

# **Statement of Basis**

**Permit to Construct No. P-2008.0072  
Project ID 61616**

**Jack B. Parson Companies  
Portable, Idaho**

**Facility ID 777-00140**

**Final**

**February 10, 2016**  
**Shawnee Chen, P.E.**   
**Senior Air Quality Engineer**

The purpose of this Statement of Basis is to satisfy the requirements of IDAPA 58.01.01. et seq, Rules for the Control of Air Pollution in Idaho, for issuing air permits.

## Table of Contents

<b>ACRONYMS, UNITS, AND CHEMICAL NOMENCLATURE.....</b>	<b>3</b>
<b>FACILITY INFORMATION.....</b>	<b>4</b>
DESCRIPTION .....	4
PERMITTING HISTORY .....	4
APPLICATION SCOPE.....	4
APPLICATION CHRONOLOGY.....	4
<b>TECHNICAL ANALYSIS.....</b>	<b>4</b>
EMISSIONS UNITS AND CONTROL EQUIPMENT.....	4
EMISSIONS INVENTORY .....	4
AMBIENT AIR QUALITY IMPACT ANALYSIS.....	4
<b>REGULATORY REVIEW.....</b>	<b>5</b>
ATTAINMENT DESIGNATION (40 CFR 81.313).....	5
FACILITY CLASSIFICATION .....	5
PERMIT TO CONSTRUCT (IDAPA 58.01.01.201) .....	5
TITLE V CLASSIFICATION (IDAPA 58.01.01.300, 40 CFR PART 70).....	5
PSD CLASSIFICATION (40 CFR 52.21).....	5
NSPS APPLICABILITY (40 CFR 60).....	5
NESHAP APPLICABILITY (40 CFR 61).....	5
MACT APPLICABILITY (40 CFR 63).....	5
STANDARDS FOR THE MANAGEMENT OF USED OIL (40 CFR 279).....	6
PERMIT CONDITIONS REVIEW .....	6
<b>PROCESSING FEE .....</b>	<b>7</b>
<b>PUBLIC COMMENT .....</b>	<b>8</b>

## ACRONYMS, UNITS, AND CHEMICAL NOMENCLATURE

acfm	actual cubic feet per minute
AFS	AIRS Facility Subsystem
AIRS	Aerometric Information Retrieval System
AQCR	Air Quality Control Region
ASTM	American Society for Testing and Materials
BACT	Best Available Control Technology
Btu	British thermal unit
CAA	Clean Air Act
CFR	Code of Federal Regulations
CO	carbon monoxide
DEQ	Department of Environmental Quality
gr	grain (1 lb = 7,000 grains)
dscf	dry standard cubic feet
EPA	U.S. Environmental Protection Agency
gpm	gallons per minute
HAP	Hazardous Air Pollutant
hp	horsepower
IDAPA	a numbering designation for all administrative rules in Idaho promulgated in accordance with the Idaho Administrative Procedures Act
lb/hr	pounds per hour
m	meter(s)
MACT	Maximum Achievable Control Technology
$\mu\text{g}/\text{m}^3$	micrograms per cubic meter
MMBtu	million British thermal units
NESHAP	National Emission Standards for Hazardous Air Pollutants
$\text{NO}_2$	nitrogen dioxide
$\text{NO}_x$	nitrogen oxides
NSPS	New Source Performance Standards
PC	permit condition
PM	particulate matter
$\text{PM}_{10}$	particulate matter with an aerodynamic diameter less than or equal to a nominal 10 micrometers
ppm	parts per million
PSD	Prevention of Significant Deterioration
PTC	permit to construct
PTE	potential to emit
Rules	Rules for the Control of Air Pollution in Idaho
scf	standard cubic feet
SIC	Standard Industrial Classification
SIP	State Implementation Plan
SM	Synthetic Minor
$\text{SO}_2$	sulfur dioxide
$\text{SO}_x$	sulfur oxides
TAP	Toxic Air Pollutant
T2	Tier II operating permit
T2/PTC	Tier II operating permit and permit to construct
T/yr	tons per year
UTM	Universal Transverse Mercator
VOC	volatile organic compound

## **FACILITY INFORMATION**

### ***Description***

This facility is a portable hot-mix asphalt plant.

### ***Permitting History***

The following information was derived from a review of the permit files available to DEQ. Permit status is noted as active and in effect (A) or superseded (S).

July 11, 2003	T2-030306, name and ownership change from Bannock Paving to Jack B. Parson Companies, Permit status (S)
June 27, 2005	P-040319, allowing the facility to remediate soil and aggregate materials that have been contaminated by on-specification used oil, Permit status (S)
November 10, 2008	P-2008.0072, converting the Tier II operating permit to a Permit to Construct (PTC), Permit status (A, but will become S upon issuance of this permit)

### ***Application Scope***

This Permit to Construct is for a minor modification at an existing minor facility. The applicant has requested to add natural gas and propane as allowable fuels for the drum dryer.

