



SOUTH COAST AIR QUALITY MANAGEMENT DISTRICT

STATIONARY SOURCE COMPLIANCE DIVISION

APPLICATION PROCESSING AND CALCULATIONS

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APPL. NO.
466936 et al

DATE
12/17/2013

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**Administrative Change &
Rule 1176 (e)(2)(A)(iii) – Alternative Control Measure**

APPLICANT'S NAME: VALERO WILMINGTON ASPHALT PLANT

FACILITY ADDRESS: 1651 ALAMEDA STREET
WILMINGTON, CA 90744

EQUIPMENT ADDRESS: 1651 ALAMEDA STREET
WILMINGTON, CA 90744

FACILITY ID NUMBER: 800393
RECLAIM CYCLE 1 NOX FACILITY

EQUIPMENT DESCRIPTION:

FACILITY PERMIT SECTION D					
Equipment	ID No.	Connected To	RECLAIM Source Type/ Monitoring Unit	Emissions * And Requirements	Conditions
Process 1 : CRUDE DISTILLATION					
System 3: HEATERS					S18.2
HEATER, VACUUM, H-1, NATURAL GAS, PROCESS GAS, REFINERY GAS, WITH LOW NOX BURNER, 19.3 MMBTU/HR WITH A/N: 388921 467281	D13	D23 D124	NOX: LARGE SOURCE	CO: 400 PPMV (5) [RULE 1146, 11-17-2000; RULE 1146, 9-5-2008]; CO: 2000 PPMV (5A) [RULE 407, 4-2-1982]; NOX: 40 PPMV (3) [RULE 2012, 5-6-2005]; PM: (9) [RULE 404, 2-7-1986]; PM: 0.1 GRAINS/SCF (5) [RULE 409, 8-7-1981]; SOX: 500 PPMV (5) [RULE 407, 4-2-1982]	B61.1, D90.4, D328.1, D328.3, H23.13, H23.16
BURNER, NATURAL GAS, REFINERY GAS, JOHN ZINK, 5 BURNERS					
FUGITIVE EMISSIONS, MISCELLANEOUS A/N: 388921 467281	D150				H23.12
Process 7 : WASTEWATER TREATMENT					
System 1: WASTEWATER TREATMENT					
VESSEL, OILY WATER TREATER, D-7, HEIGHT: 9 FT 6 IN; DIAMETER: 5 FT A/N: 464365 466936	D77				
MIXER, OILY WATER, D-11, WASTE WATER, HEIGHT: 5 FT; DIAMETER: 1 FT A/N: 464365 466936	D78				



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Equipment	ID No.	Connected To	RECLAIM Source Type/ Monitoring Unit	Emissions * And Requirements	Conditions
SUMP, WITH SKIMMER, DEPTH: 11 FT; DIAMETER: 7 FT A/N: 464365 466936	D79	C109		VOC: 500 PPMV [RULE 1176, 9-13-1996]	H23.1
TANK NO. 19, RECOVERED OIL DECANTING, HEIGHT: 13 FT 1 ON; DIAMETER: 4 FT 1 IN A/N: 464365 466936	D81	C109		VOC: 500 PPMV [RULE 1176, 9-13-1996]	H23.1
TANK, NO. 18, SLOP OIL TRANSFER, HEIGHT: 6 FT 3 IN; DIAMETER: 4 FT 1 IN A/N: 464365 466936	D83	C109		VOC: 500 PPMV [RULE 1176, 9-13-1996]	H23.1
CARBON ADSORBER, MODEL VSC-200, 55 GALLON CAPACITY A/N: 464365 466936 [No change]	C109	D79 D81 D83			D90.5, E128.1, E153.1
OIL WATER SEPARATOR, FLOATING ROOF, TK-3001, PRIMARY OIL RECOVERY, WITH AN OIL SKIMMER AND A 5-HP MIXER, HEIGHT: 28 FT; DIAMETER: 26 FT 9 IN WITH A/N: 464365 466936 FLOATING ROOF WELDED SHELL PRIMARY SEAL, METALLIC SHOE	D111				H23.10
OIL WATER SEPARATOR, FLOATING ROOF, TK-3002, PRIMARY OIL RECOVERY, WITH AN OIL SKIMMER AND A 5-HP MIXER, HEIGHT: 28 FT; DIAMETER: 26 FT 9 IN WITH A/N: 464365 466936 FLOATING ROOF WELDED SHELL PRIMARY SEAL, METALLIC SHOE	D112				H23.10
TANK, HORIZONTAL VERTICAL, V-3000 UNICEL, INDUCED GAS COALESCER AND FLOTATION SEPARATOR; LENGTH HEIGHT: 6 FT; DIAMETER: 4 FT A/N: 464365 466936	D113	D124		VOC: 500 PPMV (5) [RULE 1176, 9-13-1996]	H23.10



