

# Statement of Basis For Title V Permit

<b>Company Name</b>	Sunoco, Inc.
<b>Premise Number</b>	0448010246
What makes this facility a Title V facility?	Potential to emit over 100 tons per year of nitrogen oxides, particulate matter, sulfur dioxide, organic carbons and carbon monoxides; over 25 tons per year of HAPs.
Has each insignificant emissions unit been reviewed to confirm it meets the definition in 3745-77-01 (U)?	Yes
Were there any "common control" issues associated with this facility? If yes, provide a summary of those issues and explain how the DAPC decided to resolve them.	<p>Sunoco, Inc. refinery is the generator of waste streams for which the total annual benzene quantity exceeds 10 megagrams per year (11 tons per year), so 40 CFR 61, subpart FF is applicable to the Sunoco refinery. TWO LLC/US Filter and US Filter Scaltech are independent companies which are contracted and responsible to treat the Sunoco refinery waste streams. Portions of 40 CFR 61, subpart FF are applicable to the operations of both TWO LLS/US Filter and US Filter Scaltech. TWO LLC/US Filter and US Filter Scaltech will be responsible to the extent of their control of the benzene treatment process.</p> <p style="text-align: center;">The relation of these three firms is described below.</p> <ul style="list-style-type: none"> <li>- Sunoco, Inc., a refinery operating in Lucas County, contracts the treatment of it's wastewater to TWO LLC/US Filter.</li> <li>- TWO LLC/US Filter owns and operates an API oil-water separator and other wastewater treatment equipment which accepts wastewater which originates, at this time, exclusively from the Sunoco related facilities. TWO LLC/US Filter and Sunoco occupy adjacent and separate areas within the refinery boundaries. TWO LLC/US Filter produces treated water and oil which are returned to Sunoco as separate streams; and a mixture of oil, water, and solids ("sludge") which are sent to US Filter Scaltech for further processing.</li> <li>- USFilter Scaltech operates sludge processing equipment as a part of the wastewater treatment process and occupies adjacent separate areas within the refinery boundaries to both TWO LLC/US Filter and Sunoco. USFilter Scaltech receives oil, water and solid mixtures from TWO LLC/US Filter or from Sunoco, exclusively (at this time). USFilter Scaltech separates these waste streams into a water and oil mixture, which is returned to TWO LLC/US Filter and oil which is returned to Sunoco.</li> </ul> <p>Each of these facilities will have a TV permit. TWO LLC/US Filter's premise number is 0448020080 and USFilter Scaltech's premise number is 0448011640.</p>

**Part II (State and Federally Enforceable Requirements)**

Term and Condition (paragraph)	Basis		Comments
	SIP (3745- )	Other	
A.I.1., A.I.2a., A.I.2.b.	N	40 CFR 63, subpart A and 40 CFR 63, subpart CC	Refinery MACT General Provisions for MACT which includes the Refinery MACT for Leak Detection and Repair, Wastewater provisions, Storage Vessels and Miscellaneous Process Vents.
A.I.1., A.I.2.c. through A.I.2.e.	N	40 CFR 63, subpart CC and 40 CFR 60 subpart VV	Refinery MACT, Leak Detection and Repair Program. The permittee shall comply with 40 CFR 60, subpart VV for the LDAR requirements in order to comply with 40 CFR 63, subpart CC.
A.I.1. , A.I.2.e. and A.I.2.1.	21.09 (T)	N	State requirements for the LDAR program.
A.I.1., A.I.2.f. and A.I.2.g.	N	40 CFR 63, subpart CC and 40 CFR 61, subpart FF	Wastewater Treatment Provisions. The permittee shall comply with 40 CFR 61, subpart FF in order to comply with the wastewater requirements of 40 CFR 63, subpart CC.
A.I.1., A.I.2.h. through A.I.k.	N	40 CFR 63, subpart CC	Storage Vessel Provisions for Group 1 and Group 2 storage vessels

A.I.1., A.I.2.m. and A.I.2.n.	N	40 CFR 63, subpart F and 40 CFR 63, subpart A	Equipment Leak Detection and Repair for Hazardous Organic NESHAPS (HON) sources. The sources subject to the HON regulations are: P013, P014, P031 and J001. General Provisions and Applicability for sources subject to the HON
A.I.1. and A.I.2.o. through A.I.2.s.	N	40 CFR 63, subpart H	Equipment Leak Detection and Repair for Hazardous Organic NESHAPS (HON) sources. Applicability of the various types of HON equipment, Definitions and Compliance with subpart H also deems compliance with 40 CFR 60, subpart VV, GGG or KKK; 40 CFR 61, subpart F or J; or 40 CFR 264, subpart BB or 40 CFR 265, subpart BB.
A.I.1. and A.I.2.t.	21-09(M)	N	State requirements for process unit turnarounds
A.I.1. and A.I.2.u. and 2.v.	14-01 through 14-10	N	State requirements of the NOx Budget Terms for sources B044, B046 and B047
A.II.1. through A.II.5.	N	40 CFR 63, subpart CC	Refinery MACT Operational Restrictions for LDAR program
A.II.6.	N	40 CFR 63, subpart CC	Refinery MACT Operational Restrictions for Wastewater Treatment Provisions
A.II.7. through A.II.19.	N	40 CFR 63, subpart CC and 40 CFR 60, subpart VV	Equipment Leaks of VOC LDAR provisions Operational Restrictions for LDAR program

A.II.20 through A.II.25	N	40 CFR 63, subpart CC and 40 CFR 61, subpart FF	Wastewater Treatment Provisions. Operational Restrictions for Wastewater Treatment
A.II.26.	N	40 CFR 63, subpart CC	Refinery MACT Operational Restrictions for Group 1 Misc. Process Vents
A.II.27. through A.II.38.	N	40 CFR 63, subpart H	Equipment Leak Detection and Repair for Hazardous Organic NESHAPS (HON) sources. Operational Restrictions for HON sources
A.II.39.	21-09 (T)	N	State requirements for LDAR of VOC's from pump seals, pipeline valves, process drains, compressor seals and pressure relief devices.
A.II.40.	14-01(E)	N	Operational requirements of the NOx Budget Terms for sources B044, B046 and B047
A.III.1. and A.III.2.	N	40 CFR 63, subpart CC and 40 CFR 60, subpart VV	Refinery MACT LDAR Provisions Monitoring and Recordkeeping Requirements
A.III.3. through A.III.5.	N	40 CFR 63, subpart CC and 40 CFR 61, subpart FF	Refinery MACT and Benzene Waste Treatment and Operations Wastewater Treatment Provisions. Monitoring and Recordkeeping Requirements

A.III.6. through A.III.8.	N	40 CFR 63, subpart CC	Refinery MACT Monitoring and Recordkeeping Requirements for Group 1 Misc. Process Vents
A.III.9. through A.III.18.	N	40 CFR 63, subparts F and H	Equipment Leak Detection and Repair for Hazardous Organic NESHAPS (HON) sources. Monitoring and Recordkeeping Requirements for HON sources
A.III.19.	21-09 (T)	N	State LDAR Program Monitoring and Recordkeeping Requirements
A.III.20.	21-09 (M)	N	State Monitoring and Recordkeeping Requirements for Process Unit Turnarounds
A.III.21. through A.III.23	14-01, 14-06 and 14-08	N	Monitoring and Recordkeeping Requirements of the NOx Budget Terms for sources B044, B046 and B047
A.IV.1.	N	40 CFR 63, subpart CC and 40 CFR 60, subpart VV	Refinery MACT LDAR Provisions Reporting Requirements for LDAR program
A.IV.2.	N	40 CFR 63 and 40 CFR 61, subpart FF	Refinery MACT and Benzene Waste Treatment and Operations Wastewater Treatment Provisions. Reporting Requirements
A.IV.3. through A.IV.5.	N	40 CFR 63, subpart CC	Refinery MACT Misc. Process Vents Reporting Requirements, includes reporting requirements of 40 CFR 63, subpart A.

