



State of Ohio Environmental Protection Agency

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Columbus, Ohio 43215

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www.epa.state.oh.us

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P.O. Box 1049
Columbus, OH 43216-1049

12/19/2008

LINDA LEPPELMEIER
MARATHON PETROLEUM CO LLC
539 S MAIN ST
FINDLAY, OH 45840

RE: FINAL AIR POLLUTION PERMIT-TO-INSTALL AND OPERATE
Facility ID: 0332010020
Permit Number: P0087046
Permit Type: Renewal
County: Hancock

Certified Mail

No	TOXIC REVIEW
No	PSD
No	SYNTHETIC MINOR
No	CEMS
No	MACT
No	NSPS
No	NESHAPS
No	NETTING
No	MAJOR NON-ATTAINMENT
No	MODELING SUBMITTED

Dear Permit Holder:

Enclosed please find a final Air Pollution Permit-to-Install and Operate ("PTIO") which will allow you to install, modify, and/or operate the described emissions unit(s) in the manner indicated in the permit. Because this permit contains conditions and restrictions, please read it very carefully.

Ohio EPA maintains a document entitled "Frequently Asked Questions about the PTIO". The document can be downloaded from the DAPC Web page, www.epa.state.oh.us/dapc, from the "Permits" link. This document contains additional information related to your permit, such as what activities are covered under the PTIO, who has enforcement authority over the permit and Ohio EPA's authorization to inspect your facility and records. Please contact the Office of Compliance Assistance and Pollution Prevention at (614) 644-3469 if you need assistance.

The issuance of this PTIO is a final action of the Director and may be appealed to the Environmental Review Appeals Commission ("ERAC") under Section 3745.04 of the Ohio Revised Code. The appeal must be in writing and describe the action complained of and the grounds for the appeal. The appeal must be filed with the ERAC within thirty (30) days after notice of the Director's action. A filing fee of \$70.00 must be submitted to the ERAC with the appeal, although the ERAC, has discretion to reduce the amount of the filing fee if you can demonstrate (by affidavit) that payment of the full amount of the fee would cause extreme hardship. If you file an appeal of this action, you must notify Ohio EPA of the filing of the appeal (by providing a copy to the Director) within three (3) days of filing your appeal with the ERAC. Ohio EPA requests that a copy of the appeal also be provided to the Ohio Attorney General's Office, Environmental Enforcement Section. An appeal may be filed with the ERAC at the following address:

Environmental Review Appeals Commission
309 South Fourth Street, Room 222
Columbus, OH 43215

If you have any questions regarding this permit, please contact the Ohio EPA DAPC, Northwest District Office. This permit has been posted to the Division of Air Pollution Control (DAPC) Web page www.epa.state.oh.us/dapc.

Sincerely,

Michael W. Ahern
Michael W. Ahern, Manager
Permit Issuance and Data Management Section, DAPC

Cc: Ohio EPA-NWDO

Ted Strickland, Governor
Lee Fisher, Lieutenant Governor
Chris Korleski, Director



**State of Ohio Environmental Protection Agency
Division of Air Pollution Control**

FINAL

**Air Pollution Permit-to-Install and Operate
for
MARATHON PETROLEUM CO LLC**

Facility ID: 0332010020
Permit Number: P0087046
Permit Type: Renewal
Issued: 12/19/2008
Effective: 12/19/2008
Expiration: 12/19/2018



Air Pollution Permit-to-Install and Operate
for
MARATHON PETROLEUM CO LLC

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Final Permit-to-Install and Operate
Permit Number: P0087046
Facility ID: 0332010020
Effective Date: 12/19/2008

Authorization

Facility ID: 0332010020
Application Number(s): A0017949
Permit Number: P0087046
Permit Description: (6) storage tanks
Permit Type: Renewal
Permit Fee: \$0.00
Issue Date: 12/19/2008
Effective Date: 12/19/2008
Expiration Date: 12/19/2018
Permit Evaluation Report (PER) Annual Date: Jan 1 - Dec 31, Due Feb 15
This document constitutes issuance to:

MARATHON PETROLEUM CO LLC
709 GLESSNER AVE
FINDLAY, OH 45840

of a Permit-to-Install and Operate for the emissions unit(s) identified on the following page.

Ohio EPA District Office or local air agency responsible for processing and administering your permit:

Ohio EPA DAPC, Northwest District Office
347 North Dunbridge Road
Bowling Green, OH 43402
(419)352-8461

The above named entity is hereby granted this Permit-to-Install and Operate for the air contaminant source(s) (emissions unit(s)) listed in this section pursuant to Chapter 3745-31 of the Ohio Administrative Code. Issuance of this permit does not constitute expressed or implied approval or agreement that, if constructed or modified in accordance with the plans included in the application, the described emissions unit(s) will operate in compliance with applicable State and federal laws and regulations.

This permit is granted subject to the conditions attached hereto.

Ohio Environmental Protection Agency

Chris Korleski
Director



Authorization (continued)

Permit Number: P0087046
 Permit Description: (6) storage tanks

Permits for the following emissions unit(s) or groups of emissions units are in this document as indicated below:

- | | |
|-----------------------------------|----------------|
| Emissions Unit ID: | T001 |
| Company Equipment ID: | Tank 6 |
| Superseded Permit Number: | 03-3069 |
| General Permit Category and Type: | Not Applicable |
| Emissions Unit ID: | T002 |
| Company Equipment ID: | Tank 7 |
| Superseded Permit Number: | 03-3069 |
| General Permit Category and Type: | Not Applicable |
| Emissions Unit ID: | T012 |
| Company Equipment ID: | Tank 301 |
| Superseded Permit Number: | |
| General Permit Category and Type: | Not Applicable |
| Emissions Unit ID: | T013 |
| Company Equipment ID: | Tank 302 |
| Superseded Permit Number: | |
| General Permit Category and Type: | Not Applicable |
| Emissions Unit ID: | T014 |
| Company Equipment ID: | Tank 303 |
| Superseded Permit Number: | 03-17382 |
| General Permit Category and Type: | Not Applicable |
| Emissions Unit ID: | T015 |
| Company Equipment ID: | Tank 304 |
| Superseded Permit Number: | 03-17382 |
| General Permit Category and Type: | Not Applicable |



State of Ohio Environmental Protection Agency
Division of Air Pollution Control

Final Permit-to-Install and Operate

Permit Number: P0087046

Facility ID: 0332010020

Effective Date: 12/19/2008

A. Standard Terms and Conditions



1. What does this permit-to-install and operate ("PTIO") allow me to do?

This permit allows you to install and operate the emissions unit(s) identified in this PTIO. You must install and operate the unit(s) in accordance with the application you submitted and all the terms and conditions contained in this PTIO, including emission limits and those terms that ensure compliance with the emission limits (for example, operating, recordkeeping and monitoring requirements).