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OIL WATER SEPARATOR, FLOATING ROOD, TK-3003, FINAL OIL RECOVERY, WITH AN OIL SKIMMER AND A 5-HP MIXER, HEIGHT: 28 FT; DIAMETER: 26 FT 9 IN WITH A/N: 464365 466936 FLOATING ROOF, WELDED SHELL PRIMARY SEAL, METALLIC SHOE	D114				H23.10
OIL WATER SEPARATOR, FLOATING ROOD, TK-3004, FINAL OIL RECOVERY, WITH AN OIL SKIMMER AND A 5-HP MIXER, HEIGHT: 28 FT; DIAMETER: 26 FT 9 IN WITH A/N: 464365 466936 FLOATING ROOF, WELDED SHELL PRIMARY SEAL, METALLIC SHOE	D115				H23.10
KNOCK OUT POT, D-3005, HEIGHT: 6 FT 6 IN; DIAMETER: 1 FT 6 IN A/N: 464365 466936	D124	D13 D63 D64 D113			
DRAIN SYSTEM COMPONENT A/N: 464365 466936	D174				H23.1
FUGITIVE EMISSIONS, MISCELLANEOUS A/N: 464365 466936	D161				H23.12
Process 9 : STEAM GENERATION					P18.1
BOILER, H-2A, NATURAL GAS, PROCESS GAS, REFINERY GAS, CLEAVER-BROOKS, MODEL CR-200-350, WITH LOW NOX BURNER, FLUE GAS RECIRCULATION, 14.65 MMBTU/HR WITH A/N: 388922 467283 BURNER, NATURAL GAS, REFINERY GAS, ONE BURNER	D63	D124	NOX: LARGE SOURCE	CO: 400 PPMV (5) [RULE 1146, 11-17-2000; RULE 1146, 9-5-2008]; CO: 2000 PPMV (5A) [RULE 407, 4-2-1982]; NOX: 40 PPMV (3) [RULE 2012, 5-6-2005]; PM: 0.1 GRAINS/SCF (5) [RULE 409, 8-7-1981]; SOX: 500 PPMV (5) [RULE 407, 4-2-1982]	B61.1, D90.4, D328.1, D328.3, H23.13, H23.16



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Equipment	ID No.	Connected To	RECLAIM Source Type/ Monitoring Unit	Emissions * And Requirements	Conditions
BOILER, H-2B, NATURAL GAS, PROCESS GAS, REFINERY GAS, CLEAVER-BROOKS, MODEL CR-200-350, WITH LOW NOX BURNER, FLUE GAS RECIRCULATION, 14.65 MMBTU/HR WITH A/N:388923 467284 BURNER, NATURAL GAS, REFINERY GAS, ONE BURNER	D64	D124	NOX: LARGE SOURCE	CO: 400 PPMV (5) [RULE 1146, 11-17-2000; RULE 1146, 9-5-2008]; CO: 2000 PPMV (5A) [RULE 407, 4-2-1982]; NOX: 40 PPMV (3) [RULE 2012, 5-6-2005]; PM: 0.1 GRAINS/SCF (5) [RULE 409, 8-7-1981]; SOX: 500 PPMV (5) [RULE 407, 4-2-1982]	B61.1, D90.4, D328.1, D328.3, H23.13, <u>H23.16</u>
FUGITIVE EMISSIONS, MISCELLANEOUS A/N:388923 467284	D206				H23.12

BACKGROUND/HISTORY:

Valero Wilmington Asphalt Plant (Valero) operates an asphalt plant in the harbor area of Los Angeles County at 1651 Alameda Street, Wilmington, CA 90744. Crude oil is processed in the atmospheric and vacuum units, and the resulting naphtha and kerosene fractions are sold to other oil refineries for further processing. The bottom fractions from the vacuum unit are sold as asphalt.

