

APPENDIX P

**AIR QUALITY MODELING OUTPUT FILES
AND CALCULATION TABLES**

AIR QUALITY EMISSIONS CALCULATION TABLES

Table 1a
Alternative 1 - Percent Distribution, Patrons, and Vehicle Miles Travels per Year

Routes ¹	Market Areas	Trip Distribution ¹	Distance (miles)	Phase I and Alternative 2		Phase II		Phase III	
				Patrons	VMT/Year	Patrons	VMT/Year	Patrons	VMT/Year
Craig Road/Deno Road		0.10	33.4	188340	4,193,704	227760	5,071,456	282291	6,285,680
Highway 2 - West	Fairchild's Air Force Base	0.15	6.5	282510	1,224,210	341640	1,480,440	423436.5	1,834,892
6th Avenue	City of Spokane, Idaho	0.10	17.5	188340	2,197,300	227760	2,657,200	282291	3,293,395
Highway 2 - East	City of Spokane, Idaho	0.45	7.9	847530	4,463,658	1024920	5,397,912	1270310	6,690,297
Craigs Road - South	Fairchild's Air Force Base, City of Medical Lake	0.20	5.5	376680	1,381,160	455520	1,670,240	564582	2,070,134
Total VMT (miles)					13,460,032		16,277,248		20,174,397

¹ Traffic Impact Analysis, trip distribution (David Evans and Associates, 2011)
Source: AES, 2011

Table 1b
Alternative 3 - Percent Distribution, Patrons, and Vehicle Miles Travels per Year

Routes	Market Areas	Trip Distribution ¹	Patrons ¹	Distance (miles)	VMT/Year
Craig Road/Deno Road		0.10	312393.1106	33.4	10,433,930
Highway 2 - West	Fairchild's Air Force Base	0.15	468589.666	6.5	3,045,833
6th Avenue	City of Spokane, Idaho	0.10	312393.1106	17.5	5,466,879
Highway 2 - East	City of Spokane, Idaho	0.45	1405768.998	7.9	11,105,575
Craigs Road - South	Fairchild's Air Force Base, City of Medical Lake	0.20	624786.2213	5.5	3,436,324
Total VMT (miles)					33,488,541

¹ Traffic Impact Analysis, trip distribution (David Evans and Associates, 2011)
Source: AES, 2011

Table 2a
Mobile Operations Criteria Pollutant and GHG Emissions

Alternatives	1, Phase I	1, Phase II	1, Phase III	2	3
Speed (mph)	Freeway, Arterial, and Local	Freeway, Arterial, and Local	Freeway, Arterial, and Local	Freeway, Arterial, and Local	Freeway, Arterial, and Local
vmt/yr	13,460,032	16,277,248	20,174,397	13,460,032	33,488,541
Criteria Pollutant Emissions (tpy)					
NO _x	17.5	21.1	26.2	17.2	43.4
VOC	10.9	13.2	16.4	10.9	27.2
SO ₂	0.1	0.1	0.2	0.1	0.3
CO	266.1	321.8	398.9	266.3	662.1
PM _{2.5}	0.3	0.4	0.5	0.3	0.8
PM ₁₀	0.6	0.7	0.8	0.6	1.4
Greenhouse Gas					
CO ₂	8256.5	9984.6	12375.1	8256.5	20542.1

Criteria pollutant emissions were calculated using half summer/half winter emission factors.

Source: Mobile 6.2, 2003; AES, 2011.

Table 2b
2032 Mobile Operations Criteria Pollutant and GHG Emissions

Alternatives	1	2	3
Speed (mph)	Freeway, Arterial, and Local	Freeway, Arterial, and Local	Freeway, Arterial, and Local
vmt/yr	20,174,397	13,460,032	33,488,541
Criteria Pollutant Emissions (tpy)			
NO _x	8.4	5.6	13.9
VOC	9.5	6.4	15.8
SO ₂	0.2	0.1	0.3
CO	303.7	202.6	504.0
PM _{2.5}	0.3	0.2	0.5
PM ₁₀	0.6	0.4	1.0
Greenhouse Gas			
CO ₂	12,584.1	8,395.9	20,888.9

Criteria pollutant emissions were calculated using half summer/half winter emission factors.

Source: Mobile 6.2, 2003; AES, 2011.

Table 3a
Build Out Operational Emission Factors

Season	Winter	Summer
Default Speeds	Freeway, Arterial, and Local¹	Freeway, Arterial, and Local¹
Criteria Pollutant	grams per mile	
NOx	1.198	1.156
VOC	0.741	0.735
SO ₂	0.0078	0.0078
CO	17.925	17.946
PM _{2.5}	0.0222	0.0215
PM ₁₀	0.0378	0.0371
Greenhouse Gas		
CO ₂	555.84	557.12

¹ Freeway, Arterial, and local speeds = 55, 40, and 25 miles per hour, respectively.

Source: Mobile6.2, 2003; AES, 2011

Table 3b
Cumulative Operational Emission Factors

Season	Winter	Summer
Default Speeds	Freeway, Arterial, and Local¹	Freeway, Arterial, and Local¹
Criteria Pollutant	grams per mile	
NOx	0.373	0.380
VOC	0.426	0.432
SO ₂	0.0078	0.0078
CO	13.560	13.749
PM _{2.5}	0.0126	0.0126
PM ₁₀	0.0274	0.0274
Greenhouse Gas		
CO ₂	565.61	566.14

¹ Freeway, Arterial, and local speeds = 55, 40, and 25 miles per hour, respectively.

Source: Mobile6.2, 2003; AES, 2011

Table 4
Fugitive Dust Emissions from Construction

Alternatives	1, phase I and 2	1, phase II	1, phase III	3
Area to be Graded (acres)	68.19	31.90	27.19	132
Grading Duration (day)	110	66	132	132
PM ₁₀ Emission Factor (tons PM ₁₀ /acre-day)	0.0191	0.0191	0.0191	0.0191
PM₁₀ Emissions (tons/year)	0.012	0.009	0.004	0.019
PM _{2.5} Emission Factor (tons PM ₁₀ /acre/day)	0.005	0.005	0.005	0.005
PM_{2.5} Emissions (tons/year)¹	0.003	0.003	0.001	0.005

Source: OFFROAD air quality model, 2007.