2. Who is responsible for complying with this permit?

The person identified on the "Authorization" page, above, is responsible for complying with this permit until the permit is revoked, terminated, or transferred. "Person" means a person, firm, corporation, association, or partnership. The words "you," "your," or "permittee" refer to the "person" identified on the "Authorization" page above.

The permit applies only to the emissions unit(s) identified in the permit. If you install or modify any other equipment that requires an air permit, you must apply for an additional PTIO(s) for these sources.

3. What records must I keep under this permit?

You must keep all records required by this permit, including monitoring data, test results, strip-chart recordings, calibration data, maintenance records, and any other record required by this permit for five years from the date the record was created. You can keep these records electronically, provided they can be made available to Ohio EPA during an inspection at the facility. Failure to make requested records available to Ohio EPA upon request is a violation of this permit requirement.

4. What are my permit fees and when do I pay them?

There are two fees associated with permitted air contaminant sources in Ohio:

- PTIO fee. This one-time fee is based on a fee schedule in accordance with Ohio Revised Code (ORC) section 3745.11, or based on a time and materials charge for permit application review and permit processing if required by the Director.

You will be sent an invoice for this fee after you receive this PTIO and payment is due within 30 days of the invoice date. You are required to pay the fee for this PTIO even if you do not install or modify your operations as authorized by this permit.

- Annual emissions fee. Ohio EPA will assess a separate fee based on the total annual emissions from your facility. You self-report your emissions in accordance with Ohio Administrative Code (OAC) Chapter 3745-78. This fee assessed is based on a fee schedule in ORC section 3745.11 and funds Ohio EPA's permit compliance oversight activities. For facilities that are permitted as synthetic minor sources, the fee schedule is adjusted annually for inflation. Ohio EPA will notify you when it is time to report your emissions and to pay your annual emission fees.

5. When does my PTIO expire, and when do I need to submit my renewal application?

This permit expires on the date identified at the beginning of this permit document (see "Authorization" page above) and you must submit a renewal application to renew the permit. Ohio EPA will send a renewal notice to you approximately six months prior to the expiration date of this permit. However, it is very important that you submit a complete renewal permit application (postmarked prior to expiration of this permit) even if you do not receive the renewal notice.



If a complete renewal application is submitted before the expiration date, Ohio EPA considers this a timely application for purposes of ORC section 119.06, and you are authorized to continue operating the emissions unit(s) covered by this permit beyond the expiration date of this permit until final action is taken by Ohio EPA on the renewal application.

6. What happens to this permit if my project is delayed or I do not install or modify my source?

This PTIO expires 18 months after the issue date identified on the "Authorization" page above unless otherwise specified if you have not (1) started constructing the new or modified emission sources identified in this permit, or (2) entered into a binding contract to undertake such construction. This deadline can be extended by up to 12 months, provided you apply to Ohio EPA for this extension within a reasonable time before the 18-month period has ended and you can show good cause for any such extension.

7. What reports must I submit under this permit?

An annual permit evaluation report (PER) is required in addition to any malfunction reporting required by OAC rule 3745-15-06 or other specific rule-based reporting requirement identified in this permit. Your PER due date is identified in the Authorization section of this permit.

8. If I am required to obtain a Title V operating permit in the future, what happens to the operating provisions and PER obligations under this permit?

If you are required to obtain a Title V permit under OAC Chapter 3745-77 in the future, the permit-to-operate portion of this permit will be superseded by the issued Title V permit. From the effective date of the Title V permit forward, this PTIO will effectively become a PTI (permit-to-install) in accordance with OAC rule 3745-31-02(B). The following terms and conditions will no longer be applicable after issuance of the Title V permit: Section B, Term 1.b) and Section C, for each emissions unit, Term a)(2).

The PER requirements in this permit remain effective until the date the Title V permit is issued and is effective, and cease to apply after the effective date of the Title V permit. The final PER obligation will cover operations up to the effective date of the Title V permit and must be submitted on or before the submission deadline identified in this permit on the last day prior to the effective date of the Title V permit.

9. What are my obligations when I perform scheduled maintenance on air pollution control equipment?

You must perform scheduled maintenance of air pollution control equipment in accordance with OAC rule 3745-15-06(A). If scheduled maintenance requires shutting down or bypassing any air pollution control equipment, you must also shut down the emissions unit(s) served by the air pollution control equipment during maintenance, unless the conditions of OAC rule 3745-15-06(A)(3) are met. Any emissions that exceed permitted amount(s) under this permit (unless specifically exempted by rule) must be reported as deviations in the annual permit evaluation report (PER), including nonexempt excess emissions that occur during approved scheduled maintenance.



10. Do I have to report malfunctions of emissions units or air pollution control equipment? If so, how must I report?

If you have a reportable malfunction of any emissions unit(s) or any associated air pollution control system, you must report this to the Ohio EPA DAPC, Northwest District Office in accordance with OAC rule 3745-15-06(B). Malfunctions that must be reported are those that result in emissions that exceed permitted emission levels. It is your responsibility to evaluate control equipment breakdowns and operational upsets to determine if a reportable malfunction has occurred.

If you have a malfunction, but determine that it is not a reportable malfunction under OAC rule 3745-15-06(B), it is recommended that you maintain records associated with control equipment breakdown or process upsets. Although it is not a requirement of this permit, Ohio EPA recommends that you maintain records for non-reportable malfunctions.

11. Can Ohio EPA or my local air agency inspect the facility where the emission unit(s) is/are located?

Yes. Under Ohio law, the Director or his authorized representative may inspect the facility, conduct tests, examine records or reports to determine compliance with air pollution laws and regulations and the terms and conditions of this permit. You must provide, within a reasonable time, any information Ohio EPA requests either verbally or in writing.

12. What happens if one or more emissions units operated under this permit is/are shut down permanently?

Ohio EPA can terminate the permit terms associated with any permanently shut down emissions unit. "Shut down" means the emissions unit has been physically removed from service or has been altered in such a way that it can no longer operate without a subsequent "modification" or "installation" as defined in OAC Chapter 3745-31.

You should notify Ohio EPA of any emissions unit that is permanently shut down by submitting a certification that identifies the date on which the emissions unit was permanently shut down. The certification must be submitted by an authorized official from the facility. You cannot continue to operate an emission unit once the certification has been submitted to Ohio EPA by the authorized official.

You must comply with all recordkeeping and reporting for any permanently shut down emissions unit in accordance with the provisions of the permit, regulations or laws that were enforceable during the period of operation, such as the requirement to submit a PER, air fee emission report, or malfunction report. You must also keep all records relating to any permanently shutdown emissions unit, generated while the emissions unit was in operation, for at least five years from the date the record was generated.

Again, you cannot resume operation of any emissions unit certified by the authorized official as being permanently shut down without first applying for and obtaining a permit pursuant to OAC Chapter 3745-31.

13. Can I transfer this permit to a new owner or operator?

You can transfer this permit to a new owner or operator. If you transfer the permit, you must follow the procedures in OAC Chapter 3745-31, including notifying Ohio EPA or the local air agency of the



State of Ohio Environmental Protection Agency
Division of Air Pollution Control

Final Permit-to-Install and Operate

Permit Number: P0087046

Facility ID: 0332010020

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change in ownership or operator. Any transferee of this permit must assume the responsibilities of the transferor permit holder.