Oily water from the refinery process is routed to the Wastewater Treatment System, which uses a series of tanks to separate the oil and wastewater. The recovered oil is routed back to the refinery process, and the treated wastewater is discharged to the LA County Sewer District.

The Valero Wilmington Asphalt Plant is a Title V and a NOx RECLAIM facility. The Title V permit was issued August 7, 2012.

On April 7, 2007, Valero submitted seven (7) applications:

- One PO no PC for the Wastewater Treatment system (P7/S1)
- Four administrative change applications for Heater H-1 (D13), Boilers H-2A and H-2B (D63 and D64), and Wastewater Treatment system (P7/S1) (the Wastewater Treatment System application will be cancelled, since it is a duplicate application)
- Two RECLAIM permit amendments (one to be cancelled, since it is a duplicate)

Carbon adsorber C109 is not affected by the requested changes.

These applications were submitted to resolve differences between the process flow shown with the previous application(s) and the actual field configuration, as well as to comply with SCAQMD Rule 1176 (e)(2)(A)(iii) – Alternate Control Measure requirement for the wastewater separator. Applications are summarized in Table 1.

Table 1: AQMD applications submitted

A/N	Application Date	Equipment	Action
466935	4/4/07	RECLAIM Amendment	RECLAIM Amendment
466936	4/4/07	Wastewater Treatment (P7/S1)	Alternate control measure for IGF Vessel D113, remove



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			“connected to” D13, D63 and D64 reference
467281	4/4/07	Heater (D13)	Admin change, remove “connected to” D124 reference
467282	4/4/07	Wastewater Treatment (P7/S1)	To be cancelled, duplicate application
467283	4/4/07	Boiler (D63)	Admin change, remove “connected to” D124 reference
467284	4/4/07	Boiler (D64)	Admin change, remove “connected to” D124 reference
467285	4/4/07	RECLAIM Amendment	To be cancelled, duplicate application

COMPLIANCE RECORD REVIEW:

The following was taken from the District’s Compliance Tracking System for the period from December 1, 2010 through December 13, 2013. None of the NCs or NOVs, nor any complaints, apply to the wastewater treatment system, heater or boilers involved in this permit revision.

NOV/ NC

Ticket Number	Ticket Type	Violation date	Violation Description	Current Status
P61013	NOV	09/10/13	RULE 1173 – OPEN ENDED LINE FOUND.	In Compliance
E07232	NC	09/04/13	RULE 2012 – REPORT MONTHLY MASS EMISSIONS OF NOX TO DISTRICT WITHIN REQUIRED TIME FRAMES	In Compliance
P61012	NOV	04/30/12	RULE 2004 – FAILURE TO SUBMIT ACCURATE QCERS FOR 1 ST /3 RD QUARTER OF C/Y 2012.	In Compliance
P53530	NOV	04/14/11	RULE 3002, 463 – FAILURE TO EQUIP TANKS D145/D146 WITH VAPOR TIGHT COVERS CLOSED AT ALL TIMES, FAILURE TO COMPLY WITH CONDITION #23.3, FAILURE TO MAINTAIN D146 IN GOOD OPERATING ORDER	In Compliance

Rule 301 Fee Evaluation:



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The following fees are applicable to these applications.

Table 1: Rule 301 Fees

<u>A/N</u>	<u>Equipment</u>	<u>Type</u>	<u>Fee Schedule</u>	<u>Fee Required, \$</u>	<u>Fees Paid, \$</u>	<u>R301 Amend Date</u>
466935	Facility Permit Amendment	85	n/a	697.36	697.36	6/9/2006
466936	Wastewater Treatment ^a <small>*Higher fee paid for PO no PC, expedited</small>	50	D	5551.88	7402.51	6/9/2006
467281	Heater H-1	63	D	489.20	489.20	6/9/2006
467282	Knockout Pot in WW treatment system <small>*Application consolidated with A/N 466936/cancelled</small>	63	D	489.20	489.20	6/9/2006
467283	Boiler H-2A	63	D	489.20	489.20	6/9/2006
467284	Boiler H-2B	63	D	489.20	489.20	6/9/2006
467285	Facility Permit Amendment	80	n/a	\$697.36	\$697.36	6/9/2006
TOTAL:				\$8,903.40	\$10,754.03	
Net Fee Due:					(\$1,850.63)	

