

Appendix A
Air Quality Worksheets

Central Outfall Sewer at 59th Street and 4th Avenue Project

Peak Daily Construction Emissions (lbs/day)

Year	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total
2012	5.51	40.16	30.11	0.06	2.53	2.44	4.97	0.05	2.44	2.49
2013	3.25	21.64	19.78	0.03	2.35	1.35	3.70	0.03	1.35	1.38
Peak Day	5.51	40.16	30.11	0.06	2.53	2.44	4.97	0.05	2.44	2.49
Threshold of Significance	75	100	550	150	150	150	150	55	55	55
Exceed Threshold?	no	no	no	no	no	no	no	no	no	no

Source:

Note:

Peak daily emissions by year based on maximum of summer and winter values.

Annual Construction Emissions

Year	short tons per year										metric tons per year			
	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	CO2	CH4	N2O	CO2e
2012	0.39	2.90	2.10	0.00	0.14	0.15	0.29	0.00	0.15	0.16	368.92	0.03	0.00	369.58
2013	0.35	2.42	2.02	0.00	0.18	0.15	0.32	0.00	0.15	0.15	316.98	0.03	0.00	317.59
Peak Year	0.39	2.90	2.10	0.00	0.18	0.15	0.32	0.00	0.15	0.16	368.92	0.03	0.00	369.58
Project Total	0.74	5.32	4.12	0.00	0.32	0.30	0.61	0.00	0.30	0.31	685.90	0.06	0.00	687.17

Source:

Note:

Peak daily emissions by year based on maximum of summer and winter values.

Amortized Emissions 22.91
30 year lifetime

Threshold 10000 MTCO2e
7% of threshold

Number of construction workers	OFFROAD Equipment	Comment	Employees	Trips
Drilling operations – 16 workers			16	32
Driller	Bore/Drill Rigs		1	
Oiler	N/A	Construction worker travel only	1	
At least three laborers	N/A	Construction worker travel only	3	
Concrete truck driver	N/A	Onroad truck	1	
Concrete pump driver/operator	N/A	Onroad truck	1	
Crane operator	Cranes		1	
Crane operator helper/oiler	N/A	Construction worker travel only	1	
Backhoe operator (to remove spoils)	Tractors/Loaders/Backhoes		1	
Telehandler operator (to unload trucks – could be redundant)	Forklifts		1	
Water truck driver (if slurry is needed to keep open the drilled hole)	N/A	Onroad truck	1	
Prime contractor supervisor	N/A	Construction worker travel only	1	
City Inspector	N/A	Construction worker travel only	1	
At least two surveyors	N/A	Construction worker travel only	2	
Excavation – 16 workers			16	32
An operator on the excavator	Excavators		1	
An oiler	N/A	Construction worker travel only	1	
Three or four dump truck drivers	N/A	Onroad truck	4	
At least one back hoe operator to fill the dump trucks	Tractors/Loaders/Backhoes		1	
At least three or four laborers.	N/A	Construction worker travel only	4	
Water truck driver	N/A	Onroad truck	1	
Prime contractor supervisor	N/A	Construction worker travel only	1	
City Inspector	N/A	Construction worker travel only	1	
At least two surveyors	N/A	Construction worker travel only	2	
Major storm drain construction – 14 workers			14	28
At least five or six laborers	N/A	Construction worker travel only	6	
Concrete truck driver	N/A	Onroad truck	1	
Concrete pump driver/operator	N/A	Onroad truck	1	
Telehandler operator (to unload trucks – could be redundant)	Forklifts		1	
Water truck driver	N/A	Onroad truck	1	
Prime contractor supervisor	N/A	Construction worker travel only	1	
City Inspector	N/A	Construction worker travel only	1	
At least two surveyors	N/A	Construction worker travel only	2	
COS construction – 11 workers			11	22
At least four laborers	N/A	Construction worker travel only	4	
Crane operator	Cranes		1	
Crane operator helper/assistant	N/A	Construction worker travel only	1	
Telehandler operator (to unload trucks – could be redundant)	Forklifts		1	
Prime contractor supervisor	N/A	Construction worker travel only	1	
City Inspector	N/A	Construction worker travel only	1	
At least two surveyors	N/A	Construction worker travel only	2	
Backfill – 13 workers			13	26
At least one backhoe operator	Tractors/Loaders/Backhoes		1	
At least three laborers	N/A	Construction worker travel only	3	
At least three dump truck drivers	N/A	Onroad truck	3	
Maybe an excavator operator and oiler	Excavators		1	
Telehandler operator (to unload trucks – could be redundant)	Forklifts		1	
Prime contractor supervisor	N/A	Construction worker travel only	1	
City Inspector	N/A	Construction worker travel only	1	
At least two surveyors	N/A	Construction worker travel only	2	
Additional Storm drain work – 11 workers			11	22
At least one backhoe operator	Tractors/Loaders/Backhoes		1	
At least four laborers	N/A	Construction worker travel only	4	
At least one dump truck driver to bring in bedding	N/A	Onroad truck	1	
Telehandler operator (to unload trucks – could be redundant)	Forklifts		1	
Prime contractor supervisor	N/A	Construction worker travel only	1	
City Inspector	N/A	Construction worker travel only	1	
At least two surveyors	N/A	Construction worker travel only	2	
Street Construction – 8 workers			8	16
At least one backhoe operator	Tractors/Loaders/Backhoes		1	
At least four laborers	N/A	Construction worker travel only	4	
At least one dump truck driver to bring in bedding and asphalt	N/A	Onroad truck	1	
A grader operator	Graders		1	
A paver operator (may be same as grader operator)	Pavers		1	

Onroad Truck Summary	Trucks	Trips
Drilling & Excavation	8	16
Storm Drain Construction	3	6
COS Construction	0	0
Backfill	4	8
Street Construction	1	2
Total	16	32
check	16	

64 total trips (drilling & excavation)

48 total trips (backfill & additional storm drain work)

**Central Outfall Sewer at 59th Street and 4th Avenue Project
Los Angeles-South Coast County, Winter**

1.0 Project Characteristics

1.1 Land Usage

Land Uses	Size	Metric
Other Asphalt Surfaces	1.6	1000sqft

1.2 Other Project Characteristics

Urbanization	Urban	Wind Speed (m/s)	2.2	Utility Company	Los Angeles Department of Water & Power
Climate Zone	11	Precipitation Freq (Days)	33		

1.3 User Entered Comments

Project Characteristics - Climate zone based on Park Mesa Heights neighborhood zip code (90043) - see Appendix F to CalEEMod User's Guide (Climate Zones Zip Code Lookup)

Land Use - Parking selected as land-use type to allow VOC emissions from asphalt off-gassing to be estimated. Construction would be limited to street intersection.