14. Does compliance with this permit constitute compliance with OAC rule 3745-15-07, "air pollution nuisance"?

This permit and OAC rule 3745-15-07 prohibit operation of the air contaminant source(s) regulated under this permit in a manner that causes a nuisance. Ohio EPA can require additional controls or modification of the requirements of this permit through enforcement orders or judicial enforcement action if, upon investigation, Ohio EPA determines existing operations are causing a nuisance.

15. What happens if a portion of this permit is determined to be invalid?

If a portion of this permit is determined to be invalid, the remainder of the terms and conditions remain valid and enforceable. The exception is where the enforceability of terms and conditions are dependent on the term or condition that was declared invalid.



State of Ohio Environmental Protection Agency
Division of Air Pollution Control

Final Permit-to-Install and Operate

Permit Number: P0087046

Facility ID: 0332010020

Effective Date: 12/19/2008

B. Facility-Wide Terms and Conditions



State of Ohio Environmental Protection Agency
Division of Air Pollution Control

Final Permit-to-Install and Operate

Permit Number: P0087046

Facility ID: 0332010020

Effective Date: 12/19/2008

1. This permit document constitutes a permit-to-install issued in accordance with ORC 3704.03(F) and a permit-to-operate issued in accordance with ORC 3704.03(G).
 - a) For the purpose of a permit-to-install document, the facility-wide terms and conditions identified below are federally enforceable with the exception of those listed below which are enforceable under state law only.
 - (1) None.
 - b) For the purpose of a permit-to-operate document, the facility-wide terms and conditions identified below are enforceable under state law only with the exception of those listed below which are federally enforceable.
 - (1) None.



State of Ohio Environmental Protection Agency
Division of Air Pollution Control

Final Permit-to-Install and Operate

Permit Number: P0087046

Facility ID: 0332010020

Effective Date: 12/19/2008

C. Emissions Unit Terms and Conditions



1. T001, Tank 6

Operations, Property and/or Equipment Description:

1.7 Million Gallon Internal Floating Roof Tank Petroleum Product Storage

a) This permit document constitutes a permit-to-install issued in accordance with ORC 3704.03(F) and a permit-to-operate issued in accordance with ORC 3704.03(G).

(1) For the purpose of a permit-to-install document, the emissions unit terms and conditions identified below are federally enforceable with the exception of those listed below which are enforceable under state law only.

a. None.

(2) For the purpose of a permit-to-operate document, the emissions unit terms and conditions identified below are enforceable under state law only with the exception of those listed below which are federally enforceable.

a. None.

b) Applicable Emissions Limitations and/or Control Requirements

(1) The specific operations(s), property, and/or equipment that constitute each emissions unit along with the applicable rules and/or requirements and with the applicable emissions limitations and/or control measures. Emissions from each unit shall not exceed the listed limitations, and the listed control measures shall be specified in narrative form following the table.

	Applicable Rules/Requirements	Applicable Emissions Limitations/Control Measures
a.	OAC rule 3745-31-05(A)(3)	3.50 tons volatile organic compounds (VOC)/yr
b.	OAC rule 3745-21-09(L)	See b)(2)a. through b)(2)e.

(2) Additional Terms and Conditions

a. The maximum true vapor pressure of organic liquid stored in this storage tank shall not exceed 11.1 psia.

b. The fixed roof storage tank shall be equipped with an internal floating roof.

c. The automatic bleeder vents shall be closed at all times, except when the roof is floated off or landed on the roof leg supports; and the rim vents, if provided, shall be set to open when the roof is being floated off the roof leg supports or is at the manufacturer's recommended setting.

d. The rim vents, if present, shall be set to open or at the manufacturer's recommended setting when the roof is being floated off the roof leg supports.



- e. All openings, except stub drains, shall be equipped with a cover, seal or lid, which is in the closed position at all times, except when in actual use for tank gauging or sampling.
- c) Operational Restrictions
- (1) The annual throughput for this emissions unit shall not exceed 181,089,828 gallons of unleaded gasoline per year.
 - (2) The permittee shall store only unleaded gasoline in this emissions unit. Any changes in the fuel may be deemed a "modification" to an emissions unit and, as such, prior notification to and approval from the Ohio EPA, Northwest District Office, Division of Air Pollution Control, are required.
- d) Monitoring and/or Recordkeeping Requirements
- (1) The permittee shall maintain records of the following information:
 - a. The types of petroleum liquids stored in the tank.
 - b. The maximum true vapor pressure (in pounds per square inch absolute), as stored, of each liquid that has a maximum true vapor pressure greater than 1.0 pound per square inch absolute.

Available data on the storage temperature may be used to determine the maximum true vapor pressure as in the following:

 - i. For vessels operated above or below ambient temperatures, the maximum true vapor pressure is calculated based upon the highest expected calendar-month average of the storage temperature. For vessels operated at ambient temperatures, the maximum true vapor pressure is calculated based upon the maximum local monthly average ambient temperature as reported by the National Weather Service.
 - ii. For crude oil or refined petroleum products the vapor pressure may be obtained by the following:
 - (a) Available data on the Reid vapor pressure and the maximum expected storage temperature based on the highest expected calendar-month average temperature of the stored product may be used to determine the maximum true vapor pressure from nomographs contained in API Bulletin 2517 (incorporated by reference--see Sec. 60.17), unless the Administrator specifically requests that the liquid be sampled, the actual storage temperature determined, and the Reid vapor pressure determined from the sample(s).
 - (b) The true vapor pressure of each type of crude oil with a Reid vapor pressure less than 13.8 kPa or with physical properties that preclude determination by the recommended method is to be determined from available data and recorded if the estimated maximum true vapor pressure is greater than 3.5 kPa.



- iii. For other liquids, the vapor pressure:
 - (a) May be obtained from standard reference texts, or
 - (b) Determined by ASTM Method D2879-83 (incorporated by reference--see Sec. 60.17); or
 - (c) Measured by an appropriate method approved by the Administrator; or
 - (d) Calculated by an appropriate method approved by the Administrator.
- (2) The permittee shall maintain monthly records of the amount of material throughput for this emissions unit, in gallons per month, to date, for the calendar year.
- e) Reporting Requirements
 - (1) Annual Permit Evaluation Report (PER) forms will be mailed to the permittee at the end of the reporting period specified in the Authorization section of this permit. The permittee shall submit the PER in the form and manner provided by the director by the due date identified in the Authorization section of this permit. The permit evaluation report shall cover a reporting period of no more than twelve-months for each air contaminant source identified in this permit.
- f) Testing Requirements
 - (1) Compliance with the emission limitation in b)(1) shall be determined in accordance with the following method:
 - a. Emission Limitation: 3.50 tons VOC/yr
 - Applicable Compliance Method: Compliance with the above emission limitation will be assumed as long as the maximum throughput of unleaded gasoline does not exceed 181,089,828 gallons per year.
- g) Miscellaneous Requirements
 - (1) None.



