

IN THE UNITED STATES DISTRICT COURT  
FOR THE NORTHERN DISTRICT OF OHIO  
WESTERN DIVISION

UNITED STATES OF AMERICA	)	
	)	
and	)	
	)	
THE STATE OF OHIO,	)	CIVIL ACTION NO.
	)	
Plaintiffs,	)	JUDGE
	)	
v.	)	
	)	
BP PRODUCTS NORTH AMERICA	)	
INC. and BP-HUSKY REFINING LLC	)	
	)	
Defendants.	)	

**CONSENT DECREE**

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Concurrently with the lodging of this Consent Decree, Plaintiff, the United States of America (“United States”), on behalf of the United States Environmental Protection Agency (“EPA”), has filed a Complaint in this action seeking injunctive relief and civil penalties from BP Products North America Inc. (“BP Products” or “BPP”) and BP-Husky Refining LLC (“BP-Husky” or “BPH”) (collectively, the “Defendants”);

WHEREAS, BP Products owned and operated a petroleum refinery located in Oregon, Lucas County, Ohio (the “Toledo Refinery”) until 2008, when it sold ownership of the refinery to BP-Husky. Since that time, BP Products has remained as the refinery’s operator;

WHEREAS, BP-Husky, a joint venture between BP Products and Husky Refining LLC, has owned the Toledo Refinery since 2008;

WHEREAS, the United States, the State of Ohio (the “State” or “Ohio”), and BP Products are among the parties to a Consent Decree entered in *U.S., et al. v. BP Exploration & Oil Co., et al.*, Civil No. 2:96-cv-095 (N.D. Ind.) (the “2001 Consent Decree”), which covers the Toledo Refinery;

WHEREAS, simultaneous with the lodging of this Consent Decree, the United States has filed an amendment to the 2001 Consent Decree as it applies to the Toledo Refinery. This amendment, if entered, will result in the termination of the obligations of the Toledo Refinery under the 2001 Consent Decree. This termination shall become effective only after Defendants submit payment of stipulated penalties for the Toledo Refinery’s alleged past violations of the 2001 Consent Decree pursuant to Section V of this Consent Decree and the Court enters the Consent Decree;

WHEREAS, the Complaint alleges that BP Products and BP-Husky violated various requirements of the Clean Air Act, 42 U.S.C. § 7401 *et seq.*, as well as the reporting

requirements of the Emergency Planning and Community Right-to-Know Act (“EPCRA”), 42 U.S.C. § 11001 *et seq.*, and the Comprehensive Environmental Response, Compensation, and Liability Act (“CERCLA”), 42 U.S.C. § 9601 *et seq.*, at the Toledo Refinery;

WHEREAS, Ohio, on behalf of the Ohio Environmental Protection Agency, has joined in this matter alleging violations of its State Implementation Plan (“SIP”) and/or other State rules and regulations incorporating and implementing the requirements of the Clean Air Act;

WHEREAS, the Complaint alleges that the Defendants have violated and/or continue to violate the following:

- A) Clean Air Act Standards of Performance for New Stationary Sources (“NSPS”), promulgated pursuant to Section 111 of the Clean Air Act, 42 U.S.C. § 7411, and found at 40 C.F.R. Part 60, Subpart A, relating to the operation and maintenance of continuous emissions monitoring systems (“CEMS”);
- B) Clean Air Act NSPS, promulgated pursuant to Section 111 of the Clean Air Act, 42 U.S.C. § 7411, and found at 40 C.F.R. Part 60, Subpart QQQ, relating to controlling emissions of volatile organic compounds (“VOCs”) from petroleum refinery wastewater systems;
- C) Clean Air Act Leak Detection and Repair (“LDAR”) requirements promulgated pursuant to Clean Air Act Section 111, 42 U.S.C. § 7411, and found at 40 C.F.R. Part 60, Subparts VV and GGG (“LDAR Regulations”);
- D) Requirements of CERCLA, 42 U.S.C. § 9603(a), and EPCRA, 42 U.S.C. § 11004(a) relating to the immediate notification and reporting of releases of hazardous substances and extremely hazardous substances; and
- E) Ohio’s SIP, Ohio’s air pollution control laws in Ohio Revised Code Chapter 3704, and the rules adopted thereunder, including Ohio Administrative Code § 3745-77-07(C)(1), to assure compliance with federally enforceable terms and conditions of the Toledo Refinery’s Title V permit.

WHEREAS, EPA and Ohio EPA have issued a Finding of Violation and Notices of Violation to BP Products and BP-Husky describing the Toledo Refinery’s alleged non-

compliance with various requirements of the Clean Air Act;

WHEREAS, by entering into this Consent Decree, BP Products and BP-Husky are committing to undertake a set of compliance projects at the Toledo Refinery intended to:

(i) assure compliance with the requirements of the Clean Air Act, EPCRA, CERCLA, and Ohio's air pollution control laws, (ii) reduce emissions of air pollutants from the Toledo Refinery, and (iii) protect public health, welfare, and the environment;

WHEREAS, all process units at the Toledo Refinery have been monitored in compliance with the monitoring requirements of 40 C.F.R. Part 60, Subpart GGGa as of the Date of Lodging;

WHEREAS, before lodging this Consent Decree, the Defendants replaced the floating roof cover system on Zone 1 of the Wastewater Treatment Unit separator inlet channel (which is part of Refinery Emission Unit P026) with a fixed roof system;