Construction Phase - Construction phases/duration estimated from construction steps and wet/dry season. Storm drain portions can only be completed in dry season.

Off-road Equipment - Construction list from Backfill and Additional Storm Drain Work

Off-road Equipment - Construction list for COS construction

Off-road Equipment - Equipment list based on Drilling & Excavation construction estimates

Off-road Equipment - Construction list from major storm drain construction

Off-road Equipment - Construction list for Street Construction

Trips and VMT - # Workers based on project-specific data; vendor trucks associated with onroad construction equipment; haul trucks assumed to be 10 cubic yards.

Grading - Disturbed acreage based on size of construction area (1,600 square feet)

Energy Use -

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					
2012	5.51	40.16	30.09	0.06	2.53	2.44	4.97	0.05	2.44	2.49	0.00	5,359.19	0.00	0.48	0.00	5,369.37
2013	3.25	21.64	19.71	0.03	2.35	1.35	3.70	0.03	1.35	1.38	0.00	3,272.53	0.00	0.29	0.00	3,278.59
Total	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

2.1 Overall Construction (Maximum Daily Emission)

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					
2012	5.51	40.16	30.09	0.06	0.05	2.44	2.49	0.05	2.44	2.49	0.00	5,359.19	0.00	0.48	0.00	5,369.37
2013	3.25	21.64	19.71	0.03	0.03	1.35	1.38	0.03	1.35	1.38	0.00	3,272.53	0.00	0.29	0.00	3,278.59
Total	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

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	0.04	0.00	0.00	0.00		0.00	0.00		0.00	0.00		0.00		0.00		0.00
Energy	0.00	0.00	0.00	0.00		0.00	0.00		0.00	0.00		0.00		0.00	0.00	0.00
Mobile	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		0.00		0.00		0.00
Total	0.04	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		0.00		0.00	0.00	0.00

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	0.04	0.00	0.00	0.00		0.00	0.00		0.00	0.00		0.00		0.00		0.00
Energy	0.00	0.00	0.00	0.00		0.00	0.00		0.00	0.00		0.00		0.00	0.00	0.00
Mobile	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		0.00		0.00		0.00
Total	0.04	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		0.00		0.00	0.00	0.00

3.0 Construction Detail

3.1 Mitigation Measures Construction

3.2 Drilling & Excavation - 2012

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					0.00	0.00	0.00	0.00	0.00	0.00						0.00
Off-Road	4.64	35.91	22.37	0.04		2.27	2.27		2.27	2.27		4,066.99		0.42		4,075.71
Total	4.64	35.91	22.37	0.04	0.00	2.27	2.27	0.00	2.27	2.27		4,066.99		0.42		4,075.71

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	0.06	0.60	0.35	0.00	1.40	0.03	1.42	0.00	0.03	0.03		77.05		0.00		77.11
Vendor	0.30	3.12	2.20	0.00	0.15	0.11	0.26	0.01	0.11	0.12		438.38		0.02		438.70
Worker	0.51	0.54	5.16	0.01	0.98	0.03	1.02	0.04	0.03	0.07		776.77		0.05		777.85
Total	0.87	4.26	7.71	0.01	2.53	0.17	2.70	0.05	0.17	0.22		1,292.20		0.07		1,293.66

3.2 Drilling & Excavation - 2012

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					0.00	0.00	0.00	0.00	0.00	0.00						0.00
Off-Road	4.64	35.91	22.37	0.04		2.27	2.27		2.27	2.27	0.00	4,066.99		0.42		4,075.71
Total	4.64	35.91	22.37	0.04	0.00	2.27	2.27	0.00	2.27	2.27	0.00	4,066.99		0.42		4,075.71

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	0.06	0.60	0.35	0.00	0.00	0.03	0.03	0.00	0.03	0.03		77.05		0.00		77.11
Vendor	0.30	3.12	2.20	0.00	0.01	0.11	0.12	0.01	0.11	0.12		438.38		0.02		438.70
Worker	0.51	0.54	5.16	0.01	0.04	0.03	0.07	0.04	0.03	0.07		776.77		0.05		777.85
Total	0.87	4.26	7.71	0.01	0.05	0.17	0.22	0.05	0.17	0.22		1,292.20		0.07		1,293.66

3.3 Storm Drain Construction - 2012

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	0.49	3.70	2.64	0.00		0.22	0.22		0.22	0.22		447.62		0.04		448.55
Total	0.49	3.70	2.64	0.00		0.22	0.22		0.22	0.22		447.62		0.04		448.55

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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		0.00		0.00		0.00
Vendor	0.11	1.17	0.82	0.00	0.06	0.04	0.10	0.00	0.04	0.05		164.39		0.01		164.51
Worker	0.22	0.24	2.26	0.00	0.43	0.01	0.44	0.02	0.01	0.03		339.84		0.02		340.31
Total	0.33	1.41	3.08	0.00	0.49	0.05	0.54	0.02	0.05	0.08		504.23		0.03		504.82

3.3 Storm Drain Construction - 2012

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	0.49	3.70	2.64	0.00		0.22	0.22		0.22	0.22	0.00	447.62		0.04		448.55
Total	0.49	3.70	2.64	0.00		0.22	0.22		0.22	0.22	0.00	447.62		0.04		448.55

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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		0.00		0.00		0.00
Vendor	0.11	1.17	0.82	0.00	0.00	0.04	0.05	0.00	0.04	0.05		164.39		0.01		164.51
Worker	0.22	0.24	2.26	0.00	0.02	0.01	0.03	0.02	0.01	0.03		339.84		0.02		340.31
Total	0.33	1.41	3.08	0.00	0.02	0.05	0.08	0.02	0.05	0.08		504.23		0.03		504.82

3.4 COS Construction - 2012

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	1.37	12.25	5.11	0.01		0.53	0.53		0.53	0.53		1,343.26		0.12		1,345.84
Total	1.37	12.25	5.11	0.01		0.53	0.53		0.53	0.53		1,343.26		0.12		1,345.84

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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		0.00		0.00		0.00
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		0.00		0.00		0.00
Worker	0.17	0.19	1.77	0.00	0.34	0.01	0.35	0.01	0.01	0.02		267.02		0.02		267.39
Total	0.17	0.19	1.77	0.00	0.34	0.01	0.35	0.01	0.01	0.02		267.02		0.02		267.39

3.4 COS Construction - 2012

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	1.37	12.25	5.11	0.01		0.53	0.53		0.53	0.53	0.00	1,343.26		0.12		1,345.84
Total	1.37	12.25	5.11	0.01		0.53	0.53		0.53	0.53	0.00	1,343.26		0.12		1,345.84

