FACILITY PERMIT REVIEW SHEET

DATE: 4/20/2012 **APPLICATION NUMBER:** 7775108-007-AO

FACILITY NAME: Duval Asphalt Products, Inc.

FACILITY DESCRIPTION: Drum Mix Hot Mix Asphalt Plant

PERMIT PROCESSOR: C. Blane Johnson

MAJOR FOR CRITERIA POLLUTANTS AND/OR HAPs (Circle)

CO **PB** **NO_x** **PM** **SO_2** **VOC** **HAP**

SUBJECT TO: (Circle)

NSR(PSD) **PERMIT NUMBER:**

NSR(NAA) **PERMIT NUMBER:**

BACT **EU NUMBER:**

MACT **EU NUMBER:**

RACT **EU NUMBER:** 001

NSPS **EU NUMBER:** 001

PROJECT EMISSION SUMMARY

	POTENTIAL EMISSIONS	ALLOWABLE EMISSIONS	
	TPY	LBS/HR	TPY
PM	9.9	13.7	20.6
PM10			
SO2	3.30		
NOX	16.5		
CO	39		
VOC	9.6		
TOC			
PB			
TOTAL HAP	2.7		
SINGLE HAP (highest)	0.93		

COMMENTS:

Effective 2/27/97

EMISSIONS CALCULATIONS

APPLICATION NUMBER: 7775108-007-AO **EU NUMBER:** 001 (Natural Gas)

REFERENCES: AP-42, Section 11.1; 7775108-007-AO permit modification request

POLLUTANT: Nitrogen Oxides (NO_x)

ALLOWABLE EMISSIONS

LBS/HR	TPY	% OPACITY	CONCENTRATION	OTHER

POTENTIAL EMISSION CALCULATIONS

process rate (tons/hr) x emission factor (lb/ton) = PTE

400 0.026 = 10.4 lb/hr

process rate (tons/yr) x emission factor (lb/ton) = PTE

600,000 0.026 = 15,600 lb/yr
= 7.8 tons/yr

RULE APPLICABILITY:

FEDERAL	STATE	LOCAL

COMMENTS:

POLLUTANT: Carbon Monoxide (CO)

ALLOWABLE EMISSIONS

LBS/HR	TPY	% OPACITY	CONCENTRATION	OTHER

POTENTIAL EMISSION CALCULATIONS

process rate (tons/hr) x emission factor (lb/ton) = PTE

400 0.13 = 52.0 lb/hr

process rate (tons/yr) x emission factor (lb/ton) = PTE

600,000 0.13 = 78,000 lb/yr
= 39.0 tons/yr

RULE APPLICABILITY:

FEDERAL	STATE	LOCAL

COMMENTS:

POLLUTANT: Particulate Matter (PM)

ALLOWABLE EMISSIONS

process rate (dscf/min) x allowed emission rate (gr/dscf) / (gr/lb) x (min/hr) = PTE

39,892	0.04	7,000	60	=	13.7	lb/hr

allowable operating time (hr/yr) x emission rate (lb/hr) = PTE

3,000	13.7	=	41,100	lb/yr
		=	20.6	tons/yr

LBS/HR	TPY	% OPACITY	CONCENTRATION	OTHER
13.7	20.6	<20	0.04 gr/dscf	

POTENTIAL EMISSION CALCULATIONS

process rate (tons/hr) x emission factor (lb/ton) = PTE

400	0.033	=	13.2	lb/hr

process rate (tons/yr) x emission factor (lb/ton) = PTE

600,000	0.033	=	19,800	lb/yr
		=	9.9	tons/yr

RULE APPLICABILITY:	FEDERAL	STATE	LOCAL
	40CFR60.92	62-296.704	2.1101

COMMENTS:

POLLUTANT: Sulfur Dioxide (SO_2)

ALLOWABLE EMISSIONS

LBS/HR	TPY	% OPACITY	CONCENTRATION	OTHER

POTENTIAL EMISSION CALCULATIONS

process rate (tons/hr) x emission factor (lb/ton) = PTE

400	0.0034	=	1.4	lb/hr

process rate (tons/yr) x emission factor (lb/ton) = PTE

600,000	0.0034	=	2,040	lb/yr
		=	1.0	tons/yr

RULE APPLICABILITY:	FEDERAL	STATE	LOCAL

COMMENTS:

POLLUTANT: Hazardous Air Pollutants (HAPs)

ALLOWABLE EMISSIONS

LBS/HR	TPY	% OPACITY	CONCENTRATION	OTHER

POTENTIAL EMISSION CALCULATIONS

process rate (tons/hr) x emission factor (lb/ton) = PTE

400	5.38E-03	=	2.2	lb/hr

process rate (tons/yr) x emission factor (lb/ton) = PTE

600,000	5.38E-03	=	3,228	lb/yr
		=	1.6	tons/yr

RULE APPLICABILITY: **FEDERAL** **STATE** **LOCAL**

COMMENTS: Highest HAP, Formaldehyde (3.1E-3 lb/ton) = 1,860 lb/yr.