A.IV.6.	N	40 CFR 63, subpart H	Equipment Leak Detection and Repair for Hazardous Organic NESHAPS (HON) sources Reporting Requirements
A.IV.7.	21-09 (T)	N	State reporting requirements for the LDAR program.
A.IV.8. through A.IV.11.	14-01; 14-04; 14-05 and 14-08	N	Reporting requirements of the NOx Budget Terms for sources B044, B046 and B047. These include compliance certification reports and NOx allowance allocations.
A.V.1.	N	40 CFR 63, subpart CC and 40 CFR 60, subpart VV	Refinery MACT LDAR Provisions Testing Requirements for LDAR program
A.V.2.	N	40 CFR 63 and 40 CFR 61, subpart FF	Refinery MACT and Benzene Waste Treatment and Operations Wastewater Treatment Provisions. Testing Requirements
A.V.3. and A.V.4.	N	40 CFR 63, subpart CC	Refinery MACT Misc. Process Vents Testing Requirements
A.V.5. and A.V.6.	N	40 CFR 63, subpart H	Equipment Leak Detection and Repair for Hazardous Organic NESHAPS (HON) sources Testing Requirements
A.V.7.	21-09 (T)	N	State testing requirements for the LDAR program.

A.VI.1. through A.VI.7.	N	40 CFR 63, subpart H	Equipment Leak Detection and Repair for Hazardous Organic NESHAPS (HON) sources General Requirements; Standards of Repair and Quality Improvement Program for Valves, Pumps; and Alternative Means of Emission Limitations
A.VI.8.	N	40 CFR 63, subpart CC and 40 CFR 63, subpart A	Refinery MACT General Provisions of subpart A; Startup, Shutdown, and Malfunction Plan
A.VI.9. through A.VI.15.	14-01; 14-02; 14-03; 14-07; 14-08; and 14-09	N	Misc. requirements of the NOx Budget Terms for sources B044, B046 and B047

**Part III (Requirements Within the State & Federally Enforceable Section)**

Any unusual requirements or aspects of the terms and conditions in Part III that are not self-explanatory should be explained in the appropriate comment field or in a paragraph following the table for Part III.

EU(s)	Limitation	Basis		ND	O R	M	St	ENF	R	St	Rp	St	ET	Misc	Comments
		SIP (3745-)	Othe r												
B006, B008, B009, B014, B015, B016, B017, B018, B019, B021, B022, B023, B025, B026, B027, B028, B029, B030, B031, B032, B033, B034, B035, B036, B052	20% opacity, as a 6 minute average, except as provided by the rule  0.20 lb particulate emissions (PE) per mmBtu of actual heat input  0.04 lb SO2 per mmBtu of actual heat input	17-07 (A)  17-10 (B)(1)  18-54 (O)(1)	N  N  Y	N	Y	Y	N	N	Y	N	Y	N	Y	N	OR - CAM does not apply, all sources were installed before 1970 and they do not have control equipment. Permittee shall burn only Refinery Fuel Gas (RFG), landfill gas and/or natural gas in these units. Appropriate M, R Rp and ET have been specified. Also the quality of the fuel burned must meet a sulfur content that allows the permittee to meet the SO2 emission limit.  Other - 40 CFR 52.1881(b)(21)(xiv)

EU(s)	Limitation	Basis		ND	O R	M	St	ENF	R	St	Rp	St	ET	Misc	Comments	
		SIP (3745-)	Other													
B010	20% opacity, as a 6 minute average, except as provided by the rule	17-07(A)	N	N	Y	Y	N	N	Y	N	Y	N	Y	N	OR - CAM does not apply to this 1948 source because it has no control equipment. Permittee shall burn only Refinery Fuel Gas (RFG), landfill gas and/or natural gas in these units. Appropriate M, R Rp and ET have been specified. Also the quality of the fuel burned must meet a sulfur content that allows the permittee to meet the SO <sub>2</sub> emission limit.	
	0.19 lb particulate emissions (PE) per mmBtu of actual heat input	17-10(C)(1)	N													
	1.60 lb SO <sub>2</sub> per mmBtu of actual heat input	18-54(O)(5)	Y													Other - 40 CFR 52.1881(b)(21)(xiv)

EU(s)	Limitation	Basis		ND	O R	M	St	ENF	R	St	Rp	St	ET	Misc	Comments	
		SIP (3745-)	Other													
B044	20% opacity, as a 6 minute average, except as provided by the rule	17-07 (A)	N	N	Y	Y	N	N	Y	N	Y	N	Y	N	<p>OR - CAM does not apply to this 1954 source because it has no control equipment. Permittee shall burn only Refinery Fuel Gas (RFG), landfill gas, natural gas and/or residual fuel oil in these units. Appropriate M, R Rp and ET have been specified. Also the quality of the fuel burned must meet a sulfur content that allows the permittee to meet the SO2 emission limit.</p> <p>Other - 40 CFR 52.1881(b)(21)(xiv)</p> <p>OR, M, R &amp; Rp, Misc terms are in Part II of the permit for these NOx Budget Terms  OR - the permittee shall not emit in excess of the NOx budgeted emission limitation.  Misc - permittee shall not violate any requirements of the NOx budget trading program; duties of the NOx authorized account representative; information for submitting a NOx budget permit application; NOx allowance transfers; and opt-in units.</p>	
	0.14 lb particulate emissions (PE) per mmBtu of actual heat input	17-10 (C)(1)	N													
	1.8 lb SO2 per mmBtu of actual heat input	18-54 (O)(5)	Y													
	47 TPY NOx	14-01(A)	N											Y		

EU(s)	Limitation	Basis		ND	O R	M	St	ENF	R	St	Rp	St	ET	Misc	Comments
		SIP (3745-)	Other												
B046, B047	20% opacity, as a 6 minute average, except as provided by the rule	17-07(A)	N	N	Y	Y	N	N	Y	N	Y	N	Y	N	OR - CAM does not apply to these 1973 CO boilers but is subject to a CEM by virtue of its operational linkage to fluid bed catalytic unit (FCC) affected by 40 CFR 51, Appendix P. Continuous opacity monitoring will be required by the terms of emissions unit P011. Permittee shall burn only Refinery Fuel Gas (RFG), landfill gas, natural gas, residual fuel oil or the off gases from the regeneration of the catalyst in these units. Appropriate M, R, Rp and ET have been specified. Also the quality of the fuel burned must meet a sulfur content that allows the permittee to meet the SO2 emission limit of OAC 3745-18-54(O)(1) when not burning the off gases.
	0.14 lb particulate emissions (PE) per mmBtu of actual heat input	17-10 (C)(1)	N												ESP units shall operate at all times except during periods of start-up until the gases achieve a temperature of 250 degrees Fahrenheit at the ESP inlet. The total combined power input (kilowatts) to the ESPs, for any 3-hr block of time, shall be no less than 90% of the total combined power input, as a 3-hr average based on the most recent PM emissions test.
	0.04 lb SO2 per mmBtu of actual heat input	18-54 (O)(1)	N												
	98.1 lb particulate emissions (PE) per hour	17-11	N												Basis - Limit is based on process weight rate of 4300 tons per hour. When the unit burns CO gases from the FCC unit (P011), the PM and SO2 limits are a combined limit for P011, B046 and B047
	3.00 lbs SO2 per 1,000 lbs of fresh feed	18-54 (O)(3)	Y												Other - 40 CFR 52.1881(b)(21)(xiv)  Basis - Limit is based on process weight rate of 4300 tons per hour. When the unit burns CO gases from the FCC unit (P011), the PM and SO2 limits are a combined limit for P011, B046 and B047