2. T002, Tank 7

Operations, Property and/or Equipment Description:

1.70 Million Gallon Internal Floating Roof Tank Gasoline Storage

a) This permit document constitutes a permit-to-install issued in accordance with ORC 3704.03(F) and a permit-to-operate issued in accordance with ORC 3704.03(G).

(1) For the purpose of a permit-to-install document, the emissions unit terms and conditions identified below are federally enforceable with the exception of those listed below which are enforceable under state law only.

a. None.

(2) For the purpose of a permit-to-operate document, the emissions unit terms and conditions identified below are enforceable under state law only with the exception of those listed below which are federally enforceable.

a. None.

b) Applicable Emissions Limitations and/or Control Requirements

(1) The specific operations(s), property, and/or equipment that constitute each emissions unit along with the applicable rules and/or requirements and with the applicable emissions limitations and/or control measures. Emissions from each unit shall not exceed the listed limitations, and the listed control measures shall be specified in narrative form following the table.

	Applicable Rules/Requirements	Applicable Emissions Limitations/Control Measures
a.	OAC rule 3745-31-05(A)(3)	3.50 tons volatile organic compounds (VOC)/yr
b.	OAC rule 3745-21-09(L)	See b)(2)a. through b)(2)e.

(2) Additional Terms and Conditions

a. The maximum true vapor pressure of organic liquid stored in this storage tank shall not exceed 11.1 psia.

b. The fixed roof storage tank shall be equipped with an internal floating roof.

c. The automatic bleeder vents shall be closed at all times, except when the roof is floated off or landed on the roof leg supports; and the rim vents, if provided, shall be set to open when the roof is being floated off the roof leg supports or is at the manufacturer's recommended setting.

d. The rim vents, if present, shall be set to open or at the manufacturer's recommended setting when the roof is being floated off the roof leg supports.



- e. All openings, except stub drains, shall be equipped with a cover, seal or lid, which is in the closed position at all times, except when in actual use for tank gauging or sampling.
- c) Operational Restrictions
- (1) The annual throughput for each emissions unit shall not exceed 181,089,828 gallons of unleaded gasoline per year.
 - (2) The permittee shall store only unleaded gasoline in this emissions unit. Any changes in the fuel may be deemed a "modification" to an emissions unit and, as such, prior notification to and approval from the Ohio EPA, Northwest District Office, Division of Air Pollution Control, are required.
- d) Monitoring and/or Recordkeeping Requirements
- (1) The permittee shall maintain records of the following information:
 - a. The types of petroleum liquids stored in the tank.
 - b. The maximum true vapor pressure (in pounds per square inch absolute), as stored, of each liquid that has a maximum true vapor pressure greater than 1.0 pound per square inch absolute.

Available data on the storage temperature may be used to determine the maximum true vapor pressure as in the following:

 - i. For vessels operated above or below ambient temperatures, the maximum true vapor pressure is calculated based upon the highest expected calendar-month average of the storage temperature. For vessels operated at ambient temperatures, the maximum true vapor pressure is calculated based upon the maximum local monthly average ambient temperature as reported by the National Weather Service.
 - ii. For crude oil or refined petroleum products the vapor pressure may be obtained by the following:
 - (a) Available data on the Reid vapor pressure and the maximum expected storage temperature based on the highest expected calendar-month average temperature of the stored product may be used to determine the maximum true vapor pressure from nomographs contained in API Bulletin 2517 (incorporated by reference--see Sec. 60.17), unless the Administrator specifically requests that the liquid be sampled, the actual storage temperature determined, and the Reid vapor pressure determined from the sample(s).
 - (b) The true vapor pressure of each type of crude oil with a Reid vapor pressure less than 13.8 kPa or with physical properties that preclude determination by the recommended method is to be determined from available data and recorded if the estimated maximum true vapor pressure is greater than 3.5 kPa.



- iii. For other liquids, the vapor pressure:
 - (a) May be obtained from standard reference texts, or
 - (b) Determined by ASTM Method D2879-83 (incorporated by reference--see Sec. 60.17); or
 - (c) Measured by an appropriate method approved by the Administrator; or
 - (d) Calculated by an appropriate method approved by the Administrator.
- (2) The permittee shall maintain monthly records of the amount of material throughput for this emissions unit, in gallons per month, to date, for the calendar year.
- e) Reporting Requirements
 - (1) Annual Permit Evaluation Report (PER) forms will be mailed to the permittee at the end of the reporting period specified in the Authorization section of this permit. The permittee shall submit the PER in the form and manner provided by the director by the due date identified in the Authorization section of this permit. The permit evaluation report shall cover a reporting period of no more than twelve-months for each air contaminant source identified in this permit.
- f) Testing Requirements
 - (1) Compliance with the emission limitation in b)(1) shall be determined in accordance with the following method:
 - a. Emission Limitation: 3.5 tons VOC/yr
 - Applicable Compliance Method: Compliance with the above emission limitation will be assumed as long as the maximum throughput of unleaded gasoline does not exceed 181,089,828 gallons per year.
- g) Miscellaneous Requirements
 - (1) None.



3. T012, Tank 301

Operations, Property and/or Equipment Description:

Gasoline Storage Tank/ 9,088,000 gallons

a) This permit document constitutes a permit-to-install issued in accordance with ORC 3704.03(F) and a permit-to-operate issued in accordance with ORC 3704.03(G).

(1) For the purpose of a permit-to-install document, the emissions unit terms and conditions identified below are federally enforceable with the exception of those listed below which are enforceable under state law only.

a. None.

(2) For the purpose of a permit-to-operate document, the emissions unit terms and conditions identified below are enforceable under state law only with the exception of those listed below which are federally enforceable.

a. None.

b) Applicable Emissions Limitations and/or Control Requirements

(1) The specific operations(s), property, and/or equipment that constitute each emissions unit along with the applicable rules and/or requirements and with the applicable emissions limitations and/or control measures. Emissions from each unit shall not exceed the listed limitations, and the listed control measures shall be specified in narrative form following the table.

	Applicable Rules/Requirements	Applicable Emissions Limitations/Control Measures
a.	OAC rule 3745-21-09(L)	See b)(2)a. through b)(2)e.

(2) Additional Terms and Conditions

a. The maximum true vapor pressure of organic liquid stored in this storage tank shall not exceed 11.1 psia.

b. The fixed roof storage tank shall be equipped with an internal floating roof.

c. The automatic bleeder vents shall be closed at all times, except when the roof is floated off or landed on the roof leg supports; and the rim vents, if provided, shall be set to open when the roof is being floated off the roof leg supports or is at the manufacturer's recommended setting.

d. The rim vents, if present, shall be set to open or at the manufacturer's recommended setting when the roof is being floated off the roof leg supports.

e. All openings, except stub drains, shall be equipped with a cover, seal or lid, which is in the closed position at all times, except when in actual use for tank gauging or sampling.



c) Operational Restrictions

(1) None.

d) Monitoring and/or Recordkeeping Requirements

(1) The permittee shall maintain records of the following information:

- a. The types of petroleum liquids stored in the tank.
- b. The maximum true vapor pressure (in pounds per square inch absolute), as stored, of each liquid that has a maximum true vapor pressure greater than 1.0 pound per square inch absolute.