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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		0.00		0.00		0.00
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		0.00		0.00		0.00
Worker	0.17	0.19	1.77	0.00	0.01	0.01	0.02	0.01	0.01	0.02		267.02		0.02		267.39
Total	0.17	0.19	1.77	0.00	0.01	0.01	0.02	0.01	0.01	0.02		267.02		0.02		267.39

3.4 COS Construction - 2013

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	1.28	11.32	4.99	0.01		0.47	0.47		0.47	0.47		1,343.26		0.11		1,345.66
Total	1.28	11.32	4.99	0.01		0.47	0.47		0.47	0.47		1,343.26		0.11		1,345.66

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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		0.00		0.00		0.00
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		0.00		0.00		0.00
Worker	0.16	0.17	1.62	0.00	0.34	0.01	0.35	0.01	0.01	0.02		261.87		0.02		262.21
Total	0.16	0.17	1.62	0.00	0.34	0.01	0.35	0.01	0.01	0.02		261.87		0.02		262.21

3.4 COS Construction - 2013

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	1.28	11.32	4.99	0.01		0.47	0.47		0.47	0.47	0.00	1,343.26		0.11		1,345.66
Total	1.28	11.32	4.99	0.01		0.47	0.47		0.47	0.47	0.00	1,343.26		0.11		1,345.66

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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		0.00		0.00		0.00
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		0.00		0.00		0.00
Worker	0.16	0.17	1.62	0.00	0.01	0.01	0.02	0.01	0.01	0.02		261.87		0.02		262.21
Total	0.16	0.17	1.62	0.00	0.01	0.01	0.02	0.01	0.01	0.02		261.87		0.02		262.21

3.5 Backfill - 2013

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					0.00	0.00	0.00	0.00	0.00	0.00						0.00
Off-Road	2.74	19.60	15.04	0.03		1.26	1.26		1.26	1.26		2,445.44		0.24		2,450.58
Total	2.74	19.60	15.04	0.03	0.00	1.26	1.26	0.00	1.26	1.26		2,445.44		0.24		2,450.58

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	0.03	0.25	0.15	0.00	1.54	0.01	1.55	0.00	0.01	0.01		35.90		0.00		35.93
Vendor	0.14	1.42	0.99	0.00	0.07	0.05	0.12	0.01	0.05	0.06		219.84		0.01		219.98
Worker	0.35	0.37	3.54	0.01	0.74	0.03	0.76	0.03	0.03	0.05		571.35		0.04		572.10
Total	0.52	2.04	4.68	0.01	2.35	0.09	2.43	0.04	0.09	0.12		827.09		0.05		828.01

3.5 Backfill - 2013

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					0.00	0.00	0.00	0.00	0.00	0.00						0.00
Off-Road	2.74	19.60	15.04	0.03		1.26	1.26		1.26	1.26	0.00	2,445.44		0.24		2,450.58
Total	2.74	19.60	15.04	0.03	0.00	1.26	1.26	0.00	1.26	1.26	0.00	2,445.44		0.24		2,450.58

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	0.03	0.25	0.15	0.00	0.00	0.01	0.01	0.00	0.01	0.01		35.90		0.00		35.93
Vendor	0.14	1.42	0.99	0.00	0.01	0.05	0.06	0.01	0.05	0.06		219.84		0.01		219.98
Worker	0.35	0.37	3.54	0.01	0.03	0.03	0.05	0.03	0.03	0.05		571.35		0.04		572.10
Total	0.52	2.04	4.68	0.01	0.04	0.09	0.12	0.04	0.09	0.12		827.09		0.05		828.01

3.6 Street Construction - 2013

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	2.62	17.97	11.86	0.02		1.28	1.28		1.28	1.28		1,834.51		0.23		1,839.43
Paving	0.00					0.00	0.00		0.00	0.00						0.00
Total	2.62	17.97	11.86	0.02		1.28	1.28		1.28	1.28		1,834.51		0.23		1,839.43

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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		0.00		0.00		0.00
Vendor	0.03	0.36	0.25	0.00	0.02	0.01	0.03	0.00	0.01	0.01		54.96		0.00		54.99
Worker	0.12	0.12	1.18	0.00	0.25	0.01	0.25	0.01	0.01	0.02		190.45		0.01		190.70
Total	0.15	0.48	1.43	0.00	0.27	0.02	0.28	0.01	0.02	0.03		245.41		0.01		245.69

3.6 Street Construction - 2013

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	2.62	17.97	11.86	0.02		1.28	1.28		1.28	1.28	0.00	1,834.51		0.23		1,839.43
Paving	0.00					0.00	0.00		0.00	0.00						0.00
Total	2.62	17.97	11.86	0.02		1.28	1.28		1.28	1.28	0.00	1,834.51		0.23		1,839.43

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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		0.00		0.00		0.00
Vendor	0.03	0.36	0.25	0.00	0.00	0.01	0.01	0.00	0.01	0.01		54.96		0.00		54.99
Worker	0.12	0.12	1.18	0.00	0.01	0.01	0.02	0.01	0.01	0.02		190.45		0.01		190.70
Total	0.15	0.48	1.43	0.00	0.01	0.02	0.03	0.01	0.02	0.03		245.41		0.01		245.69

4.0 Mobile Detail

4.1 Mitigation Measures Mobile

	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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		0.00		0.00		0.00
Unmitigated	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		0.00		0.00		0.00
Total	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

4.2 Trip Summary Information

Land Use	Average Daily Trip Rate			Unmitigated	Mitigated
	Weekday	Saturday	Sunday	Annual VMT	Annual VMT
Other Asphalt Surfaces	0.00	0.00	0.00		
Total	0.00	0.00	0.00		

4.3 Trip Type Information

Land Use	Miles			Trip %		
	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
Other Asphalt Surfaces	8.90	13.30	7.40	0.00	0.00	0.00

5.0 Energy Detail

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	0.00	0.00	0.00	0.00		0.00	0.00		0.00	0.00		0.00		0.00	0.00	0.00
NaturalGas Unmitigated	0.00	0.00	0.00	0.00		0.00	0.00		0.00	0.00		0.00		0.00	0.00	0.00
Total	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

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	lb/day										lb/day					
Other Asphalt Surfaces	0	0.00	0.00	0.00	0.00		0.00	0.00		0.00	0.00		0.00		0.00	0.00	0.00
Total		0.00	0.00	0.00	0.00		0.00	0.00		0.00	0.00		0.00		0.00	0.00	0.00

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	lb/day										lb/day					
Other Asphalt Surfaces	0	0.00	0.00	0.00	0.00		0.00	0.00		0.00	0.00		0.00		0.00	0.00	0.00
Total		0.00	0.00	0.00	0.00		0.00	0.00		0.00	0.00		0.00		0.00	0.00	0.00