EU(s)	Limitation	Basis		ND	O R	M	St	ENF	R	St	Rp	St	ET	Misc	Comments
		SIP (3745-)	Other												
	34 TPY NOx for B046 and 18 TPY NOx for B047	14-01(A)	N											Y	OR, M, R & Rp, Misc terms are in Part II of the permit for these NOx Budget Terms OR - the permittee shall not emit in excess of the NOx budgeted emission limitation. Misc - permittee shall not violate any requirements of the NOx budget trading program; duties of the NOx authorized account representative; information for submitting a NOx budget permit application; NOx allowance transfers; and opt-in units.
B048	20% opacity, as a 6 minute average, except as provided by the rule  0.26 lb particulate emissions (PE) per mmBtu of actual heat input  1.40 lb SO2 per mmBtu of actual heat input  Restriction on the hydrogen sulfide (H2S) burned in this unit. Limit is 230 mg/dscm (0.10 gr/dscf)	17-07 (A)  17-10 (C)(1)  18-54 (O)(7)  N	N  N  Y  Y	N	Y	Y	N	N	Y	N	Y	N	Y	N	This source is not subject to CAM because it has no control equipment.  OR - Has H2S CEM. Permittee shall burn only Refinery Fuel Gas (RFG), landfill gas, natural gas and/or residual fuel oil in these units. Appropriate M, R Rp and ET have been specified. Also the quality of the fuel burned must meet a sulfur content that allows the permittee to meet the SO2 emission limit.  Other - 40 CFR 52.1881(b)(21)(xiv)  Other - 40 CFR 60.104(a)(1) of subpart J

EU(s)	Limitation	Basis		ND	O R	M	St	ENF	R	St	Rp	St	ET	Misc	Comments
		SIP (3745-)	Other												
B050	20% opacity, as a 6 minute average, except as provided by the rule	17-07 (A)	N	N	Y	Y	N	N	Y	N	Y	N	Y	Y	<p>This source is not subject to CAM because it has no control equipment.</p> <p>OR - Has H2S CEM. Permittee shall burn only Refinery Fuel Gas (RFG), landfill gas, and/or natural gas in this units. Appropriate M, R Rp and ET have been specified. Also the quality of the fuel burned must meet a sulfur content that allows the permittee to meet the SO2 emission limit.</p> <p>Misc. - 40 CFR 60, Appendix F Procedure 1, section 5.2 refers to excessive audit inaccuracy in regards to the H2S CEM</p>
	0.005 lb particulate emissions (PE) per mmBtu of actual heat input; (5.0 lb PE/mmcf) and 1.6 TPY PE	N	Y												<p>Other - Allowable emissions for PE and NOx as stated in PTI 04-0420 as BAT OAC rule 3745-17-10(B)(1); OAC rule 3745-18-54(O)(1) and 40 CFR 52.1881(b)(21)(xiv) are less stringent than the emission limitation established pursuant to OAC rule 3745-31-05(A)(3). Also the requirements of this rule also include compliance with the requirements of 40 CFR 60 subpart J.</p>
	8.4 TPY SO2	N	Y												See above.
	0.12 lb NOx per mmBtu of actual heat input and 35.8 TPY NOx	N	Y												See above.

EU(s)	Limitation	Basis		ND	O R	M	St	ENF	R	St	Rp	St	ET	Misc	Comments
		SIP (3745-)	Othe r												
	Restriction on the hydrogen sulfide (H2S) burned in this unit. Limit is 230 mg/dscm (0.10 gr/dscf)	N	Y												Other - 40 CFR 60.104(a)(1) of subpart J;

EU(s)	Limitation	Basis		ND	O R	M	St	ENF	R	St	Rp	St	ET	Misc	Comments
		SIP (3745-)	Other												
B051	20% opacity, as a 6 minute average, except as provided by the rule	17-07 (A)	N	N	Y	Y	N	N	Y	N	Y	N	Y	Y	<p>This source is not subject to CAM because it has no control equipment.</p> <p>OR - Has H2S CEM. Permittee shall burn only Refinery Fuel Gas (RFG), landfill gas, and/or natural gas in this units. Appropriate M, R Rp and ET have been specified. Also the quality of the fuel burned must meet a sulfur content that allows the permittee to meet the SO2 emission limit.</p> <p>Misc. - 40 CFR 60, Appendix F Procedure 1, section 5.2 refers to excessive audit inaccuracy in regards to the H2S CEM</p>
	1.86 lb/hr PE and 8.16 TPY PE	N	Y												<p>Other - OAC rule 3745-31-05(A)(3) Allowable emissions for PE, SO2, NOx, CO and VOC as established in PTI 04-0500 as BAT The hourly limitations were established for PTI purposes to reflect potential to emit for this emissions unit, therefore, it is not necessary to develop M, R and Rp to ensure compliance with these limitations.</p> <p>OAC rule 3745-17-10(B)(1); OAC rule 3745-18-54(O)(1) and 40 CFR 52.1881(b)(21)(xiv) are less stringent than the emission limitation established pursuant to OAC rule 3745-31-05(A)(3).</p>
	6.6 lb/hr SO2 and 28.9 TPY SO2	N	Y												See above.
	30.00 lb/hr NOx and 131.4 TPY NOx	N	Y												See above.
	20.59 lb/hr CO and 90.18 TPY CO	N	Y												See above.

EU(s)	Limitation	Basis		ND	O R	M	St	ENF	R	St	Rp	St	ET	Misc	Comments
		SIP (3745-)	Other												
	1.35 lb/hr VOC and 5.90 TPY VOC	N	Y												See above.
	BAT requirements in PTI 04- 0500.	N	Y												Other - the requirements of this rule also include compliance with 40 CFR 60.104(a)(1) of subpart J.
	230 mg/dscm (0.10 gr/dscf) this unit.	N	Y												Other - 40 CFR 60.104(a)(1) of subpart J;
J001	General Provisions of 40 CFR 63	N	Y	N	Y	Y	N	N	Y	N	Y	N	Y	Y	This source is not subject to CAM because it is subject to 40 CFR 63 subparts F, G and H.  OR - Permittee is referred to the Equipment LDAR program for 40 CFR 63 subpart H in PART II of the permit.  Other - 40 CFR 63 subpart A
	General Provisions and applicability of subparts G & H to F	N	Y												Other - 40 CFR 63 subpart F
	Group 2 Transfer Rack requirements	N	Y												Other - 40 CFR 63.126(c) of subpart G, the permittee shall maintain records as required in 40 CFR 63.130(f). No other provisions apply to Group 2 Transfer Racks.

EU(s)	Limitation	Basis		ND	O R	M	St	ENF	R	St	Rp	St	ET	Misc	Comments
		SIP (3745-)	Other												
	HON Equipment leak Program	N	Y												Other - 40 CFR 63, subpart H;  OR & Misc. - compliance with the HON equipment leak program shall be deemed compliance with 40 CFR 60, subpart VV. The permittee shall establish a LDAR program for HON sources according to the appropriate sections in A.I.2, A.II, A.III., A.IV., A.V. and A.VI. of PART II of this permit.
	State LDAR equipment leak program	21-09 (T)	N												The permittee shall establish a LDAR program for VOC sources according to the appropriate sections in A.I.2, A.II, A.III., A.IV., and A.V. of PART II of this permit unless they elect to comply with 40 CFR 63 subpart H.
	Loading of volatile photochemically reactive materials	21-07 (E)	N	Y	N										This source is exempt from 21-07(E) because the source does not load volatile photochemically reactive materials.
J002, J003, J004, J005	General Provisions of 40 CFR 63	N	Y	N	Y	Y	N	N	Y	N	Y	N	Y	N	This source is not subject to CAM because they do not emit greater than 100 TPY VOC.  Other - 40 CFR 63 subpart A  OR - The permittee shall use submerged fill whenever the unit is operating.
	Refinery MACT LDAR program	N	Y												Other - 40 CFR 63 subpart CC and 40 CFR 60 subpart VV
	State LDAR equipment leak program	21-09 (T)	N												The permittee shall establish a LDAR program for VOC sources according to the appropriate sections in A.I.2, A.II, A.III., A.IV., and A.V. of PART II of this permit

