

A01 - ASPHALT PLANT, BATCH MIX, NATURAL GAS FIRED, BAGHOUSE

CALCULATION METHODS $E_a = U_a \times E_f$ $E_h = U_h \times E_f$ **NOTES:**

- NOx and CO emissions are based on fuel usage (million ft³/hr or yr). Emission factors are lbs/million ft³ gas burned.
- NOx and CO factors are from the D. Smith memo (6/26/97) or site specific source test results, or AP-42 Section 11.1 (1/95).
- TOG, ROG, SOx, TSP, PM10, and trace toxic emissions are based on production (tons asphalt/hr or yr). Emission factors are lbs/ton asphalt.
- TOG, ROG, SOx, TSP, PM10, and trace toxic emissions factors are from site specific source test results or AP-42 Section 11.2 (1/95).
- TSP and PM10 uncontrolled drop zone emissions are assumed to be 0.018 lbs/ton of production as specified in the M. Lake memo (3/20/96).
- Drop zone emissions are unspecified at this time. The factors listed below are for the control system exhaust only and do not include fugitive drop zone emissions.

POLLUTANT	District Emission Factor	EPA REFERENCE	EPA	(UNITS)	COMMENTS
	(lbs/mmft ³ or lbs/ton production)	DOCUMENT	FACTOR		
NOX	150.00	AP-42 factor in lbs/ton not used as default.	0.0250	lbs/ton	Emission factor in (lbs/million ft ³) per D Smith memo (6/26/97).
CO	500.00	AP-42 factor in lbs/ton not used as default.	0.3400	lbs/ton	Emission factor in (lbs/million ft ³) per D Smith memo (6/26/97).
SOX	0.0050	AP-42, Sect. 11.1 (1/95), Table 11.1-7	0.0050	lbs/ton	Sulfur sources may include the fuel, aggregate, and asphalt oil/slurry.
TOG	0.0290	AP-42, Sect. 11.1, Tables 11.1-7 & 9	0.0290	lbs/ton	TOG value = ROG value + methane in Table 11.1-9.
ROG	0.0170	AP-42, Sect. 11.1 (1/95), Table 11.1-7	0.0170	lbs/ton	Sum of organics in Table 11.9 slightly exceeds ROG value.
TSP	0.0440	AP-42, Sect. 11.1 (1/95), Table 11.1-2	0.0440	lbs/ton	Use site specific TSP test information if available.
PM10	0.0200	AP-42, Sect. 11.1 (1/95), Table 11.1-2	0.0200	lbs/ton	Use site specific PM10 test data if available. PM10 should not exceed TSP.
ACETALDEHYDE	6.40E-04	AP-42, Sect. 11.1, Tables 11.1-9 & 12	6.40E-04	lbs/ton	
ACETONE	6.40E-03	AP-42, Sect. 11.1, Tables 11.1-9 & 12	6.40E-03	lbs/ton	
ACROLEIN					
ARSENIC	6.60E-07	AP-42, Sect. 11.1, Tables 11.1-9 & 12	6.60E-07	lbs/ton	
BARIUM	1.50E-06	AP-42, Sect. 11.1, Tables 11.1-9 & 12	1.50E-06	lbs/ton	
BENZENE	3.50E-04	AP-42, Sect. 11.1, Tables 11.1-9 & 12	3.50E-04	lbs/ton	
BERYLLIUM	2.20E-07	AP-42, Sect. 11.1, Tables 11.1-9 & 12	2.20E-07	lbs/ton	
CADMIUM	8.40E-07	AP-42, Sect. 11.1, Tables 11.1-9 & 12	8.40E-07	lbs/ton	
CHLORINE					
CHROMIUM HEXAVALENT	9.70E-09	AP-42, Sect. 11.1, Tables 11.1-9 & 12	9.70E-09	lbs/ton	
CHROMIUM NONHEXAVALENT	8.80E-07	AP-42, Sect. 11.1, Tables 11.1-9 & 12	8.80E-07	lbs/ton	
CROTONALDEHYDE	2.90E-05	AP-42, Sect. 11.1, Tables 11.1-9 & 12	2.90E-05	lbs/ton	
COPPER	3.70E-06	AP-42, Sect. 11.1, Tables 11.1-9 & 12	3.70E-06	lbs/ton	
ETHYL BENZENE	3.30E-03	AP-42, Sect. 11.1, Tables 11.1-9 & 12	3.30E-03	lbs/ton	
FORMALDEHYDE	8.60E-04	AP-42, Sect. 11.1, Tables 11.1-9 & 12	8.60E-04	lbs/ton	
LEAD	7.40E-07	AP-42, Sect. 11.1, Tables 11.1-9 & 12	7.40E-07	lbs/ton	
MANGANESE	9.90E-06	AP-42, Sect. 11.1, Tables 11.1-9 & 12	9.90E-06	lbs/ton	
MERCURY	4.50E-07	AP-42, Sect. 11.1, Tables 11.1-9 & 12	4.50E-07	lbs/ton	
NAPHTHALENE	4.20E-05	AP-42, Sect. 11.1, Tables 11.1-9 & 12	4.20E-05	lbs/ton	

NICKEL	4.20E-06	AP-42, Sect. 11.1, Tables 11.1-9 & 12	4.20E-06	lbs/ton	
PAH'S (UNSPECIFIED)	8.50E-05	AP-42, Sect. 11.1, Tables 11.1-9 & 12	8.50E-05	lbs/ton	
- BENZO(A)ANTHRACENE	4.50E-09	AP-42, Sect. 11.1, Tables 11.1-9 & 12	4.50E-09	lbs/ton	
- BENZO(B) FLUORANTHENE	4.50E-09	AP-42, Sect. 11.1, Tables 11.1-9 & 12	4.50E-09	lbs/ton	
- BENZO(K) FLUORANTHENE	2.40E-08	AP-42, Sect. 11.1, Tables 11.1-9 & 12	2.40E-08	lbs/ton	
- INDENO(1,2,3-CD) PYRENE					
PROPIONALDEHYDE					
QUINONE	2.70E-04	AP-42, Sect. 11.1, Tables 11.1-9 & 12	2.70E-04	lbs/ton	
SELENIUM	9.20E-08	AP-42, Sect. 11.1, Tables 11.1-9 & 12	9.20E-08	lbs/ton	
TOLUENE	1.80E-03	AP-42, Sect. 11.1, Tables 11.1-9 & 12	1.80E-03	lbs/ton	
XYLENES	4.30E-03	AP-42, Sect. 11.1, Tables 11.1-9 & 12	4.30E-03	lbs/ton	
ZINC	6.80E-06	AP-42, Sect. 11.1, Tables 11.1-9 & 12	6.80E-06	lbs/ton	

*Last Updated on 8/23/99
By D. Byrnes*