Table 5a
Alternatives 1, Phase I and Alternative 2 - Construction Emissions

Construction Equipment ¹	Horsepower ²	Load Factor ²	Hours in Use ² (hours/day)	Emission Factors (g/bhp/hr) ⁴						Emission (tons/year)					
				CO	VOC	NO ₂	SO ₂	PM ₁₀	PM _{2.5} ³	CO	VOC	NO ₂	SO ₂	PM ₁₀	PM _{2.5}
Year 2012 Site Grading															
2 Bulldozer	352	0.59	8	1.38	0.36	4.76	0.74	0.33	0.32	1.84	0.48	6.36	0.99	0.44	0.43
2 Motor Grader	174	0.575	8	1.36	0.35	7.43	0.74	0.33	0.32	0.88	0.23	4.78	0.48	0.21	0.21
2 Water Truck	417	0.49	8	2.07	0.44	5.49	0.74	0.41	0.40	2.72	0.58	7.21	0.97	0.54	0.53
2 Other Construction Equipment	190	0.62	8	1.55	0.38	5.00	0.74	0.35	0.34	1.17	0.29	3.79	0.56	0.27	0.26
Total Miles Traveled				Emission Factors (g/miles)						Emissions (tons/year)					
Soil Haul Trucks	98,560			3.748	0.386	0.383	0.005	0.040	0.026	0.04	0.41	0.04	0.0005	0.0043	0.0028
Employee Trips ³	17,720			17.946	0.735	1.156	0.0078	0.0371	0.0215	0.35	0.01	0.02	0.0002	0.0007	0.0004
Fugitive Dust (38.2 Acres)														0.012	0.003
Total Site Grading Emissions										7.01	1.99	22.21	3.00	1.47	1.42
Year 2013 Construction															
2 Concrete/Industrial Saw	84	0.73	8	8.50	1.00	5.80	0.13	0.16	0.15	3.35	0.39	2.29	0.05	0.06	0.06
3 Crane	190	0.43	8	1.30	0.44	5.72	0.73	0.34	0.33	1.02	0.35	4.51	0.58	0.27	0.26
3 Rough Terrain Forklift	94	0.475	8	7.76	1.98	8.56	0.95	1.39	1.35	3.34	3.24	0.83	3.58	0.40	0.58
3 Rubber Tire Loader	165	0.465	8	1.55	0.38	5.00	0.74	0.35	0.34	1.15	0.28	3.70	0.55	0.26	0.25
2 Tractors/Loader/Backhoe	79	0.465	8	8.21	1.85	7.22	0.95	1.37	1.33	1.94	0.44	1.71	0.22	0.32	0.31
2 Other Construction Equipment	190	0.62	8	1.55	0.38	5.00	0.74	0.35	0.34	1.17	0.29	3.79	0.56	0.27	0.26
Employee Trips ³				17.946	0.735	1.156	0.0078	0.0371	0.0215	0.35	0.01	0.02	0.00	0.00	0.00
Paving⁴															
Paver	132	0.59	8	8.5	1.0	5.8	0.17	0.16	0.15	2.13	0.25	1.45	0.04	0.04	0.04
Paving Equipment	111	0.53	8	8.5	1.0	5.8	0.14	0.16	0.15	1.61	0.19	1.10	0.03	0.03	0.03
2 Rollers	114	0.43	8	8.5	1.0	5.8	0.14	0.16	0.15	2.68	0.32	1.83	0.04	0.05	0.05
Architectural Coating															
Coating											34.46				
Total Construction Emissions										18.75	40.21	21.22	5.65	1.70	1.84

Source: EPA, 2007; AES, 2011

¹ Construction equipment list from USEPA approved URBEMIS 2007 air model.

² Hours per normal work day.

³ Based on 20 mile trip length, 886 trips per day, and EMFAC, 2007 emission factors (grams/mile).

⁴ Emission factors provided by EPA approved OFFROAD 2007, based on equipment age distribution in the U.S. in g/bhp/hr = grams per brake horsepower per hour

Table 5b
Alternatives 1, Phase II - Construction Emissions

Construction Equipment ¹	Horsepower ²	Load Factor ²	Hours in Use ² (hours/day)	Emission Factors (g/bhp/hr) ⁴						Emission (tons/year)					
				CO	VOC	NO ₂	SO ₂	PM ₁₀	PM _{2.5} ³	CO	VOC	NO ₂	SO ₂	PM ₁₀	PM _{2.5} ³
Year 2015 Site Grading															
2 Bulldozer	352	0.59	8	1.38	0.36	4.76	0.74	0.33	0.32	1.84	0.48	6.36	0.99	0.44	0.43
2 Motor Grader	174	0.575	8	1.36	0.35	7.43	0.74	0.33	0.32	0.88	0.23	4.78	0.48	0.21	0.21
2 Water Truck	417	0.49	8	2.07	0.44	5.49	0.74	0.41	0.40	2.72	0.58	7.21	0.97	0.54	0.53
2 Other Construction Equipment	190	0.62	8	1.55	0.38	5.00	0.74	0.35	0.34	1.17	0.29	3.79	0.56	0.27	0.26
Employee Trips ³		12,000		17.946	0.735	1.156	0.0078	0.0371	0.0215	0.24	0.01	0.02	0.00	0.00	0.00
Fugitive Dust														0.009	0.003
Total Site Grading Emissions										6.85	1.58	22.16	3.00	1.47	1.42
Year 2016 Construction															
2 Concrete/Industrial Saw	84	0.73	8	8.50	1.00	5.80	0.13	0.16	0.15	3.35	0.39	2.29	0.05	0.06	0.06
2 Crane	190	0.43	8	1.30	0.44	5.72	0.73	0.34	0.33	0.68	0.23	3.01	0.38	0.18	0.17
1Rough Terrain Forklift	94	0.475	8	7.76	1.98	8.56	0.95	1.39	1.35	1.11	0.28	1.23	0.14	0.20	0.19
1Rubber Tire Loader	165	0.465	8	1.55	0.38	5.00	0.74	0.35	0.34	0.38	0.09	1.23	0.18	0.09	0.08
1Tractors/Loader/Backhoe	79	0.465	8	8.21	1.85	7.22	0.95	1.37	1.33	0.97	0.22	0.85	0.11	0.16	0.16
Employee Trips ³				17.946	0.735	1.156	0.0078	0.0371	0.0215	0.24	0.02	0.03	0.00	0.00	0.00
Paving⁴															
Paver	132	0.59	8	8.5	1.0	5.8	0.17	0.16	0.15	2.13	0.25	1.45	0.04	0.04	0.04
Paving Equipment	111	0.53	8	8.5	1.0	5.8	0.14	0.16	0.15	1.61	0.19	1.10	0.03	0.03	0.03
2 Rollers	114	0.43	8	8.5	1.0	5.8	0.14	0.16	0.15	2.68	0.32	1.83	0.04	0.05	0.05
Architectural Coating															
Coating												16.12			
Total Construction Emissions										13.16	18.12	13.01	0.98	0.81	0.78

Source: EPA, 2007; AES, 2011

¹ Construction equipment list from USEPA approved URBEMIS 2007 air model.

² Hours per normal work day.

³ Based on 20 mile trip length, 600 trips per day, and EMFAC, 2007 emission factors (grams/mile).

