

Bay Area Air Quality Management District

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**Proposed
Permit Evaluation
and
Statement of Basis**

**Significant and Minor Revisions
to the
MAJOR FACILITY REVIEW PERMIT**

for
**Shore Terminals LLC
Facility #A0581**

Facility Address:
90 San Pablo Ave.
Crockett, CA 94525

Mailing Address:
90 San Pablo Ave.
Crockett, CA 94525

July 2022

Application Engineer: Jimmy Cheng
Site Engineer: Christopher Ablaza

Application: 31036, 30713

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Title V Statement of Basis

A. Background

This facility is subject to the Operating Permit requirements of Title V of the federal Clean Air Act, Title 70 of Volume 40 of the Code of Federal Regulations (CFR), and BAAQMD Regulation 2, Rule 6, Major Facility Review because it is a major facility as defined by BAAQMD Regulation 2-6-212 and a Phase II Acid Rain facility as defined by BAAQMD Regulation 2-6-217. It is an Acid Rain facility because it burns fossil fuel, serves a generator that is over 25 MW that is used to generate electricity for sale, and was built after November 15, 1990. It is a major facility because it has the “potential to emit,” as defined by BAAQMD Regulation 2-6-218, more than 100 tons per year of ammonia.

Major Facility Operating permits (Title V permits) must meet specifications contained in 40 CFR Part 70 as contained in BAAQMD Regulation 2, Rule 6. The permits must contain all applicable requirements (as defined in BAAQMD Regulation 2-6-202), monitoring requirements, recordkeeping requirements, and reporting requirements. The permit holders must submit reports of all monitoring at least every six months and compliance certifications at least every year.

In the Bay Area, state and District requirements are also applicable requirements and are included in the permit. These requirements can be federally enforceable or non-federally enforceable. All applicable requirements are contained in Sections I through VI of the permit.

Each facility in the Bay Area is assigned a facility identifier that consists of a letter and a 4-digit number. This identifier is also considered to be the identifier for the permit. The identifier for this facility is A0581.

This facility received its initial Major Facility Review permit on March 12, 2001, under Shore Terminals, LLC (formerly known as Wickland Oil Company), and it was renewed on July 11, 2007 and September 27, 2016. A Minor Revision was issued on April 18, 2006, and September 27, 2016.

For these revisions, the facility proposes to disconnect the fixed roof tanks S-38 (T-20106), S-40 (T-20108), S-42 (T-20110), S-43 (T-20111), and S-44 (T-3001) from the existing abatement systems (A-421 and A-422 Activated Carbon/Charcoal Adsorption) and retrofit these tanks with new internal floating roofs (IFR) to be installed within each of these tanks. Other revisions include changes to permit conditions to clarify intent, render existing emissions limits and requirements explicit, and to allow for postponement of annual source testing at S-27 Marine Loading Terminal until the next vessel loading event.

Permit Condition #6185 also currently requires continuous organics monitoring at these tanks. After the retrofit, these tanks will no longer be subject to the continuous

monitoring requirement in Permit Condition #6185 because these tanks will no longer be abated by carbon canisters; internal floating roof tanks (IFRTs) cannot be readily monitored or tested; and IFRTs are required to have circulation vents to meet American Petroleum Institute (API) standards (see Best Available Control Technology discussion below). This relaxation of monitoring is a Significant Revision of the Title V permit. Significant Revisions require a public notice. The other revisions are Minor Revisions of the Title V permit. The detail of these changes is in the evaluation for Application 30713, which is attached and forms part of this Statement of Basis and will also be explained in Section C.VI, Permit Conditions.

The proposed permit shows all changes to the permit in strikeout/underline format.

B. Facility Description

The facility is a bulk terminal that receives gasoline and petroleum products and distributes them either by pipelines or truck racks.

This bulk terminal consists of thirteen fixed roof tanks, ten external floating roof tanks, 1 tank truck loading rack, 1 marine loading wharf, 1 water pond, 1 oil-water separator, and 1 emergency diesel generator. The thirteen fixed roof tanks, which store gasoline or other petroleum products, and the marine loading wharf are abated by two Charcoal Adsorption Vapor Recovery Units (A-421 and A-422). The gasoline truck loading rack is abated by the Vapor Recovery System (A-1).

C. Permit Content

The legal and factual basis for the permit follows. The permit sections are described in the order presented in the permit.

I. Standard Conditions

This section contains administrative requirements and conditions that apply to all facilities. The section will contain a standard condition pertaining to Title IV (Acid Rain) requirements for fossil-fuel fired electrical generating facilities and the accidental release (40 CFR § 68) since these programs apply. Many of these conditions derive from 40 CFR § 70.6, Permit Content, which dictates certain standard conditions that must be placed in the permit. The language that the District has developed for many of these requirements has been adopted into the BAAQMD Manual of Procedures, Volume II, Part 3, Section 4, and therefore must appear in the permit.

The standard conditions also contain references to BAAQMD Regulation 1 and Regulation 2. These are the District's General Provisions and Permitting rules.

Changes to permit

No changes in this action.

II. Equipment

This section of the permit lists all permitted or significant sources. Each source is identified by an S and a number (e.g., S24).

Permitted sources are those sources that require a BAAQMD operating permit pursuant to BAAQMD Rule 2-1-302.

Significant sources are those sources that have a potential to emit of more than 2 tons per year of a “regulated air pollutant” (as defined in BAAQMD Rule 2-6-222) or 400 pounds per year of a “hazardous air pollutant” (as defined in BAAQMD Rule 2-6-210).

All abatement (control) devices that control permitted or significant sources are listed. Each abatement device whose primary function is to reduce emissions is identified by an A and a number (e.g., A-24). If a source is also an abatement device, such as when an engine controls VOC emissions, it will be listed in the abatement device table but will have an “S” number. An abatement device may also be a source (such as a thermal oxidizer that burns fuel) of secondary emissions. If the primary function of a device is to control emissions, it is considered an abatement (or “A”) device. If the primary function of a device is a non-control function, the device is considered to be a source (or “S”).

The equipment section is considered to be part of the facility description. It contains information that is necessary for applicability determinations, such as fuel types, contents or sizes of tanks, etc. This information is part of the factual basis of the permit.

Each of the permitted sources has previously been issued an authority to construct or a permit to operate pursuant to the requirements of BAAQMD Regulation 2, Permits. These permits are issued in accordance with state law and the District’s regulations. The capacities in the permitted sources table are the maximum allowable capacities for each source, pursuant to Standard Condition I.J and Regulation 2-1-403.

Changes to permit

Table II-A will be changed as follows:

- The source descriptions for S-38, S-40, S-42, S-43, and S-44 will be revised to reflect the conversion of these tanks from fixed roof tanks into internal floating roof tanks and reflect the materials stored in these tanks.
- Permit Condition 27277 has been added for S-38.
- NSR Application 30713 has been added for these tanks.

Table II-B will be changed as follows:

- S-38, S-40, S-42, S-43, and S-44 have been removed from the “Sources Controlled” column for A-421 and A-422 since these tanks are no longer required to be abated by A-421 and A-422.

Table II A - Permitted Sources

Each of the following sources has been issued a permit to operate pursuant to the requirements of BAAQMD Regulation 2, Permits. The capacities in this table are the maximum allowable capacities for each source, pursuant to Standard Condition I.J and Regulation 2-1-301.

S-#	Description	Make or Type	Model	Capacity	Grandfathered Limit, or Firm Limit and Basis
38	T-20106, ethanol/gasoline/petroleum storage tank	Internal Floating Roof Tank		8,022,000 gallons Facility Emissions Cap Condition 12677 Condition 27277	NSR Applications 6719 (1991) and 30713 (2022)
39	T-20107, MTBE/gasoline storage tank	Fixed Roof Tank		8,022,000 gallons Facility Emissions Cap Condition 12677	NSR Application 6719 (1991)
40	T-20108, ethanol/gasoline/petroleum storage tank	Internal Floating Roof Tank		8,022,000 gallons Facility Emissions Cap Condition 12677 Condition 27277	NSR Applications 6719 (1991) and 30713 (2022)
41	T-20109, MTBE/gasoline storage tank	Fixed Roof Tank		8,022,000 gallons Facility Emissions Cap Condition 12677	NSR Application 6719 (1991)
42	T-20110, ethanol/gasoline/petroleum storage tank	Internal Floating Roof Tank		8,022,000 gallons Facility Emissions Cap Condition 12677 Condition 27277	NSR Applications 6719 (1991) and 30713 (2022)
43	T-20111, ethanol/gasoline/petroleum storage tank	Internal Floating Roof Tank		8,022,000 gallons Facility Emissions Cap Condition 12677 Condition 27277	NSR Applications 6719 (1991) and 30713 (2022)
44	T-3001, ethanol/gasoline/petroleum storage tank	Internal Floating Roof Tank		1,260,000 gallons Facility Emissions Cap Condition 12677 Condition 27277	NSR Applications 6719 (1991) and 30713 (2022)

Table II B – Abatement Devices

A-#	Description	Source(s) Controlled	Applicable Requirement	Operating Parameters	Limit or Efficiency
A-1	Vapor Recovery System	S-22	BAAQMD Condition # 12677 Part 8A	Infrared combustible gas detector/recorder measures hydrocarbon concentration	0.08 lb POC/1000 gal
A-421	Charcoal Adsorption Vapor Recovery unit	S-27, S-32 through S-37, S-39, S-41	BAAQMD Condition # 6185 Part 5, Part 15	Infrared combustible gas detector measures hydrocarbon concentration	1 lb POC/ 1000 barrel
A-422	Charcoal Adsorption Vapor Recovery unit	S-27, S-32 through S-37, S-39, S-41	BAAQMD Condition # 6185 Part 5, Part 15	Infrared combustible gas detector measures hydrocarbon concentration	1 lb POC/ 1000 barrel

III. Generally Applicable Requirements

This section of the permit lists requirements that generally apply to all sources at a facility including insignificant sources and portable equipment that may not require a District permit. If a generally applicable requirement applies specifically to a source that is permitted or significant, the standard will also appear in Section IV and the monitoring for that requirement will appear in Sections IV and VII of the permit. Parts of this section apply to all facilities (e.g., particulate, architectural coating, odorous substance, and sandblasting standards). In addition, standards that apply to insignificant or unpermitted sources at a facility (e.g., refrigeration units that use more than 50 pounds of an ozone-depleting compound) are placed in this section.

Unpermitted sources are exempt from normal District permits pursuant to an exemption in BAAQMD Regulation 2, Rule 1. They may, however, be specifically described in a Title V permit if they are considered “significant sources” as defined in BAAQMD Rule 2-6-239.

Changes to Permit:

No changes in this action.

IV. Source-Specific Applicable Requirements

This section of the permit lists the applicable requirements that apply to permitted or significant sources. These applicable requirements are contained in tables that pertain to one or more sources that have the same requirements. The order of the requirements is:

- District Rules
- SIP Rules (if any) are listed following the corresponding District rules. SIP rules are District rules that have been approved by EPA for inclusion in the California State Implementation Plan. SIP rules are “federally enforceable” and a “Y” (yes) indication will appear in the “Federally Enforceable” column. If the SIP rule is the current District rule, separate citation of the SIP rule is not necessary and the “Federally Enforceable” column will have a “Y” for “yes”. If the SIP rule is not the current District rule, the SIP rule or the necessary portion of the SIP rule is cited separately after the District rule. The SIP portion will be federally enforceable; the non-SIP version will not be federally enforceable, unless EPA has approved it through another program.
- Other District requirements, such as the Manual of Procedures, as appropriate.
- Federal requirements (other than SIP provisions)
- BAAQMD permit conditions. The text of BAAQMD permit conditions is found in Section VI of the permit.
- Federal permit conditions. The text of Federal permit conditions, if any, is found in Section VI of the permit.

Section IV of the permit contains citations to all applicable requirements. The text of the requirements is found in the regulations, which are readily available on the District’s or EPA’s websites, or in the permit conditions, which are found in Section VI of the permit. All monitoring requirements are cited in Section IV. Section VII is a cross-reference between the limits and monitoring requirements. A discussion of monitoring is included in Section C.VII of this permit evaluation/statement of basis.

CHANGES TO PERMIT

Table IV-F will be changed as follows:

- The POC/NPOC hourly and annual emissions limits in Permit Condition #6185 Part 4a will be added for S-27, Marine Vessel Loading/Unloading Terminal.
- Part 27 has been added since it was previously omitted.

Table IV-G will be changed as follows:

- The table description has been revised to remove S-38, S-40, S-42, S-43, and S-44.
- The POC/NPOC daily emissions limit in Permit Condition #6185 Part 2a and annual emissions limit in Permit Condition #6185 Part 3a will be added for tanks S-32, S-33, S-34, S-35, S-36, S-37, S-38, S-39, S-40, and S-41.

The following table has been added:

- Table IV-H has been added for S-38, S-40, S-42, S-43, and S-44, which are being converted from fixed roof tanks into internal floating roof tanks.

Table IV –F
Source-specific Applicable Requirements
S-27–MARINE VESSEL LOADING/UNLOADING TERMINAL

Applicable Requirement	Regulation Title or Description of Requirement	Federally Enforceable (Y/N)	Future Effective Date
BAAQMD Condition # 6185	Permit Conditions		
Part 4	Total hydrocarbon liquid loaded shall not exceed 47.6 million barrels per year [Basis: Cumulative Increase]	Y	
Part 4a	Total combined POC/NPOC emissions shall not exceed 47,600 pounds in any consecutive 12-month period and 10 pounds per hour, and use of additional materials does not increase toxic emissions above any Regulation 2-5 triggers [Basis: Cumulative Increase; Toxics]	Y	
Part 5	A-421 and A-222 shall not exceed 1 pound of POCs per 1000 barrels [Basis: Cumulative Increase]	Y	
Part 12	Minimize fugitive leaks during connection and disconnection [Basis: Regulation 8-18]	Y	
Part 14	Regenerative carbon system shall install an infrared combustible gas detector or District approved equivalent at the outlet of these carbon units [Basis: NSPS]	Y	
Part 15	Regenerative carbon system shall include a continuous temperature monitor and recorder to measure the temperature of each of the four carbon beds [Basis: NSPS]	Y	
Part 25	Total pumping rate shall not exceed 10,000 barrels per hour [Basis: Cumulative Increase]	Y	
Part 26	Only specified material can be transferred [Basis: Cumulative Increase]	Y	
Part 27	Annual source testing [Basis: 40 CFR 63, 63.563(b)6]	Y	

Table IV – G
Source-specific Applicable Requirements
S-32, S-33, S-34, S-35, S-36, S-37, S-39, S-41
– FIXED ROOF TANKS

Applicable Requirement	Regulation Title or Description of Requirement	Federally Enforceable (Y/N)	Future Effective Date
BAAQMD Condition #6185	Permit Conditions		
Part 1	Emissions from tanks shall be vented to A-421 and A-422, regenerative carbon units all times [Basis: Cumulative Increase]	Y	
Part 2	Hydrocarbon liquids loaded shall not exceed 18.8 million barrels in any consecutive 12-month period [Basis: Cumulative Increase]	Y	
Part 2a	Total combined POC/NPOC emissions shall not exceed 18,800 pounds in any consecutive 12-month period and use of additional materials does not increase toxic emissions above any Regulation 2-5 triggers [Basis: Cumulative Increase; Toxics]	Y	
Part 3	Hydrocarbon liquids loaded shall not exceed 250,000 barrels in any day [Basis: Cumulative Increase]	Y	
Part 3a	Total combined POC/NPOC emissions shall not exceed 250 pounds in any calendar day and use of additional materials does not increase toxic emissions above any Regulation 2-5 triggers [Basis: Cumulative Increase; Toxics]	Y	

Table IV – H
Source-specific Applicable Requirements
S-38, S-40, S-42, S-43, S-44 – INTERNAL FLOATING ROOF TANKS

Applicable Requirement	Regulation Title or Description of Requirement	Federally Enforceable (Y/N)	Future Effective Date
BAAQMD Regulation 8, Rule 5	Organic Compounds-Storage of Organic Liquids (11/3/2021)		
8-5-101	Description	Y	
8-5-111	Limited Exemption, Tank Removal From and Return to Service	N	
8-5-112	Limited Exemption, Tanks in Operation	N	
8-5-117	Exemption, Low Vapor Pressure	Y	
8-5-301	Storage Tanks Control Requirements	N	
8-5-305	Requirements for Internal Floating Roof Tanks	N	

Table IV – H
Source-specific Applicable Requirements
S-38, S-40, S-42, S-43, S-44 – INTERNAL FLOATING ROOF TANKS

Applicable Requirement	Regulation Title or Description of Requirement	Federally Enforceable (Y/N)	Future Effective Date
8-5-320	Tank Fitting requirements	Y	
8-5-320.2	Openings in the roof	Y	
8-5-320.3	Gasketed Covers	Y	
8-5-320.4	Solid sampling or gauging wells	Y	
8-5-320.4.1	The well shall provide a projection below the liquid surface	Y	
8-5-320.4.2	The well shall be equipped with a cover	Y	
8-5-320.4.3	The gap between the well and the roof	Y	
8-5-320.5	Slotted sampling or gauging wells	Y	
8-5-320.5.1	The well shall provide a projection below the liquid surface	Y	
8-5-320.5.2	The well requirements	Y	
8-5-320.5.3	The gap between the well and the roof	Y	
8-5-320.6	Emergency roof drain	Y	
8-5-321	Primary seal requirements	Y	
8-5-321.1	No holes, tears, or other openings in the primary seal fabric	Y	
8-5-321.2	The seal shall be liquid mounted except as provided in 8-5-311.2.2	Y	
8-5-321.3	Metallic shoe type seals	Y	
8-5-321.3.1	Geometry of shoe	Y	
8-5-321.3.2	Gaps for welded tanks	Y	
8-5-322	Secondary seal requirements	Y	
8-5-322.1	No holes, tears, or other openings in the secondary seal	Y	
8-5-322.2	Insertion of probes	Y	
8-5-322.3	Gaps for welded tanks	Y	
8-5-322.5	For welded internal floating roof tank with seal installed after February 1, 1993, no gap between tank shell and the secondary seal shall exceed 1.5 mm (0.06 in.). The cumulative length of all secondary seal gaps exceeding 0.5 mm (0.02 in.) shall be not more than 5% of the circumference of the tank excluding gaps less than 5 cm (1.79 in.) from vertical weld seams.	Y	
8-5-322.6	The secondary seal shall extend from the roof to the tank shell and shall not be attached to the primary seal.	Y	
8-5-328	Tank degassing requirements	N	
8-5-328.1	Concentration of <10,000 ppm as methane after cleaning	Y	
8-5-328.2	No degassing during ozone excess	Y	
8-5-328.3	Notification requirements	N	
8-5-331	Tank Cleaning Requirements	N	
8-5-402	Inspection Requirements for Internal Floating Roof Tanks	N	
8-5-402.1	Inspection of primary and secondary seal per 8-5-321 and 8-5-322 once every 10 years	N	

