

SFPP, L.P.
Tucson Terminal
Air Quality Permit # 1674

TECHNICAL SUPPORT DOCUMENT
04/19/2007

I. General Comments:

A. Company Information

1. SFPP, L.P.
2. Source Address: 3841 E. Refinery Way, Tucson, AZ 85713.
Mailing Address: 1100 Town & Country Road, Orange, CA 92868.

B. Background

SFPP, L.P. consists of one bulk gasoline terminal with loading racks and other associated equipment (including emission control devices) that was formerly two independently owned and operated facilities. The facility also serves as a breakout station. In 2003 SFPP, L.P. (a Class I source) acquired the Shell terminal that previously held a Class II Permit (Permit #1692). As these two facilities are adjacent, under common owner/operator control, and are operations of the same SIC code, they must be considered one source under a single permit. Rather than apply for a new permit, SFPP, L.P. submitted a revision to their Class I application that incorporated the Shell terminal into the existing SFPP, L.P. operations. Adding these units, however, does not constitute a major modification and has not triggered a NSR/PSD review, i.e. there were no other changes other than taking ownership of the Shell facility. Therefore, no such review has been associated with this permit (See Appendix A for a more detailed discussion). In the past SFPP, L.P. has also done business as Kinder Morgan and Shell has also done business as Equilon. The table below summarizes permit actions processed in the last 5 years.

Table 1: Summary of permit actions for the last 5 years

Date Received (Most Recent First)	Permit Action
February 12, 2006	Update to February 2005 Title V significant revision/ renewal application to include CAM plan, insignificant activities, complete list of products that can be stored in each tank, revised combustion calculations.
November 20, 2006	Update to February 2005 Title V significant revision/ renewal application. Changes to reflect correct PTE from tanks and other equipment.
October 11, 2006	AOS submittal.
August 21, 2006	Facility changes to terminal and tank piping to facilitate delivery by tanks/ railcar and transfer of ethanol between tanks.
June 8, 2006	Permit amendment to change point of contact and addition of signatory.
June 8, 2006	Facility change to add a diesel lubricity additive storage tank.
March 16, 2006	Facility changes to Tucson terminal as part of ELX project.

August 25, 2005	Application for a minor revision to add a temporary portable TO during replacement of vapor bladder/ holder.
February , 2004	Minor permit revision modifying the primary seal and installing a new secondary seal on Tank T-7
April 6, 2003	Minor permit revision for modifications to tank T-23

C. Attainment Classification

SFPP, L.P. is located in a region that is designated attainment for all criteria pollutants.

II. Source Description

A. Process Description

SFPP, L.P. is a bulk terminal facility that receives products in 33 storage vessels (3 are currently out of service) via pipeline and tanker trucks. Petroleum products are distributed to tanker trucks through loading racks. The source also operates five “breakout” tanks which receive product from the pipeline and, after other tanks receive product from the pipeline, return that same product to the pipeline. Other products (such as fuel additives and ethanol) are received by tanker trucks and railcars.

B. Alternate Operating Scenario

SFPP, L.P. is planning an expansion of the terminal to accommodate an increase in inbound product flow rate from 4000 to 10,000 barrels per hour. To enable this SFPP, L.P. has requested an alternate operating scenario (AOS) to address the expansion. The AOS would comprise of the following equipment changes as part of the expansion:

- Installation of 16-inch distribution piping, including nozzles and fittings.
- Installation of three new 60,000 barrel breakout tanks.
- Installation of a new John Zink thermal oxidizer.
- Installation of a new surge system, including surge vessel, surge pump, meter, prover and other auxiliary equipment.
- Addition of a new 360 bhp diesel fired pump for the fire protection system.

B. Operating Capacity and Schedule

The source is designed to operate 24 hours a day, 365 days per year. A synthetic emission limit on throughput has been set at 1 billion gallons of combined products (measured at the loading racks – the breakout tanks are not considered in this limit) in order to keep SFPP, L.P. from becoming a major source of HAPs.

C. Applicability Categories

The following categories are addressed by the permit:

1. NSPS Storage Vessels (Storage Vessels Subject to 40 CFR 60 Subpart Ka);

2. NSPS Storage Vessels (Storage Vessels Subject to 40 CFR 60 Subpart Kb);
3. Non-NSPS Storage Vessels;
4. Loading Racks (Loading Racks subject to 40 CFR 60 Subpart XX);
5. Facility-Wide Operations; and
6. Alternate Operating Scenario

D. Air Pollution Control Equipment

There are two Air Pollution Control Devices (APCDs) in use at the source: a thermal oxidizer and a carbon adsorption unit. The thermal oxidizer processes vapors captured from loading racks LR-1, LR-2, and LR-3W and from the breakout tanks T-6, T-7, T-8, T-14, and T-25. The carbon adsorption unit processes vapors captured from loading rack LR-4 (LR-4 and the carbon adsorption unit were formerly part of the Shell facility).