⁴ Emission factors provided by EPA approved OFFROAD 2007, based on equipment age distribution in the U.S. in g/bhp/hr = grams per brake horsepower per hour

Table 5c
Alternatives 1, Phase III - Construction Emissions

Construction Equipment ¹	Horsepower ²	Load Factor ²	Hours in Use ² (hours/day)	Emission Factors (g/bhp/hr) ⁴						Emission (tons/year)					
				CO	VOC	NO ₂	SO ₂	PM ₁₀	PM _{2.5} ³	CO	VOC	NO ₂	SO ₂	PM ₁₀	PM _{2.5} ³
Year 2019 Site Grading															
2 Bulldozer	352	0.59	8	1.38	0.36	4.76	0.74	0.33	0.32	1.84	0.48	6.36	0.99	0.44	0.43
2 Motor Grader	174	0.575	8	1.36	0.35	7.43	0.74	0.33	0.32	0.88	0.23	4.78	0.48	0.21	0.21
2 Water Truck	417	0.49	8	2.07	0.44	5.49	0.74	0.41	0.40	2.72	0.58	7.21	0.97	0.54	0.53
2 Other Construction Equipment	190	0.62	8	1.55	0.38	5.00	0.74	0.35	0.34	1.17	0.29	3.79	0.56	0.27	0.26
Employee Trips ³				17.946	0.735	1.156	0.0078	0.0371	0.0215	0.42	0.01	0.02	0.00	0.00	0.00
Fugitive Dust														0.004	0.001
Total Site Grading Emissions										7.04	1.59	22.17	3.00	1.46	1.42
Year 2020 Construction															
3 Concrete/Industrial Saw	84	0.73	8	8.50	1.00	5.80	0.13	0.16	0.15	5.03	0.59	3.43	0.08	0.09	0.09
4 Crane	190	0.43	8	1.30	0.44	5.72	0.73	0.34	0.33	1.37	0.46	6.01	0.77	0.36	0.35
5 Rough Terrain Forklift	94	0.475	8	7.76	1.98	8.56	0.95	1.39	1.35	5.57	1.42	6.15	0.68	1.00	0.97
4 Rubber Tire Loader	165	0.465	8	1.55	0.38	5.00	0.74	0.35	0.34	1.53	0.38	4.93	0.73	0.35	0.34
3 Tractors/Loader/Backhoe	79	0.465	8	8.21	1.85	7.22	0.95	1.37	1.33	2.91	0.66	2.56	0.34	0.49	0.47
Employee Trips ³				17.946	0.735	1.156	0.0078	0.0371	0.0215	0.42	0.01	0.02	0.00	0.00	0.00
Paving⁴															
Paver	132	0.59	8	8.5	1.0	5.8	0.17	0.16	0.15	2.13	0.25	1.45	0.04	0.04	0.04
Paving Equipment	111	0.53	8	8.5	1.0	5.8	0.14	0.16	0.15	1.61	0.19	1.10	0.03	0.03	0.03
2 Rollers	114	0.43	8	8.5	1.0	5.8	0.14	0.16	0.15	2.68	0.32	1.83	0.04	0.05	0.05
Architectural Coating															
Coating												13.74			
Total Construction Emissions										23.25	18.02	27.48	2.71	2.40	2.33

Source: EPA, 2007; AES, 2011

¹ Construction equipment list from USEPA approved URBEMIS 2007 air model.

² Hours per normal work day.

³ Based on 20 mile trip length, 1,072 trips per day, and EMFAC, 2007 emission factors (grams/mile).

⁴ Emission factors provided by EPA approved OFFROAD 2007, based on equipment age distribution in the U.S. in g/bhp/hr = grams per brake horsepower per hour

Table 6 Alternatives 3 - Construction Emissions																
Construction Equipment ¹	Horsepower ²	Load Factor ²	Hours in Use ² (hours/day)	Emission Factors (g/bhp/hr) ⁴						Emission (tons/year)						
				CO	VOC	NO ₂	SO ₂	PM ₁₀	PM _{2.5} ³	CO	VOC	NO ₂	SO ₂	PM ₁₀	PM _{2.5} ³	
Year 2012 Site Grading																
2 Bulldozer	352	0.59	8	1.38	0.36	4.76	0.74	0.33	0.32	1.84	0.48	6.36	0.99	0.44	0.43	
3 Motor Grader	174	0.575	8	1.36	0.35	7.43	0.74	0.33	0.32	1.31	0.34	7.17	0.71	0.32	0.31	
2 Water Truck	417	0.49	8	2.07	0.44	5.49	0.74	0.41	0.40	2.72	0.58	7.21	0.97	0.54	0.53	
2 Other Construction Equipment	190	0.62	8	1.55	0.38	5.00	0.74	0.35	0.34	1.17	0.29	3.79	0.56	0.27	0.26	
Total Miles Traveled				Emission Factors (g/miles)						Emissions (tons/year)						
Soil Haul Trucks	98,560			3.748	0.386	0.383	0.005	0.040	0.026	0.04	0.41	0.04	0.0005	0.0043	0.0028	
Employee Trips ³	21,440			17.946	0.735	1.156	0.0078	0.0371	0.0215	0.42	0.02	0.03	0.00	0.00	0.00	
Fugitive Dust										0.019 0.005						
Total Site Grading Emissions										7.52	2.11	24.60	3.24	1.59	1.53	
2013 and 2014 Year Construction																
3 Concrete/Industrial Saw	84	0.73	8	8.50	1.00	5.80	0.13	0.16	0.15	5.03	0.59	3.43	0.08	0.09	0.09	
3 Crane	190	0.43	8	1.30	0.44	5.72	0.73	0.34	0.33	1.02	0.35	4.51	0.58	0.27	0.26	
4 Rough Terrain Forklift	94	0.475	8	7.76	1.98	8.56	0.95	1.39	1.35	4.46	1.14	4.92	0.55	0.80	0.78	
4 Rubber Tire Loader	165	0.465	8	1.55	0.38	5.00	0.74	0.35	0.34	1.53	0.38	4.93	0.73	0.35	0.34	
3 Tractors/Loader/Backhoe	79	0.465	8	8.21	1.85	7.22	0.95	1.37	1.33	2.91	0.66	2.56	0.34	0.49	0.47	
Employee Trips ³				17.946	0.735	1.156	0.0078	0.0371	0.0215	0.35	0.01	0.02	0.00	0.00	0.00	
Paving⁴																
Paver	132	0.59	8	8.5	1.0	5.8	0.17	0.16	0.15	2.13	0.25	1.45	0.04	0.04	0.04	
Paving Equipment	111	0.53	8	8.5	1.0	5.8	0.14	0.16	0.15	1.61	0.19	1.10	0.03	0.03	0.03	
2 Rollers	114	0.43	8	8.5	1.0	5.8	0.14	0.16	0.15	2.68	0.32	1.83	0.04	0.05	0.05	
Architectural Coating																
Coating											7.53					
Total 2013 Construction Emission⁵										13.03	6.85	14.85	1.43	1.27	1.23	
Total 2014 Construction Emission⁵										8.69	4.56	9.90	0.95	0.85	0.82	

Source: EPA, 2007; AES, 2011

¹ Construction equipment list from USEPA approved URBEMIS 2007 air model.² Hours per normal work day.³ Based on 20 mile trip length, 1,072 trips per day, and EMFAC, 2007 emission factors (grams/mile).⁴ Emission factors provided by EPA approved OFFROAD 2007, based on equipment age distribution in the U.S. in g/bhp/hr = grams per brake horsepower per hour⁵ Assume 60 percent of emissions would occur in 2013 and 40 percent in 2014.