Table IV – H
Source-specific Applicable Requirements
S-38, S-40, S-42, S-43, S-44 – INTERNAL FLOATING ROOF TANKS

Applicable Requirement	Regulation Title or Description of Requirement	Federally Enforceable (Y/N)	Future Effective Date
8-5-402.2	Inspection of entire circumference of outermost seal per 8-5-305.1, 8-5-305.2, 8-5-305.3, 8-5-321.1 and 8-5-322.1 twice per calendar year	N	
8-5-402.3	Tank Fitting Inspection twice per calendar year	N	
8-5-501	Recordkeeping Requirements	N	
8-5-502	Source test requirement	Y	
8-5-605	Measurement of Leak Concentrations and Residual Concentrations	N	
8-5-606	Analysis of Samples, Tank Cleaning Agents	N	
SIP Regulation 8, Rule 5	Organic Compounds-Storage of Organic Liquids (06/05/2003)		
8-5-111	Limited Exemption, Tank Removal From and Return to Service	Y	
8-5-112	Limited Exemption, Preventative Maintenance and Inspection of Tanks in Operation	Y	
8-5-301	Storage Tanks Control Requirements	Y	
8-5-303	Requirements for Pressure Vacuum Valves	Y	
8-5-305	Requirements for Internal Floating Roofs	Y	
8-5-328	Tank degassing requirements	Y	
8-5-328.1.2	Concentration of <10,000 ppm as methane after degassing	Y	
8-5-401	Primary seal inspection	Y	
8-5-401.1	Primary and Secondary Seals Inspection twice per calendar year	Y	
8-5-401.2	Tank Fitting Inspection twice per calendar year	Y	
8-5-501	Keep records	Y	
8-5-502	Tank degassing annual source test requirement	Y	
8-5-503	Portable hydrocarbon detector	Y	
40 CFR 60	Standards of Performance for New Stationary Sources (12/23/71)	Y	
Subpart A	General Provisions	Y	
60.1	Applicability	Y	
60.2	Definitions	Y	
60.3	Units and Abbreviations	Y	
60.4	Address	Y	
60.4(b)	Reports to EPA and District	Y	
60.5	Determination of Construction or Modification	Y	
60.6	Review of Plans	Y	
60.7	Notification and Recordkeeping	Y	
60.7(a)	Written notification	Y	
60.7(b)	Records	Y	
60.8	Performance Tests	Y	
60.9	Availability of Information	Y	
60.11	Compliance with Standards and Maintenance Requirements	Y	

Table IV – H
Source-specific Applicable Requirements
S-38, S-40, S-42, S-43, S-44 – INTERNAL FLOATING ROOF TANKS

Applicable Requirement	Regulation Title or Description of Requirement	Federally Enforceable (Y/N)	Future Effective Date
60.11(a)	Compliance with standards and maintenance requirements	Y	
60.11(d)	Minimizing emissions	Y	
60.12	Circumvention	Y	
60.13	Reconstruction	Y	
60.14	Modification	Y	
60.15	Reconstructions	Y	
60.17	Incorporated by Reference	Y	
60.19	General notification and reporting requirements	Y	
NSPS Part 60 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	Y	
60.110b(a)	Tanks greater than or equal to 40 cubic meters	Y	
60.112b(a) (3)	A closed vent system and control device	Y	
60.112b(a) (3)(i)	The closed vent system that collects all VOC vapors and gases discharged	Y	
60.112b(a) (3)(ii)	The control device that reduces inlet VOC emissions by 95 percent or greater	Y	
60.113b	Testing and Procedures		
60.113b(c)	Exempt from § 60.8 of the General Provisions	Y	
60.113b(c) (1)	Submit for approval by the Administrator	Y	
60.113b(c) (1)(i)	Documentation demonstrating that the control device will achieve the required control efficiency during maximum loading conditions	Y	
60.113b(c) (1)(ii)	A description of the parameter or parameters to be monitored	Y	
60.113b(c) (2)	Operate and monitor the parameters of the closed vent system and control device	Y	
60.115b	Reporting and recordkeeping requirements	Y	
60.115b(a)	After installing control equipment	Y	
60.115b(a) (1)	Furnish the Administrator with a report	Y	
60.115b(a) (2)	Keep a record of each inspection performed	Y	
60.115b(a) (3)	Report shall identify the storage vessel, the nature of the defects, and the date the storage vessel was emptied	Y	
60.115(c)	Records	Y	
60.115(c)(1)	Operating plan	Y	
60.115(c)(2)	Parameters monitored	Y	

Table IV – H
Source-specific Applicable Requirements
S-38, S-40, S-42, S-43, S-44 – INTERNAL FLOATING ROOF TANKS

Applicable Requirement	Regulation Title or Description of Requirement	Federally Enforceable (Y/N)	Future Effective Date
60.116b	Monitoring of Operation	Y	
60.116b(a)	The owner or operator shall keep copies of all records	Y	
60.116b(b)	Accessible records	Y	
60.116b(c)	Record of the VOL stored, the period of storage, and the maximum true vapor pressure of that VOL during the respective storage period	Y	
60.116b(d)	Maximum true vapor pressure	Y	
60.116b(e)	Available data on the storage temperature may be used to determine the maximum true vapor pressure	Y	
60.116b(e) (1)	The maximum true vapor pressure calculation	Y	
60.116b(e) (2)	Vapor pressure for crude oil or refined petroleum products	Y	
60.116b(e) (2)(i)	Reid vapor pressure and the maximum expected storage temperature	Y	
60.116b(e) (2)(ii)	The true vapor pressure	Y	
60.116b(e) (3)	For other liquids, the vapor pressure	Y	
60.116b(e) (3)(i)	May be obtained from standard reference texts	Y	
60.116b(e) (3)(ii)	Determined by ASTM Method D2879–83	Y	
60.116b(e) (3)(iii)	Measured by an appropriate method approved by the Administrator	Y	
60.116b(e) (3)(iv)	Calculated by an appropriate method approved by the Administrator	Y	
40 CFR 63	National Emission Standards for Hazardous Air Pollutants For Source Categories	Y	
Subpart A	General Provisions	Y	
63.1	Applicability	Y	
63.2	Definitions	Y	
63.3	Units and abbreviations	Y	
63.4	Prohibited activities and circumvention	Y	
63.5	Construction and reconstruction	Y	
63.6	Compliance with standards and maintenance requirements	Y	
63.7	Performance testing requirements	Y	
63.8	Monitoring requirements	Y	
63.9	Notification requirements	Y	
63.10	Recordkeeping and reporting	Y	
63.12	State authority and delegations	Y	

Table IV – H
Source-specific Applicable Requirements
S-38, S-40, S-42, S-43, S-44 – INTERNAL FLOATING ROOF TANKS

Applicable Requirement	Regulation Title or Description of Requirement	Federally Enforceable (Y/N)	Future Effective Date
63.13	Addresses of EPA Regional Offices	Y	
63.14	Incorporation by Reference	Y	
63.15	Availability of Information and confidentiality	Y	
40 CFR Part 63 Subpart R	National Emission Standards for Gasoline Distribution Facilities (Bulk Gasoline Terminals and Pipeline Breakout Stations) (12/14/1994)	Y	
63.420(f)	Demonstrate compliance	Y	
63.420(g)	Most stringent control requirements	Y	
63.420(h)	Subject to the provisions of 40 CFR part 63, subpart A—General Provisions	Y	
63.420(j)	<i>Rules Stayed for Reconsideration</i>	Y	
63.423	Standards: Storage vessels	Y	
63.423(a)	Requirements	Y	
63.423(c)	December 15, 1997 deadline	Y	
63.425	Test methods and procedures	Y	
63.425(a)	Performance test on the vapor processing system	Y	
63.425(b)	Operating parameter	Y	
63.425(b)(1)	Determine an operating parameter value	Y	
63.425(b)(2)	Determine an operating monitoring parameter value	Y	
63.425(b)(3)	Demonstrate continuous compliance	Y	
63.425(c)	Document the reasons for any change in the operating parameter	Y	
63.425(d)	Compliance with § 60.113b	Y	
63.427	Continuous monitoring	Y	
63.427(a)(1)	Continuous emission monitoring system (CEMS)	Y	
63.427(a)(5)	Alternative parameter demonstrates continuous compliance	Y	
63.427(b)	Operate the vapor processing system	Y	
63.427(c)	Monitoring requirements in § 60.116b; 5 years records	Y	
63.428	Reporting and recordkeeping	Y	
63.428(a)	The initial notifications	Y	
63.428(c)(2)	Record and report simultaneously with the notification of compliance	Y	
63.428(c)(2)(i)	Determining the operating parameter value	Y	
63.428(d)	Keep records and furnish reports	Y	
63.428(h)	Submit an excess emissions report to the administrator	Y	
63.428(h)(1)	Each exceedance or failure reports	Y	
63.428(h)(4)	Equipment leak	Y	

Table IV – H
Source-specific Applicable Requirements
S-38, S-40, S-42, S-43, S-44 – INTERNAL FLOATING ROOF TANKS

Applicable Requirement	Regulation Title or Description of Requirement	Federally Enforceable (Y/N)	Future Effective Date
63.428(h)(4)(i)	The date on which the leak was detected	Y	
63.428(h)(4)(ii)	The date of each attempt to repair the leak	Y	
63.428(h)(4)(iii)	The reasons for the delay of repair; and	Y	
63.428(h)(4)(iv)	The date of successful repair	Y	
40 CFR 64	Compliance Assurance Monitoring (10/22/1997)	Y	
64.2(a)	Applicability	Y	
64.3	Monitoring design criteria	Y	
64.3(a)	General criteria	Y	
64.3(a)(1)	Data for one or more indicators	Y	
64.3(a)(2)	Indicator range	Y	
64.3(a)(3)	Design of indicator ranges	Y	
64.3(b)	Performance criteria	Y	
64.3(b)(1)	Specifications for obtaining data	Y	
64.3(b)(2)	Verification procedures	Y	
64.3(b)(3)	Quality assurance and control practices	Y	
64.3(b)(4)	Specifications for frequency, procedures, and averaging periods	Y	
64.3(b)(4)(i)	Design of period over which data are obtained, etc.	Y	
64.3(b)(4)(iii)	Frequency for other pollutant-specific emission units	Y	
64.3(c)	Evaluation factors	Y	
64.4	Submittal requirements	Y	
64.4(a)	Submittal of monitoring that satisfies design requirements in 40 CFR 63.4	Y	
64.4(b)	Justification for the proposed monitoring	Y	
64.4(b)(1)	Presumptively acceptable monitoring approaches	Y	
64.4(c)(1)	Submittal of control device operating parameter data obtained during tests	Y	
64.4(c)(2)	Documentation of no changes to system after performance tests	Y	
64.5(b)	Deadline for submittals for other pollutant-specific emissions units	Y	
64.5(d)	Prior to approval, emissions unit subject to 40 CFR 70.1(a)(3)(i)(B)	Y	
64.6(a)	Approval by permitting authority	Y	
64.6(b)	Additional data collection	Y	
64.6(c)	Establishment of permit terms or conditions	Y	
64.6(d)	Installation, testing or final verification	Y	
64.7	Operation of approved monitoring	Y	

Table IV – H
Source-specific Applicable Requirements
S-38, S-40, S-42, S-43, S-44 – INTERNAL FLOATING ROOF TANKS

Applicable Requirement	Regulation Title or Description of Requirement	Federally Enforceable (Y/N)	Future Effective Date
64.7(a)	Commencement of operation	Y	
64.7(b)	Proper maintenance	Y	
64.7(c)	Continued operation	Y	
64.7(d)	Response to excursions or exceedances	Y	
64.7(e)	Documentation of need for improved monitoring	Y	
64.8	Quality improvement plan	Y	
64.9	Reporting and recordkeeping requirements	Y	
64.9(a)	General reporting requirements	Y	
64.9(b)	General recordkeeping requirements	Y	
64.10	Savings provisions	Y	
BAAQMD Condition 6185			
Part 2	Hydrocarbon liquids loaded shall not exceed 18.8 million barrels in any consecutive 12-month period [Basis: Cumulative Increase]	Y	
Part 2a	Total combined POC/NPOC emissions shall not exceed 18,800 pounds in any consecutive 12-month period and use of additional materials does not increase toxic emissions above any Regulation 2-5 triggers [Basis: Cumulative Increase; Toxics]	Y	
Part 3	Hydrocarbon liquids loaded shall not exceed 250,000 barrels in any day [Basis: Cumulative Increase]	Y	
Part 3a	Total combined POC/NPOC emissions shall not exceed 250 pounds in any calendar day and use of additional materials does not increase toxic emissions above any Regulation 2-5 triggers [Basis: Cumulative Increase; Toxics]	Y	
Part 7	The average benzene concentration in all hydrocarbon liquids stored shall not exceed 2% by weight [Basis: Toxics]	N	
Part 17	Tank degassing shall be vented at all times to abatement devices [Basis: Regulation 8-5]	Y	
Part 19	Minimize fugitive emissions during tank cleaning operation [Basis: Cumulative Increase]	Y	
Part 24	Record keeping for tank degassing operations [Basis: Record Keeping]	Y	
BAAQMD Condition 27277			
Part 11	Total materials loaded shall not exceed 18.8 million barrels in any	Y	

Table IV – H
Source-specific Applicable Requirements
S-38, S-40, S-42, S-43, S-44 – INTERNAL FLOATING ROOF TANKS

Applicable Requirement	Regulation Title or Description of Requirement	Federally Enforceable (Y/N)	Future Effective Date
	consecutive 12-month period. [Basis: Cumulative Increase]		
Part 12	Total materials loaded shall not exceed 250,000 barrels in any calendar day. [Basis: Cumulative Increase]	Y	
Part 13	RVP shall not exceed 10 psia from January-April and November-December and 6.9 psia from May-October [Basis: Cumulative Increase]	Y	
Part 14	Total combined POC/NPOC emissions shall not exceed 9933 pounds in any consecutive 12-month period and 58 pounds per calendar day, and use of additional materials does not increase toxic emissions above any Regulation 2-5 triggers [Basis: Cumulative Increase; Toxics]	Y	
Part 15	Roof fittings counts [Basis: BACT]	Y	
Part 16	Records of throughputs, loading events, material specifications [Basis; Cumulative Increase, Regulation 2-1-233]	Y	

V. Schedule of Compliance

A schedule of compliance is required in all Title V permits pursuant to BAAQMD Regulation 2-6-409.10 which provides that a major facility review permit shall contain the following information and provisions:

“409.10 A schedule of compliance containing the following elements:

10.1A statement that the facility shall continue to comply with all applicable requirements with which it is currently in compliance;

10.2A statement that the facility shall meet all applicable requirements on a timely basis as requirements become effective during the permit term; and

10.3If the facility is out of compliance with an applicable requirement at the time of issuance, revision, or reopening, the schedule of compliance shall contain a plan by which the facility will achieve compliance. The plan shall contain deadlines for each item in the plan. The schedule of compliance shall also contain a requirement for submission of progress reports by the facility at least every six months. The progress reports shall contain the dates by which each item in the plan was achieved and an explanation of why any dates in the schedule of compliance were not or will not be met, and any preventive or corrective measures adopted.”

Since the District has not determined that the facility is out of compliance with an applicable requirement at this time, the schedule of compliance for this permit contains only sections 2-6-409.10.1 and 2-6-409.10.2.

Changes to permit

No changes in this action.

VI. Permit Conditions

During the Title V permit development, the District has reviewed the existing permit conditions, deleted the obsolete conditions, and, as appropriate, revised the conditions for clarity and enforceability. Each permit condition is identified with a unique numerical identifier, up to five digits.

When necessary to meet Title V requirements, additional monitoring, recordkeeping, or reporting has been added to the permit.

All changes to existing permit conditions are clearly shown in “strike-out/underline” format in the proposed permit. When the permit is issued, all ‘strike-out’ language will be deleted and all “underline” language will be retained, subject to consideration of comments received.

The existing permit conditions are derived from previously issued District Authorities to Construct (A/C) or Permits to Operate (P/O). Permit conditions may also be imposed or revised as part of the annual review of the facility by the District pursuant to California Health and Safety Code (H&SC) § 42301(e), through a variance pursuant to H&SC § 42350 *et seq.*, an order of abatement pursuant to H&SC § 42450 *et seq.*, or as an administrative revision initiated by District staff. After issuance of the Title V permit, permit conditions will be revised using the procedures in Regulation 2, Rule 6, Major Facility Review.

The regulatory basis is listed following each condition. The regulatory basis may be a rule or regulation. The District is also using the following terms for regulatory basis:

- **BACT:** This term is used for a condition imposed by the Air Pollution Control Officer (APCO) to ensure compliance with the Best Available Control Technology in Regulation 2-2-301.
- **Cumulative Increase:** This term is used for a condition imposed by the APCO, which limits a source’s operation to the operation described in the permit application pursuant to BAAQMD Regulation 2-1-403.
- **Offsets:** This term is used for a condition imposed by the APCO to ensure compliance with the use of offsets for the permitting of a source or with the banking of emissions from a source pursuant to Regulation 2, Rules 2 and 4.
- **PSD:** This term is used for a condition imposed by the APCO to ensure compliance with a Prevention of Significant Deterioration permit issued pursuant to Regulation 2, Rule 2.

- Regulation 2, Rule 5: This term is used for a condition imposed by the APCO to ensure compliance with limits based on Regulation 2, Rule 5 New Source Review of Toxic Air Contaminants.