EU(s)	Limitation	Basis		ND	O R	M	St	ENF	R	St	Rp	St	ET	Misc	Comments	
		SIP (3745-)	Other													
	Loading of volatile photochemically reactive materials	21-07 (E)	N	Y	N											Source J002, J003 and J004 are exempt from 21-07(E) because the sources do not load volatile photochemically reactive materials. This regulation does not apply to source J005.
P008	Flare shall be used to control emissions of HAP's resulting from malfunctions and pressure relief episodes.	N	Y	N	Y	Y	N	N	Y	N	Y	N	Y	N		<p>This source is not subject to CAM but the requirements of 40 CFR 63 subpart A meet CAM's requirements for flares.</p> <p>Other - 40 CFR 63 subpart CC and 40 CFR 63 subpart A</p> <p>OR - 40 CFR 63.11(b)</p> <ul style="list-style-type: none"> <li>- Flares shall be monitored at all times</li> <li>- shall be steam assisted, air-assisted or non-assisted</li> <li>- flares shall be operated with no visible emissions, except for periods not to exceed a total of 5 min. during any 2 consecutive hours.</li> <li>- flares shall have a flame present at all times</li> <li>- the flare shall be operated with an exit velocity less than 18.3 m/sec</li> <li>- the exit velocity may exceed 18.3 m/sec if the net heating value of the combusted gas is greater than 1000 Btu/scf</li> </ul>
	Requirements of 40 CFR 61 subpart J	N	Y	Y												ND - the permittee subject to 40 CFR 61 subpart J shall comply with the requirements of 40 CFR 61 subpart V.
	Requirements of 40 CFR 61 subpart V	N	Y					Y								ENF - Directors Findings & Orders dated Nov. 25, 1986 stated that flares that comply with 40 CFR 61 subpart V shall comply with 40 CFR 60.18 of subpart A. The requirements established pursuant to this rule are equivalent or less stringent than those established by 40 CFR 63.11 of subpart A.

EU(s)	Limitation	Basis		ND	O R	M	St	ENF	R	St	Rp	St	ET	Misc	Comments
		SIP (3745-)	Other												
	Requirements of 40 CFR 60 subpart A	N	Y	Y											Other - 40 CFR 60 subpart A. The requirements established pursuant to this rule are equivalent to or less stringent than those established by 40 CFR 63.11 of subpart A.
P009	Flare shall be used to control hydrocarbon emissions resulting from process vents, malfunctions and emergency relief.	N	Y	N	Y	Y	N	N	Y	N	Y	N	Y	N	<p>This source is not subject to CAM but the requirements of 40 CFR 63 subpart A meet CAM's requirements for flares.</p> <p>Other - 40 CFR 63 subpart CC and 40 CFR 63 subpart A</p> <p>OR - 40 CFR 63.11(b)</p> <ul style="list-style-type: none"> <li>- Flares shall be monitored at all times</li> <li>- shall be steam assisted, air-assisted or non-assisted</li> <li>- flares shall be operated with no visible emissions, except for periods not to exceed a total of 5 min. during any 2 consecutive hours.</li> <li>- flares shall have a flame present at all times</li> <li>- the flare shall be operated with an exit velocity less than 18.3 m/sec</li> <li>- the exit velocity may exceed 18.3 m/sec if the net heating value of the combusted gas is greater than 1000 Btu/scf</li> </ul>
	Emissions from emergency relief and vapor blowdown systems shall be smokeless	21-07 (J)(3)	N												The requirements established pursuant to this rule are equivalent to or less stringent than those established by 40 CFR 63.11 of subpart A. Appropriate M, R and Rp have been specified in this permit for the OR stated above.

EU(s)	Limitation	Basis		ND	O R	M	St	ENF	R	St	Rp	St	ET	Misc	Comments
		SIP (3745-)	Other												
P011	20% opacity, as a 6 minute average, except as provided by the rule	17-11 (A)(4)	N	N	Y	Y	N	N	Y	N	Y	N	Y	N	<p>This source is not subject to CAM because it is subject to 40 CFR 63 subpart UUU which will meet CAM's requirements.</p> <p>The permittee shall use the combined SO2 and PE limit for sources P011, B046 and B047, when operating the CO boilers as a control device for the FCC unit.</p> <p>OR - the permittee must operate and maintain a flare system and a continuous opacity monitoring (COM) system.</p> <p>Other - 40 CFR 52.1881(b)(21)(xiv)(C)</p>
	98.1 lb of PE per hour	17-07 (A)(1) (a)	N												
	3.00 lb of SO2 per 1000 lbs. of fresh feed	18-54 (O)(3)	Y												
	Refinery MACT LDAR program	N	Y												Other - 40 CFR 63 subpart CC and 40 CFR 60 subpart VV. All M, R, RP and ET are in PART I of this permit.

EU(s)	Limitation	Basis		ND	O R	M	St	ENF	R	St	Rp	St	ET	Misc	Comments
		SIP (3745-)	Other												
	Requirements of 40 CFR 63 subpart UUU which include metal HAP emission limitations; organic HAP emission limitations and work practice standards for the catalytic cracking unit and bypass lines	N	Y											Y	<p><b>NOTE:</b> The following regulations do not take effect until April 11, 2005 however some initial reporting and testing may be required before that date.</p> <p>Other - 40 CFR 63 subpart UUU. The permittee must meet the metal Hap emissions chosen from one of the four options stated in 40 CFR 63.1564(a) and Table 1; the organic HAP emission limitations as stated in 40 CFR 63.1565(a) and Tables 8 and 9; the General Provisions of subpart A as stated in Table 44 and meet the work practice standards for bypass lines as stated in 40 CFR 63.1569(a) and Table 36.</p> <p>OR - the permittee must meet the operating limits that apply to this unit according to Table 2 for Metal HAP emissions and the operating limits that apply to this unit according to Table 9 for organic HAP emissions.</p> <p>Misc. - the applicable tables from 40 CFR 63 subpart UUU.</p>
P012	0.07 lb SO2 per lb sulfur processed	18-54 (O)(9)	Y	N	N	Y	N	N	Y	N	Y	N	Y	N	<p>This source is not subject to CAM because it is subject to 40 CFR 63 subpart UUU which will meet CAM's requirements.</p> <p>Other - 40 CFR 52.1881(b)(21)(xiv)(J) The bypassing of any refinery fuel gases from the sulfur recovery unit (SRU) to the flare system is a violation of the SO2 emission rate.</p>
	State LDAR equipment leak program	21-09 (T)	N												<p>The permittee shall establish a LDAR program for VOC sources according to the appropriate sections in A.I.2, A.II, A.III., A.IV., and A.V. of PART II of this permit</p>

EU(s)	Limitation	Basis		ND	O R	M	St	ENF	R	St	Rp	St	ET	Misc	Comments	
		SIP (3745-)	Othe r													
	Refinery MACT LDAR program	N	Y													Other - 40 CFR 63 subpart CC and 40 CFR 60 subpart VV. All M, R, RP and ET are in PART I of this permit.
	Requirements of 40 CFR 63 subpart UUU which include HAP emission limitations; and work practice standards for the SRU and bypass lines	N	Y		Y									Y		<p><b>NOTE:</b> The following regulations do not take effect until April 11, 2005 however some initial reporting and testing may be required before that date.</p> <p>Other - 40 CFR 63 subpart UUU. The permittee must meet the Hap emissions chosen from one of the two options stated in 40 CFR 63.1568(a) and Table 29; the General Provisions of subpart A as stated in Table 44; the notification requirements of 40 CFR 63.1574 and meet the work practice standards for bypass lines as stated in 40 CFR 63.1569(a) and Table 36.</p> <p>OR - the permittee must meet the operating limits that apply to this unit according to Table 30 for HAP emissions and prepare an operation, maintenance and monitoring plan for bypass lines according to 40 CFR 63.1574(f).</p> <p>Misc. - the applicable tables from 40 CFR 63 subpart UUU.</p>