Table 7a
Alternatives 1 - Construction GHG Emissions

Construction Equipment ¹	Horsepower	Load Factor	Hours in Use ² (hours/day)	Emission Factors (g/bhp/hr) ³	Emission (tons/year)
				CO2	CO2
Site Grading					
6 Bulldozer	352.00	0.59	8.00	536.20	1,948.84
6 Motor Grader	174.00	0.58	8.00	536.30	939.03
6 Water Truck	417.00	0.49	8.00	536.00	1,916.69
6 Other Construction Equipment	190.00	0.62	8.00	536.20	1,105.42
		Miles Traveled		Emission Factors (g/miles)	Emission (tons/year)
Soil Haul Trucks		98,560		500.02	49.28
Employee Trips		21,440		552.80	11.85
Construction					
7 Concrete/Industrial Saw	84.00	0.73	8.00	529.70	731.18
9 Crane	190.00	0.43	8.00	530.20	1,253.72
9 Rough Terrain Forklift	94.00	0.48	8.00	690.80	892.72
8 Rubber Tire Loader	165.00	0.47	8.00	536.20	1,058.40
6 Tractors/Loader/Backhoe	79.00	0.47	8.00	691.10	489.86
2 Other Construction Equipment	190	0.62	8	530.20	401.71
Employee Trips		21,440.00		552.80	11.85
Paving					
Paver	132.00	0.59	8.00	520.30	130.31
Paving Equipment	111.00	0.53	8.00	520.30	98.44
2 Rollers	114.00	0.43	8.00	520.30	164.04
Total GHG Construction Emissions					11,203.35

Source: EPA, 2007; AES, 2011

¹ Construction equipment list from USEPA approved URBEMIS 2002 air model.

² Hours per normal work day.

³ Emission factors provided by EPA approved NONROAD 2005.

Tables 7 b- Alternative 1, 2, and 3 Construction Emissions

Table 7b					
Alternatives 2 - Construction GHG Emissions					
Construction Equipment ¹	Horsepower	Load Factor	Hours in Use ² (hours/day)	Emission Factors (g/bhp/hr) ³	Emission (tons/year)
				CO2	CO2
Site Grading					
2 Bulldozer	352.00	0.59	8.00	536.20	716.22
2 Motor Grader	174.00	0.58	8.00	536.30	345.11
2 Water Truck	417.00	0.49	8.00	536.00	704.41
2 Other Construction Equipment	190.00	0.62	8.00	536.20	406.26
	Miles Traveled			Emission Factors (g/miles)	Emission (tons/year)
Soil Haul Trucks	98,560			500.02	49.28
Employee Trips ³	17,720			552.80	9.80
Construction					
2 Concrete/Industrial Saw	84.00	0.73	8.00	529.70	208.91
3 Crane	190.00	0.43	8.00	530.20	417.91
3 Rough Terrain Forklift	94.00	0.48	8.00	690.80	297.57
3 Rubber Tire Loader	165.00	0.47	8.00	536.20	396.90
2 Tractors/Loader/Backhoe	79.00	0.47	8.00	691.10	163.29
2 Other Construction Equipment	190	0.62	8	530.20	401.71
Employee Trips ³	17,720			552.80	9.80
Paving					
Paver	132.00	0.59	8.00	520.30	130.31
Paving Equipment	111.00	0.53	8.00	520.30	98.44
2 Rollers	114.00	0.43	8.00	520.30	164.04
Total GHG Construction Emissions					4,519.94

Source: EPA, 2007; AES, 2011

¹ Construction equipment list from USEPA approved URBEMIS 2002 air model.

² Hours per normal work day.

³ Emission factors provided by EPA approved NONROAD 2005.

Tables 7 c - Alternative 1, 2, and 3 Construction Emissions

Table 7c Alternatives 3 - Construction GHG Emissions					
Construction Equipment ¹	Horsepower	Load Factor	Hours in Use ² (hours/day)	Emission Factors (g/bhp/hr) ³	Emission (tons/year)
				CO2	CO2
Site Grading					
5 Bulldozer	352.00	0.59	8.00	536.20	1,790.56
6 Motor Grader	174.00	0.58	8.00	536.30	1,035.32
3 Water Truck	417.00	0.49	8.00	536.00	1,056.61
5 Other Construction Equipment	190.00	0.62	8.00	536.20	1,015.64
				Miles Traveled	Emission Factors (g/miles)
Soil Haul Trucks				98,560	49.28
Employee Trips ³				21,440	11.85
Construction					
3 Concrete/Industrial Saw	84.00	0.73	8.00	529.70	313.36
3 Crane	190.00	0.43	8.00	530.20	417.91
6 Rough Terrain Forklift	94.00	0.48	8.00	690.80	595.14
5 Rubber Tire Loader	165.00	0.47	8.00	536.20	661.50
5 Tractors/Loader/Backhoe	79.00	0.47	8.00	691.10	408.21
Employee Trips ³				21,440	11.85
Paving					
2 Paver	132.00	0.59	8.00	520.30	260.62
3 Paving Equipment	111.00	0.53	8.00	520.30	295.31
3 Rollers	114.00	0.43	8.00	520.30	246.06
Total GHG Construction Emissions					8,169.23

Source: EPA, 2007; AES, 2011

¹ Construction equipment list from USEPA approved URBEMIS 2002 air model.² Hours per normal work day.³ Emission factors provided by EPA approved NONROAD 2005.

Tables 8 a and b - Alts 1, Phases I and II and 2 Stationary Source Emissions

Table 8 a
Alternative 1, Phase I and Alternative 2

Pollutant/GHG	MMscf/year	Emission Factors (lb/MMscf)	Conversion factor (lb/tons)	Emissions (tons)
VOC	130	5.5	0.0005	0.36
NOx	130	0.64	0.0005	0.04
CO	130	11	0.0005	0.72
SO2	130	0.6	0.0005	0.04
PM10	130	5.7	0.0005	0.37
PM2.5	130	1.9	0.0005	0.12
Greenhouse Gas			lb/MT	MT
CO2	130	120,000	0.00045	7,020

Table 8 b
Alternative 1, Phase II

Pollutant/GHG	MMscf/year	Emission Factors (lb/MMscf)	Conversion factor (lb/tons)	Emissions (tons)
VOC	160	5.5	0.0005	0.44
NOx	160	0.64	0.0005	0.05
CO	160	11	0.0005	0.88
SO2	160	0.6	0.0005	0.05
PM10	160	5.7	0.0005	0.46
PM2.5	160	1.9	0.0005	0.15
Greenhouse Gas			lb/MT	MT
CO2	160	120,000	0.00045	8,640