^a Expedited processing not done, so expedited processing fee will be refunded

PROCESS DESCRIPTION:

Oily water from the refinery process is routed through the wastewater treatment system. Wastewater generated within the process unit is collected in a below grade sump (D79). Free oil is skimmed from the surface and sent back to the refinery crude oil tanks via the Recovered Oil Decanting Tank No. 19 (D81) and the Slop Oil Transfer Tank No. 18 (D83). The sump and Tank Nos. 18 & 19 are vented to one 55 gallon activated carbon drum (C109).

Wastewater from the sump is pumped to the primary recovery oil-water separator tanks, TK-3001 (D111) & TK-3002 (D112). Recovered oil from TK-3001 & TK-3002 is sent back to the refinery crude input tanks. Water from TK-3001 & TK-3002 goes to the Unicel V-3000 Induced Gas Flotation Separator (IGF Vessel – D113). The Unicel V-3000 is listed as a horizontal tank on the permit, this shall be corrected to indicate that this is actually a vertical tank.

The Unicel IGF vessel utilizes a water-soluble polymer and small natural gas bubbles to flocculate and separate more oil from the wastewater. Recovered oil is sent back to TK-3001 & TK-3002. The natural gas is collected in the headspace of the IGF vessel and recycled back into the wastewater feed stream to produce more bubbles. The natural gas used in this IGF unit comes from the natural gas supply line for this refinery via the D-3005 Knockout Pot (this knockout pot is inaccurately reflected as being connected to Heater H-1, and Boilers H-2A and H-2B, which will be corrected as part of this permit action).

The IGF vessel, knockout pot and gas lines are all operated at approx. 35 psig so gas can flow into and out of the IGF vessel as the liquid level fluctuates. The IGF vessel and the knockout pot each have a pressure relief device set at 50 psig vented to the atmosphere. The IGF unit operates as a sealed vessel under normal operating conditions. Natural gas is used as the blanketing gas and the flotation gas. Any VOC's from the wastewater are contained within the natural gas blanket; therefore, the natural gas blanket serves as an alternate control measure for the IGF unit for Rule 1176 purposes.

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Water from the IGF vessel is sent to the final recovery oil-water separator tanks, TK-3003(D114) & TK-3004 (D115). After this separation step, the wastewater is discharged to the LA County Sewer Districts.

Emissions Calculations:

There are no changes in emissions as part of this permit action. Removing the “connected to” reference between the Knockout Pot (D124) and Heater H-1 (D13) and Boilers H-2A (D63) and H-2B (D64) do not affect emissions. The approval of a Rule 1176 Alternate Control Measure for the wastewater system also does not affect emissions.

EVALUATION AND RULE REVIEW:

Rule 212 – Standards for Approving Permits, Amended Nov. 14, 1997

212(a) The wastewater treatment system with alternate control measure and changes to the “connected to” descriptions are expected to operate without emitting air contaminants in violation of the provision of Division 26 of the State Health & Safety Code and District rules.

212(b) Not applicable.

212(c) Not applicable. This facility is not located within 1,000 ft of any school and there are no emission increases.

212(d)-(h) Not applicable.

Rule 401 – Visible Emissions, Amended Nov. 9, 2001

Visible emissions are not expected under normal operation. Compliance with rule is expected.

Rule 402 – Nuisance, Adopted May 7, 1976

Nuisance complaints are not expected. Compliance with rule is expected.

Rule 404 – Particulate Matter – Concentration, Amended February 7, 1986

No changes to the boilers or heater emissions occur as part of this permit action. Continued compliance is expected.

Rule 407 – Liquid and Gaseous Air Contaminants, Amended April 2, 1982

No changes to the boilers or heater emissions occur as part of this permit action. Continued compliance is expected.

Rule 409 – Combustion Contaminants, Amended August 7, 1981

No changes to the boilers or heater emissions occur as part of this permit action. Continued compliance is expected.