EU(s)	Limitation	Basis		ND	O R	M	St	ENF	R	St	Rp	St	ET	Misc	Comments
		SIP (3745-)	Other												
P013	HON Equipment leak Program	N	Y	Y	Y	Y	N	N	Y	N	Y	N	Y	Y	<p>This source is not subject to CAM because it is subject to 40 CFR 63 subparts A, F and H.</p> <p>Other - 40 CFR 63, subpart H  - 40 CFR 63 subpart F  - 40 CFR 63 subpart A</p> <p>The permittee shall establish a LDAR program for HON sources according to the applicable sections in A.I.2, A.II, A.III., A.IV., A.V. and A.VI. of PART II of this permit.</p> <p>ND - 40 CFR 61 subpart V  - 40 CFR 61 subpart J  - 40 CFR 61 subpart A</p> <p>40 CFR 63.160(b) states that sources subject to the provisions of 40 CFR parts 60 and 61 are required to only comply with the provisions of 40 CFR 63 subpart H.</p> <p>OR - The permittee shall establish a LDAR program for HAP sources according to the appropriate sections in A.I.2, A.II, A.III., A.IV., and A.V. of PART II of this permit</p> <p>Misc. - General Requirements from 40 CFR 63 subparts A and F pertaining to start-ups, shutdowns and malfunctions.</p>
	State LDAR equipment leak program	21-09 (T)	N	N										N	The permittee shall establish a LDAR program for VOC sources according to the appropriate sections in A.I.2, A.II, A.III., A.IV., and A.V. of PART II of this permit
	negligible emissions	N	Y												

EU(s)	Limitation	Basis		ND	O R	M	St	ENF	R	St	Rp	St	ET	Misc	Comments
		SIP (3745-)	Other												
P014	The transfer rack shall be equipped with a vapor collection system and control device (thermal oxidizer)	N	Y	Y	Y	Y	N	N	Y	N	Y	N	Y	Y	<p>This source is not subject to CAM because it is subject to 40 CFR 63 subparts A, F, G and H.</p> <p>Other - 40 CFR 63 subpart G - 40 CFR 63 subpart F - 40 CFR 63 subpart A</p> <p>ND - 40 CFR 61 subpart BB - a group 1 transfer rack subject to this subpart is required to comply only with 40 CFR 63 subpart G.</p> <p>OR - the transfer rack shall use a control device to reduce emissions of HAPs by 98 weight percent or have an exit concentration of 20 ppmv. Loading from the rack shall be into tanks or railcars with a current certification to demonstrate that the units are vapor-tight. Appropriate M, R, Rp and ET have been specified for the OR listed in this permit.</p> <p>Misc - The permittee may request to use a control device other than those listed in Table 7 of 40 CFR 63 subpart G.</p>
	Refinery MACT LDAR program	N	Y	Y										N	<p>Other - 40 CFR 63 subpart CC and 40 CFR 60 subpart VV. All M, R, RP and ET are in PART I of this permit.</p> <p>ND - 40 CFR 61 subparts A, J and V. According to 40 CFR 63.640(p), overlap of 40 CFR 63 subpart CC with other regulations are required to comply only with the provisions in 40 CFR 63 subpart CC.</p>

EU(s)	Limitation	Basis		ND	O R	M	St	ENF	R	St	Rp	St	ET	Misc	Comments
		SIP (3745-)	Othe r												
	HON Equipment leak Program	N	Y	N										N	Other - 40 CFR 63, subpart H - 40 CFR 63 subpart F - 40 CFR 63 subpart A The permittee shall establish a LDAR program for HON sources according to the applicable sections in A.I.2, A.II, A.III., A.IV., A.V. and A.VI. of PART II of this permit for those pieces of equipment that meet the requirements 40 CFR 63 subpart H, otherwise, use the LDAR program referred to in PART II of this permit for 40 CFR 60, subpart VV and/or OAC 3745-21-09(T).
	BAT requirements for PTI 04- 478. Use submerged fill whenever the unit is operating	N	Y	N										N	Other - OAC rule 3745-31-05 The requirements of this rule also include compliance with the requirements of 40 CFR 63 subparts A and G.

EU(s)	Limitation	Basis		ND	O R	M	St	ENF	R	St	Rp	St	ET	Misc	Comments
		SIP (3745-)	Other												
P016	Requirements for a maritime tank vessel loading operation	N	Y	N	Y	Y	N	N	Y	N	Y	N	Y	Y	<p>This source is not subject to CAM as it is subject to 40 CFR 63 subpart CC.</p> <p>Other - 40 CFR 63 subpart CC - 40 CFR 63 subpart Y</p> <p>The permittee shall comply with the requirements of 63.560 through 63.567 of subpart Y if the source meets the requirements of subpart Y.</p> <p>ND - 40 CFR 63 subpart Y Source is exempt from subpart Y because of the OR listed below.</p> <p>OR - Throughput of gasoline &lt;10M barrels per year; 200 M barrels of crude oil per year; maximum emissions of HAPs shall be &lt;10 TPY of a single HAP or &lt; 25 TPY for two or more HAPs. Appropriate M, R, and Rp have been specified for the OR listed in this permit.</p> <p>Misc - If the permittee resumes loading of benzene at this unit, then the permittee shall comply with the applicable portions of 40 CFR 61, subparts A, J and V and 40 CFR 63.126(b)(1) of subpart G.</p>

EU(s)	Limitation	Basis		ND	OR	M	St	ENF	R	St	Rp	St	ET	Misc	Comments
		SIP (3745-)	Other												
P017	Refinery MACT wastewater requirements for wastewater streams, cooling towers; wastewater tanks and storm water systems within the refinery.	N	Y	Y	Y	Y	N	N	Y	N	Y	N	Y	N	<p><b>NOTE:</b> see the relationship between Sunoco, Inc.; TWO LLC/USFilter and USFilter Scaltech in the first section of the Statement of Basis.</p> <p>This source is not subject to CAM as it is subject to 40 CFR 63 subparts A and CC.</p> <p>Other - 40 CFR 63 subpart CC  - 40 CFR 63 subpart A, General Provisions  The permittee subject to the wastewater provisions of 40 CFR 63 subpart CC shall comply with the requirements of 40 CFR 61.340 through 61.355 of subpart FF.  Notification is required when a Group 2 wastewater stream is changed to a Group 1 stream.</p> <p>ND - 40 CFR 60 subpart QQQ  Group 1 wastewater streams subject to this provision is required to comply only with 40 CFR 63 subpart CC.</p> <p>OR - the benzene containing wastewater streams must remove or destroy the benzene in the streams as specified in 40 CFR 61.348  - wastewater tanks shall install operate and maintain a fixed roof and closed vent system that routes vapors to a vapor collection agency.  - containers must be covered and use submerged fill when the waste is transferred  Appropriate M, R, and Rp have been specified for the OR listed in this permit.</p>
	Benzene wastewater requirements	N	Y												Other - 40 CFR 61 subpart FF
	Refinery MACT LDAR program	N	Y												Other - 40 CFR 63 subpart CC and 40 CFR 60 subpart VV. All M, R, RP and ET are in PART I of this permit.