III. Regulatory History

A. Testing & Inspections

1. Testing

SFPP, L.P. has performed unofficial testing of various equipments on site. (i.e. testing not required by PDEQ, federal regulations or the air quality operating permit).

2. Inspections by Pima County Department of Environmental Quality, (PDEQ) have taken place regularly at the facility with the last inspection conducted 11/29/2006 – 12/01/2006. The facility is currently in compliance pending the results of the recently completed inspection. The last major compliance issue at the site was during a 2004 inspection when SFPP, L.P. received a Notice of Violation (NOV) for:
 - a. Failure to submit a revision to their Title V air quality permit. This NOV was addressed by SFPP, L.P. submitting a revision to their permit in February of 2005, updated July 2005.
 - b. Failure to submit a Transfer of Ownership 30 days before acquiring the nearby Shell Oil facility. This violation was addressed by submitting a revision to the existing facility as discussed above.

Inspections also took place in April 2001, July 2002 and May 2003. On each of these occasions, the facility was found to be in compliance with Pima county Code Title 17, 40 CFR Part 60, Subpart XX, Subparts Ka and Kb.

B. Excess Emissions

In a letter dated September 16, 2005, SFPP, L.P. reported excess emissions from the vapor holder tank on August 16, 2005 for a total of approximately 248 lbs of VOC. SFPP, L.P. did submit a minor permit revision which allowed them to temporarily use a thermal oxidizer while repairs/ replacements were being carried out to the vapor holder. These changes were completed in September of 2005.

IV. Emission Estimates

The following emission estimates were calculated by EPA Tanks 4.0 and have been supplied by the Permittee. These values are for reference purposes only and are not intended to be enforceable limits unless specifically indicated in the operating permit. These estimates include the emissions after completion of construction activities and operations due to the Alternate Operating Scenario.

Pollutant	Tons per Year
Nitrogen Oxides (NO _x)	22.51
Carbon Monoxide (CO)	53.67
Volatile Organic Compounds (VOC)	349.56
Particulate Matter (as PM ₁₀)	0.74
Sulfur Oxides (SO _x)	1.12
Lead	Negligible
Hazardous Air Pollutants (HAPs)	18.36
Greatest Component: Hexane	5.62

V. Applicable Requirements

A. Standards addressed by permit:

1. Code of Federal Regulations, Title 40, Chapter 60 (40 CFR 60):

- Subpart Ka Standards of Performance for Storage Vessels for Petroleum Liquids for Which Construction, Reconstruction, or Modification Commenced After May 18, 1978, and prior to July 23, 1984.
- Subpart Kb Standards of Performance for Volatile Organic Liquid Storage Vessels (Including Petroleum Liquid Storage Vessels) for Which Construction, Reconstruction, or Modification Commenced After July 23, 1984.
- Subpart XX Standards of Performance for Bulk Gasoline Terminals.
- Subpart IIII Standards of Performance for Stationary Compression Ignition Internal Combustion Engines

2. Code of Federal Regulations, Title 40, Chapter 64

Compliance Assurance Monitoring – This is a major source that employs control devices for pollutant specific emission units that have uncontrolled potential to emit of VOCs greater than 100 tons per year [40 CFR 64.2(a)(2) & (3)]. Therefore, this part is applicable to SFPP Tucson Terminal.

3. Pima County State Implementation Plan (SIP):

SIP 314 Petroleum Liquids.

4. Pima County Code (PCC) Title 17, Chapter 17.16:

17.16.020 Noncompliance with Applicable Standards.

- 17.16.030 Odor Limiting Standards.
- 17.16.230 Standards of Performance for Storage Vessels for Petroleum Liquids.
- 17.16.400 Organic Solvents and Other Organic Materials.
- 17.16.430 Standards of Performance for Unclassified Sources.
- 17.16.520 Standards of performance for storage vessels for petroleum liquids

B. Standards which are not applicable:

Code of Federal Regulations:

- 40 CFR 63 **Subpart R: NESHAPs for Gasoline Distribution Facilities** – This subpart does not apply to SFPP as it is not a major source of HAPs [40 CFR 63.420(a)(2)]

VI. Permit Contents

A. Applicability:

1. Storage Vessels Subject to 40 CFR 60 Subpart Ka;
2. Storage Vessels Subject to 40 CFR 60 Subpart Kb;
3. Non-NSPS Storage Vessels;
4. Loading Racks;
5. Facility-Wide Operations; and
6. Alternate Operating Scenario

B. Emission Limits/ Standards:

1. Storage Vessels Subject to 40 CFR 60 Subpart Ka

Citation	Applicable Units	Standard Title	Description	Discussion
II.A.1	Ka PLSVs	Internal Floating Roof Standard	Requirement to install an internal floating roof (IFR) meeting specific criteria on applicable units.	Standard taken directly from 40 CFR 60.112a(a)(2) – this specific option was selected by Permittee in November 2006 application update.