POLLUTANT: Volatile Organic Compounds (VOCs)

ALLOWABLE EMISSIONS

LBS/HR	TPY	% OPACITY	CONCENTRATION	OTHER

POTENTIAL EMISSION CALCULATIONS

process rate (tons/hr) x emission factor (lb/ton) = PTE

400	0.032	=	12.8	lb/hr

process rate (tons/yr) x emission factor (lb/ton) = PTE

600,000	0.032	=	19,200	lb/yr
		=	9.6	tons/yr

RULE APPLICABILITY: **FEDERAL** **STATE** **LOCAL**

COMMENTS:

PERMIT PROCESSOR: **DATE:**

Effective 2/27/97

EMISSIONS CALCULATIONS

APPLICATION NUMBER: 7775108-007-AO **EU NUMBER:** 001 (Fuel Oil)

REFERENCES: AP-42, Section 11.1; 7775108-007-AO permit modification request

POLLUTANT: Nitrogen Oxides (NO_x)

ALLOWABLE EMISSIONS

LBS/HR	TPY	% OPACITY	CONCENTRATION	OTHER

POTENTIAL EMISSION CALCULATIONS

process rate (tons/hr) x emission factor (lb/ton) = PTE

400 0.055 = 22.0 lb/hr

process rate (tons/yr) x emission factor (lb/ton) = PTE

600,000 0.055 = 33000 lb/yr
= 16.5 tons/yr

RULE APPLICABILITY: **FEDERAL** **STATE** **LOCAL**

COMMENTS:

POLLUTANT: Carbon Monoxide (CO)

ALLOWABLE EMISSIONS

LBS/HR	TPY	% OPACITY	CONCENTRATION	OTHER

POTENTIAL EMISSION CALCULATIONS

process rate (tons/hr) x emission factor (lb/ton) = PTE

400 0.13 = 52.0 lb/hr

process rate (tons/yr) x emission factor (lb/ton) = PTE

600,000 0.13 = 78,000 lb/yr
= 39.0 tons/yr

RULE APPLICABILITY: **FEDERAL** **STATE** **LOCAL**

COMMENTS:

POLLUTANT: Particulate Matter (PM)

ALLOWABLE EMISSIONS

process rate (dscf/min) x allowed emission rate (gr/dscf) / (gr/lb) x (min/hr) = PTE

39,892	0.04	7,000	60	=	13.7	lb/hr

allowable operating time (hr/yr) x emission rate (lb/hr) = PTE

3,000	13.7	=	41,100	lb/yr
		=	20.6	tons/yr

LBS/HR	TPY	% OPACITY	CONCENTRATION	OTHER
13.7	20.6	<20	0.04 gr/dscf	

POTENTIAL EMISSION CALCULATIONS

process rate (tons/hr) x emission factor (lb/ton) = PTE

400	0.033	=	13.2	lb/hr

process rate (tons/yr) x emission factor (lb/ton) = PTE

600,000	0.033	=	19,800	lb/yr
		=	9.9	tons/yr

RULE APPLICABILITY:	FEDERAL	STATE	LOCAL
	40CFR60.92	62-296.704	2.1101

COMMENTS:

POLLUTANT: Sulfur Dioxide (SO_2)

ALLOWABLE EMISSIONS

LBS/HR	TPY	% OPACITY	CONCENTRATION	OTHER

POTENTIAL EMISSION CALCULATIONS

process rate (tons/hr) x emission factor (lb/ton) = PTE

400	0.011	=	4.4	lb/hr

process rate (tons/yr) x emission factor (lb/ton) = PTE

600,000	0.011	=	6,600	lb/yr
		=	3.3	tons/yr

RULE APPLICABILITY:	FEDERAL	STATE	LOCAL

COMMENTS:

POLLUTANT: Hazardous Air Pollutants (HAPs)

ALLOWABLE EMISSIONS

LBS/HR	TPY	% OPACITY	CONCENTRATION	OTHER

POTENTIAL EMISSION CALCULATIONS

process rate (tons/hr) x emission factor (lb/ton) = PTE

400 8.85E-03 = 3.5 lb/hr

process rate (tons/yr) x emission factor (lb/ton) = PTE

600,000 8.85E-03 = 5,310 lb/yr
= 2.7 tons/yr

RULE APPLICABILITY: **FEDERAL** **STATE** **LOCAL**

COMMENTS: Highest HAP, Formaldehyde (3.1E-3 lb/ton) = 1,860 lb/yr.

POLLUTANT: Volatile Organic Compounds (VOCs)

ALLOWABLE EMISSIONS

LBS/HR	TPY	% OPACITY	CONCENTRATION	OTHER

POTENTIAL EMISSION CALCULATIONS

process rate (tons/hr) x emission factor (lb/ton) = PTE

400 0.032 = 12.8 lb/hr

process rate (tons/yr) x emission factor (lb/ton) = PTE

600,000 0.032 = 19,200 lb/yr
= 9.6 tons/yr

RULE APPLICABILITY: **FEDERAL** **STATE** **LOCAL**

COMMENTS:

PERMIT PROCESSOR: **DATE:**

Effective 2/27/97