EU(s)	Limitation	Basis		ND	O R	M	St	ENF	R	St	Rp	St	ET	Misc	Comments	
		SIP (3745-)	Other													
	State LDAR equipment leak program	21-09 (T)	N													The permittee shall establish a LDAR program for VOC sources according to the appropriate sections in A.I.2, A.II, A.III., A.IV., and A.V. of PART II of this permit
P019, P020, P021, P023, P024, P025, P027, P028, P031 and P034	Refinery MACT LDAR program	N	Y	Y	Y	Y	N	N	Y	N	Y	N	Y	N		<p>These sources are not subject to CAM because the fugitive emissions are subject to the Refinery MACT.</p> <p>Other - 40 CFR 63 subpart CC, subpart A and 40 CFR 60 subpart VV. All M, R, RP and ET are in Part II of this permit.</p> <p>OR - The permittee shall establish a LDAR program for VOC sources according to the appropriate sections in A.I.2, A.II, A.III., A.IV., and A.V. of PART II of this permit.</p> <p>ND for P023, P028 and P034 - 40 CFR 60 subpart GGG; if the unit is subject to 40 CFR 60 subpart VV, then are excluded from subpart GGG.</p>
	State LDAR equipment leak program	21-09 (T)	N													The permittee shall establish a LDAR program for VOC sources according to the appropriate sections in A.I.2, A.II, A.III., A.IV., and A.V. of PART II of this permit
	tons per year hydrocarbons or negligible emissions	N	Y													<p>BAT limitation (OAC rule 3745 31-05(A)(3))</p> <ul style="list-style-type: none"> <li>- P019 -- PTI 04-255; 7.01 TPY HC</li> <li>- P020 -- PTI 04-255; negligible emissions</li> <li>- P021 -- PTI 04 - 302; 1.3 TPY VOC</li> <li>- P023 -- PTI 04-303; 26.73 TPY VOC</li> <li>- P024 -- PTI 04-365; 1.03 TPY HC</li> <li>- P025 -- PTI 04-382; no emis. limits</li> <li>- P027 -- PTI 04-405; no emis. limits</li> <li>- P028 -- PTI 04-419; no emis. limits</li> <li>- P033 -- PTI 04-1038; 38.04 TPY VOC</li> <li>- P034 -- PTI 04-1199; 2.06 TPY VOC</li> </ul>

EU(s)	Limitation	Basis		ND	O R	M	St	ENF	R	St	Rp	St	ET	Misc	Comments	
		SIP (3745-)	Other													
	State requirements for equipment leaks	21-09 (DD)	N	Y												for source P028 only - the requirements of this rule are equivalent to the facility wide requirements for equipment leaks stated above
	Loading VOC materials	21-07 (E)	N	Y												for source P033 only - the source is exempt because no volatile photochemically reactive materials are loaded.
P031	General Provisions of 40 CFR 63	N	Y	N	Y	Y	N	N	Y	N	Y	N	Y	Y		<p>This source is not subject to CAM because it is subject to 40 CFR 63 subparts A, F, G and H.</p> <p>OR - Permittee is referred to the Equipment LDAR program for 40 CFR 63 subpart H in PART II of the permit.</p> <p>Other - 40 CFR 63 subpart A</p> <p>OR &amp; Misc -The permittee shall establish a HON LDAR program for HAP sources according to the appropriate sections in A.I.2, A.II, A.III., A.IV., and A.V. of PART II of this permit.</p>
	General Provisions and applicability of subparts G & H to F	N	Y													Other - 40 CFR 63 subpart F
	Group 2 Transfer Rack requirements	N	Y													Other - 40 CFR 63.126(c) of subpart G, the permittee shall maintain records as required in 40 CFR 63.130(f). No other provisions apply to Group 2 Transfer Racks.

EU(s)	Limitation	Basis		ND	O R	M	St	ENF	R	St	Rp	St	ET	Misc	Comments
		SIP (3745-)	Other												
	HON Equipment leak Program	N	Y												Other and OR- 40 CFR 63, subpart H; compliance with the HON equipment leak program shall deem compliance with 40 CFR 60, subpart VV. The permittee shall establish a LDAR program for HON sources according to the appropriate sections in A.I.2, A.II, A.III., A.IV., A.V. and A.VI. of PART II of this permit.
	State LDAR equipment leak program	21-09 (T)	N												The permittee shall establish a LDAR program for VOC sources according to the appropriate sections in A.I.2, A.II, A.III., A.IV., and A.V. of PART II of this permit unless they want to comply with 40 CFR 63 subpart H.
P035 P036	Refinery MACT LDAR program	N	Y	N	Y	Y	N	N	Y	N	Y	N	Y	N	This source is not subject to CAM because they are subject to the Refinery MACT.  Other - 40 CFR 63 subpart CC, subpart A and 40 CFR 60 subpart VV. All M, R, RP and ET are in PART II of this permit.  OR - The permittee shall establish a LDAR program for VOC sources according to the appropriate sections in A.I.2, A.II, A.III., A.IV., and A.V. of PART II of this permit.
	State LDAR equipment leak program	21-09 (T)	N												The permittee shall establish a LDAR program for VOC sources according to the appropriate sections in A.I.2, A.II, A.III., A.IV., and A.V. of PART II of this permit
	20% opacity, as a 6 minute average, except as provided by the rule	17-07 (A)(1)	N												OR - Permittee shall burn only Refinery Fuel Gas (RFG), landfill gas and/or natural gas in these units. Appropriate M, R Rp and ET have been specified
	0.62 lb. PE/mmBtu of actual heat input	17-11 (B)(5) (b)	N												

EU(s)	Limitation	Basis		ND	O R	M	St	ENF	R	St	Rp	St	ET	Misc	Comments	
		SIP (3745-)	Other													
	0.5 lb. SO2/mmBtu of actual heat input	18-06 (G)	N													OR - The quality of the fuel burned must meet a sulfur content that allows the permittee to meet the SO2 emission limit.
P037 P038	Refinery MACT LDAR program	N	Y	N	Y	Y	N	N	Y	N	Y	N	Y	N		<p>These sources are not subject to CAM because they are subject to the Refinery MACT.</p> <p>Other - 40 CFR 63 subpart CC, subpart A and 40 CFR 60 subpart VV. All M, R, RP and ET are in PART II of this permit.</p> <p>OR - The permittee shall establish a LDAR program for VOC sources according to the appropriate sections in A.I.2, A.II, A.III., A.IV., and A.V. of PART II of this permit.</p>
	State LDAR equipment leak program	21-09 (T)	N													The permittee shall establish a LDAR program for VOC sources according to the appropriate sections in A.I.2, A.II, A.III., A.IV., and A.V. of PART II of this permit

EU(s)	Limitation	Basis		ND	O R	M	St	ENF	R	St	Rp	St	ET	Misc	Comments
		SIP (3745-)	Other												
	Requirements of 40 CFR 63 subpart UUU which include inorganic HAP emission limitations; organic HAP emission limitations and work practice standards for catalytic reforming unit and bypass lines	N	Y											Y	<p><b>NOTE:</b> The following regulations do not take effect until April 11, 2005 however some initial reporting and testing may be required before that date.</p> <p>Other - 40 CFR 63 subpart UUU. The permittee must meet the applicable emission limitations specified in 40 CFR 63.1566(a)(1) as stated in Table 15; in 40 CFR 63.1567(a)(1) as stated in Table 16; in 40 CFR 63.1569(a)(1) as stated in Table 36 and the General Provisions of subpart A as stated in Table 44 and meet the work practice standards for bypass lines as stated in 40 CFR 63.1569(a) and Table 36.</p> <p>OR - the permittee must meet the applicable requirements for organic HAP emissions from Tables 15 and 16 and for inorganic HAP emissions from table 23.</p> <p>Misc. - the applicable tables from 40 CFR 63 subpart UUU.</p>
T001, T003, T004, T010, T060, T061, T062, and T064	The permittee shall equip the EFR -> IFR Group 1 storage vessel with an internal floating roof	N	Y	N	Y	Y	N	N	Y	N	Y	N	N	N	<p>These sources are not subject to CAM as they are subject to 40 CFR 63 subpart CC.</p> <p>Other - 40 CFR 63 subpart CC and 40 CFR 63 subpart G. The permittee shall operate and maintain an internal floating roof to control VOC emissions. This requires utilizing seals, seal inspections and appropriate vessel filling. All openings are to be closed except as stated in 40 CFR 63.646(f) and 40 CFR 63.119(b). Appropriate M, R, and Rp are required for these Group 1 storage vessels.</p>
	State storage vessel requirements	21-09 (L)	N												<p>State regulations require the tanks to be equipped with internal floating roofs, bleeder vents closed at all times except when roof is floated off and that all openings except sub drains shall be equipped with a cover, seal or lid and kept in a closed position.</p>