Changes to permit:

The following changes have been made to Permit Condition #6185:

- Added Part 2a to clarify that S-32 through S-44 storage tanks are allowed to exceed the annual throughput limit of 18.8 million barrels in any consecutive 12-month period in Part 2 as long as S-32 through S-44 do not exceed a total combined POC emissions limit of 18,800 pounds in any consecutive 12-month period and that any increase in TAC emissions due to the higher throughput does not result in total TAC emissions exceeding any risk screening trigger level in Table 2-5-1 of Regulation 2-5. This POC emissions limit is the aforementioned annual throughput limit multiplied by the 1 lb/1000 barrel POC emission factor in Part 5. A recordkeeping condition has been added as well.
- Added Part 3a to clarify that S-32 through S-44 storage tanks are allowed to exceed the daily throughput limit of 250,000 barrels in any calendar day in Part 3 as long as S-32 through S-44 do not exceed a total combined POC emissions limit of 250 pounds in any calendar day and that any increase in TAC emissions due to the higher throughput does not result in total TAC emissions exceeding any risk screening trigger level in Table 2-5-1 of Regulation 2-5. This POC emissions limit is the aforementioned daily throughput limit multiplied by the 1 lb/1000 barrel POC emission factor in Part 5. A recordkeeping condition has been added as well.
- Added Part 4a to clarify that S-27 Marine Vessel Loading is allowed to exceed the annual throughput limit of 47.6 million barrels in any consecutive 12-month period in Part 4 as long as S-27 does not exceed a total combined POC emissions limit of 47,600 pounds in any consecutive 12-month period and that any increase in TAC emissions due to the higher throughput does not result in total TAC emissions exceeding any risk screening trigger level in Table 2-5-1 of Regulation 2-5. The aforementioned annual POC emissions limit is the aforementioned annual throughput limit multiplied by the 1 lb/1000 barrel POC emission factor in Part 5. The aforementioned hourly POC emissions limit is the pumping rate limit of 10,000 barrels per hour in Part 25 multiplied by the 1 lb/1000 barrel POC emission factor in Part 5. A recordkeeping condition has been added as well.
- Revision to Part 25 to remove the last sentence about exempt materials as it was added erroneously by District staff into the Title V Permit in 2016 under Application 24048.
- Revision to Part 26 to clarify that the facility is allowed to transfer renewable/alternative jet fuel at S-27 Marine Loading Terminal as approved under NSR Application 29926.
- Revision to Part 27 to allow the facility to postpone an annual source test at S-27 until the next marine vessel loading event at S-27 if no marine vessels are loaded

at S-27 during a given calendar year. Within 60 days after the end of the prior calendar year, the facility will be required to submit written notification and corresponding monthly records showing zero throughput at S-27 occurring during the prior calendar year.

Permit Condition 27277 has been added for S-1, S-2, S-3, S-5, S-6, S-12, S-15, S-24, S-25, S-30, S-32 through S-44 Storage Tanks; S-22 Truck Loading Rack; and S-27 Marine Loading. This permit condition was to establish facility-wide organic storage outbound loading capacities and add them as permit condition limits for all organic storage sources and S-22 Truck Loading Rack. Under NSR Application 29926, these capacities were determined based on the information provided by the facility for its existing pumping capacities to the Concord and Richmond pipelines and S-22 Truck Loading Rack. Under NSR Application 30713, the following changes were made to Permit Condition 27277: Parts 11 through 18 have been added to reflect the conversion of S-38, S-40, S-42, S-43, and S-44 from fixed roof tanks into internal floating roof tanks; daily (Part 12) and annual (Part 11) throughput limits, vapor pressure limits (Part 13), and emissions limits (Part 14) have been added for these tanks; part 17 has been added to require quarterly monitoring of the concentration of the vapor space above each floating roof in terms of lower explosive limit (LEL) and quarterly visual inspections of the roof openings and rim seal system; the recordkeeping condition has been revised accordingly and moved from Part 10 to Part 18.

VII. Applicable Limits and Compliance Monitoring Requirements

This section of the permit is a summary of numerical limits and related monitoring requirements for each source. The summary includes a citation for each monitoring requirement, frequency of monitoring, and type of monitoring. The applicable requirements for monitoring are completely contained in Sections IV, Source-Specific Applicable Requirements, and VI, Permit Conditions, of the permit.

The District has reviewed all monitoring and has determined the existing continuous emission monitoring is adequate. For the vapor recovery system (A-1, A-421 and A-422), the continuous hydrocarbon monitoring system was installed as required.

Changes to permit:

Table VII-E will be changed as follows:

- The POC/NPOC hourly and annual emissions limits in Permit Condition #6185 Part 4a will be added for S-27, Marine Vessel Loading/Unloading Terminal.

Table VII-F will be changed as follows:

- The table description has been revised to remove S-38, S-40, S-42, S-43, and S-44.
- The POC/NPOC daily emissions limit in Permit Condition #6185 Part 2a and annual emissions limit in Permit Condition #6185 Part 3a will be added for tanks S-32, S-33, S-34, S-35, S-36, S-37S-39, and S-41.

The following table has been added:

- Table VII-G has been added for S-38, S-40, S-42, S-43, and S-44, which are being converted from fixed roof tanks into internal floating roof tanks.

**Table VII – E
Applicable Limits and Compliance Monitoring Requirements
S-27 – MARINE VESSEL LOADING/UNLOADING TERMINAL**

Type of Limit	Emission Limit Citation	FE Y/N	Future Effective Date	Emission Limit	Monitoring Requirement Citation	Monitoring Frequency (P/C/N)	Monitoring Type
POC/ NPOC	BAAQMD Condition # 6185 part, 4a	Y		POC/NPOC ≤ 47,600 pounds in any consecutive 12 month period POC/NPOC ≤ 10 pounds in any hour	BAAQMD Condition #6185, part 4a	P/A and H	Records

Table VII - F
Applicable Limits and Compliance Monitoring Requirements
S-32, S-33, S-34, S-35, S-36, S-37, S-39, S-41 - FIXED ROOF TANKS

Type of Limit	Emission Limit Citation	FE Y/N	Future Effective Date	Emission Limit	Monitoring Requirement Citation	Monitoring Frequency (P/C/N)	Monitoring Type
POC/ NPOC	BAAQMD Condition # 6185 part 2a	Y		POC/NPOC \leq 18,800 pounds in any consecutive 12 month period	BAAQMD Condition #6185, part 2a	P/A	Records
POC/ NPOC	BAAQMD Condition # 6185 part 3a	Y		POC/NPOC \leq 250 pounds in any calendar day	BAAQMD Condition #6185, part 3a	P/D	Records

Table VII – G
Source-specific Applicable Requirements
S-38, S-40, S-42, S-43, S-44 – INTERNAL FLOATING ROOF TANKS

Type of Limit	Emission Limit Citation	FE Y/N	Future Effective Date	Emission Limit	Monitoring Requirement Citation	Monitoring Frequency (P/C/N)	Monitoring Type
POC	BAAQMD 8-5-320.3.1	Y		Gasketed cover, seal or lid with gap \leq 0.32 cm (1/8 in)	BAAQMD 8-5-401.2, 8-5-404	P/twice/yr	Inspection Certification
POC	BAAQMD 8-5-320.4.2	Y		Well with cover, seal or lid with gap \leq 0.32 cm (1/8 in)	BAAQMD 8-5-401.2, 8-5-404	P/twice/yr	Inspection Certification
POC	BAAQMD 8-5-320.4.3	Y		Gap between well and roof \leq 1.3 cm (1/2 in)	BAAQMD 8-5-401.2, 8-5-404	P/twice/yr	Inspection Certification
POC	BAAQMD 8-5-320.5.2	Y		Well with cover gasket, a pole sleeve, pole wiper, and internal float with gap \leq 1.3 cm (1/2 in), or zero gap pole wiper seal	BAAQMD 8-5-401.2, 8-5-404	P/twice/yr	Inspection Certification
POC	BAAQMD 8-5-320.5.3	Y		Gap between well and roof \leq 1.3 cm (1/2 in)	BAAQMD 8-5-401.2, 8-5-404	P/twice/yr	Inspection Certification

Table VII – G
Source-specific Applicable Requirements
S-38, S-40, S-42, S-43, S-44 – INTERNAL FLOATING ROOF TANKS

Type of Limit	Emission Limit Citation	FE Y/N	Future Effective Date	Emission Limit	Monitoring Requirement Citation	Monitoring Frequency (P/C/N)	Monitoring Type
POC	BAAQMD 8-5-321.3	Y		Primary seal metallic shoe extends a minimum 61 cm (24 in) above liquid surface	BAAQMD 8-5-401.1, 8-5-404	P/twice/yr P/twice/yr	Inspection Certification
POC	BAAQMD 8-5-321.3.1	Y		Gap between shoe and tank shell is no greater than 46 cm (18 in)	BAAQMD 8-5-401.1, 8-5-404	P/twice/yr P/twice/yr	Inspection Certification
POC	BAAQMD 8-5-321.3.2	Y		Gap between tank shell and the primary seal < 3.8 cm (1 1/2 in). No continuous gap > 0.32 cm (1/8 in) shall exceed 10% of circumference. The cumulative length of all seal gaps exceeding 1.3 cm (1/2 in) shall be ≤ 10% of circumference and the cumulative length of all seal gaps exceeding 0.32 cm (1/8 in) ≤ 40% of circumference	BAAQMD 8-5-401.1, 8-5-404	P/twice/yr P/twice/yr	Inspection Certification
POC	BAAQMD 8-5-322.2	Y		Secondary seal shall allow insertion of probes up to 3.8 cm (1 1/2 in) in width	BAAQMD 8-5-401.1, 8-5-404	P/twice/yr P/twice/yr	Inspection Certification
POC	BAAQMD 8-5-322.3	Y		Gap between tank shell and the secondary seal shall not exceed 1.3 cm (1/2 in)	BAAQMD 8-5-401.1, 8-5-404	P/ twice/yr P/twice/yr	Inspection Certification
POC	BAAQMD 8-5-328.1.2	Y		Tank Cleaning ≥ 90% wt. emission control, POC concentration < 10,000 ppm	BAAMD 8-5-502	P/A	Source test
POC	60.112b (a)(1)	Y		Deck fitting closure standards; includes gasketed covers	60.113b (a)(3) & (4)	periodic initially & each time emptied & degassed, at least every 5 yr	visual inspection

Table VII – G
Source-specific Applicable Requirements
S-38, S-40, S-42, S-43, S-44 – INTERNAL FLOATING ROOF TANKS

Type of Limit	Emission Limit Citation	FE Y/N	Future Effective Date	Emission Limit	Monitoring Requirement Citation	Monitoring Frequency (P/C/N)	Monitoring Type
POC	60.113b (a)(1) & (4)	Y		Primary rim-seal standards; no holes or tears	60.113b (a)(3) & (4)	<u>periodic</u> initially & each time emptied & degassed & prior to refilling tank with VOL, at least every 5 yr	visual inspection
POC	60.113b (a)(1) & (4)	Y		Secondary rim-seal standards; no holes or tears	60.113b (a)(3) & (4)	<u>periodic</u> initially & each time emptied & degassed & prior to refilling tank with VOL, at least every 5 yr	visual inspection
POC	60.113b (a)(2)	Y		Internal visual inspection from viewports of fixed roof	60.113b (a)(2) & (3)	<u>periodic</u> initially & annually	visual inspection
POC	60.116b (c)	Y		Record of liquid stored and true vapor pressure	60.116b (c) & (e)	<u>periodic</u> upon change of service	records
POC		Y		Record of each initial, annual, and 10-year tank inspection	60.115b(a)(2)	<u>periodic</u> for each tank inspection	records
POC		Y		Report of non-compliant annual inspection for tanks with secondary seals	60.115b(a)(4)	<u>periodic</u> within 30 days of tank inspection	report
POC	BAAQMD Condition #6185, part 2	Y		Hydrocarbon liquid loaded \leq 18.8 million barrels in any consecutive 12 month period	BAAQMD Condition #12677, part 18	P/A	Records
POC/ NPOC	Part 2a	Y		POC/NPOC \leq 18,800 pounds in any consecutive 12 month period	BAAQMD Condition #6185, part 2a	P/A	Records

Table VII – G
Source-specific Applicable Requirements
S-38, S-40, S-42, S-43, S-44 – INTERNAL FLOATING ROOF TANKS

Type of Limit	Emission Limit Citation	FE Y/N	Future Effective Date	Emission Limit	Monitoring Requirement Citation	Monitoring Frequency (P/C/N)	Monitoring Type
POC	BAAQMD Condition #6185, part 3	Y		Hydrocarbon liquid loaded $\leq 250,000$ barrels per day	BAAQMD Condition #6185, part 3	P/D	Records
POC/ NPOC	BAAQMD Condition # 6185 part 3a	Y		POC/NPOC ≤ 250 pounds in any calendar day	BAAQMD Condition #6185, part 3a	P/D	Records
POC	BAAQMD Condition #6185, part 7	N		Benzene concentration ≤ 2 % weight	BAAQMD Condition #6185, part 7	P/Semi-annual	Analysis
POC/ NPOC	BAAQMD Condition #27277, part 11	Y		Materials loaded ≤ 18.8 million barrels in any consecutive 12 month period	BAAQMD Condition #27277, part 16	P/A	Records
POC/ NPOC	BAAQMD Condition #27277, part 12	Y		Materials loaded $\leq 250,000$ barrels in any calendar day	BAAQMD Condition #27277, part 16	P/D	Records
POC/ NPOC	BAAQMD Condition #27277, part 13	Y		RVP ≤ 10 psia (January-April and November-December) RVP ≤ 6.9 psia (May-October)	BAAQMD Condition #27277, part 16	P	Records
POC/ NPOC	BAAQMD Condition #27277, part 14	Y		POC/NPOC ≤ 9933 pounds in any consecutive 12 month period POC/NPOC ≤ 58 pounds in any calendar day	BAAQMD Condition #27277, part 16	P/A and D	Records

VIII. Test Methods

This section of the permit lists test methods that are associated with standards in District or other rules. It is included only for reference. In most cases, the test methods in the rules are source test methods that can be used to determine compliance but are not required on an ongoing basis. They are not applicable requirements.

If a rule or permit condition requires ongoing testing, the requirement will also appear in Section IV of the permit.

Changes to permit

No changes in this action.

IX. Acid Rain

Changes to permit

No changes in this action.

X. Permit Shield

The District rules allow two types of permit shields. The permit shield types are defined as follows: (1) A provision in a major facility review permit explaining that specific federally enforceable regulations and standards do not apply to a source or group of sources, or (2) A provision in a major facility review permit explaining that specific federally enforceable applicable requirements for monitoring, recordkeeping and/or reporting are subsumed because other applicable requirements for monitoring, recordkeeping, and reporting in the permit will assure compliance with all emission limits.

The second type of permit shield is allowed by EPA's White Paper 2 for Improved Implementation of the Part 70 Operating Permits Program. The District uses the second type of permit shield for all streamlining of monitoring, recordkeeping, and reporting requirements in Title V permits. The District's program does not allow other types of streamlining in Title V permits.

This facility does not have permit shields.

Changes to permit

No changes in this action.

XI. Revision History

This section details the revision history of the facility's Title V permit.

Changes to permit:

The revision history will be updated when the permit is revised.

XII. Glossary

This section contains terms that may be unfamiliar to the general public or EPA.

Changes to permit

No changes in this action.

XIII. Title IV Permit Application

The Acid Rain permit application for the facility is part of the Title V permit. The current Title IV permit application has been appended to the Title IV permit in section IX of the Title V permit.

D. Alternate Operating Scenarios

No alternate operating scenario has been requested for this facility.

E. Compliance Status

Changes to permit

No changes in this action.

APPENDIX A

Glossary

GLOSSARY

ACT

Federal Clean Air Act

APCO

Air Pollution Control Officer

API

American Petroleum Institute

ARB

Air Resources Board

BAAQMD

Bay Area Air Quality Management District

BACT

Best Available Control Technology

BARCT

Best Available Retrofit Control Technology

Basis

The underlying authority that allows the District to impose requirements.

C₅

An Organic chemical compound with five carbon atoms

C₆

An Organic chemical compound with six carbon atoms

CAA

The federal Clean Air Act

CAAQS

California Ambient Air Quality Standards

CAPCOA

California Air Pollution Control Officers Association

CEC

California Energy Commission

CEQA

California Environmental Quality Act

CEM

Continuous Emission Monitor: a monitoring device that provides a continuous direct measurement of some pollutant (e.g. NO_x concentration) in an exhaust stream.

CFP

Clean Fuels Project

CFR

The Code of Federal Regulations. 40 CFR contains the implementing regulations for federal environmental statutes such as the Clean Air Act. Parts 50-99 of 40 CFR contain the requirements for air pollution programs.

CO

Carbon Monoxide

CO₂

Carbon Dioxide

Cumulative Increase

The sum of permitted emissions from each new or modified source since a specified date pursuant to BAAQMD Rule 2-1-403, Permit Conditions (as amended by the District Board on 7/17/91) and SIP Rule 2-1-403, Permit Conditions (as approved by EPA on 6/23/95). Used to determine whether threshold-based requirements are triggered.

DAF

A "dissolved air flotation" unit is a process vessel where air bubbles injected at the bottom of the vessel are used to carry solids in the liquid into a froth on the liquid surface, where it is removed.

DWT

Dead Weight Ton

District

The Bay Area Air Quality Management District

DNF

Dissolved Nitrogen Flotation (See DAF)

dscf

Dry Standard Cubic Feet

dscm

Dry Standard Cubic Meter

E 6, E 9, E 12

Very large or very small number values are commonly expressed in a form called scientific notation, which consists of a decimal part multiplied by 10 raised to some power. For example, 4.53 E 6 equals $(4.53) \times (10^6) = (4.53) \times (10 \times 10 \times 10 \times 10 \times 10 \times 10) = 4,530,000$. Scientific notation is used to express large or small numbers without writing out long strings of zeros.

EFRT

An "external floating roof tank" minimizes VOC emissions with a roof with floats on the surface of the liquid, thus preventing the formation of a VOC-rich vapor space above the liquid surface as the level in the tank drops. If such a vapor space were allowed to form, it would be expelled when the tank was re-filled. On an EFRT, the floating roof is not enclosed by a second, fixed tank roof, and is thus described as an "external" roof.

EPA

The federal Environmental Protection Agency.

ETP

Effluent Treatment Plant

Excluded

Not subject to any District Regulations.

FCC

Fluid Catalytic Cracker

Federally Enforceable, FE

All limitations and conditions which are enforceable by the Administrator of the EPA including those requirements developed pursuant to 40 CFR Part 51, subpart I (NSR), Part 52.21 (PSD), Part 60, (NSPS), Part 61, (NESHAPs), Part 63 (HAP), and Part 72 (Permits Regulation, Acid Rain), and also including limitations and conditions contained in operating permits issued under an EPA-approved program that has been incorporated into the SIP.

FP

Filterable Particulate as measured by BAAQMD Method ST-15, Particulate.

FR

Federal Register

FRT

Floating Roof Tank (See EFRT and IFRT)

GDF

Gasoline Dispensing Facility

GLM

Ground Level Monitor

grain

1/7000 of a pound

Graphitic

Made of graphite.

HAP

Hazardous Air Pollutant. Any pollutant listed pursuant to Section 112(b) of the Act. Also refers to the program mandated by Title I, Section 112, of the Act and implemented by both 40 CFR Part 63, and District Regulation 2, Rule 5.

H₂S

Hydrogen Sulfide

H₂SO₄

Sulfuric Acid

Hg

Mercury

HHV

Higher Heating Value. The quantity of heat evolved as determined by a calorimeter where the combustion products are cooled to 60F and all water vapor is condensed to liquid.