Tables 8 c and d - Alts 1, Phase III and 3 Stationary Source Emissions

Table 8 c
Alternative 1, Phase III

Pollutant/GHG	MMscf/year	Emission Factors (lb/MMscf)	Conversion factor (lb/tons)	Emissions (tons)
VOC	240	5.5	0.0005	0.66
NOx	240	0.64	0.0005	0.08
CO	240	11	0.0005	1.32
SO2	240	0.6	0.0005	0.07
PM10	240	5.7	0.0005	0.68
PM2.5	240	1.9	0.0005	0.23
Greenhouse Gas			lb/MT	MT
CO2	240	120,000	0.00045	12,960

Tabel 8 d
Alternative 3

Pollutant/GHG	MMscf/year	Emission Factors (lb/MMscf)	Conversion factor (lb/tons)	Emissions (tons)
VOC	240	5.5	0.0005	0.66
NOx	240	0.64	0.0005	0.08
CO	240	11	0.0005	1.32
SO2	240	0.6	0.0005	0.07
PM10	240	5.7	0.0005	0.68
PM2.5	240	1.9	0.0005	0.23
Greenhouse Gas			lb/MT	MT
CO2	240	120,000	0.00045	12,960

MOBILE 6.2 OUTPUT FILES

summer criteria.PM

 * MOBILE6.2.03 (24-Sep-2003) *
 * Input file: N:\PROJECTS\MOBILE6.2\SPOKPM7.IN (file 1, run 1). *

* #####
 * Spokane Case no

* File 1, Run 1, Scenario 1.
 * #####

* Reading PM Gas Carbon ZML Levels
 * from the external data file PMGZML.CSV

* Reading PM Gas Carbon DR1 Levels
 * from the external data file PMGDR1.CSV

* Reading PM Gas Carbon DR2 Levels
 * from the external data file PMGDR2.CSV

* Reading PM Diesel Zero Mile Levels
 * from the external data file PMDZML.CSV

* Reading the First PM Deterioration Rates
 * from the external data file PMDDR1.CSV

* Reading the Second PM Deterioration Rates
 * from the external data file PMDDR2.CSV
 M 48 Warning:
 there are no sales for vehicle class HDGV8b
 M 48 Warning:
 there are no sales for vehicle class LDDT12

* Reading Ammonia (NH3) Basic Emission Rates
 * from the external data file PMNH3BER.D

* Reading Ammonia (NH3) Sulfur Deterioration Rates
 * from the external data file PMNH3SDR.D

Calendar Year: 2012
 Month: July
 Altitude: High
 Minimum Temperature: 25.0 (F)
 Maximum Temperature: 35.0 (F)
 Absolute Humidity: 75. grains/lb
 Nominal Fuel RVP: 7.0 psi
 Weathered RVP: 7.0 psi
 Fuel Sulfur Content: 30. ppm
 Exhaust I/M Program: No
 Evap I/M Program: No
 ATP Program: No
 Reformulated Gas: No

HDDV	Vehicle Type: MC	Type: All Veh GVWR:	LDGV	LDGT12	LDGT34	LDGT (All)	HDGV	LDDV	LDDT
-----	-----	-----	-----	<6000	>6000	-----	-----	-----	-----
0.0861	0.0054	1.0000	0.3271	0.4043	0.1389		0.0360	0.0003	0.0020
7.2	50.0	16.4	24.1	18.5	14.3	17.2	9.7	32.4	17.0

Composi te Emission Factors (g/mi):									
0.678	2.44	0.735	0.556	0.698	1.201	0.827	0.876	0.130	0.364
3.276	30.22	17.946	16.80	18.53	24.01	19.93	32.86	0.803	0.694
5.191	1.15	1.156	0.540	0.743	1.226	0.867	1.521	0.269	0.556

				summer criteria.PM				
Composite CO2 :	368.1	478.5	621.8	515.1	912.1	314.1	599.4	
1415.0	177.4	557.12						

* MOBILE6. 2. 03 (24-Sep-2003) *
* Input file: N:\PROJECTS\MOBILE6. 2\SP0KPM7. IN (file 1, run 1). *

* #####
* Spokane Case no

* File 1, Run 1, Scenario 1.
* #####

Calendar Year: 2012
Month: July
Gasoline Fuel Sulfur Content: 30. ppm
Diesel Fuel Sulfur Content: 15. ppm
Particle Size Cutoff: 10.00 Microns
Reformulated Gas: No

HDDV	Vehicle Type: MC	AI I Veh GVWR:	LDGV	LDGT12 <6000	LDGT34 >6000	LDGT (AI I)	HDGV	LDDV	LDDT
0.0861	0.0054	1.0000	0.3271	0.4043	0.1389		0.0360	0.0003	0.0020

Composi te Emi ssi on Factors (g/mi):

-----	Lead:	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	-----	-----
-----	0.0000	0.0000							
-----	GASPM:	0.0040	0.0039	0.0040	0.0039	0.0275	-----	-----	
-----	0.0205	0.0045							
0.0762	ECARBON:	-----	-----	-----	-----	-----	0.0282	0.0170	
-----	0.0066								
0.0386	OCARBON:	-----	-----	-----	-----	-----	0.0080	0.0245	
-----	0.0034								
0.0009	S04:	0.0003	0.0005	0.0005	0.0005	0.0017	0.0002	0.0003	
-----	0.0001	0.0005							
0.1157	Total Exhaust PM:	0.0043	0.0043	0.0045	0.0044	0.0291	0.0364	0.0418	
-----	0.0206	0.0150							
0.0125	Brake:	0.0125	0.0125	0.0125	0.0125	0.0125	0.0125	0.0125	
-----	0.0125	0.0125							
0.0259	Ti re:	0.0080	0.0080	0.0080	0.0080	0.0086	0.0080	0.0080	
-----	0.0040	0.0095							
0.1541	Total PM:	0.0248	0.0249	0.0250	0.0249	0.0503	0.0569	0.0624	
-----	0.0371	0.0371							

* MOBILE6.2.03 (24-Sep-2003) *
* Input file: N:\PROJECTS\MOBILE6.2\SP0K257.IN (file 1, run 1). *

* #####
* Spokane Case no

* File 1, Run 1, Scenario 1.
* #####

Calendar Year: 2012
Month: July
Gasoline Fuel Sulfur Content: 30. ppm
Diesel Fuel Sulfur Content: 15. ppm
Particle Size Cutoff: 2.50 Microns
Reformulated Gas: No

HDDV	Vehicle Type: MC All Veh	LDGV	LDGT12 <6000	LDGT34 >6000	LDGT (All)	HDGV	LDDV	LDDT
0.0861	0.0054	1.0000	0.3271	0.4043	0.1389	0.0360	0.0003	0.0020

Composi te Emi ssi on Factors (g/mi):