EU(s)	Limitation	Basis		ND	O R	M	St	ENF	R	St	Rp	St	ET	Misc	Comments
		SIP (3745-)	Other												
T013, T053, T058, T070, T072, T090, T091, T092, T093, T110 and T111	The permittee shall equip the IFR Group 1 storage vessels with an internal floating roof	N	Y	N	Y	Y	N	N	Y	N	Y	N	N	N	<p>These sources are not subject to CAM as they are subject to 40 CFR 63 subpart CC.</p> <p>Other - 40 CFR 63 subpart CC and 40 CFR 63 subpart G. The permittee shall operate and maintain an internal floating roof to control VOC emissions.</p> <p>OR - Requires utilizing seals, seal inspections and appropriate vessel filling. All openings are to be closed except as stated in 40 CFR 63.646(f) and 40 CFR 63.119(b). Appropriate M, R, and Rp are required for these Group 1 storage vessels.</p> <p>ET - Since there is no emission limit, testing is not required.</p>
	State storage vessel requirements	21-09 (L)	N												State regulations require the tanks to be equipped with internal floating roofs, bleeder vents closed at all times except when roof is floated off and that all openings except sub drains shall be equipped with a cover, seal or lid and kept in a closed position.

EU(s)	Limitation	Basis		ND	O R	M	St	ENF	R	St	Rp	St	ET	Misc	Comments
		SIP (3745-)	Other												
T006, T007, T008, T009, T015, T029, T038, T039, T041, T044, T054, T059, T063, T065, T066, T067, T068, T069, T082, T083, T086, and T097	The permittee shall equip the EFR Group 1 storage vessels with a closure device that consists of a dual seal system	N	Y	N	Y	Y	N	N	Y	N	Y	N	N	N	<p>These sources are not subject to CAM as they are subject to 40 CFR 63 subpart CC.</p> <p>Other - 40 CFR 63 subpart CC and 40 CFR 63 subpart G. The permittee shall operate and maintain an external floating roof to control VOC emissions by complying with the requirements of 40 CFR 63 subpart G, monitoring the seals and performing inspections</p> <p>OR - Requires that the external roof remain closed at all times, bleeder vents are to be closed; the seals are to be monitored and inspected. Appropriate M, R, and RP are required for these Group 1 EFR tanks.</p> <p>ET - Since there is no emission limit, testing is not required.</p>
	State storage vessel requirements	21-09 (Z)	N												State regulations require the tanks to be equipped with external floating roofs, all openings except bleeder vents, rim space vents, leg sleeves, sub-drains and gauging/sampling wells shall be equipped with a projection into the tank below the surface.
	2.28 tons per year VOC	N	Y												For source T015 - PTI 04-680 Other - BAT limitation (OAC rule 3745 31-05(A)(3))

EU(s)	Limitation	Basis		ND	O R	M	St	ENF	R	St	Rp	St	ET	Misc	Comments
		SIP (3745-)	Other												
T098 and T099	The permittee shall equip the IFR Group 1 storage vessel with an internal floating roof	N	Y	Y	Y	Y	N	N	Y	N	Y	N	N	N	<p>These sources are not subject to CAM as they are subject to 40 CFR 63 subpart G.</p> <p>Other - 40 CFR 63 subpart G, 40 CFR 63 subpart F and 40 CFR 63 subpart A. The permittee shall operate and maintain a fixed roof with an internal floating roof to control VOC emissions.</p> <p>ND - 40 CFR 63 subpart CC The provisions of the Refinery MACT do not apply to emission points subject to 40 CFR 63 subparts F, G, H and I.</p> <p>OR - The internal floating roof shall be floating on the surface at all times except for the exceptions stated in 40 CFR 63.119(b). The permittee shall use the appropriate seals, maintain and inspect them. Appropriate M, R, and Rp are required for these Group 1 storage vessels.</p> <p>ET - Since there is no emission limit, testing is not required.</p>
	State storage vessel requirements	21-09 (L)	N												
T036 and T158	The permittee shall equip the EFR -> IFR Group 1 storage vessel with an internal floating roof	N	Y	N	N	Y	N	N	Y	N	Y	N	Y	N	<p>These sources are not subject to CAM as they are subject to 40 CFR 63 subpart CC.</p> <p>Other - 40 CFR 63 subpart CC . A Group 1 vessel that is also subject to 40 CFR 60 subpart Kb, is required to comply only with the requirements of 40 CFR 60 subpart Kb except as stated in 40 CFR 63.640(n)(8).</p>

EU(s)	Limitation	Basis		ND	O R	M	St	ENF	R	St	Rp	St	ET	Misc	Comments
		SIP (3745-)	Other												
	The permittee shall employ an internal floating roof with seals in accordance with 40 CFR 60 subpart Kb	N	Y												Other - 40 CFR 60 subpart Kb The permittee shall monitor and inspect the seals, keep all openings covered, and bleeder vents closed. The permittee shall maintain records of the material stored, vapor pressure, and annual throughput. Appropriate M, R, and Rp are required for these Group 1 storage vessels.
	State storage vessel requirements	21-09 (L)	N												The requirements of this rule are equivalent or less stringent than the requirements of 40 CFR 60 subpart Kb.
	Emission Limitation for VOC for sources T036 and T158.	N	Y												Other - BAT limitation (OAC rule 3745 31-05(A)(3) -- T036; PTI 04-0589; 3.45 TPY VOC -- T158; PTI 04-1037; 8.6 TPY VOC
T075	The permittee shall equip the IFR Group 1 storage vessel with an internal floating roof	N	Y	N	Y	Y	N	N	Y	N	Y	N	N	N	This source is not subject to CAM as it is subject to 40 CFR 63 subpart CC and 40 CFR 61 subpart FF.  Other - 40 CFR 63 subpart CC and 40 CFR 63 subpart G.  OR - The permittee shall operate and maintain an internal floating roof to control VOC emissions. This requires utilizing seals, seal inspections and appropriate vessel filling. All openings are to be closed except as stated in 40 CFR 63.646(f) and 40 CFR 63.119(b). Appropriate M, R, and Rp are required for these Group 1 storage vessels.  ET - Since there is no emission limit, testing is not required.

EU(s)	Limitation	Basis		ND	O R	M	St	ENF	R	St	Rp	St	ET	Misc	Comments
		SIP (3745-)	Othe r												
	Wastewater storage vessel requirements	N	Y												Other - 40 CFR 61 subpart FF The permittee may elect to install a fixed roof and IFR that meets the requirements of 40 CFR 60.112b(a)(1) of subpart Kb.
	State storage vessel requirements	21-09 (L)	N												State regulations require the tanks to be equipped with internal floating roofs, bleeder vents closed at all times except when roof is floated off and that all openings except sub drains shall be equipped with a cover, seal or lid and kept in a closed position.
T157	The permittee shall equip the IFR Group 1 storage vessel with an internal floating roof	N	Y	Y	Y	Y	N	N	Y	N	Y	N	Y	N	<p>These sources are not subject to CAM as they are subject to 40 CFR 63 subpart G.</p> <p>Other - 40 CFR 63 subpart G, 40 CFR 63 subpart F and 40 CFR 63 subpart A. The permittee shall operate and maintain a fixed roof with an internal floating roof to control VOC emissions.</p> <p>ND - 40 CFR 63 subpart CC The provisions of the Refinery MACT do not apply to emission points subject to 40 CFR 63 subparts F, G, H and I.</p> <p>ND - 40 CFR 61 subpart Y and 40 CFR 60 subpart Kb A Group 1 storage vessel subject to 40 CFR 61 subpart Y or 40 CFR 60 subpart Kb are required to comply only with the provisions of 40 CFR 63 subpart G.</p> <p>OR - The internal floating roof shall be floating on the surface at all times except for the exceptions stated in 40 CFR 63.119(b). The permittee shall use the appropriate seals, maintain and inspect them. Appropriate M, R, and Rp are required for these Group 1 storage vessels.</p>