IFRT

An "internal floating roof tank" minimizes VOC emissions with a roof with floats on the surface of the liquid, thus preventing the formation of a VOC-rich vapor space above the liquid surface as the level in the tank drops. If such a vapor space were allowed to form, it would be expelled when the tank was re-filled. On an IFRT, the floating roof is enclosed by a second, fixed tank roof, and thus is described as an "internal" roof.

ISOM

Isomerization plant

LHV

Lower Heating Value. Similar to the higher heating value (see HHV) except that the water produced by the combustion is not condensed but retained as vapor at 60F.

Lighter

"Lightering" is a transfer operation during which liquid is pumped from an ocean-going tanker vessel to a smaller vessel such as a barge. Like any liquid transfer operation, lightering of organic liquids produces organic vapor emissions.

Long ton

2200 pounds

Major Facility

A facility with potential emissions of: (1) at least 100 tons per year of any regulated air pollutant, (2) at least 10 tons per year of any single hazardous air pollutant, and/or (3) at least 25 tons per year of any combination of hazardous air pollutants, or such lesser quantity of hazardous air pollutants as determined by the EPA administrator.

MDEA

Methyl Diethanolamine

MFR

Major Facility Review. The District's term for the federal operating permit program mandated by Title V of the Act and implemented by District Regulation 2, Rule 6.

Mo Gas

Motor gasoline

MOP

The District's Manual of Procedures.

MOSC

Mobil Oil Sludge Conversion (licensed technology)

MSDS

Material Safety Data Sheet

MTBE

methyl tertiary-butyl ether

NA

Not Applicable

NAAQS

National Ambient Air Quality Standards

NESHAPs

National Emission Standards for Hazardous Air Pollutants. Contained in 40 CFR Part 63.

NMHC

Non-methane Hydrocarbons

NMOC

Non-methane Organic Compounds (Same as NMHC)

NO₂

Nitrogen Dioxide.

NO_x

Oxides of nitrogen.

NSPS

Standards of Performance for New Stationary Sources. Federal standards for emissions from new stationary sources. Mandated by Title I, Section 111 of the Act, and implemented by both 40 CFR Part 60 and District Regulation 10.

NSR

New Source Review. A federal program for pre-construction review and permitting of new and modified sources of air pollutants for which the District is classified "non-attainment". Mandated by Title I of the Clean Air Act and implemented by 40 CFR Parts 51 and 52 as well as District Regulation 2, Rule 2. (Note: There are additional NSR requirements mandated by the California Clean Air Act.)

O₂

The chemical name for naturally-occurring oxygen gas.

Offset Requirement

A New Source Review requirement to provide federally enforceable emission offsets at a specified ratio for the emissions from a new or modified source and any pre-existing cumulative increase minus any onsite contemporaneous emission reduction credits. Applies to emissions of POC, NO_x, PM₁₀, and SO₂.

Phase II Acid Rain Facility

A facility that generates electricity for sale through fossil-fuel combustion and by virtue of certain other characteristics (defined in Regulation 2, Rule 6) is subject to Titles IV and V of the Clean Air Act.

POC

Precursor Organic Compounds

PM

Total Particulate Matter

PM₁₀

Particulate matter with aerodynamic equivalent diameter of less than or equal to 10 microns

PSD

Prevention of Significant Deterioration. A federal program for permitting new and modified sources of air pollutants for which the District is classified "attainment" of the National Air Ambient Quality Standards. Mandated by Title I of the Act and implemented by both 40 CFR Part 52 and District Regulation 2, Rule 2.

Regulated Organic Liquid

"Regulated organic liquids" are those liquids which require permits, or which are subject to some regulation, when processed at a liquid-handling operation. For example, for refinery marine terminals, regulated organic liquids are defined as "organic liquids" in Regulation 8, Rule 44.

RFG

Refinery Fuel Gas

RMG

Refinery Make Gas

SCR

A "selective catalytic reduction" unit is an abatement device that reduces NO_x concentrations in the exhaust stream of a combustion device. SCRs utilize a catalyst, which operates at a specific temperature range, and injected ammonia to promote the conversion of NO_x compounds to nitrogen gas.

SIP

State Implementation Plan. State and District programs and regulations approved by EPA and developed in order to attain the National Air Ambient Quality Standards. Mandated by Title I of the Act.

SO₂

Sulfur dioxide

SO₂ Bubble

An SO₂ bubble is an overall cap on the SO₂ emissions from a defined group of sources, or from an entire facility. SO₂ bubbles are sometimes used at refineries because combustion sources are typically fired entirely or in part by "refinery fuel gas" (RFG), a waste gas product from refining operations. Thus, total SO₂ emissions may be conveniently quantified by monitoring the total amount of RFG that is consumed, and the concentration of H₂S and other sulfur compounds in the RFG.

SO₃

Sulfur trioxide

THC

Total Hydrocarbons (NMHC + Methane)

therm

100,000 British Thermal Units

Title V

Title V of the federal Clean Air Act. Requires a federally enforceable operating permit program for major and certain other facilities.

TOC

Total Organic Compounds (NMOC + Methane, Same as THC)

TPH

Total Petroleum Hydrocarbons

TRMP

Toxic Risk Management Plan

TRS

"Total reduced sulfur" is a measure of the amount of sulfur-containing compounds in a gas stream, typically a fuel gas stream, including, but not limited to, hydrogen sulfide. The TRS content of a fuel gas determines the concentration of SO₂ that will be present in the combusted fuel gas, since sulfur compounds are converted to SO₂ by the combustion process.

TSP

Total Suspended Particulate

TVP

True Vapor Pressure

VESSEL CALLING

Communication between vessel to vessel, or vessel to harbor authority for notification of distance or position of the vessel.

VOC

Volatile Organic Compounds

Units of Measure:

bbbl	=	barrel of liquid (42 gallons)
bhp	=	brake-horsepower
btu	=	British Thermal Unit
C	=	degrees Celcius
F	=	degrees Fahrenheit
f ³	=	cubic feet
g	=	grams
gal	=	gallon
gpm	=	gallons per minute
gr	=	grain
hp	=	horsepower
hr	=	hour
lb	=	pound
in	=	inches
max	=	maximum
m ²	=	square meter
min	=	minute
M	=	thousand
mm	=	million
Mg	=	mega-gram, one thousand grams
μg	=	micro-gram, one millionth of a gram
MM	=	million
mm	=	millimeter
MMbtu	=	million btu
mm Hg	=	millimeters of Mercury (pressure)
MW	=	megawatts
ppmv	=	parts per million, by volume
ppmw	=	parts per million, by weight
psia	=	pounds per square inch, absolute
psig	=	pounds per square inch, gauge
scfm	=	standard cubic feet per minute
yr	=	year

Symbols:

<	=	less than
>	=	greater than
≤	=	less than or equal to
≥	=	greater than or equal to

Appendix B, Evaluation for Application 30713

ENGINEERING EVALUATION Shore Terminals, LLC, Plant: 581 Application 30713

INTRODUCTION

Shore Terminals, LLC (Subsidiary of NuStar Energy) has applied for Modifications to make physical changes at the following existing sources:

Existing source descriptions:

- S-38 Fixed Roof Tank (T-20106), 8,022,000 gallon capacity, abated by:**
 - A-421 Activated Carbon/Charcoal Adsorption**
 - A-422 Activated Carbon/Charcoal Adsorption**
- S-40 Fixed Roof Tank (T-20108), 8,022,000 gallon capacity, abated by:**
 - A-421 Activated Carbon/Charcoal Adsorption**
 - A-422 Activated Carbon/Charcoal Adsorption**
- S-42 Fixed Roof Tank (T-20110), 8,022,000 gallon capacity, abated by:**
 - A-421 Activated Carbon/Charcoal Adsorption**
 - A-422 Activated Carbon/Charcoal Adsorption**
- S-43 Fixed Roof Tank (T-20111), 8,022,000 gallon capacity, abated by:**
 - A-421 Activated Carbon/Charcoal Adsorption**
 - A-422 Activated Carbon/Charcoal Adsorption**
- S-44 Fixed Roof Tank (T-3001), 1,260,000 gallon capacity, abated by:**
 - A-421 Activated Carbon/Charcoal Adsorption**
 - A-422 Activated Carbon/Charcoal Adsorption**

Revised source descriptions:

- S-38 Internal Floating Roof Tank (T-20106), 7,610,000 gallon capacity**
- S-40 Internal Floating Roof Tank (T-20108), 7,610,000 gallon capacity**
- S-42 Internal Floating Roof Tank (T-20110), 7,610,000 gallon capacity**
- S-43 Internal Floating Roof Tank (T-20111), 7,610,000 gallon capacity**
- S-44 Internal Floating Roof Tank (T-3001), 1,175,000 gallon capacity**

On October 15, 2019, a fire occurred at the facility, which caused the collapse of two tanks that are not a part of this application, S-39 (T-20107) and S-41 (T-20109). The fire also caused the loss of vapor controls for S-38, S40, S-42, S43 and S-44, which are all being modified in this application. A permit application to reconstruct S-39 and S-41 has since been submitted under Application 31506.

Shore Terminals proposes to disconnect the aforementioned fixed roof tanks from the existing abatement systems (A-421 and A-422 Activated Carbon/Charcoal Adsorption) and retrofit these tanks with new internal floating roofs (IFR) to be installed within each of these tanks. No other changes are being proposed in this project.

Each IFR will be constructed inside each of these existing tanks. This project will effectively reduce the maximum working volumes of these tanks to the capacities specified above. The IFRs will be made of reinforced vinyl ester resin, thus allowing the roof to be constructed as single piece and thereby eliminating the possibility of deck

seam emissions. The IFRs will also be cable suspended from the tank's fixed roof, thus eliminating deck penetrations for roof legs and thereby reducing tank fitting emissions.

Prior to the issuance of revised permit conditions under Application 29926, none of the storage tanks at this facility had any existing throughput limits that could establish the potential to emit. As part of the analysis for Application 29926, the Air District evaluated the total facility's combined existing maximum capacity for material throughput and used this to establish new permit conditions (Condition #27277 Parts 1 and 2) that would limit the potential to emit for all storage tanks at this facility. To ensure that the combined throughput of all storage tanks were not modified per Regulation 2-1-234 and thus qualified as alterations per Regulation 2-1-233, facility-wide organic storage loading capacities were added as permit condition limits. These capacities were determined from information provided by the facility on its existing pumping capacities at the Concord and Richmond pipelines. Since any facility storage tank may be serviced by a shared pump, a combined facility-wide throughput limit (a "bubble limit" of 1,110,159,246 gallons in any consecutive 12-month period) applying to all tanks was imposed to limit the potential to emit for the storage tanks.

The storage tanks in this project are also constrained by Permit Condition #6185 Part 2, which limits total combined throughput (a "bubble limit" of 18.8 million barrels or 789,600,000 gallons in any consecutive 12-month period) for a subset of tanks at this facility: S-32 through S-44.

Note that Regulation 2-1-234.1.1 states that "A permit limit that applies to combined emissions from multiple sources does not establish an individual source's potential to emit, unless the limit imposes an effective, legally enforceable limitation specifically on the emissions from the individual source." Replacing S-38, S-40, S-42, S-43 and S-44 fixed roof tanks abated by the carbon abatement system with 99.7% POC abatement efficiency with IFRTs will increase the emissions from the tanks for the equivalent throughput. This conversion will modify S-38, S-40, S-42, S-43 and S-44. So although there is a constraint on all tanks at the facility in Condition #27277 Parts 1 and 2 and a constraint on S-32 through S-44 in Condition 6185 Part 2, S-38, S-40, S-42, S-43 and S-44 are all being physically modified. Replacing S-38, S-40, S-42, S-43 and S-44 fixed roof tanks abated by the carbon abatement system with 99.7% POC abatement efficiency with IFRTs will increase the emissions from each of these tanks for the equivalent throughput. The PTE's of these tanks will increase and this conversion will modify S-38, S-40, S-42, S-43 and S-44.

Permit Condition #6185 also currently requires continuous organics monitoring at these tanks. After the retrofit, these tanks will no longer be subject to the continuous monitoring requirement in Permit Condition #6185 because these tanks will no longer be abated by carbon canisters; internal floating roof tanks (IFRTs) cannot be readily monitored or tested; and IFRTs are required to have circulation vents to meet American Petroleum Institute (API) standards (see Best Available Control Technology discussion below). Due to this relaxation of monitoring, this project will require a Significant Revision for Title V per Reg. 2-6-226.3.

The facility is also requesting the following changes to Permit Condition #6185:

- Revision to Part 26 to clarify that the facility is allowed to transfer renewable/alternative jet fuel at S-27 Marine Loading Terminal as approved under Application 29926 and
- Revision to Part 27 to allow the facility to postpone an annual source test at S-27 until the next marine vessel loading event at S-27 if no marine vessels are loaded at S-27 during a given calendar year. Within 60 days after the end of the prior calendar year, the facility will be required to submit written notification and corresponding monthly records showing zero throughput at S-27 occurring during the prior calendar year.

Lastly, the Air District added the following language to Permit Condition #6185:

- Added Part 2a to clarify that S-32 through S-44 storage tanks are allowed to exceed the annual throughput limit of 18.8 million barrels in any consecutive 12-month period in Part 2 as long as S-32 through S-44 do not exceed a total combined POC emissions limit of 18,800 pounds in any consecutive 12-month period and that any increase in TAC emissions due to the higher throughput does not result in total TAC emissions exceeding any risk screening trigger level in Table 2-5-1 of Regulation 2-5. This POC emissions limit is the aforementioned annual throughput limit multiplied by the 1 lb/1000 barrel POC emission factor in Part 5. A recordkeeping condition has been added as well.
- Added Part 3a to clarify that S-32 through S-44 storage tanks are allowed to exceed the daily throughput limit of 250,000 barrels in any calendar day in Part 3 as long as S-32 through S-44 do not exceed a total combined POC emissions limit of 250 pounds in any calendar day and that any increase in TAC emissions due to the higher throughput does not result in total TAC emissions exceeding any risk screening trigger level in Table 2-5-1 of Regulation 2-5. This POC emissions limit is the aforementioned daily throughput limit multiplied by the 1 lb/1000 barrel POC emission factor in Part 5. A recordkeeping condition has been added as well.
- Added Part 4a to clarify that S-27 Marine Vessel Loading is allowed to exceed the annual throughput limit of 47.6 million barrels in any consecutive 12-month period in Part 4 as long as S-27 does not exceed a total combined POC emissions limit of 47,600 pounds in any consecutive 12-month period and that any increase in TAC emissions due to the higher throughput does not result in total TAC emissions exceeding any risk screening trigger level in Table 2-5-1 of Regulation 2-5. The aforementioned annual POC emissions limit is the aforementioned annual throughput limit multiplied by the 1 lb/1000 barrel POC emission factor in Part 5. The aforementioned hourly POC emissions limit is the pumping rate limit of 10,000 barrels per hour in Part 25 multiplied by the 1 lb/1000 barrel POC emission factor in Part 5. A recordkeeping condition has been added as well.

EMISSION CALCULATIONS

The bulk liquids are received via pipeline, railcar, or marine vessel and distributed to the terminal's bulk storage tanks. The bulk liquids are then transferred from tank storage for delivery to customers by pipeline, marine vessel, or tanker trucks through the facility's

truck loading rack, or marine vessel loading rack. The facility operates under a facility-wide emission limitation specified in Permit Condition # 12677. As mentioned above, the storage tanks currently have permit conditions that establish the existing potential to emit.

TankESP emissions estimation software, which incorporates the calculation methodology of the United States Environmental Protection Agency's (USEPA) AP-42 Chapter 7.1 for Organic Liquid Storage Tanks. was used to estimate maximum annual POC emissions. The following tables summarize the tank fittings and control technologies for each of these tanks. The emissions calculations are provided in Appendix B and the TankESP output reports are provided in Appendix C.

Table 1: Tank details and fittings information for S-38, S-40, S-42, and S-43 (Proposed Fittings)	
Deck fitting category	Detail
Deck Type	Welded
Primary seal	Mechanical shoe
Secondary seal	Rim-mounted
Access Hatch (24-in. Diam.)/Bolted Cover, Gasketed	2
Ladder-Slotted Guidepole Combination Well/Ladder Sleeve, Gasketed Sliding Cover	1
Stub Drain (1-in. Diameter)	17
Column Well (20-in.Diam.)/Flexible fabric sleeve seal	1
Column Well (12-in. Diam.)/Flex. Fabric Sleeve Seal	8
Vacuum Breaker (10-in. Diam.)/Weighted Mech. Actuation, Gasket.	2
Sample Pipe or Well (24" diameter), Slit fabric seal 10% open area	1
Slotted Guidepole/Sample Well, Gasketed sliding cover with float, sleeve, wiper	1

Table 2: Tank details and fittings information for S-44 (Proposed Fittings)	
Deck fitting category	Pontoon
Deck Type	Welded
Primary seal	Mechanical shoe
Secondary seal	Rim-mounted
Access Hatch (24-in. Diam.)/Bolted Cover, Gasketed	2
Ladder-Slotted Guidepole Combination Well/Ladder Sleeve, Gasketed Sliding Cover	1
Stub Drain (1-in. Diameter)	5
Column Well (24-in.Diam.)/Flexible fabric sleeve seal	1
Vacuum Breaker (10-in. Diam.)/Weighted Mech. Actuation, Gasket.	2
Sample Pipe or Well (24" diameter), Slit fabric seal 10% open area	1
Slotted Guidepole/Sample Well, Gasketed sliding cover with float, sleeve, wiper	1

The facility plans to store a range of products at these storage tanks, including gasoline, ethanol, transmix, biodiesel, and alternative (non-petroleum) fuels. The Potential to Emit of each storage tank is conservatively estimated assuming all throughput is gasoline, since it has the highest vapor pressure among the materials to be stored in these tanks. The properties of gasoline are not static and may vary throughout the year due to regulatory standards, weather conditions, and other factors. The California Air Resources Board (CARB) Phase 3 CARBOB standards limit gasoline blendstock to an RVP of 6.9 psi for the months of May through October within the Air District's jurisdiction. Gasoline was defined in the TankESP program using the default properties for gasoline

with a Reid Vapor Pressure (RVP) of seven (7) psi for the months of May through October and 10 psi throughout the remainder of the year to account for the CARB standards. These vapor pressures will be conditionally limited in Condition #27277 Part 12). Potential storage tank TAC emissions were also calculated in the TankESP program using the default gasoline speciation and TAC properties.