Rule 431.1 – Sulfur Content of Gaseous Fuels, Amended June 12, 1998

No changes to the boilers or heater emissions occur as part of this permit action. Continued compliance is expected.

Rule 464 – Wastewater Separators, Amended December 7, 1990

464(b)(1)(A) The Unicel IGF vessel (D113) in the wastewater treatment system is a enclosed vessel. No changes in operation of this vessel are part of this permit action. Continued compliance is expected.

464(b)(2) The Unicel IGF vessel (D113) in the wastewater treatment system is a one piece enclosed vessel with no visible gaps. No changes in operation of this vessel are part of this permit action. Continued compliance is expected.

464(b)(3) No forebay is present in the Unicel IGF vessel (D113) in the wastewater treatment system. Not applicable.



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464(b)(4) Oil skimmed from the Unicel IGF vessel (D113) in the wastewater treatment system is sent back to the oil/water separators (D111 & D112) and ultimately back to the refinery crude oil input. No changes in operation of this vessel are part of this permit action. Continued compliance is expected.

Rule 1146 – Emissions of NOx from Boilers, Steam Generators and Process Heaters, Amended September 5, 2008

Being a NOx RECLAIM facility, any requirements pertaining to NOx emissions are subsumed by RECLAIM.

1146(c)(4) No changes to the boilers or heater emissions occur as part of this permit action. Continued compliance is expected.

1146(d)(9) Heater H-1 and the boilers have now been tagged with the Condition H23.16, making them subject to the applicable requirements of Rule 1146. Previously this equipment had been tagged with Condition D328.1 requiring the operator to determine compliance with the CO emission limit with either a source test every 5 years or an annual test with a portable analyzer, however, the 2008 revision of Rule 1146 requires more frequent testing for CO, so the Rule 1146 tagging has been removed from Condition D328.1.

Rule 1173 – Fugitive Emissions of Volatile Organic Compounds, Amended February 6, 2009

Rule 1173 categorizes leak types and stipulates maintenance & reporting requirements for fugitive components. No changes in fugitive components are expected as part of this permit action. Continued compliance is expected.

1173(h)(4) Atmospheric Process PRD Requirements – Compliance Plan required
The Valero Asphalt Plant has an approved compliance plan (A/N 533452) listing the pressure relief valve on the V-3000 Unicel IGF vessel and the pressure relief valve on the D-3005 knockout drum.

Rule 1176 – VOC Emissions from Wastewater Systems, Amended September 13, 1996

1176(d)(2) The operator has an approved compliance plan, A/N 388968. Plan will be reviewed and any needed changes made. Compliance is met.

1176(e)(1) The V-3000 Unicel IGF vessel and the D-3005 knockout drum are sealed pressure vessels and are therefore not likely to exceed 500 ppm VOC. Compliance is expected.

1176(e)(2)(A)(ii) The sump (D79) is equipped with a fixed solid cover with all openings sealed. The off gases are vented to an activated carbon canister (C109) which achieves VOC control efficiency of 95% or above. Compliance is expected.

1176(e)(2)(A)(iii) The V-3000 Unicel IGF vessel and the D-3005 Knockout Pot are sealed pressure vessels operating at 35 psig.
The IGF vessel is vented to the fuel gas system through the knockout pot. Rule 1176 (e)(6) requires a VOC control efficiency of 95 percent by weight or VOC emissions not greater than 500 ppm above background. There have been no NCs or NOV's for exceeding the 500 ppm VOC limit in this existing equipment, and continued compliance is expected. Therefore, venting the V-3000 Unicel IGF vessel through the knockout pot to the fuel gas system qualifies as an alternate VOC control measure allowed by paragraph (e)(2)(A)(iii).

1176(e)(2)(B)(i) The solid cover is impermeable to VOC and all openings are sealed. Compliance is expected.

1176(e)(2)(B)(ii) No drain on cover. Not applicable.

1176(e)(2)(B)(iii) Gauges and sampling openings will be kept closed and free of gaps. Compliance is expected.

1176(e)(2)(B)(iv) Hatches on covers will be kept closed and is free of gaps. Compliance is expected.

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1176(e)(2)(B)(v) The perimeter of the cover shall form a seal free of gaps. Compliance is expected.