Available data on the storage temperature may be used to determine the maximum true vapor pressure as in the following:

- i. For vessels operated above or below ambient temperatures, the maximum true vapor pressure is calculated based upon the highest expected calendar-month average of the storage temperature. For vessels operated at ambient temperatures, the maximum true vapor pressure is calculated based upon the maximum local monthly average ambient temperature as reported by the National Weather Service.
- ii. For crude oil or refined petroleum products the vapor pressure may be obtained by the following:
 - (a) Available data on the Reid vapor pressure and the maximum expected storage temperature based on the highest expected calendar-month average temperature of the stored product may be used to determine the maximum true vapor pressure from nomographs contained in API Bulletin 2517 (incorporated by reference--see Sec. 60.17), unless the Administrator specifically requests that the liquid be sampled, the actual storage temperature determined, and the Reid vapor pressure determined from the sample(s).
 - (b) The true vapor pressure of each type of crude oil with a Reid vapor pressure less than 13.8 kPa or with physical properties that preclude determination by the recommended method is to be determined from available data and recorded if the estimated maximum true vapor pressure is greater than 3.5 kPa.
- iii. For other liquids, the vapor pressure:
 - (a) May be obtained from standard reference texts, or
 - (b) Determined by ASTM Method D2879-83 (incorporated by reference--see Sec. 60.17); or
 - (c) Measured by an appropriate method approved by the Administrator; or



- (d) Calculated by an appropriate method approved by the Administrator.

- e) Reporting Requirements
 - (1) Annual Permit Evaluation Report (PER) forms will be mailed to the permittee at the end of the reporting period specified in the Authorization section of this permit. The permittee shall submit the PER in the form and manner provided by the director by the due date identified in the Authorization section of this permit. The permit evaluation report shall cover a reporting period of no more than twelve-months for each air contaminant source identified in this permit.

- f) Testing Requirements
 - (1) None.

- g) Miscellaneous Requirements
 - (1) None.



4. T013, Tank 302

Operations, Property and/or Equipment Description:

836,346 Gallon Internal Floating Roof Tank

a) This permit document constitutes a permit-to-install issued in accordance with ORC 3704.03(F) and a permit-to-operate issued in accordance with ORC 3704.03(G).

(1) For the purpose of a permit-to-install document, the emissions unit terms and conditions identified below are federally enforceable with the exception of those listed below which are enforceable under state law only.

a. None.

(2) For the purpose of a permit-to-operate document, the emissions unit terms and conditions identified below are enforceable under state law only with the exception of those listed below which are federally enforceable.

a. None.

b) Applicable Emissions Limitations and/or Control Requirements

(1) The specific operations(s), property, and/or equipment that constitute each emissions unit along with the applicable rules and/or requirements and with the applicable emissions limitations and/or control measures. Emissions from each unit shall not exceed the listed limitations, and the listed control measures shall be specified in narrative form following the table.

	Applicable Rules/Requirements	Applicable Emissions Limitations/Control Measures
a.	OAC rule 3745-21-09(L)	See b)(2)a. through b)(2)e.

(2) Additional Terms and Conditions

a. The maximum true vapor pressure of organic liquid stored in this storage tank shall not exceed 11.1 psia.

b. The fixed roof storage tank shall be equipped with an internal floating roof.

c. The automatic bleeder vents shall be closed at all times, except when the roof is floated off or landed on the roof leg supports; and the rim vents, if provided, shall be set to open when the roof is being floated off the roof leg supports or is at the manufacturer's recommended setting.

d. The rim vents, if present, shall be set to open or at the manufacturer's recommended setting when the roof is being floated off the roof leg supports.

e. All openings, except stub drains, shall be equipped with a cover, seal or lid, which is in the closed position at all times, except when in actual use for tank gauging or sampling.



c) Operational Restrictions

(1) None.

d) Monitoring and/or Recordkeeping Requirements

(1) The permittee shall maintain records of the following information:

- a. The types of petroleum liquids stored in the tank.
- b. The maximum true vapor pressure (in pounds per square inch absolute), as stored, of each liquid that has a maximum true vapor pressure greater than 1.0 pound per square inch absolute.

Available data on the storage temperature may be used to determine the maximum true vapor pressure as in the following:

- i. For vessels operated above or below ambient temperatures, the maximum true vapor pressure is calculated based upon the highest expected calendar-month average of the storage temperature. For vessels operated at ambient temperatures, the maximum true vapor pressure is calculated based upon the maximum local monthly average ambient temperature as reported by the National Weather Service.
- ii. For crude oil or refined petroleum products the vapor pressure may be obtained by the following:
 - (a) Available data on the Reid vapor pressure and the maximum expected storage temperature based on the highest expected calendar-month average temperature of the stored product may be used to determine the maximum true vapor pressure from nomographs contained in API Bulletin 2517 (incorporated by reference--see Sec. 60.17), unless the Administrator specifically requests that the liquid be sampled, the actual storage temperature determined, and the Reid vapor pressure determined from the sample(s).
 - (b) The true vapor pressure of each type of crude oil with a Reid vapor pressure less than 13.8 kPa or with physical properties that preclude determination by the recommended method is to be determined from available data and recorded if the estimated maximum true vapor pressure is greater than 3.5 kPa.
- iii. For other liquids, the vapor pressure:
 - (a) May be obtained from standard reference texts, or
 - (b) Determined by ASTM Method D2879-83 (incorporated by reference--see Sec. 60.17); or
 - (c) Measured by an appropriate method approved by the Administrator; or



- (d) Calculated by an appropriate method approved by the Administrator.

- e) Reporting Requirements
 - (1) Annual Permit Evaluation Report (PER) forms will be mailed to the permittee at the end of the reporting period specified in the Authorization section of this permit. The permittee shall submit the PER in the form and manner provided by the director by the due date identified in the Authorization section of this permit. The permit evaluation report shall cover a reporting period of no more than twelve-months for each air contaminant source identified in this permit.

- f) Testing Requirements
 - (1) None.

- g) Miscellaneous Requirements
 - (1) None.



5. T014, Tank 303

Operations, Property and/or Equipment Description:

1,785,000 Gasoline Storage Tank with External Floating Roof

a) This permit document constitutes a permit-to-install issued in accordance with ORC 3704.03(F) and a permit-to-operate issued in accordance with ORC 3704.03(G).

(1) For the purpose of a permit-to-install document, the emissions unit terms and conditions identified below are federally enforceable with the exception of those listed below which are enforceable under state law only.

a. None.