2. Storage Vessels Subject to 40 CFR 60 Subpart Kb

Citation	Applicable Units	Standard Title	Description	Discussion
II.B	Kb PLSVs	Internal Floating Roof Standard	Requirement to install an IFR meeting specific criteria on applicable units.	Standard taken directly from applicable parts of 40 CFR 60.112b(a)(1) – this specific option was selected by Permittee in February 2005 application.

3. Non-NSPS Storage Vessels

Citation	Applicable Units	Standard Title	Description	Discussion
II.C.1	All PLSVs	Vapor Loss Prevention Standards	Requirement to install and operate specific control measures on each PLSV.	Standards taken directly from PCC 17.16.230.A.1.a, c, d & A.2
II.C.2 & 3	All PLSVs	Hydrocarbon Emission Prevention Standards	Requirement to install and operate specific control measures on each PLSV.	Standard taken directly from SIP 314.A.2 & B.
II.C.4	All PLSVs	Submerged Fill Standard	Requirement to fill PLSVs by submerged fill or equivalent.	Standard taken directly from PCC 17.16.230.B & SIP 314.A.3.
II.C.5	All PLSVs	Mechanical Seal Standard	Requirement to install and operate mechanical seals or equivalent on all pumps and compressors.	Standard taken directly from PCC 17.16.230.D.
II.C.6	All Storage Vessels	Allowable Products Standard	Limitation on products to be stored on-site.	PCC 17.12.190.B requirement created to ensure appropriate review before introducing new products.

4. Loading Racks

Citation	Applicable Units	Standard Title	Description	Discussion
II.D.1.a	All Loading Racks	Combined Throughput Standard	Limitation on total throughput (1 billion gallons) of all products.	PCC 17.12.190.B limitation proposed by Permittee to avoid 40 CFR 63 Subpart R – NESHAPS for Gasoline Distribution Facilities (surrogate for HAPs).
II.D.2.a	XX Racks	Truck Vapor Collection Standard	Requirement to capture vapors displaced from tank trucks.	Requirement taken directly from 40 CFR 60.502(a).
II.D.2.b	XX Racks	Truck Loading Emission Standard	Limitation on tank truck loading emissions below 35 mg/L of TOC.	Requirement taken directly from 40 CFR 60.502(b).
II.D.2.c	XX Racks	Vapor System Standard	Requirement to prevent vapors from passing from one rack to another.	Requirement taken directly from 40 CFR 60.502(d).

Citation	Applicable Units	Standard Title	Description	Discussion
II.D.2.d	XX Racks	Vapor Tight Truck Standard	Requirement to exclusively fill vapor tight trucks.	Requirement taken directly from 40 CFR 60.502(e).
II.D.2.e	XX Racks	Truck Compatibility Standard	Requirement to exclusively fill tank trucks compatible with the facilities vapor collection system.	Requirement taken directly from 40 CFR 60.502(f).
II.D.2.f	XX Racks	Truck Hook-up Standard	Requirement to ensure proper hook-up of truck and facility vapor collection systems.	Requirement taken directly from 40 CFR 60.502(g).
II.D.2.g	XX Racks	Pressure Standard	Requirement to limit pressure during loading to less than 4500 Pa.	Requirement taken directly from 40 CFR 60.502(h).
II.D.2.h	XX Racks	Pressure Release Standard	Requirement to prevent pressure release vents from opening at greater than 4500 Pa.	Requirement taken directly from 40 CFR 60.502(i).

5. Facility-Wide Operations

Citation	Applicable Units	Standard Title	Description	Discussion
II.E.1	All Operations	VOC Transportation Standard	Requirement to take measures to prevent VOC emission.	Requirement taken directly from PCC 17.16.400.A.
II.E.2	All Operations	Odor Limiting Standard	Requirement to limit gaseous and odorous emissions.	Requirement taken directly from PCC 17.16.030 & PCC 17.16.430.D.

C. Air Pollution Controls:

Citation	Applicable Units	Standard Title	Description	Discussion
III.A.1	LR-1, 2, & 3W & T-6, 7, 8, 14 & 25	Thermal Oxidizer Standard	Requirement to capture and process hydrocarbon emissions.	NSPS Subpart XX and PCC 17.12.190.B requirement created to ensure synthetic minor source status for HAPs.

Citation	Applicable Units	Standard Title	Description	Discussion
III.A.2	Thermal Oxidizer	Thermal Oxidizer Maintenance Standard	Requirement to operate and maintain thermal oxidizer according to manufacturer's specs or O&M w/o bypass.	NSPS Subpart XX and PCC 17.12.190.B requirement created to ensure synthetic minor source status for HAPs.
III.B.1	LR-4	Carbon Adsorber Standard	Requirement to capture and process hydrocarbon emissions.	NSPS Subpart XX and PCC 17.12.190.B requirement created to ensure synthetic minor source status for HAPs.
III.B.2	Carbon Adsorber	Carbon Adsorber Maintenance Standard	Requirement to operate and maintain carbon adsorber according to manufacturer's specs or O&M w/o bypass.	NSPS Subpart XX and PCC 17.12.190.B requirement created to ensure synthetic minor source status for HAPs.