6.0 Area Detail

6.1 Mitigation Measures Area

	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	0.04	0.00	0.00	0.00		0.00	0.00		0.00	0.00		0.00		0.00		0.00
Unmitigated	0.04	0.00	0.00	0.00		0.00	0.00		0.00	0.00		0.00		0.00		0.00
Total	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

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	0.01					0.00	0.00		0.00	0.00							0.00
Consumer Products	0.03					0.00	0.00		0.00	0.00							0.00
Landscaping	0.00	0.00	0.00	0.00		0.00	0.00		0.00	0.00		0.00		0.00			0.00
Total	0.04	0.00	0.00	0.00		0.00	0.00		0.00	0.00		0.00		0.00			0.00

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	0.01					0.00	0.00		0.00	0.00							0.00
Consumer Products	0.03					0.00	0.00		0.00	0.00							0.00
Landscaping	0.00	0.00	0.00	0.00		0.00	0.00		0.00	0.00		0.00		0.00			0.00
Total	0.04	0.00	0.00	0.00		0.00	0.00		0.00	0.00		0.00		0.00			0.00

7.0 Water Detail

7.1 Mitigation Measures Water

8.0 Waste Detail

8.1 Mitigation Measures Waste

9.0 Vegetation

**Central Outfall Sewer at 59th Street and 4th Avenue Project
Los Angeles-South Coast County, Summer**

1.0 Project Characteristics

1.1 Land Usage

Land Uses	Size	Metric
Other Asphalt Surfaces	1.6	1000sqft

1.2 Other Project Characteristics

Urbanization	Urban	Wind Speed (m/s)	2.2	Utility Company	Los Angeles Department of Water & Power
Climate Zone	11	Precipitation Freq (Days)	33		

1.3 User Entered Comments

Project Characteristics - Climate zone based on Park Mesa Heights neighborhood zip code (90043) - see Appendix F to CalEEMod User's Guide (Climate Zones Zip Code Lookup)

Land Use - Parking selected as land-use type to allow VOC emissions from asphalt off-gassing to be estimated. Construction would be limited to street intersection.

Construction Phase - Construction phases/duration estimated from construction steps and wet/dry season. Storm drain portions can only be completed in dry season.

Off-road Equipment - Construction list from Backfill and Additional Storm Drain Work

Off-road Equipment - Construction list for COS construction

Off-road Equipment - Equipment list based on Drilling & Excavation construction estimates

Off-road Equipment - Construction list from major storm drain construction

Off-road Equipment - Construction list for Street Construction

Trips and VMT - # Workers based on project-specific data; vendor trucks associated with onroad construction equipment; haul trucks assumed to be 10 cubic yards.

Grading - Disturbed acreage based on size of construction area (1,600 square feet)

Energy Use -

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					
2012	5.46	39.90	30.11	0.06	2.53	2.44	4.97	0.05	2.44	2.49	0.00	5,424.17	0.00	0.49	0.00	5,434.36
2013	3.22	21.51	19.78	0.03	2.35	1.35	3.70	0.03	1.35	1.38	0.00	3,319.64	0.00	0.29	0.00	3,325.71
Total	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

2.1 Overall Construction (Maximum Daily Emission)

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					
2012	5.46	39.90	30.11	0.06	0.05	2.44	2.49	0.05	2.44	2.49	0.00	5,424.17	0.00	0.49	0.00	5,434.36
2013	3.22	21.51	19.78	0.03	0.03	1.35	1.38	0.03	1.35	1.38	0.00	3,319.64	0.00	0.29	0.00	3,325.71
Total	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

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	0.04	0.00	0.00	0.00		0.00	0.00		0.00	0.00		0.00		0.00		0.00
Energy	0.00	0.00	0.00	0.00		0.00	0.00		0.00	0.00		0.00		0.00	0.00	0.00
Mobile	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		0.00		0.00		0.00
Total	0.04	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		0.00		0.00	0.00	0.00

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	0.04	0.00	0.00	0.00		0.00	0.00		0.00	0.00		0.00		0.00		0.00
Energy	0.00	0.00	0.00	0.00		0.00	0.00		0.00	0.00		0.00		0.00	0.00	0.00
Mobile	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		0.00		0.00		0.00
Total	0.04	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		0.00		0.00	0.00	0.00

3.0 Construction Detail

3.1 Mitigation Measures Construction

3.2 Drilling & Excavation - 2012

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					0.00	0.00	0.00	0.00	0.00	0.00						0.00
Off-Road	4.64	35.91	22.37	0.04		2.27	2.27		2.27	2.27		4,066.99		0.42		4,075.71
Total	4.64	35.91	22.37	0.04	0.00	2.27	2.27	0.00	2.27	2.27		4,066.99		0.42		4,075.71

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	0.06	0.56	0.33	0.00	1.40	0.03	1.42	0.00	0.03	0.03		77.40		0.00		77.46
Vendor	0.29	2.97	1.98	0.00	0.15	0.11	0.26	0.01	0.11	0.12		441.39		0.01		441.69
Worker	0.47	0.46	5.42	0.01	0.98	0.03	1.02	0.04	0.03	0.07		838.39		0.05		839.50
Total	0.82	3.99	7.73	0.01	2.53	0.17	2.70	0.05	0.17	0.22		1,357.18		0.06		1,358.65

3.2 Drilling & Excavation - 2012

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					0.00	0.00	0.00	0.00	0.00	0.00						0.00
Off-Road	4.64	35.91	22.37	0.04		2.27	2.27		2.27	2.27	0.00	4,066.99		0.42		4,075.71
Total	4.64	35.91	22.37	0.04	0.00	2.27	2.27	0.00	2.27	2.27	0.00	4,066.99		0.42		4,075.71

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	0.06	0.56	0.33	0.00	0.00	0.03	0.03	0.00	0.03	0.03		77.40		0.00		77.46
Vendor	0.29	2.97	1.98	0.00	0.01	0.11	0.12	0.01	0.11	0.12		441.39		0.01		441.69
Worker	0.47	0.46	5.42	0.01	0.04	0.03	0.07	0.04	0.03	0.07		838.39		0.05		839.50
Total	0.82	3.99	7.73	0.01	0.05	0.17	0.22	0.05	0.17	0.22		1,357.18		0.06		1,358.65

3.3 Storm Drain Construction - 2012

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	0.49	3.70	2.64	0.00		0.22	0.22		0.22	0.22		447.62		0.04		448.55
Total	0.49	3.70	2.64	0.00		0.22	0.22		0.22	0.22		447.62		0.04		448.55