The facility is requesting a new separate “bubble” throughput limit that specifically applies to only the storage tanks in this project, S-38, S-40, S-42, S-43, and S-44. This new bubble throughput limit will be 18.8 million barrels in any consecutive 12-month period and 250,000 barrels in any calendar day of non-exempt compounds total at S-38, S-40, S-42, S-43, and S-44 (Condition #27277 Parts 11 and 12). Potential annual emissions from each storage tank were conservatively estimated assuming the maximum “bubble” throughput limit of 18.8 million barrels per year in each storage tank. Potential maximum daily and hourly emissions from each storage tank were conservatively estimated assuming the maximum “bubble” throughput limit of 250,000 barrels per day in each storage tank. These tanks will be removed from Permit Condition #6185 Parts 1, 5, 12 and 20, which, as mentioned above, requires the subject tanks to be abated by carbon canisters A-421 and A-421 and continuous organics monitoring. Since the remaining tanks will continue to be subject to Permit Condition #6185 requirements, the associated limits are not changing, and no physical modifications are being made, the remaining tanks are not considered altered or modified.

Potential annual storage tank emissions are estimated by summing the monthly emissions calculated using TankESP. Potential maximum daily storage tank emissions are estimated by dividing monthly emissions by the number of days per month. Potential maximum hourly emissions were estimated by dividing the potential maximum daily storage tank emissions by 24 hours per day.

The TankESP program calculates both standing losses and working losses from storage tanks. The contribution of POC emissions from standing losses and working losses are included in the TankESP output reports. However, TankESP only includes total emissions of TACs. Standing and working loss contributions of TAC emissions were estimated by multiplying the total emissions of a TAC by the ratio of standing or working POC losses to total POC emissions for each tank.

Post-project maximum annual, daily, and hourly emissions are shown in Tables 3, 4, and 5 below, respectively. Working losses for each tank are calculated based on the total proposed annual or maximum daily “bubble” throughput. To avoid double counting emissions, the overall Potential to Emit for the project is calculated by summing the standing losses from each tank and the working losses from only the worst-case (highest) emitting tank. For this Project, the worst-case emitting tank was determined to be storage tank T-3001, the smallest tank. The TankESP emissions outputs and hourly emissions calculations are provided in Appendix D.

Table 3: Maximum Annual Emissions Calculations							
Tank	A	B	C	D	E	F	G
	Standing Loss POC Emissions (lbs/year)	Working Loss POC Emissions (lbs/year)	Capacity (gallons)	% of Total Storage Capacity	Weighted Working Loss POC Emissions (weighted based on tank capacity) (B x E) (lbs/year)	Worst-Case Total POC Emissions (A + B) (lbs/year)	Post-Project Total POC Emissions (A + E) (lbs/year)
S-38 (T-20106)	1704.38	2231.85	8,022,000	24.1%	536.88	3936.23	2241.26
S-40 (T-20108)	1704.38		8,022,000	24.1%	536.88	3936.23	2241.26
S-42 (T-20110)	1704.38		8,022,000	24.1%	536.88	3936.23	2241.26
S-43 (T-20111)	1704.38		8,022,000	24.1%	536.88	3936.23	2241.26
S-44 (T-3001)	883.24		1,260,000	3.78%	84.33	3115.09	967.56
TOTAL	9932.61		33,348,000	100%	2231.85		9932.61

Table 4: Maximum Daily Emissions Calculations							
Tank	A	B	C	D	E	F	G
	Standing Loss POC Emissions (lbs/day)	Working Loss POC Emissions (lbs/day)	Capacity (gallons)	% of Total Storage Capacity	Weighted Working Loss POC Emissions (weighted based on tank capacity) (B x E) (lbs/day)	Worst-Case Total POC Emissions (A + B) (lbs/day)	Post-Project Total POC Emissions (A + E) (lbs/day)
S-38 (T-20106)	5.75	32.24	8,022,000	24.1%	7.76	37.99	13.51
S-40 (T-20108)	5.75		8,022,000	24.1%	7.76	37.99	13.51
S-42 (T-20110)	5.75		8,022,000	24.1%	7.76	37.99	13.51
S-43 (T-20111)	5.75		8,022,000	24.1%	7.76	37.99	13.51
S-44 (T-3001)	2.98		1,260,000	3.78%	1.22	35.22	4.2
TOTAL	58.23			100%	32.24		58.23

	A	B	C	D	E	F	G
Tank	Standing Loss POC Emissions (lbs/hour)	Working Loss POC Emissions (lbs/hour)	Capacity (gallons)	% of Total Storage Capacity	Weighted Working Loss POC Emissions (weighted based on tank capacity) (B x E) (lbs/hour)	Worst-Case Total POC Emissions (A + B) (lbs/hour)	Post-Project Total POC Emissions (A + E) (lbs/hour)
S-38 (T-20106)	0.24	1.34	8,022,000	24.1%	0.32	1.58	0.56
S-40 (T-20108)	0.24		8,022,000	24.1%	0.32	1.58	0.56
S-42 (T-20110)	0.24		8,022,000	24.1%	0.32	1.58	0.56
S-43 (T-20111)	0.24		8,022,000	24.1%	0.32	1.58	0.56
S-44 (T-3001)	0.12		1,260,000	3.78%	0.05	1.46	0.17
TOTAL	2.43		33,348,000	100%	1.34		2.43

Post-Project Emissions Increase

The actual post-project emission increase is the difference between the post-project emissions and the pre-project baseline emissions. Per Regulation 2-2-605, the baseline emission level is the annual average emissions based on the previous 36 months of operation for each given source. The baseline POC emissions calculations and TankESP output reports are provided in Appendix C. The baseline period for this project is the 36-month period from 10/1/18 to 9/30/21.

Transportation mixture (transmix) is a mixture of products resulting from the transportation of different products in the same pipeline. Therefore, the composition and properties of transmix varies over time. For the purposes of calculating baseline emissions, transmix is assumed to be gasoline with an RVP of 7 (the lower of the two CARB RVP standards for gasoline, as mentioned previously) to obtain conservatively low emissions estimates to account for the varying properties of transmix.

S-38, S-40, S-42, S-43, and S-44 are currently abated by carbon canisters A-421 and A-422. During the baseline period, A-421 and A-422 operated with an average abatement efficiency of 99.70%, based on source test results. Actual abated baseline emissions were calculated by applying the average abatement efficiency of 99.70% to the unabated storage tank emissions calculated using TankESP.

Table 6: Pre-Project Baseline POC Emissions (Existing Fixed-Roof Tanks abated by A-421/A-422 Activated Carbon/Charcoal Adsorption)

Tank	Unabated POC Emissions (lb/yr), 3-year baseline (annual average)	Average Abatement Efficiency of A-421/A-422	Pre-Project Baseline POC Emissions (lb/yr)
S-38 (T-20106)	61,336	99.70%	182.48
S-40 (T-20108)	47,930	99.70%	142.59
S-42 (T-20110)	32,301	99.70%	96.09
S-43 (T-20111)	43,639	99.70%	129.83
S-44 (T-3001)	23,243	99.70%	69.15
Total	213,252		620.14

Table 7: Post-Project Emissions Increase

Tank	Post-Project Potential POC Emissions (lb/yr) (from Table 3)	Pre-Project Baseline POC Emissions (lb/yr) (from Table 6)	POC Emissions Increase (lb/yr)
S-38 (T-20106)	2241.26	182.48	2058.78
S-40 (T-20108)	2241.26	142.59	2098.67
S-42 (T-20110)	2241.26	96.09	2145.17
S-43 (T-20111)	2241.26	129.83	2111.43
S-44 (T-3001)	967.56	69.15	898.41
Total	9932.61	620.14	9312.46

Plant Cumulative Increase**Table 8. Plant Cumulative Emissions Increase, Post-4/5/91**

Pollutant	Existing Emissions, Post- 4/5/91 (TPY)	New Increase with This Application (TPY)	Cumulative Emissions (TPY)
NO _x	1.260	0	1.260
POC	13.581	4.656	18.237
CO	7.104	0	7.104
PM ₁₀	0.056	0	0.056
SO ₂	0.052	0	0.052
PM _{2.5}	0.053	0	0.053

Health Risk Assessment

TAC emissions calculations are provided in Appendix B. As stated above, the TankESP program calculates both standing losses and working losses from storage tanks for organics or POC. However, TankESP only includes total emissions of TACs. Standing and working loss contributions of TAC emissions were estimated by multiplying the total emissions of a TAC by the ratio of standing or working POC losses to total POC emissions for each tank. Also, an HRA requires more representative estimates for working losses rather than assuming that the worst-case working losses (from the highest emitting tank) applies to each tank. Therefore, estimated working losses from each tank were estimated by distributing the total potential working loss for the project proportionally based on the storage capacity of the tanks.

As shown below, the maximum annual emissions of benzene and naphthalene will exceed TAC thresholds in Table 2-5-1 of Regulation 2-5. Therefore, a Health Risk Assessment (HRA) is required under Regulation 2-5.

An HRA conducted by Ted Hull for this project on 2/4/22 found that the risk levels (the project cancer risk is 0.50 in a million, the project chronic hazard index was 0.0020 and the project acute hazard index was 0.24) were acceptable per Regulation 2-5-302.

Table 9: Maximum Annual TAC Emissions

Pollutant	Total Annual Emissions (lb/yr)					Reg 2-5 Trigger Level (lb/yr)	Exceeds Trigger? (Y/N)
	S-38	S-40	S-42	S-43	S-44		
Benzene	2.70E+01	2.70E+01	2.70E+01	2.70E+01	1.44E+01	2.9E+00	Y
Ethylbenzene	1.51E+01	1.51E+01	1.51E+01	1.51E+01	9.84E+00	3.3E+01	N
Hexane (n-)	1.79E+01	1.79E+01	1.79E+01	1.79E+01	8.65E+00	2.7E+05	N
Naphthalene	4.31E+00	4.31E+00	4.31E+00	4.31E+00	2.88E+00	2.4E+00	Y
Polycyclic aromatic hydrocarbons (PAH) (as B(a)P-equivalent)	2.70E-04	2.70E-04	2.70E-04	2.70E-04	1.80E-04	3.3E-03	N
Toluene	8.18E+01	8.18E+01	8.18E+01	8.18E+01	5.06E+01	1.2E+04	N
Xylene	7.51E+01	7.51E+01	7.51E+01	7.51E+01	4.91E+01	2.7E+04	N

Table 10: Maximum Hourly TAC Emissions

Pollutant	Total Hourly Emissions (lb/hr)					Reg 2-5 Trigger Level (lb/hr)	Exceeds Trigger? (Y/N)
	S-38	S-40	S-42	S-43	S-44		
Benzene	8.91E-03	8.91E-03	8.91E-03	8.91E-03	2.95E-03	6.0E-02	N
Ethylbenzene	6.61E-03	6.61E-03	6.61E-03	6.61E-03	2.25E-03		
Hexane (n-)	5.11E-03	5.11E-03	5.11E-03	5.11E-03	1.67E-03		
Naphthalene	1.95E-03	1.95E-03	1.95E-03	1.95E-03	6.64E-04		
Polycyclic aromatic hydrocarbons (PAH) (as B(a)P-equivalent)	1.22E-07	1.22E-07	1.22E-07	1.22E-07	4.16E-08		
Toluene	3.34E-02	3.34E-02	3.34E-02	3.34E-02	1.13E-02	8.2E+01	N
Xylene	3.30E-02	3.30E-02	3.30E-02	3.30E-02	1.12E-02	4.9E+01	N

Best Available Control Technology (BACT)

In accordance with Regulation 2-2-301, BACT is triggered for any new or modified source with the potential to emit 10 pounds or more per highest day of POC, NPOC, NO_x, CO, SO₂, PM₁₀, or PM_{2.5}. As shown above, the owner/operator is subject to BACT for POC.

The BACT Workbook Document # 167.4.1 contains the requirements for "Storage Tank – Internal Floating Roof, Organic Liquids." BACT 1 is a vapor recovery system with an overall system efficiency $\geq 98\%$, and the typical technology is a thermal incinerator, carbon adsorber, or refrigerated condenser. The Air District initially inquired whether the circulation vents can continue to be connected to the existing manifold system such that all vented emissions are still routed to A-421 and A-422 or to another vapor recovery system that achieves $\geq 98\%$. The facility stated that retaining the existing manifold that is routed to A-421 and A-422 (which is used in the current fixed-roof tank configuration) would pose potential safety concerns and would violate API standards for IFRTs. Specifically, API 650 H.5.2.2 provides design standards for the cone roof circulation vents that are necessary for tanks operating with an IFR configuration. These circulation vents are required to prevent the development of a combustible gas mixture within the tank and above the IFR and prevent proper circulation above the IFR when the tanks are in a static state (not being filled or emptied). API 650 H.5.2.2.1 requires that the maximum spacing for these vents is 32 feet (no fewer than four equally spaced vents) and the venting shall be distributed such that the sum of the open areas of the vents located within any 32 feet interval is at least 2 square feet. Therefore, routing these vents to a vapor recovery system and/or extending these vents for the purpose of installing a continuous hydrocarbon analyzer would prevent the minimum spacing and opening requirements set forth in API 650. Additionally, pressure relief valves will not allow air to be freely circulated when the tank is in a static state. The facility stated that

there is no benefit gained from installing an IFR in the tanks in this configuration, and it presents operational complexities of having two fundamentally different abatement approaches (one preventing emissions and the other allowing emissions and collecting them).

BACT 2 is a BAAQMD-approved roof w/ liquid mounted primary seal and zero gap secondary seal, all meeting design criteria of Regulation 8-5, no ungasketed roof penetrations, no slotted pipe guide pole unless equipped with float and wiper seals, and no adjustable roof legs unless fitted w/ vapor seal boots or equivalent. The proposed floating roof designs will meet the minimum BACT 2 level of control, which consists of specific seal and deck fitting specifications. In addition, the proposed IFRs also include additional state-of-the-art features for further emissions reductions beyond the BACT 2 level of control. As mentioned previously, the IFRs will be made of reinforced vinyl ester resin, thus allowing the roof to be constructed as single piece and thereby eliminating the possibility of deck seam emissions. The IFRs will also be cable suspended from the tank's fixed roof, thus eliminating deck penetrations for roof legs and thereby reducing tank fitting emissions.

Source Category

Plant #581

Source:	Storage Tank - Internal Floating Roof, Organic Liquids	Revision:	2
Class:	All	Document #:	167.4.1
		Date:	03/03/95

Determination

POLLUTANT	BACT	TYPICAL TECHNOLOGY
	1. Technologically Feasible/ Cost Effective 2. Achieved in Practice	
POC	1. Vapor recovery system w/ an overall system efficiency $\geq 98\%$ ^{a,T} 2. BAAQMD Approved roof w/ liquid mounted primary seal and zero gap secondary seal, all meeting design criteria of Reg. 8, Rule 5. Also, no ungasketed roof penetrations, no slotted pipe guide pole unless equipped with float and wiper seals, and no adjustable roof legs unless fitted w/ vapor seal boots or equivalent ^{a,T}	1. Thermal Incinerator; or Carbon Adsorber; or Refrigerated Condenser; or BAAQMD approved equivalent ^{a,T} 2. BAAQMD Approved Roof and Seal Design ^{a,T}
NO _x	1. n/a 2. n/a	1. n/a 2. n/a
SO ₂	1. n/a 2. n/a	1. n/a 2. n/a
CO	1. n/a 2. n/a	1. n/a 2. n/a
PM ₁₀	1. n/a 2. n/a	1. n/a 2. n/a
NPOC	1. Vapor recovery system w/ an overall system efficiency $\geq 98\%$ ^{a,T} 2. Same as for POC above	1. Carbon Adsorber; or Refrigerated Condenser; or BAAQMD approved equivalent ^{a,T} 2. BAAQMD Approved Roof and Seal Design ^{a,T}

References

a. BAAQMD T. TBACT

Offsets

Per Regulation 2-2-302, offsets must be provided for any new or modified source at a facility that emits more than 10 TPY of POC or NO_x. Per Regulation 2-2-303, offsets for PM₁₀, PM_{2.5}, and SO₂ are required if the source is located at a Major Facility and is over 1.0 TPY since April 5, 1991 for PM₁₀, PM_{2.5}, and SO₂.

Facilities with a potential to emit between 10 and 35 TPY of POC or NO_x can use offsets from the Small Facilities Bank. The facility is required to surrender any banked offsets prior to any offsets provided from the Small Facilities Bank.

Because this facility has been permitted to emit more than 35 tons of NO_x and POC per year, the facility must provide offsets for the NO_x and POC emissions increases in this application at a 1.15:1 ratio. **The facility has provided Banking Certificate 1874 for the required POC offsets (5.355 TPY).**

Table 11. Plant Cumulative Emissions Increase, Pre- and Post-4/5/91

Pollutant	Existing Emissions, Pre- and Post- 4/5/91 Combined (TPY)*	New Increase with This Application (TPY)	Cumulative Emissions (TPY)
NO _x	101.087	0	101.087
POC	124.358	4.656	129.014
CO	99.631	0	99.631
PM ₁₀	0.056	0	0.056
SO ₂	62.649	0	62.649
PM _{2.5}	0.053	0	0.053

*Note: Post-4/5/91 emissions of POC and NO_x have been fully offset.

Table 12. Post-Project Emissions Increase and Required Offsets

Tank	Potential POC Emissions (lb/yr)	Baseline POC Emissions (lb/yr)	Cumulative POC Emissions Increase (lb/yr)
S-38 (T-20106)	2,241.26	182.48	2,058.78
S-40 (T-20108)	2,241.26	142.59	2,098.67
S-42 (T-20110)	2,241.26	96.09	2,145.17
S-43 (T-20111)	2,241.26	129.83	2,111.43
S-44 (T-3001)	967.56	69.15	898.41

Total Cumulative POC Increase (ton/yr) = 4.656

POC Offset Ratio = 1.15

Total POC Offsets (ton) = 5.355

STATEMENT OF COMPLIANCE

District Rules

S-38, S-40, S-42, S-43, and S-44 are expected to comply with Regulation 8-5 (Organic Compounds- Storage of Organic Liquids). Specifically, the tanks are subject to Reg. 8-5-301 (control requirements for storage tanks), 8-5-305 (requirements for internal floating roof tanks), 8-5-320 (fitting requirements for floating roof tanks), 8-5-321 (primary seal requirements), 8-5-322 (secondary seal requirements), 328 (tank degassing requirements), 331 (tank cleaning requirements), and 332 (sludge handling requirements).

Federal Rules

S-38, S-40, S-42, S-43, and S-44 are subject to and expected to continue to comply with the requirements of 40 CFR 60 Subpart Kb (NSPS 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" because they are volatile organic liquid (VOL) storage tanks with a capacity greater than 19,803 gallons for which construction, reconstruction, or modification commenced after July 23, 1984.

The storage tanks in this project are subject to the requirements of 40 CFR 63 Subpart R (NESHAP R). Per 40 CFR 63.423(a), compliance with the NESHAP R standards for storage vessels is achieved via compliance with the emissions standards of NSPS Kb.