D. Monitoring Requirements:

1. No appropriate monitoring requirements in 40 CFR 60 Subpart Ka. Requirements listed under monitoring under that subpart are more appropriate for recordkeeping and so have been listed under those requirements.
2. Storage Vessels Subject to 40 CFR 60 Subpart Kb

Citation	Applicable Units	Standard Title	Description	Discussion
IV.B.1	Kb PLSVs	Annual Inspection Standard	Requirement to annually inspect Kb affected PLSVs.	Requirement taken directly from 40 CFR 60.113b(a)(2).
IV.B.2	Kb PLSVs	Roof Inspection Standard	Requirement to inspect internal floating roofs at least every 10 years.	Requirement taken directly from 40 CFR 60.113b(a)(4).

3. Compliance Assurance Monitoring Plans for Loading Racks VOC Emissions

Citation	Applicable Units	Standard Title	Description	Discussion
----------	------------------	----------------	-------------	------------

Citation	Applicable Units	Standard Title	Description	Discussion
IV.C.1	Loading Racks	Compliance Assurance Monitoring	CAM Requirements	These standards were proposed by SFPP, L.P., verified by PDEQ against the requirements of 40 CFR 64.3(d) and 64.6. CAM was based on Appendix B of the EPA CAM Technical guidance Revision 1 January 2005 document. Illustration No.6c was used for the thermal oxidizer and illustration No. 11c was used as a guide for the carbon adsorption unit. Following public notice EPA recommended addition of a requirement for flow measurement to assure that there was a constant flow of vapors from the vapor holder tank to the thermal oxidizer.

4. Non-NSPS Storage Vessels

Citation	Applicable Units	Standard Title	Description	Discussion
IV.D	Non-NSPS Storage Vessels	Vapor Loss Prevention Monitoring	Requirement to monitor specific control measures on each PLSV.	Standards taken directly from PCC 17.16.230.A.1.b

5. Loading Racks

Citation	Applicable Units	Standard Title	Description	Discussion
IV.E.1	All Racks	Loading Rack Monitoring Standard	Requirement to monitor and record throughput of all products and gasoline through loading racks.	PCC 17.12.190.B requirement created to ensure compliance with II.C.1 & II.C.2 (synthetic minor limitations on product throughput to limit HAPs).
IV.E.2	XX Racks	XX Rack Inspection Standard	Requirement to inspect affected loading racks on a monthly basis.	Requirement taken directly from 40 CFR 60.502(j).

6. Facility-Wide Operations

Citation	Applicable Units	Standard Title	Description	Discussion
IV.F.1 & 2	All Operations	Semi-annual Inspection Standard	Requirements to inspect facility on a semi-annual basis.	PCC 17.12.180.A.3 requirement created to ensure facility is operating optimally to prevent emissions.

E. Recordkeeping Requirements:

1. NSPS Storage Vessels (Storage Vessels Subject to 40 CFR 60 Subpart Ka)

Citation	Applicable Units	Standard Title	Description	Discussion
V.A.1	Ka PLSVs	Recordkeeping Standard	Requirement to keep specification records of products stored in tanks.	Requirement taken directly from 40 CFR 60.115a(a).
V.A.2 & A.3	Ka PLSVs	Calculation methods	Methodology for determining maximum vapor pressure and temperature. SFPP, L.P. requested the use of the latest available USEPA Tanks program whenever determinations of maximum vapor pressure and temperature are made. EPA denied the use of Tanks to calculate the maximum vapor pressure for compliance purposes in an email dated April 19, 2007,	Requirement taken directly from 40 CFR 60.115a(b).

2. NSPS Storage Vessels (Storage Vessels Subject to 40 CFR 60 Subpart Kb)

Citation	Applicable Units	Standard Title	Description	Discussion
V.B.1	Kb PLSVs	Recordkeeping Standard	Requirement to keep all records as specified.	Requirement taken directly from 40 CFR 60.116b(a).
V.B.2	Kb PLSVs	Recordkeeping Standard	Requirement to keep records of each inspection required in IV.B.1 & IV.B.2.	Requirement taken directly from 40 CFR 60.115b(a)(2).
V.B.3	Kb PLSVs	Content Recordkeeping Standard	Requirement to record and maintain file of PSLV contents and characteristics.	Requirement taken directly from 40 CFR 60.116b(c).
V.B.4	Kb PLSVs	Vapor Pressure Calculation Standard	Methodology for determining vapor pressure.	Provision taken directly from 40 CFR 60.116b(e).
V.B.5	Kb PLSVs	Capacity Recordkeeping Standard	Requirement to calculate and record dimension and capacity of each applicable tank.	Requirement taken directly from 40 CFR 60.116b(b).