1176(e)(2)(B)(vi) Not applicable.

1176(e)(6)(A) The APC devices are expected to of achieve control efficiencies greater than 95% and/or VOC emission less than 500 ppm (as required by permit condition). Compliance is expected.

REGULATION XIII – New Source Review

Rule 1303 – REQUIREMENTS, Amended April 20, 2001

There is no change in emissions as a result of this permit action, therefore Rule 1303 is not applicable.

REGULATION XIV – Toxics and Other Non-Criteria Pollutants

Rule 1401 – New Source Review of Toxic Air Contaminants, Amended June 15, 2001

There is no change in toxic air contaminant emissions as a result of this permit action, therefore Rule 1401 is not applicable.

REGULATION XX – RECLAIM PERMITS, Amended April 20, 2001

The Valero Asphalt Plant is a NOx RECLAIM facility. The wastewater treatment system is not a NOx emission source, and therefore RECLAIM requirements do not apply. The boilers and heater are RECLAIM NOx sources, however there are no changes to NOx emissions as a result of removing the “connected to” D124 reference. Continued compliance with Regulation XX for NOx is expected.

REGULATION XXX – TITLE V PERMITS, Amended November 5, 2010

Valero was issued a Title V operating permit on August 7, 2012. This application is classified as an minor permit revision as defined in 3000(b)(15). Minor permit revisions are exempt from public participation per 3006(b), but are required to be submitted to the EPA per 3003(j)(1)(B) and state per 3003(m)(1). The proposed minor permit revision shall be submitted to the EPA and State.

STATE REGULATIONS

California Environmental Quality Act (CEQA)

The applicant has submitted Form 400-CEQA, California Environmental Quality Act Applicability indicating that CEQA document is not required.

FEDERAL REGULATIONS

NSPS for Petroleum Refinery – 40CFR60 Subpart J

The requirements of Subpart J apply to fuel gas combustions devices at petroleum refineries. The heaters and boilers are fueled with process gas, and are therefore subject to NSPS Subpart J. There are no projected changes to compliance with Subpart J as a result of removing the “connected to” D124 reference. The heater and boilers are tagged with Conditions B61.1, D90.4, and H23.13 requiring compliance with various provisions of Subpart J. Continued compliance is expected.

NSPS for Petroleum Refinery Wastewater Operations – 40CFR60 Subpart QQQ

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The requirements of Subpart QQQ apply to wastewater operations, including oil/water separators, located at petroleum refineries. The IGF and knockout pot are therefore subject to NSPS Subpart QQQ. Continued compliance is expected.

§60.692-3 Standards for Oil-Water Separators.

- 60.692-3(a)(1) The IGF is a sealed tank which is equivalent to a roof that completely covers the equipment with no separation between the roof and the wall.
- 60.692-3(a)(2) Vapor from the IGF is directed to a fuel gas system, and so is not purged unless directed to that control device.
- 60.692-3(a)(3) The IGF is a sealed tank with which is equivalent to having solid covers and roofs that are gasketed and will be closed at all times.
- 60.692-3(a)(4) The IGF will be checked at least semiannually for cracks or gaps .
- 60.692-3(a)(5) The IGF will be repaired as soon as possible, but no later than 15 days of a broken seal, gasket, or other problem being identified.

§60.692-5 Standards for Closed Vent Systems and control devices.

- 60.692-5(a) This standard does not apply since gas is routed to a fuel gas system, which is a closed vent system.

NESHAP for Benzene Waste Operations – 40CFR61 Subpart FF

The requirements of Subpart FF do not apply to the VOC emissions control for the IGF and knockout pot since the gas stream is routed to the fuel gas system per exemption in § 61.340(d)

NESHAP for Industrial, Commercial, and Institutional Boilers and Process Heaters – 40CFR63 Subpart DDDDD

Having a total combined HAP of less than 1 tons for fiscal year 2012, Valero is not considered a major source for HAPs. Hence, this subpart does not apply.

NESHAP for Petroleum Refinery– 40CFR63 Subpart CC

Having a total combined HAP of less than 1 tons for fiscal year 2012, Valero is not considered a major source for HAPs. Hence, this subpart does not apply.