(2) For the purpose of a permit-to-operate document, the emissions unit terms and conditions identified below are enforceable under state law only with the exception of those listed below which are federally enforceable.

a. None.

b) Applicable Emissions Limitations and/or Control Requirements

(1) The specific operations(s), property, and/or equipment that constitute each emissions unit along with the applicable rules and/or requirements and with the applicable emissions limitations and/or control measures. Emissions from each unit shall not exceed the listed limitations, and the listed control measures shall be specified in narrative form following the table.

	Applicable Rules/Requirements	Applicable Emissions Limitations/Control Measures
a.	OAC rule 3745-31-05(A)(3)	See b)(2)a.
b.	OAC rule 3745-21-09(Z)	See b)(2)b.
c.	<u>40 CFR, Part 60, Subpart Kb</u> 40 CFR Part 60.112b	See b)(2)c. through b)(2)e.
	40 CFR Part 60.113b	See d)(4) through d)(8) and e)(3) and e)(4)
	40 CFR Part 60.115b	See e)(2)
	40 CFR Part 60.116b	See d)(1) and d)(3)

(2) Additional Terms and Conditions

a. The PTIO for this air contaminant source takes into account the use of an external floating roof as a voluntary restriction proposed by the permittee for purposes of avoiding Best Available Technology (BAT) requirements under OAC rule-3745-31-05(A)(3).



The potential to emit for this emissions unit is 3.95 tons of volatile organic compounds (VOC)/year and is based on an annual throughput of 1,485,000 barrels* of gasoline, U.S. EPA's TANKS version 4.0.9D, and landing losses calculated in accordance with AP-42 Section 7.1.3.2.2 (11/06). The landing losses were calculated assuming RVP 15 gasoline and an estimated two landing events per year.

* 42 gallons per barrel

- b. The requirements of this rule are less stringent than the requirements established under 40 CFR Part 60 Subpart Kb.
- c. The storage tank shall be equipped with an external floating roof. An external floating roof means a pontoon-type or double-deck type cover that rests on the liquid surface in a vessel with no fixed roof. Each external floating roof must meet the following specifications:
 - i. Each external floating roof shall be equipped with a closure device between the wall of the storage vessel and the roof edge. The closure device is to consist of two seals, one above the other. The lower seal is referred to as the primary seal, and the upper seal is referred to as the secondary seal.
 - (a) The primary seal shall be either a mechanical shoe seal or a liquid-mounted seal. Except as provided in 40 CFR 60.113(b)(4), the seal shall completely cover the annular space between the edge of the floating roof and tank wall.
 - (b) The secondary seal shall completely cover the annular space between the external floating roof and the wall of the storage vessel in a continuous fashion except as allowed in 40 CFR 60.113(b)(4).
- d. Except for automatic bleeder vents and rim space vents, each opening in a noncontact external floating roof shall provide a projection below the liquid surface. Except for automatic bleeder vents, rim space vents, roof drains, and leg sleeves, each opening in the roof is to be equipped with a gasketed cover, seal, or lid that is to be maintained in a closed position at all times (i.e., no visible gap) except when the device is in actual use. Automatic bleeder vents are to be closed at all times when the roof is floating except when the roof is being floated off or is being landed on the roof leg supports. Rim vents are to be set to open when the roof is being floated off the roof leg supports or at the manufacturer's recommended setting. Automatic bleeder vents and rim space vents are to be gasketed. Each emergency roof drain is to be provided with a slotted membrane fabric cover that covers at least 90 percent of the area of the opening.
- e. The roof shall be floating on the liquid at all times (i.e., off the roof leg supports) except during initial fill until the roof is lifted off leg supports and when the tank is completely emptied and subsequently refilled. The process of filling, emptying, or refilling when the roof is resting on the leg supports shall be continuous and shall be accomplished as rapidly as possible.



- c) Operational Restrictions
 - (1) The permittee shall not exceed an annual material throughput rate of 1,485,000 barrels (42 gallons per barrel).

- d) Monitoring and/or Recordkeeping Requirements
 - (1) The permittee shall keep readily accessible records showing the dimension of the storage vessel and an analysis showing the capacity of the storage vessel (shall be kept for the life of the source).
 - (2) The permittee shall maintain monthly records of the amount of material throughput for this emissions unit, in gallons per month and total gallons, to date, for the calendar year.
 - (3) The permittee shall maintain records of the following information:
 - a. The types of petroleum liquids stored in the tank;
 - b. The period of storage; and
 - c. The maximum true vapor pressure (in pounds per square inch absolute), as stored, of each petroleum liquid that has a maximum true vapor pressure greater than 1.0 pound per square inch absolute. Available data on the storage temperature may be used to determine the maximum true vapor pressure as in the following:
 - i. For vessels operated above or below ambient temperatures, the maximum true vapor pressure is calculated based upon the highest expected calendar-month average of the storage temperature. For vessels operated at ambient temperatures, the maximum true vapor pressure is calculated based upon the maximum local monthly average ambient temperature as reported by the National Weather Service.
 - ii. For crude oil or refined petroleum products the vapor pressure may be obtained by the following:
 - (a) Available data on the Reid vapor pressure and the maximum expected storage temperature based on the highest expected calendar-month average temperature of the stored product may be used to determine the maximum true vapor pressure from nomographs contained in API Bulletin 2517 (incorporated by reference - see 40 CFR 60.17), unless the Administrator specifically requests that the liquid be sampled, the actual storage temperature determined, and the Reid vapor pressure determined from the sample(s).
 - (b) The true vapor pressure of each type of crude oil with a Reid vapor pressure less than 13.8 kPa or with physical properties that preclude determination by the recommended method is to be determined from available data and recorded if the estimated maximum true vapor pressure is greater than 3.5 kPa.



- iii. For other liquids, the vapor pressure:
 - (a) May be obtained from standard reference texts; or
 - (b) Determined by ASTM Method 2879-83 (incorporated by reference - see 40 CFR 60.17); or
 - (c) Measured by an appropriate method approved by the Administrator; or
 - (d) Calculated by an appropriate method approved by the Administrator.
- (4) The permittee shall determine the gap areas and maximum gap widths, between the primary seal and the wall of the storage vessel and between the secondary seal and the wall of the storage vessel according to the following frequency:
 - a. Measurements of gaps between the tank wall and the primary seal (seal gaps) shall be performed during the hydrostatic testing of the vessel or within 60 days of the initial fill with volatile organic liquid (VOL) and at least once every 5 years thereafter.
 - b. Measurements of gaps between the tank wall and the secondary seal shall be performed within 60 days of the initial fill with VOL and at least once per year thereafter.
 - c. If any source ceases to store VOL for a period of 1 year or more, subsequent introduction of VOL into the vessel shall be considered an initial fill.
- (5) The permittee shall determine gap widths and areas in the primary and secondary seals individually by the following procedures:
 - a. Measure seal gaps, if any, at one or more floating roof levels when the roof is floating off the roof leg supports.
 - b. Measure seal gaps around the entire circumference of the tank in each place where a 0.32-cm diameter uniform probe passes freely (without forcing or binding against seal) between the seal and the wall of the storage vessel and measure the circumferential distance of each such location.
 - c. The total surface area of each gap described in d)(5)b. above shall be determined using probes of various widths to measure accurately the actual distance from the tank wall to the seal and multiplying each such width by its respective circumferential distance.
- (6) The permittee shall add the gap surface area of each gap location for the primary seal and the secondary seal individually and divide the sum for each seal by the nominal diameter of the tank and compare each ratio to the respective standards in paragraph d)(7) of this section.
- (7) The permittee shall make necessary repairs or empty the storage vessel within 45 days of identification in any inspection for seals not meeting the following requirements:



- a. The accumulated area of gaps between the tank wall and the mechanical shoe or liquid-mounted primary seal shall not exceed 212 Cm² per meter of tank diameter, and the width of any portion of any gap shall not exceed 3.81 cm.
 - i. One end of the mechanical shoe seal is to extend into the stored liquid, and the other end is to extend a minimum vertical distance of 61 cm above the stored liquid surface.
 - ii. There are to be no holes, tears, or other openings in the shoe, seal fabric, or seal envelope.
 - b. The secondary seal is to meet the following requirements:
 - i. The secondary seal is to be install above the primary seal so that it completely covers the space between the roof edge and tank wall except as provided in section d)(5)c.
 - ii. The accumulated area of gaps between the tank wall and the secondary seal shall not exceed 21.2 cm² per meter of tank diameter and the width of any portion of any gap shall not exceed 1.27 cm.
 - iii. There are to be no holes, tears, or other openings in the seal or seal fabric.
 - c. If a failure that is detected during inspections required in paragraph (b)(1) of 40 CFR 60.113b(b) cannot be repaired within 45 days and if the vessel cannot be emptied within 45 days, a 30-day extension may be requested from the Administrator in the inspection report required in 40 CFR 60.115b(b)(4). Such extension request must include a demonstration of unavailability of alternate storage capacity and a specification of a schedule that will assure that the control equipment will be repaired or the vessel will be emptied as soon as possible.
- (8) The permittee shall visually inspect the external floating roof, the primary seal, secondary seal, and fittings each time the vessel is emptied and degassed. If the external floating roof has defects, the primary seal has holes, tears, or other openings in the seal or the seal fabric, or the secondary seal has holes, tears, or other openings in the seal or the seal fabric, the owner or operator shall repair the items as necessary so that none of the conditions specified in this paragraph exist before filling or refilling the storage vessel with VOL.
- e) Reporting Requirements
 - (1) Annual Permit Evaluation Report (PER) forms will be mailed to the permittee at the end of the reporting period specified in the Authorization section of this permit. The permittee shall submit the PER in the form and manner provided by the director by the due date identified in the Authorization section of this permit. The permit evaluation report shall cover a reporting period of no more than twelve-months for each air contaminant source identified in this permit.
 - f) Testing Requirements
 - (1) None.



State of Ohio Environmental Protection Agency
Division of Air Pollution Control

Final Permit-to-Install and Operate

Permit Number: P0087046

Facility ID: 0332010020

Effective Date: 12/19/2008

g) Miscellaneous Requirements

(1) None.



6. T015, Tank 304

Operations, Property and/or Equipment Description:

1,785,000 Gallon Gasoline Storage Tank with External Floating Roof

a) This permit document constitutes a permit-to-install issued in accordance with ORC 3704.03(F) and a permit-to-operate issued in accordance with ORC 3704.03(G).

(1) For the purpose of a permit-to-install document, the emissions unit terms and conditions identified below are federally enforceable with the exception of those listed below which are enforceable under state law only.

a. None.

(2) For the purpose of a permit-to-operate document, the emissions unit terms and conditions identified below are enforceable under state law only with the exception of those listed below which are federally enforceable.

a. None.

b) Applicable Emissions Limitations and/or Control Requirements

(1) The specific operations(s), property, and/or equipment that constitute each emissions unit along with the applicable rules and/or requirements and with the applicable emissions limitations and/or control measures. Emissions from each unit shall not exceed the listed limitations, and the listed control measures shall be specified in narrative form following the table.

	Applicable Rules/Requirements	Applicable Emissions Limitations/Control Measures
a.	OAC rule 3745-31-05(A)(3)	See b)(2)a.
b.	OAC rule 3745 21-09(Z)	See b)(2)b.
c.	<u>40 CFR Part 60 Subpart Kb</u> 40 CFR Part 60.112b 40 CFR Part 60.113b 40 CFR Part 60.115b 40 CFR Part 60.116b	See b)(2)c. through b)(2)e. See d)(4) through d)(8) and e)(3) through e)(4) See e)(2) See d)(1) and d)(3)

(2) Additional Terms and Conditions

a. The PTIO for this air contaminant source takes into account the use of an external floating roof as a voluntary restriction proposed by the permittee for purposes of avoiding Best Available Technology (BAT) requirements under OAC rule-3745-31-05(A)(3).



The potential to emit for this emissions unit is 3.95 tons of volatile organic compounds (VOC)/year and is based on an annual throughput of 1,485,000 barrels* of gasoline, U.S. EPA's TANKS version 4.0.9D, and landing losses calculated in accordance with AP-42 Section 7.1.3.2.2 (11/06). The landing losses were calculated assuming RVP 15 gasoline and an estimated two landing events per year.

* 42 gallons per barrel

- b. The requirements of this rule are less stringent than the requirements established under 40 CFR Part 60 Subpart Kb.
- c. The storage tank shall be equipped with an external floating roof. An external floating roof means a pontoon-type or double-deck type cover that rests on the liquid surface in a vessel with no fixed roof. Each external floating roof must meet the following specifications:
 - i. Each external floating roof shall be equipped with a closure device between the wall of the storage vessel and the roof edge. The closure device is to consist of two seals, one above the other. The lower seal is referred to as the primary seal, and the upper seal is referred to as the secondary seal.
 - (a) The primary seal shall be either a mechanical shoe seal or a liquid-mounted seal. Except as provided in 40 CFR 60.113(b)(4), the seal shall completely cover the annular space between the edge of the floating roof and tank wall.
 - (b) The secondary seal shall completely cover the annular space between the external floating roof and the wall of the storage vessel in a continuous fashion except as allowed in 40 CFR 60.113(b)(4).
- d. Except for automatic bleeder vents and rim space vents, each opening in a noncontact external floating roof shall provide a projection below the liquid surface. Except for automatic bleeder vents, rim space vents, roof drains, and leg sleeves, each opening in the roof is to be equipped with a gasketed cover, seal, or lid that is to be maintained in a closed position at all times (i.e., no visible gap) except when the device is in actual use. Automatic bleeder vents are to be closed at all times when the roof is floating except when the roof is being floated off or is being landed on the roof leg supports. Rim vents are to be set to open when the roof is being floated off the roof leg supports or at the manufacturer's recommended setting. Automatic bleeder vents and rim space vents are to be gasketed. Each emergency roof drain is to be provided with a slotted membrane fabric cover that covers at least 90 percent of the area of the opening.
- e. The roof shall be floating on the liquid at all times (i.e., off the roof leg supports) except during initial fill until the roof is lifted off leg supports and when the tank is completely emptied and subsequently refilled. The process of filling, emptying, or refilling when the roof is resting on the leg supports shall be continuous and shall be accomplished as rapidly as possible.