3. Non-NSPS Storage Vessels

Citation	Applicable Units	Standard Title	Description	Discussion
V.C.1	Non-NSPS Vessels	Recordkeeping Standard	Requirement to maintain log of inspections on PLSV.	PCC 17.12.180.A.4 requirement created to

Citation	Applicable Units	Standard Title	Description	Discussion
V.C.2	Non-NSPS Vessels	Content Recordkeeping Standard	Requirement to record and maintain file of PLSV contents and characteristics.	Requirement taken directly from PCC 17.16.230.E.
V.C.3	Breakout Tanks	Turnover Monitoring Standard	Requirement to monitor and record monthly turnovers of breakout tanks.	PCC 17.12.180.A.4 requirement created to provide basis for emissions inventory calculations.

4. Loading Racks

Citation	Applicable Units	Standard Title	Description	Discussion
V.D.1	All Racks	Loading Rack Recording Standard	Requirement to record throughput of all products and gasoline through loading racks	Requirement created to ensure compliance with II.D.1 (synthetic minor limitation on product throughput to limit HAPs).
V.D.2.a	XX Racks	XX Rack Inspection Standard	Requirement to record on a monthly basis, the results of inspections performed due to IV.C on affected loading racks.	Requirement taken directly from 40 CFR 60.505(c). Recordkeeping complements IV.C
V.D.2.b.i	XX Racks	Tank Truck Recordkeeping Standard	Requirement to maintain records on each tank truck loaded at the facility.	Requirement streamlines 40 CFR 60.502(e)(1) & 40 CFR 60.505(a) & (b).
V.D.2.b.ii	XX Racks	Tank Truck ID Standard	Requirement to record tank truck ID # of each truck loaded at the facility.	Requirement taken directly from 40 CFR 60.502(e)(2).
V.D.2.b.iii	XX Racks	Tank Truck Cross Check Standard	Requirement to and schedule for tank truck vapor tightness documentation.	Requirement taken directly from 40 CFR 60.502(e)(3)(i).
V.D.2.b.iv	XX Racks	Cross Check Frequency Standard	Schedule for vapor tightness cross checks.	Requirements taken directly from 40 CFR 502(e)(3)(ii).
V.D.2.b.v	XX Racks	Non-vapor-tight tank truck notification	Schedule & provisions for truck owner/operator notifications.	Requirements taken directly from 40 CFR 502(e)(4)
V.D.2.b.vi	XX Racks	No reloading of non-compliant trucks	Non-compliant trucks not reloaded until vapor tightness for truck is obtained.	Requirements taken directly from 40 CFR 502(e)(5)

Citation	Applicable Units	Standard Title	Description	Discussion
V.D.2.b.vii	XX Racks	Alternate Recordkeeping Standard	Provision for the Permittee to construct a unique monitoring/recordkeeping scheme.	Provision taken directly from 40 CFR 60.502(e)(6).
V.D.2.c	XX Racks	Owner/Operator Notification Standard	Requirement to maintain records of owner/operator notifications.	Requirement taken directly from 40 CFR 60.505(d).
V.D.2.d	XX Racks	Electronic Recordkeeping Standard	Provision to maintain electronic truck documentation.	Provision taken directly from 40 CFR 60.505(e).

5. Facility-Wide Operations

Citation	Applicable Units	Standard Title	Description	Discussion
V.E.1	Vapor Processing system	Records Maintenance Standard	Federal requirement to maintain replacements/ additions for 3 years.	Requirement taken directly from 40 CFR 60.505(f)
V.E.2	All Operations	Records Maintenance Standard	Local requirement to maintain all records on-site for 5 years.	Requirement taken directly from PCC 17.12.180.A.4.b

F. Reporting Requirements:

1. There are no reporting requirements in 40 CFR 60 Subpart Ka, other than those in Part A of the permit.
2. NSPS Storage Vessels (Vessels Subject to 40 CFR 60 Subpart Kb)

Citation	Applicable Units	Standard Title	Description	Discussion
VI.B.1	Kb PLSVs	Tank Refilling Reporting Standard	Requirement to notify control officer before refilling tank after inspections required by IV.B.3.	Requirement taken directly from 40 CFR 60.113b(a)(5).
VI.B.2	Kb PLSVs	Inspection Reporting Standard	Requirement to notify control officer if deficiencies are found during inspections.	Requirement taken directly from 40 CFR 60.115b(a)(3).

3. Thermal Oxidizer and Carbon Adsorption Unit

Citation	Applicable Units	Standard Title	Description	Discussion
----------	------------------	----------------	-------------	------------

Citation	Applicable Units	Standard Title	Description	Discussion
VI.C	Thermal Oxidizer & CAU	Tank Refilling Reporting Standard	Requirement to submit manufacturer's recommendations or an O&M Plan within 90 days of issuance of the permit or installation of equipment.	Authority taken directly from PCC 17.24.050.