-----	Lead:	0.0000	0.0000	0.0000	0.0000	0.0000	-----	-----
-----	GASPM:	0.0037	0.0035	0.0036	0.0036	0.0244	-----	-----
0.0701	ECARBON:	0.0061	-----	-----	-----	-----	0.0260	0.0157
0.0355	OCARBON:	0.0031	-----	-----	-----	-----	0.0073	0.0225
0.0009	S04:	0.0003	0.0005	0.0005	0.0005	0.0017	0.0002	0.0003
0.1065	Total Exhaust PM:	0.0040	0.0040	0.0041	0.0041	0.0260	0.0335	0.0385
0.0053	Brake:	0.0053	0.0053	0.0053	0.0053	0.0053	0.0053	0.0053
0.0065	Ti re:	0.0020	0.0020	0.0020	0.0020	0.0022	0.0020	0.0020
0.1183	Total PM:	0.0113	0.0114	0.0115	0.0114	0.0335	0.0408	0.0458

Winter criteria.PM

 * MOBILE6.2.03 (24-Sep-2003) *
 * Input file: N:\PROJECTS\MOBILE6.2\SPOKPM.IN (file 1, run 1). *

* #####
 * Spokane Case no

* File 1, Run 1, Scenario 1.
 * #####

* Reading PM Gas Carbon ZML Levels
 * from the external data file PMGZML.CSV

* Reading PM Gas Carbon DR1 Levels
 * from the external data file PMGDR1.CSV

* Reading PM Gas Carbon DR2 Levels
 * from the external data file PMGDR2.CSV

* Reading PM Diesel Zero Mile Levels
 * from the external data file PMDZML.CSV

* Reading the First PM Deterioration Rates
 * from the external data file PMDDR1.CSV

* Reading the Second PM Deterioration Rates
 * from the external data file PMDDR2.CSV
 M 48 Warning:
 there are no sales for vehicle class HDGV8b
 M 48 Warning:
 there are no sales for vehicle class LDDT12

* Reading Ammonia (NH3) Basic Emission Rates
 * from the external data file PMNH3BER.D

* Reading Ammonia (NH3) Sulfur Deterioration Rates
 * from the external data file PMNH3SDR.D

Calendar Year: 2012
 Month: Jan.
 Altitude: High
 Minimum Temperature: 25.0 (F)
 Maximum Temperature: 35.0 (F)
 Absolute Humidity: 75. grains/lb
 Nominal Fuel RVP: 7.0 psi
 Weathered RVP: 7.0 psi
 Fuel Sulfur Content: 30. ppm

 Exhaust I/M Program: No
 Evap I/M Program: No
 ATP Program: No
 Reformulated Gas: No

HDDV	Vehicle Type: MC	AI I Veh GVWR:	LDGV	LDGT12 <6000	LDGT34 >6000	LDGT (AI I)	HDGV	LDDV	LDDT
-----	-----	-----	-----	-----	-----	-----	-----	-----	-----
0.0857	VMT Distribution: 0.0053	1.0000	0.3321	0.4018	0.1370		0.0358	0.0003	0.0020
7.2	Fuel Economy (mpg): 50.0	16.4	24.1	18.5	14.3	17.2	9.7	32.4	17.0

Composi te Emi ssi on Factors (g/mi):									
0.693	Composi te VOC :	0.568	0.688	1.239	0.828	0.915	0.131	0.376	
3.492	Composi te CO :	16.87	18.17	24.64	19.81	33.14	0.805	0.711	
5.579	Composi te NOX :	0.550	0.740	1.273	0.876	1.624	0.279	0.586	

Composi te CO2 :			Winter cri teria.PM					
1415.5	177.4	555.84	478.4	621.6	514.8	912.6	314.1	599.5

 * MOBILE6.2.03 (24-Sep-2003) *
 * Input file: N:\PROJECTS\MOBILE6.2\SPOKPM.IN (file 1, run 1). *

* #####
 * Spokane Case no

* File 1, Run 1, Scenario 1.
 * #####

Calendar Year: 2012
 Month: Jan.
 Gasoline Fuel Sulfur Content: 30. ppm
 Diesel Fuel Sulfur Content: 15. ppm
 Particle Size Cutoff: 10.00 Microns
 Reformulated Gas: No

HDDV	Vehicle Type: MC All Veh	LDGV	LDGT12 <6000	LDGT34 >6000	LDGT (All)	HDGV	LDDV	LDDT
0.0857	0.0053	1.0000	0.3321	0.4018	0.1370	0.0358	0.0003	0.0020

Composite Emission Factors (g/mi):

0.0000	Lead:	0.0000	0.0000	0.0000	0.0000	0.0000	-----	-----
0.0205	GASPM:	0.0040	0.0039	0.0040	0.0039	0.0290	-----	-----
0.0818	ECARBON:	0.0046	-----	-----	-----	-----	0.0294	0.0181
0.0414	OCARBON:	0.0071	-----	-----	-----	-----	0.0083	0.0260
0.0009	S04:	0.0036	0.0003	0.0005	0.0005	0.0005	0.0016	0.0002
0.1242	Total Exhaust PM:	0.0001	0.0005	0.0043	0.0045	0.0044	0.0307	0.0378
0.0125	Brake:	0.0206	0.0157	0.0125	0.0125	0.0125	0.0125	0.0125
0.0259	Tire:	0.0125	0.0125	0.0080	0.0080	0.0080	0.0086	0.0080
0.1626	Total PM:	0.0040	0.0095	0.0248	0.0249	0.0250	0.0249	0.0519
		0.0371	0.0378					

 * MOBILE6.2.03 (24-Sep-2003) *
 * Input file: N:\PROJECTS\MOBILE6.2\SP0K251.IN (file 1, run 1). *

* #####
 * Spokane Case no

* File 1, Run 1, Scenario 1.
 * #####

Calendar Year: 2012
 Month: Jan.
 Gasoline Fuel Sulfur Content: 30. ppm
 Diesel Fuel Sulfur Content: 15. ppm
 Particle Size Cutoff: 2.50 Microns
 Reformulated Gas: No

HDDV	Vehicle Type: MC	AI I Veh GVWR:	LDGV	LDGT12 <6000	LDGT34 >6000	LDGT (AI I)	HDGV	LDDV	LDDT
0.0857	0.0053	1.0000	0.3321	0.4018	0.1370		0.0358	0.0003	0.0020

Composi te Emi ssi on Factors (g/mi):

0.0000	Lead:	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	-----	-----
0.0142	GASPM:	0.0037	0.0036	0.0037	0.0036	0.0258	-----	-----	
0.0753	ECARBON:	0.0041	-----	-----	-----	-----	0.0270	0.0167	
0.0381	OCARBON:	0.0065	-----	-----	-----	-----	0.0076	0.0240	
0.0009	S04:	0.0003	0.0005	0.0005	0.0005	0.0016	0.0002	0.0003	
0.1143	Total Exhaust PM:	0.0005	0.0040	0.0041	0.0041	0.0274	0.0348	0.0409	
0.0053	0.0143 Brake:	0.0145	0.0053	0.0053	0.0053	0.0053	0.0053	0.0053	
0.0065	0.0053 Tire:	0.0053	0.0020	0.0020	0.0020	0.0022	0.0020	0.0020	
0.1261	0.0010 Total PM:	0.0024	0.0113	0.0114	0.0115	0.0114	0.0349	0.0421	0.0482
	0.0206	0.0222							