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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		0.00		0.00		0.00
Vendor	0.11	1.11	0.74	0.00	0.06	0.04	0.10	0.00	0.04	0.05		165.52		0.01		165.64
Worker	0.20	0.20	2.37	0.00	0.43	0.01	0.44	0.02	0.01	0.03		366.80		0.02		367.28
Total	0.31	1.31	3.11	0.00	0.49	0.05	0.54	0.02	0.05	0.08		532.32		0.03		532.92

3.3 Storm Drain Construction - 2012

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	0.49	3.70	2.64	0.00		0.22	0.22		0.22	0.22	0.00	447.62		0.04		448.55
Total	0.49	3.70	2.64	0.00		0.22	0.22		0.22	0.22	0.00	447.62		0.04		448.55

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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		0.00		0.00		0.00
Vendor	0.11	1.11	0.74	0.00	0.00	0.04	0.05	0.00	0.04	0.05		165.52		0.01		165.64
Worker	0.20	0.20	2.37	0.00	0.02	0.01	0.03	0.02	0.01	0.03		366.80		0.02		367.28
Total	0.31	1.31	3.11	0.00	0.02	0.05	0.08	0.02	0.05	0.08		532.32		0.03		532.92

3.4 COS Construction - 2012

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	1.37	12.25	5.11	0.01		0.53	0.53		0.53	0.53		1,343.26		0.12		1,345.84
Total	1.37	12.25	5.11	0.01		0.53	0.53		0.53	0.53		1,343.26		0.12		1,345.84

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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		0.00		0.00		0.00
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		0.00		0.00		0.00
Worker	0.16	0.16	1.86	0.00	0.34	0.01	0.35	0.01	0.01	0.02		288.20		0.02		288.58
Total	0.16	0.16	1.86	0.00	0.34	0.01	0.35	0.01	0.01	0.02		288.20		0.02		288.58

3.4 COS Construction - 2012

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	1.37	12.25	5.11	0.01		0.53	0.53		0.53	0.53	0.00	1,343.26		0.12		1,345.84
Total	1.37	12.25	5.11	0.01		0.53	0.53		0.53	0.53	0.00	1,343.26		0.12		1,345.84

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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		0.00		0.00		0.00
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		0.00		0.00		0.00
Worker	0.16	0.16	1.86	0.00	0.01	0.01	0.02	0.01	0.01	0.02		288.20		0.02		288.58
Total	0.16	0.16	1.86	0.00	0.01	0.01	0.02	0.01	0.01	0.02		288.20		0.02		288.58

3.4 COS Construction - 2013

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	1.28	11.32	4.99	0.01		0.47	0.47		0.47	0.47		1,343.26		0.11		1,345.66
Total	1.28	11.32	4.99	0.01		0.47	0.47		0.47	0.47		1,343.26		0.11		1,345.66

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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		0.00		0.00		0.00
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		0.00		0.00		0.00
Worker	0.15	0.15	1.71	0.00	0.34	0.01	0.35	0.01	0.01	0.02		282.67		0.02		283.02
Total	0.15	0.15	1.71	0.00	0.34	0.01	0.35	0.01	0.01	0.02		282.67		0.02		283.02

3.4 COS Construction - 2013

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	1.28	11.32	4.99	0.01		0.47	0.47		0.47	0.47	0.00	1,343.26		0.11		1,345.66
Total	1.28	11.32	4.99	0.01		0.47	0.47		0.47	0.47	0.00	1,343.26		0.11		1,345.66

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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		0.00		0.00		0.00
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		0.00		0.00		0.00
Worker	0.15	0.15	1.71	0.00	0.01	0.01	0.02	0.01	0.01	0.02		282.67		0.02		283.02
Total	0.15	0.15	1.71	0.00	0.01	0.01	0.02	0.01	0.01	0.02		282.67		0.02		283.02

3.5 Backfill - 2013

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					0.00	0.00	0.00	0.00	0.00	0.00						0.00
Off-Road	2.74	19.60	15.04	0.03		1.26	1.26		1.26	1.26		2,445.44		0.24		2,450.58
Total	2.74	19.60	15.04	0.03	0.00	1.26	1.26	0.00	1.26	1.26		2,445.44		0.24		2,450.58

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	0.02	0.24	0.14	0.00	1.54	0.01	1.55	0.00	0.01	0.01		36.07		0.00		36.09
Vendor	0.13	1.36	0.88	0.00	0.07	0.05	0.12	0.01	0.05	0.05		221.40		0.01		221.54
Worker	0.32	0.32	3.74	0.01	0.74	0.03	0.76	0.03	0.03	0.05		616.73		0.04		617.50
Total	0.47	1.92	4.76	0.01	2.35	0.09	2.43	0.04	0.09	0.11		874.20		0.05		875.13

3.5 Backfill - 2013

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					0.00	0.00	0.00	0.00	0.00	0.00						0.00
Off-Road	2.74	19.60	15.04	0.03		1.26	1.26		1.26	1.26	0.00	2,445.44		0.24		2,450.58
Total	2.74	19.60	15.04	0.03	0.00	1.26	1.26	0.00	1.26	1.26	0.00	2,445.44		0.24		2,450.58

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	0.02	0.24	0.14	0.00	0.00	0.01	0.01	0.00	0.01	0.01		36.07		0.00		36.09
Vendor	0.13	1.36	0.88	0.00	0.01	0.05	0.05	0.01	0.05	0.05		221.40		0.01		221.54
Worker	0.32	0.32	3.74	0.01	0.03	0.03	0.05	0.03	0.03	0.05		616.73		0.04		617.50
Total	0.47	1.92	4.76	0.01	0.04	0.09	0.11	0.04	0.09	0.11		874.20		0.05		875.13

3.6 Street Construction - 2013

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	2.62	17.97	11.86	0.02		1.28	1.28		1.28	1.28		1,834.51		0.23		1,839.43
Paving	0.00					0.00	0.00		0.00	0.00						0.00
Total	2.62	17.97	11.86	0.02		1.28	1.28		1.28	1.28		1,834.51		0.23		1,839.43

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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		0.00		0.00		0.00
Vendor	0.03	0.34	0.22	0.00	0.02	0.01	0.03	0.00	0.01	0.01		55.35		0.00		55.38
Worker	0.11	0.11	1.25	0.00	0.25	0.01	0.25	0.01	0.01	0.02		205.58		0.01		205.83
Total	0.14	0.45	1.47	0.00	0.27	0.02	0.28	0.01	0.02	0.03		260.93		0.01		261.21

3.6 Street Construction - 2013

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	2.62	17.97	11.86	0.02		1.28	1.28		1.28	1.28	0.00	1,834.51		0.23		1,839.43
Paving	0.00					0.00	0.00		0.00	0.00						0.00
Total	2.62	17.97	11.86	0.02		1.28	1.28		1.28	1.28	0.00	1,834.51		0.23		1,839.43