4. Facility-Wide Operations

Citation	Applicable Units	Standard Title	Description	Discussion
VI.D	All Operations	Prompt Deviation Reporting Standard	Requirement to promptly report deviations.	Requirement taken directly from 17.12.180.A.5.b.
VI.E	All Operations	Semiannual Deviation Reporting Standard	Requirement to submit semiannual reports of deviations.	Requirement taken directly from 17.12.180.A.5.a.
VI.F	All Operations	Compliance Certification Standard	Requirement to submit annual compliance certification.	Requirement taken directly from 17.12.220.
VI.G	All Operations	Emissions Inventory Standard	Requirement to submit annual emissions inventory.	Requirement taken directly from 17.12.320.

G. Testing Requirements:

1. Loading Racks (NSPS only)

Citation	Applicable Units	Standard Title	Description	Discussion
VII.A.1	XX Racks	Performance Test Standards	Requirement to use reference methods in Appendix A of 40 CFR 60 specifically modified.	Requirement taken directly from 40 CFR 60.503(a).
VII.A.2	XX Racks	Test Condition Standards	Requirement to ensure specific conditions before performance tests.	Requirement taken directly from 40 CFR 60.503(b).
VII.A.3	XX Racks	Test Parameter Standards	Test parameters for performance tests.	Requirement taken directly from 40 CFR 60.503(c). Authority for once per term test is 17.20.010.
VII.A.4	XX Racks	Test Condition Standards	Requirement to conduct monitoring before and during test.	Requirement taken directly from 40 CFR 60.503(d).

2. Facility-Wide Operations

Citation	Applicable Units	Standard Title	Description	Discussion
VII.B	All Operations	General Testing Standard	Control Officer shall make a written request outlining the reasons for requiring the test and the appropriate test methods to use.	Requirement taken directly from PCC 17.20.010

VII. Previous Permit Conditions

The following standards were removed from the permit [citations refer to 1-Year permit (See 1-yr permit)]:

A. Standards which do not pertain to activities on site:

Part B-2 – the SVEU has been removed from the facility.

B. Standards which have been fulfilled and are no longer applicable:

1. Part B-1 condition 3: Requirement to connect breakout tanks to vapor recovery by June 30, 1993. Requirement has already been fulfilled.
2. Part B-1 condition 4: Requirement for initial test/inspection on tank T-23 – completed.
3. Part B-1 condition 5: Requirement for closed vapor system on tank T-VH-1 – tank is no longer on site.

VIII. NSPS Applicability Determination

A. NSPS Applicability Matrix:

Subpart	Description	Capacity**	Date
K	Petroleum liquids*	>40,000 gal	06-11-1973 – 05-19-1978
Ka	Petroleum liquids*	>40,000 gal	05-19-1978 – 07-23-1984
Kb	Volatile Organic Liquids with:	And a capacity:	>07-23-1984
	Vapor Pressure ≥ 3.5 kPa Vapor Pressure $3.5 < X < 15.0$ kPa	$\geq 39,889$ gal $19,813 \leq X < 39,889$ gal	
XX	Loading racks at bulk gasoline terminals	Throughput >75,700 L	>12-17-1980

*Diesel and Jet Fuel exempted per 40 CFR 60.111(b), 40 CFR 60.111a(b).

**19,813 gal = 75m³; 39,889 gal = 151m³.

Note¹: Petroleum Liquids on-site: Diesel (exempt), **Gasoline, Jet-A, JP-8, Transmix.**

Not petroleum liquids: Ethanol, Additives.

Note²: The vapor pressures of liquids on site: Diesel: ~0.07 kPa, **Denatured Ethanol:** 15.5 kPa, **Gasoline:** >15 kPa, Jet A: <0.3 kPa, JP-8: <3.5 kPa (@ 20 C).

Note³: Custody transfer exemption determination: the Permittee takes the definition of custody transfer to not apply to SFPP as the Permittee is not “the producing operation (40 CFR 60.111(g), 60.111a(k), & 60.111b)”.

B. Tank Information

Based on the information above in VIII of the NSPS Applicability Determination Matrix, the tanks below were found to be subject to NSPS as indicated. All other tanks on site and listed in the permit are only subject to local only standards.

Tank ID	Product	Roof	Closure Device Used (For NSPS) OR Vapor Pressure (Non-NSPS)	Capacity (Gal)	Comment	Date	NSPS?
T-20	Gasoline, Diesel, Jet Fuel, Transmix, Ethanol	Internal Floating	Primary Seal – Mechanical Shoe	1,260,000		1959 Mod: 1979	Ka
T-23	Gasoline, Diesel, Jet Fuel, Transmix, Ethanol	Internal Floating	Primary Seal – Mechanical Shoe Secondary Seal – Compression Plate w/ wiper	840,000		1992	Kb
T-25	Gasoline, Diesel, Jet Fuel, Transmix, Ethanol	Internal Floating	Primary Seal – Mechanical Shoe Secondary Seal – Compression Plate w/ wiper	2,100,000	Breakout Tank	1997	Kb
T-26	Gasoline, Diesel, Jet Fuel, Transmix, Ethanol	Internal Floating	Primary Seal – Mechanical Shoe Secondary Seal – Compression Plate w/ wiper	2,832,690		1999	Kb
T-34	Gasoline, Diesel, Jet Fuel, Transmix, Ethanol	Internal Floating	Primary Seal – Mechanical Shoe Secondary Seal – Wiper w/ Apron	2,814,000		2000	Kb

