYSIS

ID	Intersection	Turn Lane	Available Storage (ft)	Period	95th % Queue
6	Hillcrest Avenue & Hillcrest Crossroads	WB	70	AM	22 ft.
				PM	61 ft.
		SBL	125	AM	29 ft.
				PM	70 ft.
10	Wildflower Drive & The Project's Commercial Entrance	NBL	0	AM	< 20 ft.
				PM	< 20 ft.
		EB	75	AM	< 20 ft.
				PM	< 20 ft.

5.10 Recommended Mitigation Measures

The project would not cause any intersections in the study area to exceed City or Caltrans standards and no vehicular traffic mitigations would be required.

Project-Specific Impacts and Mitigation Measures

The following is a list of potential transportation impacts of the project. With the implementation of the proposed measures described in this section, all project transportation impacts would be reduced to a less than significant level.

TR-1 Impacts related to bicycle and pedestrian facilities.

Although the proposed project would increase vehicle and pedestrian and bicycle traffic in the project vicinity it is not expected to significantly impact or change the design of any existing bicycle or pedestrian facilities or create any new safety problems for bicyclists or pedestrians in the area.

Mitigation Measure(s)
None required.

TR-2 Impacts related to transit facilities.

The proposed project has the potential to increase patronage on bus lines in the area. However, based on this analysis the project would not result in degradation of the level of service (or a significant increase in delay) on any roadway segments currently being utilized by bus transit in the area and, as such, no significant impacts to transit are expected. The project contribution to key roadway segments in the area would not result in any significant changes to travel speeds. As a result, the project would not be expected to result in any significant impacts to transit service in the area.

Mitigation Measure(s)
None required.

TR-3 Construction activities associated with the proposed project would result in an increase in traffic to and from the site and could lead to unsafe conditions near the project site.

The increase in traffic as a result of construction activities associated with the proposed project has been quantified assuming a worst-case single phase construction period of 24 months.

Heavy Equipment

Approximately ten pieces of heavy equipment are estimated to be transported on and off the site each month throughout the construction of the proposed project. Heavy equipment transport to and from the site could cause traffic impacts in the vicinity of the project site during construction. However, each load would be required to obtain all necessary permits, which would include conditions. Prior to issuance of grading and building permits, the project applicant would be required to submit a Traffic Control Plan. The requirements within the Traffic Control Plan include, but are not limited to, the following: truck drivers would be notified of and required to use the most direct route between the site and the freeway, as determined by the City Engineering Department; all site ingress and egress would occur only at the main driveways to the project site and construction activities may require installation of temporary (or ultimate) traffic signals as determined by the City Engineer; specifically designated travel routes for large vehicles would be monitored and controlled by flaggers for large construction vehicle ingress and egress; warning signs indicating frequent truck entry and exit would be posted on adjacent roads; and any debris and mud on nearby streets caused by trucks would be monitored daily and may require instituting a street cleaning program. In addition, eight loads of heavy equipment being hauled to and from the site each month would be short-term and temporary.

Employees

The weekday work is expected to begin around 7:00 AM and end around 4:00 PM. The construction worker arrival peak would occur between 6:30 AM and 7:30 AM, and the departure peak would occur between 4:00 PM and 5:00 PM. It should be noted that the number of trips generated during construction would not only be temporary, but should also be less than the proposed project trip generation at buildout. Based on past construction of similar projects, construction workers could require parking for up to 50 vehicles during the peak construction period. Additionally, deliveries, visits, and other activities may generate peak non-worker parking demand of 10 to 20 trucks and automobiles per day. Therefore, up to 70 vehicle parking spaces may be required during the peak construction period just for the construction employees. Furthermore, the Traffic Control Plan will require construction employee parking be provided on the project site or in off-site parking lots to eliminate conflicts with nearby residential areas. The construction of the project can also be staggered so that employee parking demand can be met by using on-site parking. Therefore, the impacts of construction-related employee traffic and parking are considered less-than-significant.

Construction Material Import

The project would also require the importation of construction material, including raw materials for the building pads, the buildings, the parking areas, and landscaping. Under the provisions of the Traffic Control Plan, if importation and exportation of material

becomes a traffic nuisance, then the City Engineer may limit the hours the activities can take place.

Traffic Control Plan

The Traffic Control Plan would indicate how parking for construction workers would be provided during construction and ensure a safe flow of traffic in the project area during construction. This analysis assumed construction of the entire project in one phase to identify the potential worst-case traffic effects. If the project is built in phases over time, the effects of each phase will be the same or less. Each phase will be subject to a Traffic Control Plan and oversight by the City Engineer. The last phase may require added worker parking measures, depending on the circumstances, as there will not be any remaining vacant land for parking. Therefore, the construction activities associated with the proposed project or its individual phases would not lead to noticeable congestion in the vicinity of the site or the perception of decreased traffic safety resulting in a ***less-than-significant*** impact.

Mitigation Measure(s)
None required.

TR-4 Impacts to freeway operations.

The development of the proposed project would increase the total traffic on SR 4 during both AM and PM peak hours but the increase to the future traffic volumes on any one segment is forecast to be less than 50 trips per hour. In addition, it is our understanding that the project site has already been planned to be developed in the City's General Plan and this has already been assumed in previous cumulative build-out traffic forecasts that have been used in the design of freeway facilities in the area. Therefore, the proposed project would have a ***less-than-significant*** impact to freeway operations.

Mitigation Measure(s)
None required.

TR-5 Impacts related to site access and circulation.

The proposed project would have one main signalized access intersection on Hillcrest Avenue and two unsignalized driveways on Wildflower Drive. Please note that the level of service and Caltrans signal warrants were carefully reviewed to confirm that traffic signals would not be required by the project at the two proposed driveways on Wildflower Drive. Based on a review of the proposed site plan it was determined that the site circulation should function well and would not cause any safety or operational problems. The project site design has been required to conform to City design standards and the plan is not expected to create any significant impacts to pedestrians, bicyclists or traffic operations. Therefore, impacts related to site access and circulation to the proposed project would be ***less-than-significant***.

Mitigation Measure(s)
None required.

TR-6 Impacts regarding emergency vehicle access on and surrounding the proposed project site.

Sufficient emergency access is determined by factors such as number of access points, roadway width, and proximity to fire stations. The land use plan for the proposed project includes a primary entrance on Hillcrest Avenue along with secondary access onto Wildflower Drive. All lane widths within the project should meet the minimum width that can accommodate emergency vehicles and the final emergency vehicle access plan would be subject to final approval from the Fire Department. Therefore, the development of the proposed project is expected to have ***less-than-significant*** impacts regarding emergency vehicle access.

Mitigation Measure(s)
None required.

5.13 Recommended Improvement Measures

As part of this study it was requested that the report include an evaluation of all study area roadways to determine if any safety or operational "*improvement measures*" could be recommended for the area. As part of this review there was only one significant change that it is recommended the City might consider implementing. Based on our review of the geometric conditions and traffic volumes on Larkspur Drive we would recommend the City consider remarking the segment between Wildflower Drive and Bluebell Drive to have one lane in each direction with bicycle lanes and left turn lanes. This change could allow for better continuity by allowing for a uniform cross section along this roadway which could potentially reduce travel speeds and improve safety in the area. Please note that our analysis indicated the four lane section is not required to maintain adequate traffic operations and that this roadway could readily accommodate both the existing and future traffic forecast to use it with just one lane in each direction.