SP0Kjul 2032 Criteria.PM

 * MOBILE6. 2. 03 (24-Sep-2003) *
 * Input file: N:\PROJECTS\MOBILE6. 2\2032\SP0K2573.IN (file 1, run 1). *

* #####
 * Spokane Case no

* File 1, Run 1, Scenario 1.
 * #####

* Reading PM Gas Carbon ZML Levels
 * from the external data file PMGZML.CSV

* Reading PM Gas Carbon DR1 Levels
 * from the external data file PMGDR1.CSV

* Reading PM Gas Carbon DR2 Levels
 * from the external data file PMGDR2.CSV

* Reading PM Diesel Zero Mile Levels
 * from the external data file PMDZML.CSV

* Reading the First PM Deterioration Rates
 * from the external data file PMDDR1.CSV

* Reading the Second PM Deterioration Rates
 * from the external data file PMDDR2.CSV
 M 48 Warning:
 there are no sales for vehicle class HDGV8b
 M 48 Warning:
 there are no sales for vehicle class LDDT12

* Reading Ammonia (NH3) Basic Emission Rates
 * from the external data file PMNH3BER.D

* Reading Ammonia (NH3) Sulfur Deterioration Rates
 * from the external data file PMNH3SDR.D

Calendar Year: 2032
 Month: July
 Altitude: High
 Minimum Temperature: 25.0 (F)
 Maximum Temperature: 35.0 (F)
 Absolute Humidity: 75. grains/lb
 Nominal Fuel RVP: 7.0 psi
 Weathered RVP: 7.0 psi
 Fuel Sulfur Content: 30. ppm

 Exhaust I/M Program: No
 Evap I/M Program: No
 ATP Program: No
 Reformulated Gas: No

HDDV	Vehicle Type: MC	Type: All Veh GVWR:	LDGV	LDGT12	LDGT34	LDGT (All)	HDGV	LDDV	LDDT
-----	-----	-----	-----	<6000	>6000	-----	-----	-----	-----
0.0876	0.0051	1.0000	0.2788	0.4388	0.1507		0.0365	0.0003	0.0022
7.2	50.0	16.1	24.1	18.5	14.2	17.2	9.8	32.4	17.0

Composi te Emi ssi on Factors (g/mi):									
0.486	Composi te VOC :	0.322	0.423	0.583	0.464	0.353	0.047	0.109	
0.528	Composi te CO :	14.33	13.93	15.83	14.42	28.87	0.597	0.350	
0.554	Composi te NOX :	0.248	0.379	0.559	0.425	0.157	0.028	0.123	

	Composi te CO2 :	368.0	SP0Kjul	2032	Cri teria. PM			
1410.9	177.4	566.14	479.4	624.6	516.6	907.3	314.1	598.7

 * MOBILE6. 2. 03 (24-Sep-2003) *
 * Input file: N:\PROJECTS\MOBILE6. 2\2032\SP0KPM73. IN (file 1, run 1). *

* #####
 * Spokane Casi no

* File 1, Run 1, Scenario 1.
 * #####

Calendar Year: 2032
 Month: July
 Gasoline Fuel Sulfur Content: 30. ppm
 Diesel Fuel Sulfur Content: 15. ppm
 Particle Size Cutoff: 10.00 Microns
 Reformulated Gas: No

HDDV	Vehicle Type: MC	AI I Veh GVWR:	LDGV	LDGT12 <6000	LDGT34 >6000	LDGT (AI I)	HDGV	LDDV	LDDT
0.0876	0.0051	1.0000	0.2788	0.4388	0.1507		0.0365	0.0003	0.0022

Composi te Emi ssi on Factors (g/mi):

0.0000	Lead:	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	-----	-----
0.0205	GASPM:	0.0039	0.0037	0.0037	0.0037	0.0037	0.0082	-----	-----
0.0082	ECARBON:	0.0037	-----	-----	-----	-----	-----	0.0071	0.0037
0.0042	OCARBON:	0.0007	-----	-----	-----	-----	-----	0.0020	0.0053
0.0009	S04:	0.0004	0.0003	0.0005	0.0005	0.0005	0.0019	0.0002	0.0003
0.0133	Total Exhaust PM:	0.0001	0.0005	0.0042	0.0042	0.0042	0.0101	0.0093	0.0093
0.0125	0.0206	0.0053	0.0125	0.0125	0.0125	0.0125	0.0125	0.0125	0.0125
0.0258	Brake:	0.0125	0.0125	0.0125	0.0125	0.0125	0.0125	0.0125	0.0125
0.0516	Ti re:	0.0080	0.0080	0.0080	0.0080	0.0080	0.0086	0.0080	0.0080
	0.0040	0.0096	0.0247	0.0247	0.0247	0.0247	0.0313	0.0298	0.0299
	Total PM:	0.0371	0.0274						

 * MOBILE6. 2. 03 (24-Sep-2003) *
 * Input file: N:\PROJECTS\MOBILE6. 2\2032\SP0K2573. IN (file 1, run 1). *

* #####
 * Spokane Casi no

* File 1, Run 1, Scenario 1.
 * #####

Calendar Year: 2032
 Month: July
 Gasoline Fuel Sulfur Content: 30. ppm
 Diesel Fuel Sulfur Content: 15. ppm
 Particle Size Cutoff: 2. 50 Microns
 Reformulated Gas: No

HDDV	Vehicle Type: MC	AI I Veh GVWR:	LDGV	LDGT12 <6000	LDGT34 >6000	LDGT (AI I)	HDGV	LDDV	LDDT
0. 0876	0. 0051	1. 0000	0. 2788	0. 4388	0. 1507		0. 0365	0. 0003	0. 0022

Composi te Emi ssi on Factors (g/mi):

-----	Lead:	0. 0000	0. 0000	0. 0000	0. 0000	0. 0000	0. 0000	-----	-----
-----	0. 0000	0. 0000							
-----	GASPM:	0. 0036	0. 0034	0. 0034	0. 0034	0. 0034	0. 0075	-----	-----
-----	0. 0142	0. 0034							
0. 0075	ECARBON:	-----	-----	-----	-----	-----	-----	0. 0065	0. 0034
-----	0. 0007								
0. 0038	OCARBON:	-----	-----	-----	-----	-----	-----	0. 0018	0. 0049
-----	0. 0003								
0. 0009	S04:	0. 0003	0. 0005	0. 0005	0. 0005	0. 0005	0. 0019	0. 0002	0. 0003
0. 0001	0. 0001	0. 0005							
Total Exhaust PM:	0. 0039	0. 0039	0. 0039	0. 0039	0. 0039	0. 0039	0. 0094	0. 0085	0. 0086
0. 0123	0. 0143	0. 0049							
0. 0053	Brake:	0. 0053	0. 0053	0. 0053	0. 0053	0. 0053	0. 0053	0. 0053	0. 0053
0. 0053	0. 0053	0. 0053							
0. 0065	Ti re:	0. 0020	0. 0020	0. 0020	0. 0020	0. 0020	0. 0022	0. 0020	0. 0020
0. 0010	0. 0010	0. 0024							
Total PM:	0. 0112	0. 0112	0. 0112	0. 0112	0. 0112	0. 0112	0. 0169	0. 0159	0. 0159
0. 0241	0. 0206	0. 0126							