C. Loading Rack Information

Rack ID	Description	Control Device	Date	NSPS
LR-1	2 bays, 9 bottom-loading arms.	NAO Thermal Oxidizer	<1980	XX
LR-2	2 bays, 6 bottom-loading arms.	NAO Thermal Oxidizer	1989	XX
LR-3	1 bay, 4 bottom-loading arms.	NAO Thermal Oxidizer	1999	XX
LR-4	2 bays, 10 bottom-loading arms.	John Zink Carbon Adsorption Unit	1984	XX

Note: SFPP determined that all racks at this facility would be subject to 40CFR60 Subpart XX and conveyed such to USEPA in 1998.

PROPOSED
FINAL
TSD

IX. Insignificant Activities.

The application listed several activities that may occur at the site. The following table lists the activities listed in the application and provides a determination as to whether the control officer considers the activities insignificant:

Insignificant Activities Listed in the Application

Type of Activity or Equipment	Insignificant Determination
Fuel additive tanks	Yes, provided that contents are below vapor pressure standards
4000 gallon Diesel lubricity additive storage tank	Yes
Contact water storage tanks	Yes
Water Collection sumps	Yes
Laboratory activities	Yes, by definition
Non-architectural coating painting	Yes
Earth-moving that is smaller in scope than activity permit requirements	Yes
Emergency/Standby internal combustion engines	Yes, by definition
Sample Shelter activities	Yes
Sump operation	Yes
Maintenance activities including replace loading arms	Yes
Sampling of tanks	Yes
Preparation for a source test (installing flow meter)	Yes
Loading rack calibration	Yes
Off-road utility vehicles	Yes

X. Alternate Operating Scenario (AOS)

Citation	Applicable Units	Standard Title	Description	Discussion
II	Various equipment as indicated in the permit.	Various Titles	Notification, recordkeeping and other requirements upon installation, startup and performance testing of equipment.	Various general applicable requirements taken directly from 40 CFR 60 Subpart A, includes notification, recordkeeping and other requirements for SFPP, L.P. to notify PDEQ concerning AOS.
III.A.1	NSPS Fire Pump Engine	Emission Limitations/Standards	Pollutant emission limits and certification of engine.	Limitations taken directly from 40 CFR 60.4205(c) and 40 CFR 60.4205(d).
III.A.2	Breakout Tanks	Emission Limitations/Standards	Requirement to install an IFR meeting specific criteria on applicable units.	Permittee to follow NSPS Kb limitations in Part B of the permit.
III.B.1	NSPS Fire Pump Engine	Operational Limitations	Operate engine according to O & M plan.	Limitation taken directly from 40 CFR 60.4206.
III.B.2	NSPS Fire Pump Engine	Fuel Requirements	Permittee must meet diesel fuel requirements specified by given dates.	Requirements taken directly from 40 CFR 60.4207(a) & (b).
III.B.3	NSPS Fire Pump Engine	Maintenance checks	Maintenance checks and readiness testing of engine limited to 100 hours per year.	Requirements taken directly from 40 CFR 60.4211(e).
III.C	NSPS Breakout Tanks	Air Pollution Controls	Route all emissions from refloating the roof in breakout tanks to thermal oxidizer.	Limitation using 17.12.190.B to prevent triggering a significant modification under attainment NSR.
III.D.1	NSPS Fire Pump Engine	Monitoring Requirements	Non-resettable hour meter installation.	Requirements taken directly from 40 CFR 60.4209(a).
III.D.1	NSPS Breakout Tanks	Monitoring Requirements	Permittee shall meet all 40 CFR 60 Subpart Kb monitoring requirements identified in Part B of the permit.	Requirements taken directly from 40 CFR 60 Subpart Kb as identified in Part B of the permit.
III.E.1	NSPS Fire Pump Engine	Recordkeeping Requirements	Permittee shall keep a record of manufacturer's written instructions onsite and keep all records required by the permit for at least 5 years.	Authority from PCC 17.12.180.A.4.b to require SFPP, L.P. keep all records onsite for a minimum of 5 years.
III.E.2	NSPS Breakout Tanks	Recordkeeping Requirements	Permittee shall meet all 40 CFR 60 Subpart Kb monitoring requirements identified in Part B of the permit.	Requirements taken directly from 40 CFR 60 Subpart Kb as identified in Part B of the permit and 40 CFR 60.115b.