EU(s)	Limitation	Basis		ND	O R	M	St	ENF	R	St	Rp	St	ET	Misc	Comments	
		SIP (3745-)	Other													
	State storage vessel requirements	21-09 (L)	N													State regulations require the tanks to be equipped with internal floating roofs, bleeder vents closed at all times except when roof is floated off and that all openings except sub drains shall be equipped with a cover, seal or lid and kept in a closed position.
	1.04 tons per year benzene and 1.04 tons per year VOC	N	Y													Other - BAT limitation (OAC rule 3745 31-05(A)(3) as established in PTI 04-0904;
T005, T014, T124, T125, T081, T085, T088, and T089	Group 2 storage vessels with an internal floating roof	N	Y	N	N	Y	N	N	Y	N	Y	N	N	N		These sources are not subject to CAM as they are subject to 40 CFR 63 subpart CC.  Other - 40 CFR 63 subpart CC  OR - No operational restriction is required for Group 2 storage vessels. Appropriate M, R and Rp are required for these Group 2 storage vessels. ET - For T005, T124, T125, T081, T085, T088 and T089; there is no emission limit, testing is not required.
	State storage vessel requirements	21-09 (L)	N													State regulations require the tanks to be equipped with internal floating roofs, bleeder vents closed at all times except when roof is floated off and that all openings except sub drains shall be equipped with a cover, seal or lid and kept in a closed position.
	Total combined emissions for sources T014, T127 and T128 is 2.72 TPY VOC	N	Y										Y			Other - BAT limitation (OAC rule 3745 31-05(A)(3) as established in PTI 04-0480.

EU(s)	Limitation	Basis		ND	O R	M	St	ENF	R	St	Rp	St	ET	Misc	Comments
		SIP (3745-)	Other												
T016, T018, T019, T022, T023, T024, T025, T026, T042, T043, T045, T051, T056,	Requirements for Group 2 fixed roof EFR storage vessels	N	Y	N	Y	Y	N	N	Y	N	Y	N	N	N	<p>These sources are not subject to CAM as they are subject to 40 CFR 63 subpart CC.</p> <p>Other - 40 CFR 63, subpart CC If a Group 2 emission point becomes a Group 1 emission point, it must be in compliance with the applicable requirements for Group 1 emission point upon startup. Appropriate M, R and Rp are required for these Group 2 storage vessels.</p> <p>ET - For all tanks listed except T127; since there is no emission limit, testing is not required.</p>
T076, T077, T078, T079, T080, T100, T102, T103, T104, and T127	State storage vessel requirements	21-09 (L)	N												State regulations require the permittee to maintain records showing the types of petroleum liquids stored, the maximum true vapor pressure of the liquids, the storage vessels dimensions and analysis showing the capacity of the vessel.
	Total combined emissions for sources T014, T127 and T128 is 2.72 TPY VOC	N	Y										Y		For source T127 only: Other - BAT limitation (OAC rule 3745 31-05(A)(3) as established in PTI 04-0480.

EU(s)	Limitation	Basis		ND	O R	M	St	ENF	R	St	Rp	St	ET	Misc	Comments
		SIP (3745-)	Other												
T028, T101	The permittee shall comply with the recordkeeping requirements in 40 CFR 63.123 for Group 2 storage vessels with an internal floating roof	N	Y	Y	Y	Y	N	N	Y	N	Y	N	N	N	<p>These sources are not subject to CAM as they are subject to 40 CFR 63 subpart G.</p> <p>Other - 40 CFR 63 subpart G, 40 CFR 63 subpart F and 40 CFR 63 subpart A.</p> <p>ND - 40 CFR 63 subpart CC The provisions of the Refinery MACT do not apply to emission points subject to 40 CFR 63 subparts F, G, H and I.</p> <p>ET - Since there is no emission limit, testing is not required.</p>
	State storage vessel requirements	21-09 (L)	N												<p>State regulations require the permittee to maintain records showing the types of petroleum liquids stored, the maximum true vapor pressure of the liquids, the storage vessels dimensions and analysis showing the capacity of the vessel.</p> <p>OR - the permittee shall not store petroleum liquids in this vessel that has a true vapor pressure greater than 1.52 psia.</p>
T037, T047	Group 2 storage vessel with an external floating roof	N	Y	Y	N	Y	N	N	Y	N	Y	N	N	N	<p>These sources are not subject to CAM as they are subject to 40 CFR 63 subpart G.</p> <p>Other - 40 CFR 63 subpart G, subpart F and subpart A</p> <p>ND - 40 CFR 63 subpart CC The provisions of the Refinery MACT do not apply to emission points subject to 40 CFR 63 subparts F, G, H and I.</p> <p>OR - No operational restriction is required for Group 2 storage vessels. Appropriate M, R and Rp are required for these Group 2 storage vessels.</p> <p>ET - Since there is no emission limit, testing is not required.</p>

EU(s)	Limitation	Basis		ND	O R	M	St	ENF	R	St	Rp	St	ET	Misc	Comments	
		SIP (3745-)	Other													
	State storage vessel requirements	21-09 (Z)	N													State regulations require the tanks to be equipped with external floating roofs, all openings except bleeder vents, rim space vents, leg sleeves, sub drains and gauging/sampling wells shall be equipped with a projection into the tank below the surface.
T128	The permittee shall equip the fixed roof tank with an internal floating roof; Group 2 storage vessel	N	Y	Y	N	Y	N	N	Y	N	Y	N	Y	N		This source is not subject to CAM as it is subject to 40 CFR 60 subpart Kb.  Other 40 CFR 60 subpart Kb  ND- 40 CFR 63 subpart CC . A Group 1 vessel that is also subject to 40 CFR 60 subpart Kb, is required to comply only with the requirements of 40 CFR 60 subpart Kb except as stated in 40 CFR 63.640(n)(8).
	Wastewater storage vessel requirements	N	Y													Other - 40 CFR 61 subpart FF The permittee may elect to install a fixed roof and IFR that meets the requirements of 40 CFR 60.112b(a)(1) of subpart Kb.
	State storage vessel requirements	21-09 (L)	N													State regulations require the tanks to be equipped with internal floating roofs, bleeder vents closed at all times except when roof is floated off and that all openings except sub drains shall be equipped with a cover, seal or lid and kept in a closed position.
	Total combined emissions for sources T014, T127 and T128 is 2.72 TPY VOC	N	Y													Other - BAT limitation (OAC rule 3745 31-05(A)(3) as established in PTI 04-0480.

EU(s)	Limitation	Basis		ND	O R	M	St	ENF	R	St	Rp	St	ET	Misc	Comments
		SIP (3745-)	Other												
T150, T155, T161, and T162	The permittee shall record the dimensions and capacity of the Group 2 fixed roof storage vessels	N	Y	N	N	Y	N	N	Y	N	Y	N	Y	N	These sources are not subject to CAM as they are subject to 40 CFR 63 subpart CC.  Other 40 CFR 60 subpart Kb
	Changing from a Group 2 to a Group 1 emission point	N	Y												Other - 40 CFR 63 subpart CC
	State storage vessel requirements	21-09 (L)	N		Y										OR - The permittee shall not place, store, or hold in this fixed tank any petroleum liquid has a true vapor pressure greater than 1.52 psia.
	Emission Limitation for VOC	N	Y												Other - BAT limitation (OAC rule 3745 31-05(A)(3)) -- T150; PTI 04-796; 0.08 TPY VOC -- T155; PTI 04-898; 0.63 TPY VOC -- T161; PTI 04-796; 2.61 TPY VOC -- T162; PTI 04-01230; 2.61 TPY VOC