RECOMMENDATION:

It is recommended that a Permit to Operate be issued in the Facility Permit Section D subject to the following conditions:



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DEVICE ID.	FP COND. NO.	CONDITION				
Process 9	P18.1	<p>All affected devices listed under this process/system shall be used only to received, recover, and/or dispose of vent gases routed from the system(s) or process(es) listed below, in addition to specific devices identified in the "connected to" column:</p> <p>Gas Oil/Naphtha Tank Truck Loading (Process: 5, System: 0)</p> <p>Crude Distillation Unit (Process: 1, System:1)</p> <p>Fuel Gas Treating (Hiperion Unit) (Process: 3, System: 1)</p> <p>[RULE 1303(a)(1)-BACT, 05/10/1996; RULE 1303(a)(1)-BACT, 12/06/2002]</p> <p>[Processes subject to this condition: 9]</p>				
Process 1, System 3	S18.2	<p>All affected devices listed under this process/system shall be used only to receive, recover, and/or dispose of vent gases routed from the system(s) or process(es) listed below, in addition to specific devices identified in the "connected to" column:</p> <p>Fuel Gas Treating (Process: 3, System: 1)</p> <p>Gas Oil/Naphtha Tank Truck Loading (Process: 5, System: 0)</p> <p>Crude Distillation Unit (Process: 1, System:1)</p> <p>[RULE 1303(a)(1)-BACT, 05/10/1996; RULE 1303(a)(1)-BACT, 12/06/2002; RULE 1303(b)(2) – Offset, 5-10-1996; RULE 1303(b)(2) – Offset, 12-6-2002]</p> <p>[Systems subject to this condition: Process 1, System 3]</p>				
D13, D63, D64	B61.1	<p>The operator shall not use fuel gas containing the following specified compounds:</p> <table border="1"> <thead> <tr> <th>Compound</th> <th>ppm by volume</th> </tr> </thead> <tbody> <tr> <td>H2S greater than</td> <td>160</td> </tr> </tbody> </table> <p><u>The H2S concentration limit of 160 ppm shall be based on a rolling 3-hour averaging period at the standard conditions of 60 F and 14.7 psia, as defined in Rule 102. This H2S concentration is equivalent to 162 ppm at the standard conditions of 68 F and 29.92" Hg, as defined in 40CFR 60 Subpart A.</u></p> <p>[40CFR 60 Subpart J, 10-4-1991 9-12-2012]</p> <p>[Devices subject to this condition: D13, D63, D64]</p>	Compound	ppm by volume	H2S greater than	160
Compound	ppm by volume					
H2S greater than	160					



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DEVICE ID.	FP COND. NO.	CONDITION
D13, D63, D64	D90.4	<p>The operator shall continuously monitor the H2S concentration in the fuel gas before being burned in this device according to the following specifications:</p> <p>The operator shall use an NSPS Subpart J approved instrument meeting the requirements of 40CFR60 Subpart J to monitor the parameter.</p> <p>The operator shall also install and maintain a device to continuously record the parameter being monitored.</p> <p>The operator may monitor the H2S concentration at a single location for fuel combustion devices, if monitoring at this location accurately represents the concentration of H2S in the fuel has being burned in this device.</p> <p>[40CFR 60 Subpart J, 10-4-1991 9-12-2012]</p> <p>[Devices subject to this condition: D13, D63, D64]</p>
C109	D90.5	<p>The operator shall periodically monitor the VOC concentration at the outlet of the carbon canister according to the following specifications:</p> <p>The operator shall monitor once every day.</p> <p>The operator shall use a District approved Organic Vapor Analyzer (OVA) to monitor the parameter.</p> <p>The operator shall calibrate the instrument used to monitor the parameter in ppmv methane.</p> <p>[RULE 1176, 9-13-1996; RULE 3004(a)(4)-Periodic Monitoring, 12-12-1997]</p> <p>[Devices subject to this condition: C109]</p>
D13, D63, D64	D328.1	<p>The operator shall determine compliance with the CO emission limit(s) either (a) conducting a source test at least once every five years using AQMD Method 100.1 or 10.1; or (b) conducting a test at least annually using a portable analyzer and AQMD-approved test method. The test shall be conducted when the equipment is operating under normal conditions to demonstrate compliance with the CO emission limit. The operator shall comply with all general testing, reporting, and recordkeeping requirements in Sections E and K of this permit.</p> <p>[RULE 1146, 11-17-2000; RULE 3004(a)(4) – Periodic Monitoring, 12-12-1997; RULE 407, 4-2-1982]</p> <p>[Devices subject to this condition: D13, D63, D64]</p> <p><i>Rule 1146 requires more frequent monitoring of CO emissions. Condition H23.16 will be added to require devices D13, D63, D64 comply with applicable requirements of Rule 1146.</i></p>