Citation	Applicable Units	Standard Title	Description	Discussion
III.F.1	NSPS Fire Pump Engine	Reporting Requirements	General notification requirements.	Authority from PCC 17.12.180.A.5 for Permittee to submit deviation, semiannual and compliance certification reports.
III.F.2	NSPS Breakout Tanks	Reporting Requirements	Demonstrate that control equipment is compliant with specifications.	Requirements taken directly from 40 CFR 60 Subpart Kb as identified in Part B of the permit and 40 CFR 60.115b(a)(1).
III.G.1	NSPS Breakout Tanks	Testing Requirements	Permittee shall meet all 40 CFR 60 Subpart Kb testing requirements identified in Part B of the permit and initial testing after installation of control equipment.	Requirements taken directly from 40 CFR 60 Subpart Kb as identified in Part B of the permit and 40 CFR 60.113b(a), (a)(1) & (a)(2).

PROPOSED
FINAL
TSD

APPENDIX A

**DISCUSSION ON NON-APPLICABILITY OF
NSR/PSD REVIEW FOR SFPP, L.P.**

PREPARED BY

**SFPP, L.P.
(Edited by PDEQ)**

Requirements for New Major Sources

The following is a discussion of the New Source Review (NSR) requirements including the treatment of new acquisitions contiguous to an existing major source. This section is included to clarify the permit application in light of the consolidation of assets purchased in 2003.

I. THE PURCHASE OF AN EXISTING SOURCE DOES NOT TRIGGER REQUIREMENTS FOR NEW OR MODIFIED MAJOR SOURCES UNDER COUNTY OR FEDERAL REGULATIONS.

The former Shell facility was an existing source with an existing Class II permit and existing emissions. Thus it is not a new source. Rule 17.04.340.A, “new source” defines a new source as, “Any source that is not an existing source.” Since the former Shell facility held a PDEQ issued permit, it is clearly an existing source (see also 17.04.340.A, “existing source” – “a source in operation prior to the effective date of this Title.” – Shell meets this definition.)

Similarly, under the applicable regulatory definitions, the transfer of ownership of the former Shell terminal was neither a modification nor a major modification, such that NSR would be triggered. By definition, a modification is “a physical change or a change in the method of operation of a source which increases the actual emissions of any regulated air pollutant” The transfer of ownership of the former Shell facility to SFPP, L.P. involved neither a physical change nor a change in the method of operation which increased the actual emissions of any regulated air pollutant. In fact, no increase in actual emissions resulted from the transfer of ownership. Furthermore, transfer of ownership is specifically exempted in the definition of major modification in both county and federal regulations (17.04.340.A, “Major Modification” (c)(vii) and 40 CFR 51.165(a)(v)(C)(7). Therefore, this action does not constitute a major modification and shall not trigger NSR – Prevention of Significant Deterioration (PSD) review.

Note: failure to give notice of the transfer of a permit within the time frame set forth in Rule 17.12.290 has no bearing on the above analysis.

II. FEDERAL LAW REGARDING TREATMENT OF “SINGLE SOURCES” DOES NOT REQUIRE APPLCIATION OF NSR.

Under the existing federal regulation and guidance, EPA can require that two separate, adjacent facilities under common ownership and control must be treated as a single source for purposes of Title V permitting, NSR/PSD. SFPP, L.P. does not dispute that the two facilities in question must be permitted together as a single source under Title V. However, because the two sources are both existing sources, they do not trigger NSR/PSD upon aggregation, because NSR/PSD are *preconstruction* review requirements (See 40 CFR 51.165; New Source Review Workshop Manual - draft, October 1990). Additionally, as noted in the previous section, federal rules specifically exempt change of ownership from the definition of major modification - 40 CFR 51.165(a)(v)(C)(7).

This result is consistent with EPA’s single source guidance (SFPP, L.P. is unaware of an EPA single source determination that requires the purchasing of an adjacent facility to retroactively apply NSR/PSD requirements). Consider the following summary of single source determinations made by EPA¹:

- If an existing NSR/PSD major stationary source is going to build a new source that will be considered as a single source, the new source must be evaluated to see if it is a major modification that requires PSD/NSR review under the modification requirements of the regulation.

¹ See EPA NSR/PSD guidance at www.epa.gov/region7/programs/artd/air/title5/title5pg.htm

Comment: as noted above, the former Shell facility is not a new source such that it could be viewed as a modification.

- If a single owner/operator has owned/operated two separate facilities that should have been seen as a single source because their construction was conducted in such a way as to circumvent the NSR/PSD regulations, then a NSR/PSD review shall be required.

Comment: the two facilities in question were not constructed or operated in order to circumvent NSR/PSD. They were constructed and operated by competitors until coming under common ownership and control through a purchase agreement.

Therefore, although the two facilities shall be considered a single source, SFPP, L.P.'s purchase of the former Shell facility shall not trigger NSR/PSD review.

PROPOSED
FINAL
TSD