CEQA

This application is considered to be exempt from CEQA review under Regulation 2-1-312.6. As required under Regulation 2-1-426.1, a completed Form Appendix H has been submitted by the applicant.

2-1-312 Other Categories of Exempt Projects: In addition to ministerial projects, the following categories of projects subject to permit review by the District will be exempt from the CEQA review, either because the category is exempted by the express terms of CEQA (subsections 2-1-312.1 through 312.9) or because the project has no potential for causing a significant adverse environmental impact (subsections 2-1-312.10 and 312.11). Any permit applicant wishing to qualify under any of the specific exemptions set forth in this Section 2-1-312 must include in its permit application CEQA-related information in accordance with subsection 2-1-426.1. In addition, the CEQA-related information submitted by any permit applicant wishing to qualify under subsection 2-1-312.11 must demonstrate to the satisfaction of the APCO that the proposed project has no potential for resulting in a significant environmental effect in connection with any of the environmental media or resources listed in Section II of Appendix I of the State CEQA Guidelines.

312.6 Permit applications relating exclusively to the repair, maintenance or minor alteration of existing facilities, equipment or sources involving negligible or no expansion of use beyond that previously existing.

The District has determined that the issuance of this Authority to Construct for the proposed modification is exempt from CEQA because the project entails a minor alteration of existing mechanical equipment that does not expand existing use (CEQA Guidelines § 15301). The District's action is also exempt from CEQA because there is no possibility that the project may have a significant effect on the environment (CEQA Guidelines § 15061(b)(3)). A Notice of Exemption will be filed with the Contra Costa County Clerk and is attached.

Public Notices

This facility is over 1,000 feet from the nearest school and therefore is not subject to the public notification requirements of Regulation 2-1-412.

PERMIT CONDITIONS

See Attachment A.

APPENDIX A

The proposed changes to the tables in Section IV and permit conditions in Section VI of the Title V permit are provided below. For conditions, please refer to the Permit Condition Section of the Evaluation Report for Application 30713.

Table II:

Table II A - Permitted Sources

Each of the following sources has been issued a permit to operate pursuant to the requirements of BAAQMD Regulation 2, Permits. The capacities in this table are the maximum allowable capacities for each source, pursuant to Standard Condition I.J and Regulation 2-1-301.

S-#	Description	Make or Type	Model	Capacity	Grandfathered Limit, or Firm Limit and Basis
38	T-20106, ethanol/gasoline/petroleum storage tank	Internal Floating Roof Tank		8,022,000 gallons Facility Emissions Cap Condition 12677 Condition 27277	NSR Applications 6719 (1991) and 30713 (2022)
39	T-20107, MTBE/gasoline storage tank	Fixed Roof Tank		8,022,000 gallons Facility Emissions Cap Condition 12677	NSR Application 6719 (1991)
40	T-20108, ethanol/gasoline/petroleum storage tank	Internal Floating Roof Tank		8,022,000 gallons Facility Emissions Cap Condition 12677	NSR Applications 6719 (1991) and 30713 (2022)
41	T-20109, MTBE/gasoline storage tank	Fixed Roof Tank		8,022,000 gallons Facility Emissions Cap Condition 12677	NSR Application 6719 (1991)
42	T-20110, ethanol/gasoline/petroleum storage tank	Internal Floating Roof Tank		8,022,000 gallons Facility Emissions Cap Condition 12677	NSR Applications 6719 (1991) and 30713 (2022)
43	T-20111, ethanol/gasoline/petroleum storage tank	Internal Floating Roof Tank		8,022,000 gallons Facility Emissions Cap Condition 12677	NSR Applications 6719 (1991) and 30713 (2022)
44	T-3001, ethanol/gasoline/petroleum storage tank	Internal Floating Roof Tank		1,260,000 gallons Facility Emissions Cap Condition 12677	NSR Applications 6719 (1991) and 30713 (2022)

Table II B – Abatement Devices

A-#	Description	Source(s) Controlled	Applicable Requirement	Operating Parameters	Limit or Efficiency
A-1	Vapor Recovery System	S-22	BAAQMD Condition # 12677 Part 8A	Infrared combustible gas detector/recorder measures hydrocarbon concentration	0.08 lb POC/1000 gal
A-421	Charcoal Adsorption Vapor Recovery unit	S-27, S-32 through S-37, S-39, S-41	BAAQMD Condition # 6185 Part 5, Part 15	Infrared combustible gas detector measures hydrocarbon concentration	1 lb POC/ 1000 barrel
A-422	Charcoal Adsorption Vapor Recovery unit	S-27, S-32 through S-37, S-39, S-41	BAAQMD Condition # 6185 Part 5, Part 15	Infrared combustible gas detector measures hydrocarbon concentration	1 lb POC/ 1000 barrel

Table IV:

**Table IV –F
 Source-specific Applicable Requirements
 S-27–MARINE VESSEL LOADING/UNLOADING TERMINAL**

Applicable Requirement	Regulation Title or Description of Requirement	Federally Enforceable (Y/N)	Future Effective Date
BAAQMD Condition # 6185	Permit Conditions		
Part 4	Total hydrocarbon liquid loaded shall not exceed 47.6 million barrels per year [Basis: Cumulative Increase]	Y	
Part 4a	Total combined POC/NPOC emissions shall not exceed 47,600 pounds in any consecutive 12-month period and 10 pounds per hour, and use of additional materials does not increase toxic emissions above any Regulation 2-5 triggers [Basis: Cumulative Increase; Toxics]	Y	
Part 5	A-421 and A-222 shall not exceed 1 pound of POCs per 1000 barrels [Basis: Cumulative Increase]	Y	
Part 12	Minimize fugitive leaks during connection and disconnection [Basis: Regulation 8-18]	Y	

Table IV –F
Source-specific Applicable Requirements
S-27–MARINE VESSEL LOADING/UNLOADING TERMINAL

Applicable Requirement	Regulation Title or Description of Requirement	Federally Enforceable (Y/N)	Future Effective Date
Part 14	Regenerative carbon system shall install an infrared combustible gas detector or District approved equivalent at the outlet of these carbon units [Basis: NSPS]	Y	
Part 15	Regenerative carbon system shall include a continuous temperature monitor and recorder to measure the temperature of each of the four carbon beds [Basis: NSPS]	Y	
Part 25	Total pumping rate shall not exceed 10,000 barrels per hour [Basis: Cumulative Increase]	Y	
Part 26	Only specified material can be transferred [Basis: Cumulative Increase]	Y	
Part 27	Annual source testing [Basis: 40 CFR 63, 63.563(b)6]	Y	

Table IV – G
Source-specific Applicable Requirements
S-32, S-33, S-34, S-35, S-36, S-37, S-39, S-41
– FIXED ROOF TANKS

Applicable Requirement	Regulation Title or Description of Requirement	Federally Enforceable (Y/N)	Future Effective Date
BAAQMD Condition #6185	Permit Conditions		
Part 1	Emissions from tanks shall be vented to A-421 and A-422, regenerative carbon units all times [Basis: Cumulative Increase]	Y	
Part 2	Hydrocarbon liquids loaded shall not exceed 18.8 million barrels in any consecutive 12-month period [Basis: Cumulative Increase]	Y	
Part 2a	Total combined POC/NPOC emissions shall not exceed 18,800 pounds in any consecutive 12-month period and use of additional materials does not increase toxic emissions above any Regulation 2-5 triggers [Basis: Cumulative Increase; Toxics]	Y	
Part 3	Hydrocarbon liquids loaded shall not exceed 250,000 barrels in any day [Basis: Cumulative Increase]	Y	
Part 3a	Total combined POC/NPOC emissions shall not exceed 250 pounds in any calendar day and use of additional materials does not increase toxic emissions above any Regulation 2-5 triggers [Basis: Cumulative Increase; Toxics]	Y	

Table IV – H
Source-specific Applicable Requirements
S-38, S-40, S-42, S-43, S-44 – INTERNAL FLOATING ROOF TANKS

Applicable Requirement	Regulation Title or Description of Requirement	Federally Enforceable (Y/N)	Future Effective Date
BAAQMD Regulation 8, Rule 5	Organic Compounds-Storage of Organic Liquids (11/3/2021)		
8-5-101	Description	Y	
8-5-111	Limited Exemption, Tank Removal From and Return to Service	N	
8-5-112	Limited Exemption, Tanks in Operation	N	
8-5-117	Exemption, Low Vapor Pressure	Y	
8-5-301	Storage Tanks Control Requirements	N	
8-5-305	Requirements for Internal Floating Roof Tanks	N	
8-5-320	Tank Fitting requirements	Y	
8-5-320.2	Openings in the roof	Y	
8-5-320.3	Gasketed Covers	Y	
8-5-320.4	Solid sampling or gauging wells	Y	
8-5-320.4.1	The well shall provide a projection below the liquid surface	Y	
8-5-320.4.2	The well shall be equipped with a cover	Y	
8-5-320.4.3	The gap between the well and the roof	Y	
8-5-320.5	Slotted sampling or gauging wells	Y	
8-5-320.5.1	The well shall provide a projection below the liquid surface	Y	
8-5-320.5.2	The well requirements	Y	
8-5-320.5.3	The gap between the well and the roof	Y	
8-5-320.6	Emergency roof drain	Y	
8-5-321	Primary seal requirements	Y	
8-5-321.1	No holes, tears, or other openings in the primary seal fabric	Y	
8-5-321.2	The seal shall be liquid mounted except as provided in 8-5-311.2.2	Y	
8-5-321.3	Metallic shoe type seals	Y	
8-5-321.3.1	Geometry of shoe	Y	
8-5-321.3.2	Gaps for welded tanks	Y	
8-5-322	Secondary seal requirements	Y	
8-5-322.1	No holes, tears, or other openings in the secondary seal	Y	
8-5-322.2	Insertion of probes	Y	
8-5-322.3	Gaps for welded tanks	Y	
8-5-322.5	For welded internal floating roof tank with seal installed after February 1, 1993, no gap between tank shell and the secondary seal shall exceed 1.5 mm (0.06 in.). The cumulative length of all secondary seal gaps exceeding 0.5 mm (0.02 in.) shall be not more than 5% of the circumference of the tank excluding gaps less than 5 cm (1.79 in.) from vertical weld seams.	Y	
8-5-322.6	The secondary seal shall extend from the roof to the tank shell and shall not be attached to the primary seal.	Y	

Table IV – H
Source-specific Applicable Requirements
S-38, S-40, S-42, S-43, S-44 – INTERNAL FLOATING ROOF TANKS

Applicable Requirement	Regulation Title or Description of Requirement	Federally Enforceable (Y/N)	Future Effective Date
8-5-328	Tank degassing requirements	N	
8-5-328.1	Concentration of <10,000 ppm as methane after cleaning	Y	
8-5-328.2	No degassing during ozone excess	Y	
8-5-328.3	Notification requirements	N	
8-5-331	Tank Cleaning Requirements	N	
8-5-402	Inspection Requirements for Internal Floating Roof Tanks	N	
8-5-402.1	Inspection of primary and secondary seal per 8-5-321 and 8-5-322 once every 10 years	N	
8-5-402.2	Inspection of entire circumference of outermost seal per 8-5-305.1, 8-5-305.2, 8-5-305.3, 8-5-321.1 and 8-5-322.1 twice per calendar year	N	
8-5-402.3	Tank Fitting Inspection twice per calendar year	N	
8-5-501	Recordkeeping Requirements	N	
8-5-502	Source test requirement	Y	
8-5-605	Measurement of Leak Concentrations and Residual Concentrations	N	
8-5-606	Analysis of Samples, Tank Cleaning Agents	N	
SIP Regulation 8, Rule 5	Organic Compounds-Storage of Organic Liquids (06/05/2003)		
8-5-111	Limited Exemption, Tank Removal From and Return to Service	Y	
8-5-112	Limited Exemption, Preventative Maintenance and Inspection of Tanks in Operation	Y	
8-5-301	Storage Tanks Control Requirements	Y	
8-5-303	Requirements for Pressure Vacuum Valves	Y	
8-5-305	Requirements for Internal Floating Roofs	Y	
8-5-328	Tank degassing requirements	Y	
8-5-328.1.2	Concentration of <10,000 ppm as methane after degassing	Y	
8-5-401	Primary seal inspection	Y	
8-5-401.1	Primary and Secondary Seals Inspection twice per calendar year	Y	
8-5-401.2	Tank Fitting Inspection twice per calendar year	Y	
8-5-501	Keep records	Y	
8-5-502	Tank degassing annual source test requirement	Y	
8-5-503	Portable hydrocarbon detector	Y	
40 CFR 60	Standards of Performance for New Stationary Sources (12/23/71)	Y	
Subpart A	General Provisions	Y	
60.1	Applicability	Y	
60.2	Definitions	Y	
60.3	Units and Abbreviations	Y	
60.4	Address	Y	
60.4(b)	Reports to EPA and District	Y	
60.5	Determination of Construction or Modification	Y	

Table IV – H
Source-specific Applicable Requirements
S-38, S-40, S-42, S-43, S-44 – INTERNAL FLOATING ROOF TANKS

Applicable Requirement	Regulation Title or Description of Requirement	Federally Enforceable (Y/N)	Future Effective Date
60.6	Review of Plans	Y	
60.7	Notification and Recordkeeping	Y	
60.7(a)	Written notification	Y	
60.7(b)	Records	Y	
60.8	Performance Tests	Y	
60.9	Availability of Information	Y	
60.11	Compliance with Standards and Maintenance Requirements	Y	
60.11(a)	Compliance with standards and maintenance requirements	Y	
60.11(d)	Minimizing emissions	Y	
60.12	Circumvention	Y	
60.13	Reconstruction	Y	
60.14	Modification	Y	
60.15	Reconstructions	Y	
60.17	Incorporated by Reference	Y	
60.19	General notification and reporting requirements	Y	
NSPS Part 60 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	Y	
60.110b(a)	Tanks greater than or equal to 40 cubic meters	Y	
60.112b(a) (3)	A closed vent system and control device	Y	
60.112b(a) (3)(i)	The closed vent system that collects all VOC vapors and gases discharged	Y	
60.112b(a) (3)(ii)	The control device that reduces inlet VOC emissions by 95 percent or greater	Y	
60.113b	Testing and Procedures		
60.113b(c)	Exempt from § 60.8 of the General Provisions	Y	
60.113b(c) (1)	Submit for approval by the Administrator	Y	
60.113b(c) (1)(i)	Documentation demonstrating that the control device will achieve the required control efficiency during maximum loading conditions	Y	
60.113b(c) (1)(ii)	A description of the parameter or parameters to be monitored	Y	
60.113b(c) (2)	Operate and monitor the parameters of the closed vent system and control device	Y	
60.115b	Reporting and recordkeeping requirements	Y	
60.115b(a)	After installing control equipment	Y	
60.115b(a) (1)	Furnish the Administrator with a report	Y	
60.115b(a) (2)	Keep a record of each inspection performed	Y	

Table IV – H
Source-specific Applicable Requirements
S-38, S-40, S-42, S-43, S-44 – INTERNAL FLOATING ROOF TANKS

Applicable Requirement	Regulation Title or Description of Requirement	Federally Enforceable (Y/N)	Future Effective Date
60.115b(a)(3)	Report shall identify the storage vessel, the nature of the defects, and the date the storage vessel was emptied	Y	
60.115(c)	Records	Y	
60.115(c)(1)	Operating plan	Y	
60.115(c)(2)	Parameters monitored	Y	
60.116b	Monitoring of Operation	Y	
60.116b(a)	The owner or operator shall keep copies of all records	Y	
60.116b(b)	Accessible records	Y	
60.116b(c)	Record of the VOL stored, the period of storage, and the maximum true vapor pressure of that VOL during the respective storage period	Y	
60.116b(d)	Maximum true vapor pressure	Y	
60.116b(e)	Available data on the storage temperature may be used to determine the maximum true vapor pressure	Y	
60.116b(e)(1)	The maximum true vapor pressure calculation	Y	
60.116b(e)(2)	Vapor pressure for crude oil or refined petroleum products	Y	
60.116b(e)(2)(i)	Reid vapor pressure and the maximum expected storage temperature	Y	
60.116b(e)(2)(ii)	The true vapor pressure	Y	
60.116b(e)(3)	For other liquids, the vapor pressure	Y	
60.116b(e)(3)(i)	May be obtained from standard reference texts	Y	
60.116b(e)(3)(ii)	Determined by ASTM Method D2879–83	Y	
60.116b(e)(3)(iii)	Measured by an appropriate method approved by the Administrator	Y	
60.116b(e)(3)(iv)	Calculated by an appropriate method approved by the Administrator	Y	
40 CFR 63	National Emission Standards for Hazardous Air Pollutants For Source Categories	Y	
Subpart A	General Provisions	Y	
63.1	Applicability	Y	
63.2	Definitions	Y	
63.3	Units and abbreviations	Y	
63.4	Prohibited activities and circumvention	Y	
63.5	Construction and reconstruction	Y	
63.6	Compliance with standards and maintenance requirements	Y	
63.7	Performance testing requirements	Y	

Table IV – H
Source-specific Applicable Requirements
S-38, S-40, S-42, S-43, S-44 – INTERNAL FLOATING ROOF TANKS

Applicable Requirement	Regulation Title or Description of Requirement	Federally Enforceable (Y/N)	Future Effective Date
63.8	Monitoring requirements	Y	
63.9	Notification requirements	Y	
63.10	Recordkeeping and reporting	Y	
63.12	State authority and delegations	Y	
63.13	Addresses of EPA Regional Offices	Y	
63.14	Incorporation by Reference	Y	
63.15	Availability of Information and confidentiality	Y	
40 CFR Part 63 Subpart R	National Emission Standards for Gasoline Distribution Facilities (Bulk Gasoline Terminals and Pipeline Breakout Stations) (12/14/1994)	Y	
63.420(f)	Demonstrate compliance	Y	
63.420(g)	Most stringent control requirements	Y	
63.420(h)	Subject to the provisions of 40 CFR part 63, subpart A—General Provisions	Y	
63.420(j)	<i>Rules Stayed for Reconsideration</i>	Y	
63.423	Standards: Storage vessels	Y	
63.423(a)	Requirements	Y	
63.423(c)	December 15, 1997 deadline	Y	
63.425	Test methods and procedures	Y	
63.425(a)	Performance test on the vapor processing system	Y	
63.425(b)	Operating parameter	Y	
63.425(b)(1)	Determine an operating parameter value	Y	
63.425(b)(2)	Determine an operating monitoring parameter value	Y	
63.425(b)(3)	Demonstrate continuous compliance	Y	
63.425(c)	Document the reasons for any change in the operating parameter	Y	
63.425(d)	Compliance with § 60.113b	Y	
63.427	Continuous monitoring	Y	
63.427(a)(1)	Continuous emission monitoring system (CEMS)	Y	
63.427(a)(5)	Alternative parameter demonstrates continuous compliance	Y	
63.427(b)	Operate the vapor processing system	Y	
63.427(c)	Monitoring requirements in § 60.116b; 5 years records	Y	
63.428	Reporting and recordkeeping	Y	
63.428(a)	The initial notifications	Y	
63.428(c)(2)	Record and report simultaneously with the notification of compliance	Y	
63.428(c)(2)(i)	Determining the operating parameter value	Y	
63.428(d)	Keep records and furnish reports	Y	
63.428(h)	Submit an excess emissions report to the administrator	Y	