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DEVICE ID.	FP COND. NO.	CONDITION
D13, D63, D64	D328.3	<p>The operator shall determine compliance with the total sulfur compound (as SO₂) emission limit(s) either: (a) conducting a source test at least once every five years using AQMD Method 100.1 or 7.1; or (b) conducting a test at least annually using a portable analyzer and AQMD- approved test method. The test shall be conducted when the equipment is operating under normal conditions to demonstrate compliance with the SO_x emission limit(s). The operator shall comply with all general testing, reporting, and recordkeeping requirements in Sections E and K of this permit.</p> <p>[RULE 3004(a)(4) – Periodic Monitoring, 12-12-1997; RULE 407, 4-2-1982]</p> <p>[Devices subject to this condition: D13, D63, D64]</p>
C109	E128.1	<p>The operator shall keep all spent carbon in a tightly covered container which shall remain closed except when it is being transferred into or out of the container.</p> <p>[RULE 1303(a)(1)-BACT, 05-10-1996; RULE 1303(a)(1)-BACT, 12-06-2002]</p> <p>[Devices subject to this condition: C86, C109, C189, C190]</p>
C109	E153.1	<p>The operator shall change over the carbon in the adsorber whenever breakthrough occurs.</p> <p>For the purpose of this condition, breakthrough occurs when the VOC monitor reading indicates a concentration of 500 ppmv at the outlet of each carbon adsorber.</p> <p>[RULE 1303(a)(1)-BACT, 05/10/1996; RULE 1303(a)(1)-BACT, 12/06/2002]</p> <p>[Devices subject to this condition: C86, C109]</p>



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DEVICE ID.	FP COND. NO.	CONDITION		
D79, D81, D83, D174	H23.1	This equipment is subject to the applicable requirements of the following rules or regulations:		
		Contaminant	Rule	Rule/Subpart
		VOC	District Rule	1176
		<p>[RULE 1176, 9-13-1996] [Devices subject to this condition: D79, D81, D83, D174]</p>		
D111, D112, D113, D114, D115	H23.10	This equipment is subject to the applicable requirements of the following rules or regulations:		
		Contaminant	Rule	Rule/Subpart
		VOC	District Rule	1176
		VOC	40CFR60, SUBPART	QQQ
<p>[RULE 1176, 9-13-1996; 40CFR 60 Subpart QQ, 5-5-1989 10-17-2000] [Devices subject to this condition: D111, D112, D113, D114, D115]</p>				
D150, D161, D206	H23.12	This equipment is subject to the applicable requirements of the following rules or regulations:		
		Contaminant	Rule	Rule/Subpart
		VOC	District Rule	1173
		<p>[Rule 1173, 5-13-1994 2-6-2009] [Devices subject to this condition: D148, D149, D150, D151, D153, D154, D155, D156, D157, D159, D160, D161, D162, D163, D206, D208]</p>		
D13, D63, D64	H23.13	This equipment is subject to the applicable requirements of the following rules or regulations:		
		Contaminant	Rule	Rule/Subpart
		H2S	40CFR60, SUBPART	J
		<p>[40CFR 60 Subpart J, 10-4-1991 9-12-2012] [Devices subject to this condition: D13, D63, D64]</p>		
D13, D63, D64	H23.16	This equipment is subject to the requirements of the following rules or regulations:		
		Contaminant	Rule	Rule/Subpart



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DEVICE ID.	FP COND. NO.	CONDITION		
		<u>CO</u>	<u>District Rule</u>	<u>1146</u>
<u>[RULE 1146, 11-17-2000; RULE 1146, 9-5-2008]</u> <u>[Devices subject to this condition: D13, D63, D64]</u>				