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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		0.00		0.00		0.00
Vendor	0.03	0.34	0.22	0.00	0.00	0.01	0.01	0.00	0.01	0.01		55.35		0.00		55.38
Worker	0.11	0.11	1.25	0.00	0.01	0.01	0.02	0.01	0.01	0.02		205.58		0.01		205.83
Total	0.14	0.45	1.47	0.00	0.01	0.02	0.03	0.01	0.02	0.03		260.93		0.01		261.21

4.0 Mobile Detail

4.1 Mitigation Measures Mobile

	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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		0.00		0.00		0.00
Unmitigated	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		0.00		0.00		0.00
Total	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

4.2 Trip Summary Information

Land Use	Average Daily Trip Rate			Unmitigated	Mitigated
	Weekday	Saturday	Sunday	Annual VMT	Annual VMT
Other Asphalt Surfaces	0.00	0.00	0.00		
Total	0.00	0.00	0.00		

4.3 Trip Type Information

Land Use	Miles			Trip %		
	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
Other Asphalt Surfaces	8.90	13.30	7.40	0.00	0.00	0.00

5.0 Energy Detail

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	0.00	0.00	0.00	0.00		0.00	0.00		0.00	0.00		0.00		0.00	0.00	0.00
NaturalGas Unmitigated	0.00	0.00	0.00	0.00		0.00	0.00		0.00	0.00		0.00		0.00	0.00	0.00
Total	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

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	lb/day										lb/day					
Other Asphalt Surfaces	0	0.00	0.00	0.00	0.00		0.00	0.00		0.00	0.00		0.00		0.00	0.00	0.00
Total		0.00	0.00	0.00	0.00		0.00	0.00		0.00	0.00		0.00		0.00	0.00	0.00

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	lb/day										lb/day					
Other Asphalt Surfaces	0	0.00	0.00	0.00	0.00		0.00	0.00		0.00	0.00		0.00		0.00	0.00	0.00
Total		0.00	0.00	0.00	0.00		0.00	0.00		0.00	0.00		0.00		0.00	0.00	0.00

6.0 Area Detail

6.1 Mitigation Measures Area

	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	0.04	0.00	0.00	0.00		0.00	0.00		0.00	0.00		0.00		0.00		0.00
Unmitigated	0.04	0.00	0.00	0.00		0.00	0.00		0.00	0.00		0.00		0.00		0.00
Total	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

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	0.01					0.00	0.00		0.00	0.00						0.00
Consumer Products	0.03					0.00	0.00		0.00	0.00						0.00
Landscaping	0.00	0.00	0.00	0.00		0.00	0.00		0.00	0.00		0.00		0.00		0.00
Total	0.04	0.00	0.00	0.00		0.00	0.00		0.00	0.00		0.00		0.00		0.00

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	0.01					0.00	0.00		0.00	0.00						0.00
Consumer Products	0.03					0.00	0.00		0.00	0.00						0.00
Landscaping	0.00	0.00	0.00	0.00		0.00	0.00		0.00	0.00		0.00		0.00		0.00
Total	0.04	0.00	0.00	0.00		0.00	0.00		0.00	0.00		0.00		0.00		0.00

7.0 Water Detail

7.1 Mitigation Measures Water

8.0 Waste Detail

8.1 Mitigation Measures Waste

9.0 Vegetation

**Central Outfall Sewer at 59th Street and 4th Avenue Project
Los Angeles-South Coast County, Annual**

1.0 Project Characteristics

1.1 Land Usage

Land Uses	Size	Metric
Other Asphalt Surfaces	1.6	1000sqft

1.2 Other Project Characteristics

Urbanization	Urban	Wind Speed (m/s)	2.2	Utility Company	Los Angeles Department of Water & Power
Climate Zone	11	Precipitation Freq (Days)	33		

1.3 User Entered Comments

Project Characteristics - Climate zone based on Park Mesa Heights neighborhood zip code (90043) - see Appendix F to CalEEMod User's Guide (Climate Zones Zip Code Lookup)

Land Use - Parking selected as land-use type to allow VOC emissions from asphalt off-gassing to be estimated. Construction would be limited to street intersection.

Construction Phase - Construction phases/duration estimated from construction steps and wet/dry season. Storm drain portions can only be completed in dry season.

Off-road Equipment - Construction list from Backfill and Additional Storm Drain Work

Off-road Equipment - Construction list for COS construction

Off-road Equipment - Equipment list based on Drilling & Excavation construction estimates

Off-road Equipment - Construction list from major storm drain construction

Off-road Equipment - Construction list for Street Construction

Trips and VMT - # Workers based on project-specific data; vendor trucks associated with onroad construction equipment; haul trucks assumed to be 10 cubic yards.

Grading - Disturbed acreage based on size of construction area (1,600 square feet)

Energy Use -

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					
2012	0.39	2.90	2.10	0.00	0.14	0.15	0.29	0.00	0.15	0.16	0.00	368.92	368.92	0.03	0.00	369.58
2013	0.35	2.42	2.02	0.00	0.18	0.15	0.32	0.00	0.15	0.15	0.00	316.98	316.98	0.03	0.00	317.59
Total	0.74	5.32	4.12	0.00	0.32	0.30	0.61	0.00	0.30	0.31	0.00	685.90	685.90	0.06	0.00	687.17

2.1 Overall Construction

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					
2012	0.39	2.90	2.10	0.00	0.00	0.15	0.16	0.00	0.15	0.16	0.00	368.92	368.92	0.03	0.00	369.58
2013	0.35	2.42	2.02	0.00	0.00	0.15	0.15	0.00	0.15	0.15	0.00	316.98	316.98	0.03	0.00	317.59
Total	0.74	5.32	4.12	0.00	0.00	0.30	0.31	0.00	0.30	0.31	0.00	685.90	685.90	0.06	0.00	687.17

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	0.01	0.00	0.00	0.00		0.00	0.00		0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Energy	0.00	0.00	0.00	0.00		0.00	0.00		0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Mobile	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Waste						0.00	0.00		0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Water						0.00	0.00		0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Total	0.01	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00

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	0.01	0.00	0.00	0.00		0.00	0.00		0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Energy	0.00	0.00	0.00	0.00		0.00	0.00		0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Mobile	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Waste						0.00	0.00		0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Water						0.00	0.00		0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Total	0.01	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00