### ***Application Chronology***

October 22, 2015	DEQ received an application.
October 27, 2015	DEQ received an application fee.
November 24, 2015	DEQ determined application complete.
January 7, 2016	DEQ made available the draft permit and statement of basis for peer and regional office review.
January 22, 2016	DEQ made available the draft permit and statement of basis for applicant review.
February 4, 2016	DEQ received the permit processing fee.
February 10, 2016	DEQ issued the final permit and statement of basis.

## **TECHNICAL ANALYSIS**

### ***Emissions Units and Control Equipment***

No changes are made to the emissions units and control equipment.

### ***Emissions Inventory***

The applicant has requested to add natural gas and propane as allowable fuels for the drum dryer. The emissions from burning natural gas or propane are equal to or less than emissions from burning already permitted fuels; they are residual fuel (ASTM Grade 4, 5, or 6), distillate fuel (ASTM Grade 1 or 2), and used oil. No changes are made to the allowable emissions rates.

### ***Ambient Air Quality Impact Analysis***

Because the allowable emissions limits are kept the same, no ambient air quality impact analysis is required.

## **REGULATORY REVIEW**

### ***Attainment Designation (40 CFR 81.313)***

This is a portable source and is permitted to operate anywhere (nonattainment, attainment, or unclassifiable areas) within the state of Idaho.

### ***Facility Classification***

This permitting action does not change allowable emissions rates; therefore does not change the facility's classification. The facility classification is SM80 according to the 2008 permit.

### ***Permit to Construct (IDAPA 58.01.01.201)***

The permittee has requested that a PTC be issued to the facility for burning the new allowable fuels in the drum dryer. Therefore, a permit to construct is required to be issued in accordance with IDAPA 58.01.01.220. This permitting action was processed in accordance with the procedures of IDAPA 58.01.01.200-228.

### ***Title V Classification (IDAPA 58.01.01.300, 40 CFR Part 70)***

IDAPA 58.01.01.301 ..... Requirement to Obtain Tier I Operating Permit

This permitting action does not change the allowable emissions and does not change facility's current classification as SM80. Therefore, the facility is not a Tier I source in accordance with IDAPA 58.01.01.006 and the requirements of IDAPA 58.01.01.301 do not apply.

### ***PSD Classification (40 CFR 52.21)***

40 CFR 52.21 ..... Prevention of Significant Deterioration Of Air Quality

The facility is not a major stationary source as defined in 40 CFR 52.21(b)(1), nor is it undergoing any physical change at a stationary source, not otherwise qualifying under paragraph 40 CFR 52.21(b)(1) as a major stationary source, that would constitute a major stationary source by itself as defined in 40 CFR 52.21(b). Therefore, in accordance with 40 CFR 52.21(a)(2), the PSD requirements do not apply.

### ***NSPS Applicability (40 CFR 60)***

40 CFR 60, Subpart I ..... Standards of Performance for Hot Mix Asphalt Facilities

40 CFR 60.90(a) and (b) apply to this facility because it is a hot mix asphalt plant and was issued a PTC modification on February 28, 1997. The definitions in 40 CFR 60.91 apply to this facility. The requirements of 40 CFR 60.92 apply to the facility. The test methods and procedural requirements of 40 CFR 60.93 apply. The testing requirement in 40 CFR 60.93(b)(1) was satisfied on June 10-12, 1997.

### ***NESHAP Applicability (40 CFR 61)***

No NESHAP applies to this facility.

### ***MACT Applicability (40 CFR 63)***

40 CFR 63, Subpart ZZZZ—National Emissions Standards For Hazardous Air Pollutants For Stationary Reciprocating Internal Combustion Engines

The generator engine of this portable source is a nonroad engine when it meets the nonroad engine definition in 40 CFR 1068.30. Otherwise, it will be subject to requirements in 40 CFR 63 Subpart ZZZZ.

In accordance with 40 CFR 1068.30, nonroad engine means:

(1) Except as discussed in paragraph (2) of this definition, a nonroad engine is an internal combustion engine that meets any of the following criteria:

(i) It is (or will be) used in or on a piece of equipment that is self-propelled or serves a dual purpose by both propelling itself and performing another function (such as garden tractors, off-highway mobile cranes and bulldozers).

(ii) It is (or will be) used in or on a piece of equipment that is intended to be propelled while performing its function (such as lawnmowers and string trimmers).

(iii) By itself or in or on a piece of equipment, it is portable or transportable, meaning designed to be and capable of being carried or moved from one location to another. Indicia of transportability include, but are not limited to, wheels, skids, carrying handles, dolly, trailer, or platform.

(2) An internal combustion engine is not a nonroad engine if it meets any of the following criteria:

(i) The engine is used to propel a motor vehicle, an aircraft, or equipment used solely for competition.