Table IV – H
Source-specific Applicable Requirements
S-38, S-40, S-42, S-43, S-44 – INTERNAL FLOATING ROOF TANKS

Applicable Requirement	Regulation Title or Description of Requirement	Federally Enforceable (Y/N)	Future Effective Date
63.428(h)(1)	Each exceedance or failure reports	Y	
63.428(h)(4)	Equipment leak	Y	
63.428(h)(4)(i)	The date on which the leak was detected	Y	
63.428(h)(4)(ii)	The date of each attempt to repair the leak	Y	
63.428(h)(4)(iii)	The reasons for the delay of repair; and	Y	
63.428(h)(4)(iv)	The date of successful repair	Y	
40 CFR 64	Compliance Assurance Monitoring (10/22/1997)	Y	
64.2(a)	Applicability	Y	
64.3	Monitoring design criteria	Y	
64.3(a)	General criteria	Y	
64.3(a)(1)	Data for one or more indicators	Y	
64.3(a)(2)	Indicator range	Y	
64.3(a)(3)	Design of indicator ranges	Y	
64.3(b)	Performance criteria	Y	
64.3(b)(1)	Specifications for obtaining data	Y	
64.3(b)(2)	Verification procedures	Y	
64.3(b)(3)	Quality assurance and control practices	Y	
64.3(b)(4)	Specifications for frequency, procedures, and averaging periods	Y	
64.3(b)(4)(i)	Design of period over which data are obtained, etc.	Y	
64.3(b)(4)(iii)	Frequency for other pollutant-specific emission units	Y	
64.3(c)	Evaluation factors	Y	
64.4	Submittal requirements	Y	
64.4(a)	Submittal of monitoring that satisfies design requirements in 40 CFR 63.4	Y	
64.4(b)	Justification for the proposed monitoring	Y	
64.4(b)(1)	Presumptively acceptable monitoring approaches	Y	
64.4(c)(1)	Submittal of control device operating parameter data obtained during tests	Y	
64.4(c)(2)	Documentation of no changes to system after performance tests	Y	
64.5(b)	Deadline for submittals for other pollutant-specific emissions units	Y	
64.5(d)	Prior to approval, emissions unit subject to 40 CFR 70.1(a)(3)(i)(B)	Y	
64.6(a)	Approval by permitting authority	Y	
64.6(b)	Additional data collection	Y	
64.6(c)	Establishment of permit terms or conditions	Y	
64.6(d)	Installation, testing or final verification	Y	

Table IV – H
Source-specific Applicable Requirements
S-38, S-40, S-42, S-43, S-44 – INTERNAL FLOATING ROOF TANKS

Applicable Requirement	Regulation Title or Description of Requirement	Federally Enforceable (Y/N)	Future Effective Date
64.7	Operation of approved monitoring	Y	
64.7(a)	Commencement of operation	Y	
64.7(b)	Proper maintenance	Y	
64.7(c)	Continued operation	Y	
64.7(d)	Response to excursions or exceedances	Y	
64.7(e)	Documentation of need for improved monitoring	Y	
64.8	Quality improvement plan	Y	
64.9	Reporting and recordkeeping requirements	Y	
64.9(a)	General reporting requirements	Y	
64.9(b)	General recordkeeping requirements	Y	
64.10	Savings provisions	Y	
BAAQMD Condition 6185			
Part 2	Hydrocarbon liquids loaded shall not exceed 18.8 million barrels in any consecutive 12-month period [Basis: Cumulative Increase]	Y	
Part 2a	Total combined POC/NPOC emissions shall not exceed 18,800 pounds in any consecutive 12-month period and use of additional materials does not increase toxic emissions above any Regulation 2-5 triggers [Basis: Cumulative Increase; Toxics]	Y	
Part 3	Hydrocarbon liquids loaded shall not exceed 250,000 barrels in any day [Basis: Cumulative Increase]	Y	
Part 3a	Total combined POC/NPOC emissions shall not exceed 250 pounds in any calendar day and use of additional materials does not increase toxic emissions above any Regulation 2-5 triggers [Basis: Cumulative Increase; Toxics]	Y	
Part 7	The average benzene concentration in all hydrocarbon liquids stored shall not exceed 2% by weight [Basis: Toxics]	N	
Part 17	Tank degassing shall be vented at all times to abatement devices [Basis: Regulation 8-5]	Y	
Part 19	Minimize fugitive emissions during tank cleaning operation [Basis: Cumulative Increase]	Y	
Part 24	Record keeping for tank degassing operations [Basis: Record Keeping]	Y	
BAAQMD Condition 27277			
Part 11	Total materials loaded shall not exceed 18.8 million barrels in any	Y	

Table IV – H
Source-specific Applicable Requirements
S-38, S-40, S-42, S-43, S-44 – INTERNAL FLOATING ROOF TANKS

Applicable Requirement	Regulation Title or Description of Requirement	Federally Enforceable (Y/N)	Future Effective Date
	consecutive 12-month period. [Basis: Cumulative Increase]		
Part 12	Total materials loaded shall not exceed 250,000 barrels in any calendar day. [Basis: Cumulative Increase]	Y	
Part 13	RVP shall not exceed 10 psia from January-April and November-December and 6.9 psia from May-October [Basis: Cumulative Increase]	Y	
Part 14	Total combined POC/NPOC emissions shall not exceed 9933 pounds in any consecutive 12-month period and 58 pounds per calendar day, and use of additional materials does not increase toxic emissions above any Regulation 2-5 triggers [Basis: Cumulative Increase; Toxics]	Y	
Part 15	Roof fittings counts [Basis: BACT]	Y	
Part 16	Records of throughputs, loading events, material specifications [Basis: Cumulative Increase, Regulation 2-1-233]	Y	

Section VI. Permit Conditions:

The changes to the permit conditions are shown in the “Permit Conditions” section above.

Table VII:

Table VII – E
Applicable Limits and Compliance Monitoring Requirements
S-27 – MARINE VESSEL LOADING/UNLOADING TERMINAL

Type of Limit	Emission Limit Citation	FE Y/N	Future Effective Date	Emission Limit	Monitoring Requirement Citation	Monitoring Frequency (P/C/N)	Monitoring Type
POC/ NPOC	BAAQMD Condition # 6185 part, 4a	Y		POC/NPOC \leq 47,600 pounds in any consecutive 12 month period POC/NPOC \leq 10 pounds in any hour	BAAQMD Condition #6185, part 4a	P/A and H	Records

Table VII - F
Applicable Limits and Compliance Monitoring Requirements
S-32, S-33, S-34, S-35, S-36, S-37, S-38, S-39, S-40, S-41, S-42,
S-43, S-44 - FIXED ROOF TANKS

Type of Limit	Emission Limit Citation	FE Y/N	Future Effective Date	Emission Limit	Monitoring Requirement Citation	Monitoring Frequency (P/C/N)	Monitoring Type
POC/ NPOC	BAAQMD Condition # 6185 part 2a	Y		POC/NPOC \leq 18,800 pounds in any consecutive 12 month period	BAAQMD Condition #6185, part 2a	P/A	Records
POC/ NPOC	BAAQMD Condition # 6185 part 3a	Y		POC/NPOC \leq 250 pounds in any calendar day	BAAQMD Condition #6185, part 3a	P/D	Records

Table VII – G
Source-specific Applicable Requirements
S-38, S-40, S-42, S-43, S-44 – INTERNAL FLOATING ROOF TANKS

Type of Limit	Emission Limit Citation	FE Y/N	Future Effective Date	Emission Limit	Monitoring Requirement Citation	Monitoring Frequency (P/C/N)	Monitoring Type
POC	BAAQMD 8-5-320.3.1	Y		Gasketed cover, seal or lid with gap \leq 0.32 cm (1/8 in)	BAAQMD 8-5-401.2, 8-5-404	P/twice/yr	Inspection Certification
POC	BAAQMD 8-5-320.4.2	Y		Well with cover, seal or lid with gap \leq 0.32 cm (1/8 in)	BAAQMD 8-5-401.2, 8-5-404	P/twice/yr	Inspection Certification
POC	BAAQMD 8-5-320.4.3	Y		Gap between well and roof \leq 1.3 cm (1/2 in)	BAAQMD 8-5-401.2, 8-5-404	P/twice/yr	Inspection Certification
POC	BAAQMD 8-5-320.5.2	Y		Well with cover gasket, a pole sleeve, pole wiper, and internal float with gap \leq 1.3 cm (1/2 in), or zero gap pole wiper seal	BAAQMD 8-5-401.2, 8-5-404	P/twice/yr	Inspection Certification
POC	BAAQMD 8-5-320.5.3	Y		Gap between well and roof \leq 1.3 cm (1/2 in)	BAAQMD 8-5-401.2, 8-5-404	P/twice/yr	Inspection Certification

Table VII – G
Source-specific Applicable Requirements
S-38, S-40, S-42, S-43, S-44 – INTERNAL FLOATING ROOF TANKS

Type of Limit	Emission Limit Citation	FE Y/N	Future Effective Date	Emission Limit	Monitoring Requirement Citation	Monitoring Frequency (P/C/N)	Monitoring Type
POC	BAAQMD 8-5-321.3	Y		Primary seal metallic shoe extends a minimum 61 cm (24 in) above liquid surface	BAAQMD 8-5-401.1, 8-5-404	P/twice/yr P/twice/yr	Inspection Certification
POC	BAAQMD 8-5-321.3.1	Y		Gap between shoe and tank shell is no greater than 46 cm (18 in)	BAAQMD 8-5-401.1, 8-5-404	P/twice/yr P/twice/yr	Inspection Certification
POC	BAAQMD 8-5-321.3.2	Y		Gap between tank shell and the primary seal < 3.8 cm (1 1/2 in). No continuous gap > 0.32 cm ((1/8 in) shall exceed 10% of circumference. The cumulative length of all seal gaps exceeding 1.3 cm (1/2 in) shall be ≤ 10% of circumference and the cumulative length of all seal gaps exceeding 0.32 cm (1/8 in) ≤ 40% of circumference	BAAQMD 8-5-401.1, 8-5-404	P/twice/yr P/twice/yr	Inspection Certification
POC	BAAQMD 8-5-322.2	Y		Secondary seal shall allow insertion of probes up to 3.8 cm (1 1/2 in) in width	BAAQMD 8-5-401.1, 8-5-404	P/twice/yr P/twice/yr	Inspection Certification
POC	BAAQMD 8-5-322.3	Y		Gap between tank shell and the secondary seal shall not exceed 1.3 cm (1/2 in)	BAAQMD 8-5-401.1, 8-5-404	P/ twice/yr P/twice/yr	Inspection Certification
POC	BAAQMD 8-5-328.1.2	Y		Tank Cleaning ≥ 90% wt. emission control, POC concentration < 10,000 ppm	BAAMD 8-5-502	P/A	Source test
POC	60.112b (a)(1)	Y		Deck fitting closure standards; includes gasketed covers	60.113b (a)(3) & (4)	periodic initially & each time emptied & degassed, at least every 5 yr	visual inspection

Table VII – G
Source-specific Applicable Requirements
S-38, S-40, S-42, S-43, S-44 – INTERNAL FLOATING ROOF TANKS

Type of Limit	Emission Limit Citation	FE Y/N	Future Effective Date	Emission Limit	Monitoring Requirement Citation	Monitoring Frequency (P/C/N)	Monitoring Type
POC	60.113b (a)(1) & (4)	Y		Primary rim-seal standards; no holes or tears	60.113b (a)(3) & (4)	<u>periodic</u> initially & each time emptied & degassed & prior to refilling tank with VOL, at least every 5 yr	visual inspection
POC	60.113b (a)(1) & (4)	Y		Secondary rim-seal standards; no holes or tears	60.113b (a)(3) & (4)	<u>periodic</u> initially & each time emptied & degassed & prior to refilling tank with VOL, at least every 5 yr	visual inspection
POC	60.113b (a)(2)	Y		Internal visual inspection from viewports of fixed roof	60.113b (a)(2) & (3)	<u>periodic</u> initially & annually	visual inspection
POC	60.116b (c)	Y		Record of liquid stored and true vapor pressure	60.116b (c) & (e)	<u>periodic</u> upon change of service	records
POC		Y		Record of each initial, annual, and 10-year tank inspection	60.115b(a)(2)	<u>periodic</u> for each tank inspection	records
POC		Y		Report of non-compliant annual inspection for tanks with secondary seals	60.115b(a)(4)	<u>periodic</u> within 30 days of tank inspection	report
POC	BAAQMD Condition #6185, part 2	Y		Hydrocarbon liquid loaded ≤ 18.8 million barrels in any consecutive 12 month period	BAAQMD Condition #12677, part 18	P/A	Records
POC/ NPOC	Part 2a	Y		POC/NPOC ≤ 18,800 pounds in any consecutive 12 month period	BAAQMD Condition #6185, part 2a	P/A	Records

Table VII – G
Source-specific Applicable Requirements
S-38, S-40, S-42, S-43, S-44 – INTERNAL FLOATING ROOF TANKS

Type of Limit	Emission Limit Citation	FE Y/N	Future Effective Date	Emission Limit	Monitoring Requirement Citation	Monitoring Frequency (P/C/N)	Monitoring Type
POC	BAAQMD Condition #6185, part 3	Y		Hydrocarbon liquid loaded \leq 250,000 barrels per day	BAAQMD Condition #6185, part 3	P/D	Records
POC/ NPOC	BAAQMD Condition # 6185 part 3a	Y		POC/NPOC \leq 250 pounds in any calendar day	BAAQMD Condition #6185, part 3a	P/D	Records
POC	BAAQMD Condition #6185, part 7	N		Benzene concentration \leq 2 % weight	BAAQMD Condition #6185, part 7	P/Semi-annual	Analysis
POC/ NPOC	BAAQMD Condition #27277, part 11	Y		Materials loaded \leq 18.8 million barrels in any consecutive 12 month period	BAAQMD Condition #27277, part 16	P/A	Records
POC/ NPOC	BAAQMD Condition #27277, part 12	Y		Materials loaded \leq 250,000 barrels in any calendar day	BAAQMD Condition #27277, part 16	P/D	Records
POC/ NPOC	BAAQMD Condition #27277, part 13	Y		RVP \leq 10 psia (January-April and November-December) RVP \leq 6.9 psia (May-October)	BAAQMD Condition #27277, part 16	P	Records
POC/ NPOC	BAAQMD Condition #27277, part 14	Y		POC/NPOC \leq 9933 pounds in any consecutive 12 month period POC/NPOC \leq 58 pounds in any calendar day	BAAQMD Condition #27277, part 16	P/A and D	Records

RECOMMENDATION

I recommend that the Air District issue Authorities to Construct to Shore Terminals, LLC for the modification of the following sources:

Existing source descriptions:

- S-38 Fixed Roof Tank (T-20106), 8,022,000 gallon capacity, abated by:
A-421 Activated Carbon/Charcoal Adsorption
A-422 Activated Carbon/Charcoal Adsorption**
- S-40 Fixed Roof Tank (T-20108), 8,022,000 gallon capacity, abated by:
A-421 Activated Carbon/Charcoal Adsorption
A-422 Activated Carbon/Charcoal Adsorption**
- S-42 Fixed Roof Tank (T-20110), 8,022,000 gallon capacity, abated by:
A-421 Activated Carbon/Charcoal Adsorption
A-422 Activated Carbon/Charcoal Adsorption**
- S-43 Fixed Roof Tank (T-20111), 8,022,000 gallon capacity, abated by:
A-421 Activated Carbon/Charcoal Adsorption
A-422 Activated Carbon/Charcoal Adsorption**
- S-44 Fixed Roof Tank (T-3001), 1,260,000 gallon capacity, abated by:
A-421 Activated Carbon/Charcoal Adsorption
A-422 Activated Carbon/Charcoal Adsorption**

Revised source descriptions:

- S-38 Internal Floating Roof Tank (T-20106), 7,610,000 gallon capacity**
- S-40 Internal Floating Roof Tank (T-20108), 7,610,000 gallon capacity**
- S-42 Internal Floating Roof Tank (T-20110), 7,610,000 gallon capacity**
- S-43 Internal Floating Roof Tank (T-20111), 7,610,000 gallon capacity**
- S-44 Internal Floating Roof Tank (T-3001), 1,175,000 gallon capacity**

And issue a Change of Conditions for the following source:

- S-27 Marine Vessel Loading**

Jimmy Cheng, Senior Air Quality Engineer

Date

Attachment A Permit Conditions

COND# 6185

For S-1, S-2, S-3, S-5, S-6, S-12, S-15, S-24, S-25, S-30, S-32 THROUGH S-44, STORAGE TANKS, S-27
MARINE LOADING:

1. The Owner/Operator of Storage Tanks S-32, S-33, S-34, S-35, S-36, S-37, S-39, and S-41 and Marine Loading Berth S-27 shall vent all emissions at all times of operation to the properly maintained and properly operated A-421 and A-422 Regenerative Carbon Units. The switching time between carbon canisters for these units shall not exceed 20 minutes while the system is operating. This condition shall not apply to exempt materials. [Basis: Cumulative Increase]
2. The Owner/Operator shall not load more than 18.8 million barrels of organic materials into Storage Tanks S-32 through S-44 in any consecutive 12-month period. [Basis: Cumulative Increase]
 - a. The owner/operator of S-32 through S-44 may store usages in excess of those specified in Part 2, provided that the owner/operator can demonstrate that the following are satisfied:
 - a. Total combined POC/NPOC emissions from S-32 through S-44 do not exceed 18,800 pounds in any consecutive 12-month period; and
 - b. The use of these materials does not increase toxic emissions above any risk screening trigger level of Table 2-5-1 in Regulation 2-5.Daily records of the total liquid loaded into Storage Tanks S-32 through S-44 shall be kept in a District approved log and retained for at least five years from the date of entry. This log shall be kept on site and made available to District staff upon request. [Basis: Cumulative Increase; Toxics]
3. The Owner/Operator shall not load more than 250,000 barrels of organic materials into Storage Tanks S-32 through S-44 in any calendar day. Daily records of the total liquid loaded into Storage Tanks S-32 through S-44 shall be kept in a District approved log and retained for at least five years from the date of entry. This log shall be kept on site and made available to District staff upon request. [Basis: Cumulative Increase]
 - a. The owner/operator of S-32 through S-44 may store usages in excess of those specified in Part 3, provided that the owner/operator can demonstrate that the following are satisfied:
 - a. Total combined POC/NPOC emissions from S-32 through S-44 do not exceed 250 pounds in any calendar day; and
 - b. The use of these materials does not increase toxic emissions above any risk screening trigger level of Table 2-5-1 in Regulation 2-5.Daily records of the total liquid loaded into Storage Tanks S-32 through S-44 shall be kept in a District approved log and retained for at least five years from the date of entry. This log shall be kept on site and made available to District staff upon request. [Basis: Cumulative Increase; Toxics]
4. The Owner/Operator shall not load more than 47.6 million barrels of organic materials into marine vessels at the Marine Loading Terminal S-27 in any consecutive 12-month period. Monthly records of the total hydrocarbon liquid loaded into marine vessels at S-27 shall be kept in a District approved log and retained for at least five years from the date of entry. This log shall be kept on site and made available to District staff upon request. [Basis: Cumulative Increase]

- a. The owner/operator of S-27 may load usages in excess of those specified in Part 4, provided that the owner/operator can demonstrate that the following are satisfied:
 - a. Total combined POC/NPOC emissions from loading any organic material into marine vessels at S-27 do not exceed 47,600 pounds in any consecutive 12-month period;
 - b. Total combined POC/NPOC emissions from loading any organic material into marine vessels at S-27 do not exceed 10 pounds in any given hour;
 - c. The use of these materials does not increase toxic emissions above any risk screening trigger level of Table 2-5-1 in Regulation 2-5.