- c) Operational Restrictions
 - (1) The permittee shall not exceed an annual material throughput rate of 1,485,000 barrels (42 gallons per barrel).

- d) Monitoring and/or Recordkeeping Requirements
 - (1) The permittee shall keep readily accessible records showing the dimension of the storage vessel and an analysis showing the capacity of the storage vessel (shall be kept for the life of the source).
 - (2) The permittee shall maintain monthly records of the amount of material throughput for this emissions unit, in gallons per month and total gallons, to date, for the calendar year.
 - (3) The permittee shall maintain records of the following information:
 - a. The types of petroleum liquids stored in the tank;
 - b. The period of storage; and
 - c. The maximum true vapor pressure (in pounds per square inch absolute), as stored, of each petroleum liquid that has a maximum true vapor pressure greater than 1.0 pound per square inch absolute. Available data on the storage temperature may be used to determine the maximum true vapor pressure as in the following:
 - i. For vessels operated above or below ambient temperatures, the maximum true vapor pressure is calculated based upon the highest expected calendar-month average of the storage temperature. For vessels operated at ambient temperatures, the maximum true vapor pressure is calculated based upon the maximum local monthly average ambient temperature as reported by the National Weather Service.
 - ii. For crude oil or refined petroleum products the vapor pressure may be obtained by the following:
 - (a) Available data on the Reid vapor pressure and the maximum expected storage temperature based on the highest expected calendar-month average temperature of the stored product may be used to determine the maximum true vapor pressure from nomographs contained in API Bulletin 2517 (incorporated by reference - see 40 CFR 60.17), unless the Administrator specifically requests that the liquid be sampled, the actual storage temperature determined, and the Reid vapor pressure determined from the sample(s).
 - (b) The true vapor pressure of each type of crude oil with a Reid vapor pressure less than 13.8 kPa or with physical properties that preclude determination by the recommended method is to be determined from available data and recorded if the estimated maximum true vapor pressure is greater than 3.5 kPa.



- iii. For other liquids, the vapor pressure:
 - (a) May be obtained from standard reference texts; or
 - (b) Determined by ASTM Method 2879-83 (incorporated by reference - see 40 CFR 60.17); or
 - (c) Measured by an appropriate method approved by the Administrator; or
 - (d) Calculated by an appropriate method approved by the Administrator.

- (4) The permittee shall determine the gap areas and maximum gap widths, between the primary seal and the wall of the storage vessel and between the secondary seal and the wall of the storage vessel according to the following frequency:
 - a. Measurements of gaps between the tank wall and the primary seal (seal gaps) shall be performed during the hydrostatic testing of the vessel or within 60 days of the initial fill with volatile organic liquid (VOL) and at least once every 5 years thereafter.
 - b. Measurements of gaps between the tank wall and the secondary seal shall be performed within 60 days of the initial fill with VOL and at least once per year thereafter.
 - c. If any source ceases to store VOL for a period of 1 year or more, subsequent introduction of VOL into the vessel shall be considered an initial fill.

- (5) The permittee shall determine gap widths and areas in the primary and secondary seals individually by the following procedures:
 - a. Measure seal gaps, if any, at one or more floating roof levels when the roof is floating off the roof leg supports.
 - b. Measure seal gaps around the entire circumference of the tank in each place where a 0.32-cm diameter uniform probe passes freely (without forcing or binding against seal) between the seal and the wall of the storage vessel and measure the circumferential distance of each such location.
 - c. The total surface area of each gap described in d)(5)b. above shall be determined using probes of various widths to measure accurately the actual distance from the tank wall to the seal and multiplying each such width by its respective circumferential distance.

- (6) The permittee shall add the gap surface area of each gap location for the primary seal and the secondary seal individually and divide the sum for each seal by the nominal diameter of the tank and compare each ratio to the respective standards in paragraph d)(7) of this section.

- (7) The permittee shall make necessary repairs or empty the storage vessel within 45 days of identification in any inspection for seals not meeting the following requirements:



- a. The accumulated area of gaps between the tank wall and the mechanical shoe or liquid-mounted primary seal shall not exceed 212 Cm² per meter of tank diameter, and the width of any portion of any gap shall not exceed 3.81 cm.
 - i. One end of the mechanical shoe seal is to extend into the stored liquid, and the other end is to extend a minimum vertical distance of 61 cm above the stored liquid surface.
 - ii. There are to be no holes, tears, or other openings in the shoe, seal fabric, or seal envelope.
 - b. The secondary seal is to meet the following requirements:
 - i. The secondary seal is to be installed above the primary seal so that it completely covers the space between the roof edge and tank wall except as provided in section d)(5)c.
 - ii. The accumulated area of gaps between the tank wall and the secondary seal shall not exceed 21.2 cm² per meter of tank diameter and the width of any portion of any gap shall not exceed 1.27 cm.
 - iii. There are to be no holes, tears, or other openings in the seal or seal fabric.
 - c. If a failure that is detected during inspections required in paragraph (b)(1) of 40 CFR 60.113b(b) cannot be repaired within 45 days and if the vessel cannot be emptied within 45 days, a 30-day extension may be requested from the Administrator in the inspection report required in 40 CFR 60.115b(b)(4). Such extension request must include a demonstration of unavailability of alternate storage capacity and a specification of a schedule that will assure that the control equipment will be repaired or the vessel will be emptied as soon as possible.
- (8) The permittee shall visually inspect the external floating roof, the primary seal, secondary seal, and fittings each time the vessel is emptied and degassed. If the external floating roof has defects, the primary seal has holes, tears, or other openings in the seal or the seal fabric, or the secondary seal has holes, tears, or other openings in the seal or the seal fabric, the owner or operator shall repair the items as necessary so that none of the conditions specified in this paragraph exist before filling or refilling the storage vessel with VOL.
- e) Reporting Requirements
 - (1) Annual Permit Evaluation Report (PER) forms will be mailed to the permittee at the end of the reporting period specified in the Authorization section of this permit. The permittee shall submit the PER in the form and manner provided by the director by the due date identified in the Authorization section of this permit. The permit evaluation report shall cover a reporting period of no more than twelve-months for each air contaminant source identified in this permit.
 - f) Testing Requirements
 - (1) None.



State of Ohio Environmental Protection Agency
Division of Air Pollution Control

Final Permit-to-Install and Operate

Permit Number: P0087046

Facility ID: 0332010020

Effective Date: 12/19/2008

g) Miscellaneous Requirements

(1) None.