3.0 Construction Detail

3.1 Mitigation Measures Construction

3.2 Drilling & Excavation - 2012

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					0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Off-Road	0.15	1.17	0.73	0.00		0.07	0.07		0.07	0.07	0.00	119.88	119.88	0.01	0.00	120.13
Total	0.15	1.17	0.73	0.00	0.00	0.07	0.07	0.00	0.07	0.07	0.00	119.88	119.88	0.01	0.00	120.13

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	0.00	0.02	0.01	0.00	0.04	0.00	0.04	0.00	0.00	0.00	0.00	2.28	2.28	0.00	0.00	2.28
Vendor	0.01	0.10	0.07	0.00	0.00	0.00	0.01	0.00	0.00	0.00	0.00	12.98	12.98	0.00	0.00	12.99
Worker	0.02	0.02	0.17	0.00	0.03	0.00	0.03	0.00	0.00	0.00	0.00	23.44	23.44	0.00	0.00	23.47
Total	0.03	0.14	0.25	0.00	0.07	0.00	0.08	0.00	0.00	0.00	0.00	38.70	38.70	0.00	0.00	38.74

3.2 Drilling & Excavation - 2012

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					0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Off-Road	0.15	1.17	0.73	0.00		0.07	0.07		0.07	0.07	0.00	119.88	119.88	0.01	0.00	120.13
Total	0.15	1.17	0.73	0.00	0.00	0.07	0.07	0.00	0.07	0.07	0.00	119.88	119.88	0.01	0.00	120.13

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	0.00	0.02	0.01	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	2.28	2.28	0.00	0.00	2.28
Vendor	0.01	0.10	0.07	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	12.98	12.98	0.00	0.00	12.99
Worker	0.02	0.02	0.17	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	23.44	23.44	0.00	0.00	23.47
Total	0.03	0.14	0.25	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	38.70	38.70	0.00	0.00	38.74

3.3 Storm Drain Construction - 2012

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	0.04	0.28	0.20	0.00		0.02	0.02		0.02	0.02	0.00	31.06	31.06	0.00	0.00	31.12
Total	0.04	0.28	0.20	0.00		0.02	0.02		0.02	0.02	0.00	31.06	31.06	0.00	0.00	31.12

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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.01	0.08	0.06	0.00	0.00	0.00	0.01	0.00	0.00	0.00	0.00	11.45	11.45	0.00	0.00	11.46
Worker	0.02	0.02	0.18	0.00	0.03	0.00	0.03	0.00	0.00	0.00	0.00	24.14	24.14	0.00	0.00	24.17
Total	0.03	0.10	0.24	0.00	0.03	0.00	0.04	0.00	0.00	0.00	0.00	35.59	35.59	0.00	0.00	35.63

3.3 Storm Drain Construction - 2012

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	0.04	0.28	0.20	0.00		0.02	0.02		0.02	0.02	0.00	31.06	31.06	0.00	0.00	31.12
Total	0.04	0.28	0.20	0.00		0.02	0.02		0.02	0.02	0.00	31.06	31.06	0.00	0.00	31.12

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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.01	0.08	0.06	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	11.45	11.45	0.00	0.00	11.46
Worker	0.02	0.02	0.18	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	24.14	24.14	0.00	0.00	24.17
Total	0.03	0.10	0.24	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	35.59	35.59	0.00	0.00	35.63

3.4 COS Construction - 2012

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	0.13	1.20	0.50	0.00		0.05	0.05		0.05	0.05	0.00	119.39	119.39	0.01	0.00	119.62
Total	0.13	1.20	0.50	0.00		0.05	0.05		0.05	0.05	0.00	119.39	119.39	0.01	0.00	119.62

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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Worker	0.02	0.02	0.18	0.00	0.03	0.00	0.03	0.00	0.00	0.00	0.00	24.30	24.30	0.00	0.00	24.33
Total	0.02	0.02	0.18	0.00	0.03	0.00	0.03	0.00	0.00	0.00	0.00	24.30	24.30	0.00	0.00	24.33

3.4 COS Construction - 2012

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	0.13	1.20	0.50	0.00		0.05	0.05		0.05	0.05	0.00	119.39	119.39	0.01	0.00	119.62
Total	0.13	1.20	0.50	0.00		0.05	0.05		0.05	0.05	0.00	119.39	119.39	0.01	0.00	119.62

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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Worker	0.02	0.02	0.18	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	24.30	24.30	0.00	0.00	24.33
Total	0.02	0.02	0.18	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	24.30	24.30	0.00	0.00	24.33

3.4 COS Construction - 2013

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	0.04	0.36	0.16	0.00		0.02	0.02		0.02	0.02	0.00	38.98	38.98	0.00	0.00	39.05
Total	0.04	0.36	0.16	0.00		0.02	0.02		0.02	0.02	0.00	38.98	38.98	0.00	0.00	39.05

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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Worker	0.00	0.00	0.05	0.00	0.01	0.00	0.01	0.00	0.00	0.00	0.00	7.78	7.78	0.00	0.00	7.79
Total	0.00	0.00	0.05	0.00	0.01	0.00	0.01	0.00	0.00	0.00	0.00	7.78	7.78	0.00	0.00	7.79

3.4 COS Construction - 2013

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	0.04	0.36	0.16	0.00		0.02	0.02		0.02	0.02	0.00	38.98	38.98	0.00	0.00	39.05
Total	0.04	0.36	0.16	0.00		0.02	0.02		0.02	0.02	0.00	38.98	38.98	0.00	0.00	39.05

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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Worker	0.00	0.00	0.05	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	7.78	7.78	0.00	0.00	7.79
Total	0.00	0.00	0.05	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	7.78	7.78	0.00	0.00	7.79

3.5 Backfill - 2013

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					0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Off-Road	0.21	1.51	1.16	0.00		0.10	0.10		0.10	0.10	0.00	170.78	170.78	0.02	0.00	171.13
Total	0.21	1.51	1.16	0.00	0.00	0.10	0.10	0.00	0.10	0.10	0.00	170.78	170.78	0.02	0.00	171.13

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	0.00	0.02	0.01	0.00	0.11	0.00	0.11	0.00	0.00	0.00	0.00	2.51	2.51	0.00	0.00	2.52
Vendor	0.01	0.10	0.07	0.00	0.01	0.00	0.01	0.00	0.00	0.00	0.00	15.42	15.42	0.00	0.00	15.43
Worker	0.02	0.03	0.28	0.00	0.05	0.00	0.05	0.00	0.00	0.00	0.00	40.85	40.85	0.00	0.00	40.91
Total	0.03	0.15	0.36	0.00	0.17	0.00	0.17	0.00	0.00	0.00	0.00	58.78	58.78	0.00	0.00	58.86