SP0Kjan 2032 Cri teria. PM

 * MOBILE6. 2. 03 (24-Sep-2003) *
 * Input file: N:\PROJECTS\MOBILE6. 2\2032\SP0K2513.IN (file 1, run 1). *

* #####
 * Spokane Case no

* File 1, Run 1, Scenario 1.
 * #####

* Reading PM Gas Carbon ZML Levels
 * from the external data file PMGZML.CSV

* Reading PM Gas Carbon DR1 Levels
 * from the external data file PMGDR1.CSV

* Reading PM Gas Carbon DR2 Levels
 * from the external data file PMGDR2.CSV

* Reading PM Diesel Zero Mile Levels
 * from the external data file PMDZML.CSV

* Reading the First PM Deterioration Rates
 * from the external data file PMDDR1.CSV

* Reading the Second PM Deterioration Rates
 * from the external data file PMDDR2.CSV
 M 48 Warning:
 there are no sales for vehicle class HDGV8b
 M 48 Warning:
 there are no sales for vehicle class LDDT12

* Reading Ammonia (NH3) Basic Emission Rates
 * from the external data file PMNH3BER.D

* Reading Ammonia (NH3) Sulfur Deterioration Rates
 * from the external data file PMNH3SDR.D

Calendar Year: 2032
 Month: Jan.
 Altitude: High
 Minimum Temperature: 25.0 (F)
 Maximum Temperature: 35.0 (F)
 Absolute Humidity: 75. grains/lb
 Nominal Fuel RVP: 7.0 psi
 Weathered RVP: 7.0 psi
 Fuel Sulfur Content: 30. ppm

Exhaust I/M Program: No
 Evap I/M Program: No
 ATP Program: No
 Reformulated Gas: No

HDDV	Vehicle Type: MC	Type: All Veh GVWR:	LDGV	LDGT12	LDGT34	LDGT (All)	HDGV	LDDV	LDDT
-----	-----	-----	-----	<6000	>6000	-----	-----	-----	-----
0.0872	0.0050	1.0000	0.2790	0.4400	0.1500		0.0363	0.0003	0.0022
7.2	50.0	16.1	24.1	18.5	14.2	17.2	9.8	32.4	17.0

Composi te Emi ssi on Factors (g/mi):

0.486	Composi te VOC :	0.327	0.403	0.594	0.452	0.357	0.047	0.109
0.529	Composi te CO :	14.32	13.42	16.09	14.10	28.87	0.592	0.349
0.559	Composi te NOX :	0.250	0.358	0.569	0.411	0.158	0.028	0.123

			SP0Kjan 2032 Cri teria. PM					
Composi te CO2 :	368.0		479.4	624.6	516.4	907.4	314.1	598.7
1411.1	177.4	565.61						

 * MOBILE6. 2. 03 (24-Sep-2003) *
 * Input file: N:\PROJECTS\MOBILE6. 2\2032\SP0KPM13. IN (file 1, run 1). *

* #####
 * Spokane Case no

* File 1, Run 1, Scenario 1.
 * #####

Calendar Year: 2032
 Month: Jan.
 Gasoline Fuel Sulfur Content: 30. ppm
 Diesel Fuel Sulfur Content: 15. ppm
 Particle Size Cutoff: 10.00 Microns
 Reformulated Gas: No

HDDV	Vehicle Type: MC All Veh	LDGV	LDGT12 <6000	LDGT34 >6000	LDGT (All)	HDGV	LDDV	LDDT
0.0872	0.0050 1.0000	0.2790	0.4400	0.1500		0.0363	0.0003	0.0022

Composite Emission Factors (g/mi):

0.0000	Lead:	0.0000	0.0000	0.0000	0.0000	0.0000	-----	-----
0.0205	GASPM:	0.0039	0.0037	0.0037	0.0037	0.0082	-----	-----
0.0082	ECARBON:	0.0007	-----	-----	-----	-----	0.0071	0.0037
0.0042	OCARBON:	0.0004	-----	-----	-----	-----	0.0020	0.0053
0.0009	S04:	0.0003	0.0005	0.0005	0.0005	0.0019	0.0002	0.0003
0.0133	Total Exhaust PM:	0.0042	0.0042	0.0042	0.0042	0.0101	0.0093	0.0093
0.0125	Brake:	0.0125	0.0125	0.0125	0.0125	0.0125	0.0125	0.0125
0.0259	Tire:	0.0080	0.0080	0.0080	0.0080	0.0086	0.0080	0.0080
0.0517	Total PM:	0.0247	0.0247	0.0247	0.0247	0.0313	0.0298	0.0299

 * MOBILE6. 2. 03 (24-Sep-2003) *
 * Input file: N:\PROJECTS\MOBILE6. 2\2032\SP0K2513. IN (file 1, run 1). *

* #####
 * Spokane Case no

* File 1, Run 1, Scenario 1.
 * #####

Calendar Year: 2032
 Month: Jan.
 Gasoline Fuel Sulfur Content: 30. ppm
 Diesel Fuel Sulfur Content: 15. ppm
 Particle Size Cutoff: 2.50 Microns
 Reformulated Gas: No

HDDV	Vehicle Type: MC	AI I Veh GVWR:	LDGV	LDGT12 <6000	LDGT34 >6000	LDGT (AI I)	HDGV	LDDV	LDDT
0.0872	0.0050	1.0000	0.2790	0.4400	0.1500		0.0363	0.0003	0.0022

Composi te Emi ssi on Factors (g/mi):

0.0000	Lead:	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	-----	-----
0.0142	GASPM:	0.0036	0.0034	0.0034	0.0034	0.0034	0.0075	-----	-----
0.0075	ECARBON:	0.0034	-----	-----	-----	-----	-----	0.0065	0.0034
0.0038	OCARBON:	0.0007	-----	-----	-----	-----	-----	0.0018	0.0049
0.0009	S04:	0.0003	0.0005	0.0005	0.0005	0.0005	0.0019	0.0002	0.0003
0.0123	Total Exhaust PM:	0.0001	0.0005	0.0039	0.0039	0.0039	0.0094	0.0085	0.0086
0.0053	0.0143 Brake:	0.0049	0.0053	0.0053	0.0053	0.0053	0.0053	0.0053	0.0053
0.0065	0.0053 Tire:	0.0053	0.0020	0.0020	0.0020	0.0020	0.0022	0.0020	0.0020
0.0241	0.0010 Total PM:	0.0024	0.0112	0.0112	0.0112	0.0112	0.0169	0.0159	0.0159
	0.0206	0.0126							