(ii) The engine is regulated under 40 CFR part 60, (or otherwise regulated by a federal New Source Performance Standard promulgated under section 111 of the Clean Air Act (42 U.S.C. 7411)).

(iii) The engine otherwise included in paragraph (1)(iii) of this definition remains or will remain at a location for more than 12 consecutive months or a shorter period of time for an engine located at a seasonal source. A location is any single site at a building, structure, facility, or installation. Any engine (or engines) that replaces an engine at a location and that is intended to perform the same or similar function as the engine replaced will be included in calculating the consecutive time period. An engine located at a seasonal source is an engine that remains at a seasonal source during the full annual operating period of the seasonal source. A seasonal source is a stationary source that remains in a single location on a permanent basis (i.e., at least two years) and that operates at that single location approximately three months (or more) each year. See 40 CFR 1068.31 for provisions that apply if the engine is removed from the location.

### ***Standards for the Management of Used Oil (40 CFR 279)***

The definition of used oil in 40 CFR 279.10(a) generally applies to the facility. 40 CFR 279.11 applies to this facility because it uses used oil for energy recovery.

### ***Permit Conditions Review***

This section describes only those permit conditions (PC) that have been added, revised, modified or deleted as a result of this permitting action.

Permit Condition 1.1 states the purpose of this permitting action.

Permit Condition 1.3 states that this revised PTC replaces Permit to Construct No. P-2008.0072, issued on November 10, 2008.

Permit Condition 2.7

The link to the Portable Equipment Registration and Relocation Form is updated.

Permit Conditions 3.3 and 3.4

“(NSPS limit)” is added to PC 3.4 right after 0.04 gr/dscf limit to clarify that the emissions limit is taken from 40 CFR 60 Subpart I or 40 CFR 60.92.

“- NSPS” is added to the title of Permit Condition 3.4 to clarify that the emissions limit is taken from 40 CFR 60 Subpart I or 40 CFR 60.92.

Permit Condition 3.5

The dryer is rated at 450 T/yr. However, the facility conducted the source test at the production rate of 245.6 T/hr in November 2015. As recommended by DEQ source test review group and according to IDAPA 58.01.01.157.02.b, Permit Condition 3.5 has imposed a daily production limit of 7,080 T/day. The production

limit is calculated as: (245.6 T/hr, average production rate during the test) x 120% (buffer) x 24 hr/day = 7,080 T/day.

#### Permit Condition 3.7

Permit Condition 3.7 is revised to add natural gas and propane as allowable fuels for the drum dryer.

#### Permit Condition 3.9

“Within 60 days of the issuance of this permit” in the existing permit is changed to “By January 10, 2009” because the existing permit was issued on November 10, 2008.

#### Permit Condition 3.13

The facility is permitted to operate at attainment and non-attainment areas. Apparently, Permit Condition 3.13 regarding Sandpoint PM<sub>10</sub> nonattainment area was unintentional left in the permit. The requirements in PC 3.13 is now deleted and marked as “Reserved”.

#### Permit Conditions 3.14 and 3.15

The two PCs duplicate each other and have been consolidated to one permit condition as a revised PC 3.14.

Permit Condition 3.14 is updated with the following changes:

- “Within 180 days after permit issuance” is changed to “By November 11, 2020” because the permit requires the facility to test at least every five years and because the facility tested the dryer in November 2015.
- “and in accordance with 40 CFR 60.90, if the initial source test for an affected facility has not been conducted in accordance with that regulation” is removed. The initial test was conducted.
- “the hourly asphalt production rate expressed as tons per hour, once every 15 minutes” taken from old PC 3.15 replaces “the hourly asphalt production rate expressed as pounds per hour” in PC 3.14
- Natural gas and propane are added for burner fuel type.
- “PM<sub>10</sub> emissions limit in Permit Condition 3.3” is added for clarification purpose.
- “The recycled asphalt pavement usage in tons per hour, once every 15 minutes” from old PC 3.15 is moved to PC 3.14.

Permit Condition 3.15 is marked as “Reserved”.

#### Permit Condition 3.17

Permit Condition 3.17 duplicates PC 3.16 and is replaced with “Reserved”.

#### Permit Condition 3.20

The HMA is currently at the location belong to Pocatello Regional Office. The performance test report is now required to be submitted to Pocatello Regional Office instead of Boise Regional Office. The mailing address is updated.

Section 7 of the permit is new. It states that the generator engine would become applicable to 40 CFR 63 Subpart ZZZZ should the engine not qualify as a nonroad engine as defined in 40 CFR 1068.30.

General Provisions are replaced with the ones taken from the current PTC template.

## **PROCESSING FEE**

This permitting action does not require engineering analysis. Therefore, the processing fee is \$250 in accordance with IDAPA 58.01.01.225.

## **PUBLIC COMMENT**

Because this permitting action does not authorize an increase in emissions, an opportunity for public comment period is not required in accordance with IDAPA 58.01.01.209.04.