3.5 Backfill - 2013

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					0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Off-Road	0.21	1.51	1.16	0.00		0.10	0.10		0.10	0.10	0.00	170.78	170.78	0.02	0.00	171.13
Total	0.21	1.51	1.16	0.00	0.00	0.10	0.10	0.00	0.10	0.10	0.00	170.78	170.78	0.02	0.00	171.13

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	0.00	0.02	0.01	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	2.51	2.51	0.00	0.00	2.52
Vendor	0.01	0.10	0.07	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	15.42	15.42	0.00	0.00	15.43
Worker	0.02	0.03	0.28	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	40.85	40.85	0.00	0.00	40.91
Total	0.03	0.15	0.36	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	58.78	58.78	0.00	0.00	58.86

3.6 Street Construction - 2013

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	0.06	0.39	0.25	0.00		0.03	0.03		0.03	0.03	0.00	35.77	35.77	0.00	0.00	35.87
Paving	0.00					0.00	0.00		0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Total	0.06	0.39	0.25	0.00		0.03	0.03		0.03	0.03	0.00	35.77	35.77	0.00	0.00	35.87

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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.00	0.01	0.01	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	1.08	1.08	0.00	0.00	1.08
Worker	0.00	0.00	0.03	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	3.80	3.80	0.00	0.00	3.81
Total	0.00	0.01	0.04	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	4.88	4.88	0.00	0.00	4.89

3.6 Street Construction - 2013

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	0.06	0.39	0.25	0.00		0.03	0.03		0.03	0.03	0.00	35.77	35.77	0.00	0.00	35.87
Paving	0.00					0.00	0.00		0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Total	0.06	0.39	0.25	0.00		0.03	0.03		0.03	0.03	0.00	35.77	35.77	0.00	0.00	35.87

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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Vendor	0.00	0.01	0.01	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	1.08	1.08	0.00	0.00	1.08
Worker	0.00	0.00	0.03	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	3.80	3.80	0.00	0.00	3.81
Total	0.00	0.01	0.04	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	4.88	4.88	0.00	0.00	4.89

4.0 Mobile Detail

4.1 Mitigation Measures Mobile

	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	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Unmitigated	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Total	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

4.2 Trip Summary Information

Land Use	Average Daily Trip Rate			Unmitigated	Mitigated
	Weekday	Saturday	Sunday	Annual VMT	Annual VMT
Other Asphalt Surfaces	0.00	0.00	0.00		
Total	0.00	0.00	0.00		

4.3 Trip Type Information

Land Use	Miles			Trip %		
	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
Other Asphalt Surfaces	8.90	13.30	7.40	0.00	0.00	0.00

5.0 Energy Detail

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						0.00	0.00		0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Electricity Unmitigated						0.00	0.00		0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
NaturalGas Mitigated	0.00	0.00	0.00	0.00		0.00	0.00		0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
NaturalGas Unmitigated	0.00	0.00	0.00	0.00		0.00	0.00		0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Total	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

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	tons/yr										MT/yr					
Other Asphalt Surfaces	0	0.00	0.00	0.00	0.00		0.00	0.00		0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Total		0.00	0.00	0.00	0.00		0.00	0.00		0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00

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	tons/yr										MT/yr					
Other Asphalt Surfaces	0	0.00	0.00	0.00	0.00		0.00	0.00		0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Total		0.00	0.00	0.00	0.00		0.00	0.00		0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00

5.3 Energy by Land Use - Electricity

Unmitigated

	Electricity Use	ROG	NOx	CO	SO2	Total CO2	CH4	N2O	CO2e
Land Use	kWh	tons/yr				MT/yr			
Other Asphalt Surfaces	0					0.00	0.00	0.00	0.00
Total						0.00	0.00	0.00	0.00

5.3 Energy by Land Use - Electricity

Mitigated

	Electricity Use	ROG	NOx	CO	SO2	Total CO2	CH4	N2O	CO2e
Land Use	kWh	tons/yr				MT/yr			
Other Asphalt Surfaces	0					0.00	0.00	0.00	0.00
Total						0.00	0.00	0.00	0.00

6.0 Area Detail

6.1 Mitigation Measures Area

	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	0.01	0.00	0.00	0.00		0.00	0.00		0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Unmitigated	0.01	0.00	0.00	0.00		0.00	0.00		0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Total	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

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	0.00					0.00	0.00		0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Consumer Products	0.01					0.00	0.00		0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Landscaping	0.00	0.00	0.00	0.00		0.00	0.00		0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Total	0.01	0.00	0.00	0.00		0.00	0.00		0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00

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	0.00					0.00	0.00		0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Consumer Products	0.01					0.00	0.00		0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Landscaping	0.00	0.00	0.00	0.00		0.00	0.00		0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Total	0.01	0.00	0.00	0.00		0.00	0.00		0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00

7.0 Water Detail

7.1 Mitigation Measures Water

	ROG	NOx	CO	SO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr				MT/yr			
Mitigated					0.00	0.00	0.00	0.00
Unmitigated					0.00	0.00	0.00	0.00
Total	NA	NA	NA	NA	NA	NA	NA	NA

7.2 Water by Land Use

Unmitigated

	Indoor/Outdoor Use	ROG	NOx	CO	SO2	Total CO2	CH4	N2O	CO2e
Land Use	Mgal	tons/yr				MT/yr			
Other Asphalt Surfaces	0 / 0					0.00	0.00	0.00	0.00
Total						0.00	0.00	0.00	0.00

7.2 Water by Land Use

Mitigated

	Indoor/Outdoor Use	ROG	NOx	CO	SO2	Total CO2	CH4	N2O	CO2e
Land Use	Mgal	tons/yr				MT/yr			
Other Asphalt Surfaces	0 / 0					0.00	0.00	0.00	0.00
Total						0.00	0.00	0.00	0.00

8.0 Waste Detail

8.1 Mitigation Measures Waste

Category/Year

	ROG	NOx	CO	SO2	Total CO2	CH4	N2O	CO2e
	tons/yr				MT/yr			
Mitigated					0.00	0.00	0.00	0.00
Unmitigated					0.00	0.00	0.00	0.00
Total	NA	NA	NA	NA	NA	NA	NA	NA

8.2 Waste by Land Use

Unmitigated

	Waste Disposed	ROG	NOx	CO	SO2	Total CO2	CH4	N2O	CO2e
Land Use	tons	tons/yr				MT/yr			
Other Asphalt Surfaces	0					0.00	0.00	0.00	0.00
Total						0.00	0.00	0.00	0.00

Mitigated

	Waste Disposed	ROG	NOx	CO	SO2	Total CO2	CH4	N2O	CO2e
Land Use	tons	tons/yr				MT/yr			
Other Asphalt Surfaces	0					0.00	0.00	0.00	0.00
Total						0.00	0.00	0.00	0.00

9.0 Vegetation