Daily and hourly records of the total liquid loaded at S-27 shall be kept in a District approved log and retained for at least five years from the date of entry. This log shall be kept on site and made available to District staff upon request.

[Basis: Cumulative Increase; Toxics]

5. The Owner/Operator shall ensure that emissions from the A-421 and A-422 Regenerative Carbon Units do not exceed 1 pound of POC's per 1000 barrels of hydrocarbon liquid transferred at S-27, S-32, S-33, S-34, S-35, S-36, S-37, S-39, and S-41. [Basis: Cumulative Increase]
- *6. The Owner/Operator shall ensure that the Benzene emissions from the A-421 and A-422 Carbon Systems combined do not exceed 0.15 lbs per calendar day. [Basis: Toxics]
- *7. The Owner/Operator shall ensure that the average benzene concentration in all organic materials stored in Storage Tanks S-32 through S-44 do not exceed 2% by weight. The owner/operator of sources S-32 through S-44 shall randomly analyze materials stored in at least three storage tanks for the average benzene concentration at least once every 6 months. Each tank shall be sampled within 30 days of start-up. If the owner/operator can demonstrate that several tanks contain organic materials from a single source (shipment), then a single benzene analysis may be performed for that group of tanks. These records shall be kept on file for at least five years after the date of entry and shall be made available to District personnel upon request. All tests shall be performed in accordance with District approved laboratory procedures. [Basis: Toxics]
8. Start-up source test condition, deleted.
9. Deleted.
10. The Owner/Operator shall ensure all new hydrocarbon liquid product pumps shall be equipped with either double mechanical shaft seals or shall utilize seal-less magnetically coupled pumps. These new pumps shall be subject to the inspection and maintenance requirements of District Regulation 8-18 and any future revisions to this rule. [Basis: Regulation 8-18]
11. The Owner/Operator shall ensure all new valves and flanges shall be subject to the inspection and maintenance criteria of District Regulation 8-18 and any future revisions to this rule. [Basis: Regulation 8-18]
12. The Owner/Operator shall equip Storage Tanks S-32, S-33, S-34, S-35, S-36, S-37, S-39, and S-41 with properly installed and properly operated pressure relief valves which do not open under normal operating conditions and thereby allow bypassing of the A-421/A-422 Carbon System. The Owner/Operator of S-27 Marine Terminal shall use connection couplings, which minimize fugitive leaks during connection and disconnection of the product loading and vapor recovery piping. [Basis: Regulation 8-18]
13. Deleted.
14. The Owner/Operator of the A-421 and A-422 Regenerative Carbon Systems shall install an infrared combustible gas detector or District approved equivalent at the outlet of these

carbon units. This detector shall continuously measure and record non-methane hydrocarbon concentration in PPM as propane. The type and design specifications of this detector shall be approved by the District's Source Test Manager before installation. [Basis: NSPS]

15. Deleted, extra requirement, continuous hydrocarbon monitor and recorder installed at the tail end of the abatement's outlet is already a good indicator.
16. The Owner/Operator shall not degas more than six tanks at this facility using A-421 and A-422 in any consecutive 12-month period. [Basis: Cumulative Increase]
17. The Owner/Operator shall vent all tank degassing operations at all times in accordance with Regulation 8-5-328. [Basis: Regulation 8-5]
18. Deleted.
19. The Owner/Operator shall ensure that the tank cleaning operations are in accordance with Regulation 8-5-331. Fugitive emissions during tank cleaning operations shall be minimized. [Basis: Cumulative Increase]
20. The Owner/Operator shall vent storage tank vapors from Storage Tanks S-32, S-33, S-34, S-35, S-36, S-37, S-39, and S-41 to A-421 and A-422 control equipment, or an authorized portable unit for as long as is necessary to reduce the POC concentration in the vapor stream to less than 1% (vol) or 10,000 ppm. [Basis: Cumulative Increase]
21. Deleted.
22. The Owner/Operator shall equip A-421 and A-422 with a continuous hydrocarbon concentration monitor and recorder that measures the outlet concentrations at this abatement equipment. [Basis: NSPS]
23. The Owner/Operator shall not degas any tanks to the A-421/A-422 Carbon Systems during bulk liquid transfers at any other sources abated by A-421 and A-422. [Basis: Cumulative Increase]
24. The Owner/Operator shall maintain the following records pertaining to tank degassing operations:
 - a) Number of tank degassing operations,
 - b) Abatement device used for each degassing operation
 - c) The hydrocarbon concentration at the outlet of the abatement device during the venting operation. [Basis: Recordkeeping]

These records shall be kept in a District approved log and retained for at least five years from the date of entry. This log shall be kept on site and made available to District Staff upon request. [Basis: Cumulative Increase]

25. The Owner/Operator shall ensure that the combined total pumping rate through the two loading arms associated with S-27 does not exceed 10,000 barrels per hour. [Basis: Cumulative Increase]

26. The Owner/Operator shall transfer only the following materials at Marine Loading Terminal S-27:
- 1) Ethanol, Methanol
 - 2) Gasoline
 - 3) MTBE
 - 4) Any material which is exempt from District permitting requirements (as long as the loading of this exempt material has been properly reported to the District), or any other petroleum hydrocarbon material with a vapor pressure less than unleaded gasoline (6.2 psia at 70 deg F) and toxicity less than unleaded gasoline (4% benzene by weight).
 - 5) Renewable/alternative jet fuel.
- [Basis: Cumulative Increase, Toxics]
27. The Owner/Operator shall conduct an annual emissions and efficiency test on equipment A-421 and A-422 when loading a marine vessel with any organic material at S-27. If no marine vessels are loaded at S-27 during a given calendar year, the owner/operator shall submit to the District's Engineering Division no later than 60 days after the end of the calendar year written notification and the corresponding monthly records showing zero throughput at S-27 during the given calendar year or the last recorded throughput at S-27 occurring during the prior calendar year and shall conduct an annual emissions and efficiency test on equipment A-421 and A-422 during the next marine vessel loading event at S-27. The owner/operator shall obtain approval for all source test procedures from the District's Source Test Section prior to conducting any tests. The owner/operator shall comply with all applicable testing requirements as specified in 40 CFR 63, Section 63.565(d). The owner/operator shall notify the District's Source Test Section, in writing, of the source test protocols and projected test dates at least 7 days prior to testing. These records shall be kept on file for at least five years after the date of entry and shall be made available to District personnel upon request. (Basis: 40 CFR 63, 63.563(b)6))

COND# 27277

For S-1, S-2, S-3, S-5, S-6, S-12, S-15, S-24, S-25, S-30, S-32 THROUGH S-44, STORAGE TANKS, S-22 TRUCK LOADING RACK, S-27 MARINE LOADING

1. The owner/operator of S-1, S-2, S-3, S-5, S-6, S-12, S-15, S-24, S-25, S-30, S-32, S-33, S-34, S-35, S-36, S-37, S-38, S-39, S-40, S-41, S-42, S-43, and S-44 shall not exceed a combined total throughput of more than 1,110,159,246 gallons of material in any consecutive 12-month period. The owner/operator may exceed the preceding throughput limit at S-1, S-2, S-3, S-5, S-6, S-12, S-15, S-24, S-25, S-30, S-32, S-33, S-34, S-35, S-36, S-37, S-38, S-39, S-40, S-41, S-42, S-43, and S-44 by a combined total of no more than 546,361,200 gallons of ethanol and Regulation 2, Rule 1 exempt materials that are received by rail car in any consecutive 12-month period.
[Basis: Regulation 2-1-233]
2. The owner/operator of S-1, S-2, S-3, S-5, S-6, S-12, S-15, S-24, S-25, S-30, S-32, S-33, S-34, S-35, S-36, S-37, S-38, S-39, S-40, S-41, S-42, S-43, and S-44 shall not exceed a combined total throughput of more than 13,301,400 gallons of material in any calendar day. The owner/operator may exceed the preceding throughput limit at S-1, S-2, S-3, S-5, S-6, S-12, S-15, S-24, S-25, S-30, S-32, S-33, S-34, S-35, S-36, S-37, S-38, S-39, S-40, S-41, S-42, S-43, and S-44 by a combined total of no more than 1,995,840 gallons of ethanol and Regulation 2, Rule 1 exempt materials that are received by rail car in any

- calendar day.
[Basis: Regulation 2-1-233]
3. The owner/operator of S-22 shall not load more than 420,480,000 gallons of all materials at S-22 during any consecutive twelve-month period.
[Basis: Regulation 2-1-233]
 4. The owner/operator of S-22 shall not load more than 1,536,000 gallons of all materials at S-22 in any calendar day.
[Basis: Regulation 2-1-233]
 5. The owner/operator of S-22 shall vent all emissions from the S-22 Truck Loading Rack to A-1 whenever any organic liquid (including but not limited to gasoline, transmix, jet fuel, renewable jet fuel, and diesel) is loaded into a truck in accordance with the requirements of Regulation 8-33-301. [Basis: Regulation 2-1-233]
 6. Not more than 30 days after the startup of S-1, S-3, S-5, S-12, S-22, and S-27; the owner/operator shall provide the Air District's Engineering Division with a final count of fugitive components installed. The owner/operator has been permitted for an increase in the following fugitive components as part of their renewable jet project:

valves in light liquid service	92
pump seals in light liquid service	4
Connectors/flanges	419

 - a. The valves shall be either bellow valves, diaphragm valves, quarter turn valves, live loaded valves, or other low emission valves.
 - b. The pumps shall be double mechanical seals with barrier fluid or Air District-approved equivalent.
 - c. The connectors and flanges shall have graphitic gaskets or Air District-approved equivalent.Once installed, the fugitive components shall be included incorporated into the Leak Detection and Repair (LDAR) program and comply with the applicable requirements of Regulation 8-18.
[Basis: BACT]
 7. The owner/operator of S-1, S-3, S-5, S-12, S-22, and S-27 may not operate both the blend/loading pump and its backup pump at a same time when loading, unloading, or blending materials to or from S-1, S-3, S-5, S-12, S-22, or S-27.
[Basis: 2-1-233]
 8. The owner/operator of S-22 shall load only one truck per lane at any given time at S-22.
[Basis: 2-1-233]
 9. The owner/operator of S-1 shall not install any electric heater to heat materials stored in S-1.
[Basis: 2-1-233]
 10. (Deleted; moved to Part 17)
 11. The owner/operator of S-38, S-40, S-42, S-43, and S-44 shall not exceed a combined total throughput of more than 789,600,000 gallons (18.8 million barrels) of material (including gasoline, ethanol, transmix, biodiesel, renewable fuels, or other materials as allowed by

Part 14) in any consecutive 12-month period.
[Basis: Cumulative Increase]

- 12. The owner/operator of S-38, S-40, S-42, S-43, and S-44 shall not exceed a combined total throughput of more than 10,500,000 (250,000 barrels) of materials (including gasoline, ethanol, transmix, biodiesel, renewable fuels, or other materials as allowed by Part 14) in any calendar day.

[Basis: Cumulative Increase]

- 13. For each month, the owner/operator S-38, S-40, S-42, S-43, and S-44 shall not store materials in S-38, S-40, S-42, S-43, and S-44 that exceed the following RVPs.

Months	RVP limit (psia)
January through April	10
May through October	6.9
November through December	10

[Basis: Cumulative Increase]

- 14. The owner/operator of S-38, S-40, S-42, S-43, and S-44 may store alternate liquid(s) other than those specified in Parts 11, 12, and 13, and/or usages in excess of those specified in Parts 11 and 12, provided that the owner/operator can demonstrate that the following are satisfied:

- a. Total combined POC/NPOC emissions from S-38, S-40, S-42, S-43, and S-44 do not exceed 9933 pounds in any consecutive 12-month period using AP-42 internal floating roof tank equations; and
- b. Total combined POC/NPOC emissions from S-38, S-40, S-42, S-43, and S-44 do not exceed 58 pounds in any calendar day using AP-42 internal floating roof tank equations; and
- c. The use of these materials does not increase toxic emissions above any risk screening trigger level of Table 2-5-1 in Regulation 2-5.

[Basis: Cumulative Increase; Toxics]

- 15. The owner/operator shall control organic emissions from S-38, S-40, S-42, S-43, and S-44 with an internal and seamless deck floating roof using a mechanical shoe primary seal and a rim-mounted secondary seal that meet the design criteria in Regulation 8, Rule 5. Each roof fitting shall be designed to minimize roof fitting losses. The following list specifies for each tank the types of roof fittings allowed, the maximum count for each fitting, and the control technique required. Control techniques for roof fittings not included in this list shall be subject to prior District approval prior to installing the internal floating roof on the given tank.

Not more than 30 days after the startup of S-38, S-40, S-42, S-43, and S-44; the owner/operator shall provide the Air District's Engineering Division with a final accounting the types and counts of roof fittings to be incorporated into this condition.

S-38, S-40, S-42, and S-43 (each tank):

Fitting Type and Count

Control Technique

Access hatch (24" diameter), 2 total.....Bolted cover, gasketed

Ladder-Slotted Guidepole Combination Well, 1 total.....Ladder sleeve, gasketed sliding cover
 Stub drain (1” diameter), 17 total
 Column well (20” diameter), 1 total.....Flexible fabric sleeve seal
 Column well (12” diameter), 8 total.....Flexible fabric sleeve seal
 Vacuum breaker (10” diameter), 2 total.....Weighted mechanical actuation, gasketed
 Sample Pipe or Well (24” diameter), 1 total..... Slit fabric seal 10% open area
 Slotted Guidepole/Sample Well, 1 total..... Gasketed sliding cover with float, sleeve, wiper

S-44:

Fitting Type and Count

Control Technique

Access hatch (24” diameter), 2 total.....Bolted cover, gasketed
 Ladder-Slotted Guidepole Combination Well, 1 total.....Ladder sleeve, gasketed sliding cover
 Stub drain (1” diameter), 5 total
 Column well (24” diameter), 1 total.....Flexible fabric sleeve seal
 Vacuum breaker (10” diameter), 2 total.....Weighted mechanical actuation, gasketed
 Sample Pipe or Well (24” diameter), 1 total.....Slit fabric seal 10% open area
 Slotted Guidepole/Sample Well, 1 total.....Gasketed sliding cover with float, sleeve, wiper

[Basis: BACT]

16. The owner/operator shall ensure that the concentration of organic vapor in the vapor space above the internal floating roof of S-38, S-40, S-42, S-43, and S-44 shall not exceed 30 percent of its lower explosive limit (LEL). [Basis: Cumulative Increase]
17. To demonstrate compliance with Part 16, the owner/operator shall have a person conduct the following on a quarterly basis:
 - a. Using an explosimeter, measure the concentration of the vapor space above the floating roof in terms of lower explosive limit (LEL), and record the reading.
 - b. Conduct a visual inspection of the roof openings (including at each viewport) and the rim seal system and record findings.
 - c. Conduct a visual inspection of the slotted guidepole flexible enclosure system. [Basis: Cumulative Increase]
18. To determine compliance with the above parts, the owner/operator shall maintain the following records in an Air District-approved log and provide all of the data necessary to evaluate compliance with the above parts, including the following information:
 - a. Quantities of each type of liquid stored in S-1, S-2, S-3, S-5, S-6, S-12, S-15, S-24, S-25, S-30, S-32, S-33, S-34, S-35, S-36, S-37, S-38, S-39, S-40, S-41, S-42, S-43, and S-44 on a daily basis.
 - b. Quantities of each type of liquid loaded into Storage Tanks S-1, S-2, S-3, S-5, S-6, S-12, S-15, S-24, S-25, S-30, S-32, S-33, S-34, S-35, S-36, S-37, S-38, S-39, S-40, S-41, S-42, S-43, and S-44 on a daily and monthly basis
 - c. The type and amount of materials loaded at S-22 Truck Rack.
 - d. Date of each S-22 loading event

- e. Monthly throughput shall be totaled for each consecutive twelve-month period.
- f. To demonstrate compliance with Part 13, material specifications or certifications from the vendor, with the liquid RVP, for each shipment of a different type of material stored in S-38, S-40, S-42, S-43, and S-44. If a mixture of different materials is stored, the RVP of the most volatile material shall be used to demonstrate compliance. Materials without available liquid RVP information from the vendor shall be assumed to be in compliance with Part 13; however, Air District staff has the discretion to collect a sample of the material stored to test the liquid RVP for compliance with Part 13.
- g. To demonstrate compliance with Part 14, when storing alternate liquid(s) other than those specified in Parts 11, 12, or 13 and/or usages in excess of those specified in Parts 11 and 12, emission calculations for S-38, S-40, S-42, S-43, and S-44 shall be totaled for each consecutive twelve-month period.
- h. Inspection findings and vapor space concentration measurements to demonstrate compliance with Parts 16 and 17

All records shall be retained on-site for five years, from the date of entry, and made available for inspection by Air District staff upon request. These recordkeeping requirements shall not replace the recordkeeping requirements contained in any applicable District Regulations.

[Basis: Cumulative Increase, Regulation 2-1-233]