WHEREAS, EPA estimates that when the compliance requirements of this Consent Decree are fully implemented, fugitive emissions of VOCs and HAPs will be reduced;

WHEREAS, EPA provided the Defendants and Ohio with actual notice of the alleged violations, in accordance with Sections 113(a)(1) and (b) of the Clean Air Act, 42 U.S.C. §§ 7413(a)(1) and (b);

WHEREAS, BP Products and BP-Husky do not admit any liability to the United States or the State arising out of the transactions or occurrences alleged in the Complaint, the Notices of Violation, or otherwise;

WHEREAS, BP Products and BP-Husky waive any applicable federal or state requirements of statutory notice of the alleged violations; and

WHEREAS, the Parties recognize, and the Court by entering this Consent Decree finds, that this Consent Decree has been negotiated by the Parties at arms-length and in good faith and

will avoid litigation among the Parties and that this Consent Decree is fair, reasonable, and in the public interest.

NOW, THEREFORE, before the taking of any testimony, without the adjudication or admission of any issue of fact or law, except as provided in Section I, and with the consent of the Parties, IT IS HEREBY ADJUDGED, ORDERED, AND DECREED as follows:

**I. JURISDICTION AND VENUE**

1. This Court has jurisdiction over the subject matter of this action pursuant to: a) 28 U.S.C. §§ 1331, 1345, and 1355, b) Section 113(b) of the Clean Air Act, 42 U.S.C. § 7413(b), c) Section 109(c) of CERCLA, 42 U.S.C. § 9609(c), and d) Section 325(b)(3) of EPCRA, 42 U.S.C. § 11045(b)(3). This Court also has jurisdiction over the Parties. This Court has supplemental jurisdiction over the State law claims asserted by Ohio pursuant to 28 U.S.C. § 1367.

2. Venue lies in this judicial district pursuant to Section 113(b) of the Clean Air Act, 42 U.S.C. § 7413(b), Section 109(c) of CERCLA, 42 U.S.C. § 9609(c), and Section 325(b)(3) of EPCRA, 42 U.S.C. § 11045(b)(3), and 28 U.S.C. §§ 1391(b) and (c) and 1395(a), because the violations alleged in the Complaint are alleged to have occurred in this judicial district. In addition, BP Products and BP-Husky conduct business in this judicial district. The Defendants consent to: a) this Court's subject matter jurisdiction over this Consent Decree and any action to enforce this Consent Decree, b) this Court's personal jurisdiction over them, and c) venue in this judicial district.

3. For purposes of this Consent Decree, the Defendants agree that the Complaint states claims upon which relief may be granted pursuant to: a) Sections 111, 113, and 502 of the

Clean Air Act, 42 U.S.C. §§ 7411-13 and 7661a, b) Sections 103 and 109 of CERCLA, 42 U.S.C. §§ 9603(a) and 9609(c), c) Sections 304(a) and 325(b)(3) of EPCRA, 42 U.S.C. §§ 11004(a) and 11045(b)(3), and d) State law.

4. Notice of the commencement of this action has been given to Ohio as required by Section 113 of the Clean Air Act, 42 U.S.C. § 7413.

## **II. APPLICABILITY**

5. The obligations of this Consent Decree apply to and are binding upon the United States and Ohio, as well as jointly and severally upon the Defendants and any successors, assigns, or other entities or persons otherwise bound by law.

6. Commencing on the Effective Date, the Defendants shall provide written notice and a copy of this Consent Decree to any successors in interest to the Toledo Refinery before the transfer of ownership or operation of any portion of the Refinery. At least 30 Days before any such transfer, the Defendant transferring its interest shall provide a copy of this Consent Decree to the proposed transferee and shall simultaneously provide written notice of the prospective transfer to EPA Region 5, Ohio, and the United States Department of Justice, in accordance with Section XIX (Notices).

7. The Defendants shall condition any transfer of ownership or operation of any portion of, or interest in (exclusive of any non-controlling, non-operational shareholder or membership interest), the Toledo Refinery upon the execution by the transferee of a modification to this Consent Decree that makes the transferred terms and conditions of the Consent Decree applicable to, binding upon, and enforceable against the transferee. Any attempt to transfer ownership or operation of the Toledo Refinery without complying with Paragraphs 6-8 constitutes a violation of this Consent Decree.

8. Within ten (10) Days following the closing date of the transfer, the Defendant transferring its interest in the Toledo Refinery shall provide the following to EPA Region 5, Ohio, and the United States Department of Justice in accordance with Section XIX (Notices): (i) notice of the transfer and (ii) a certification from the transferee to the United States that the transferee has the financial and technical ability to assume the obligations and liabilities of this Consent Decree and that the transferee is contractually bound to assume the obligations and liabilities of this Consent Decree.

9. By no earlier than 60 Days after providing the notice, agreement, and certification required by the preceding Paragraphs, BP-Husky and/or BP Products may file a motion requesting that the Court modify this Consent Decree so that the transferred terms and conditions are applicable to, binding upon, and enforceable against the transferee. The Defendant(s) shall be released from any ongoing obligations and liabilities of this Consent Decree that have been transferred unless the United States or Ohio opposes the motion and the Court finds that: (i) the Defendants have failed to prove that the transferee has the financial and technical ability to assume the obligations and liabilities of the Consent Decree; or (ii) the modification language fails to effectively transfer the obligations and liabilities to the transferee.

10. Unless and until the motion contemplated by Paragraph 9 is granted by the Court, the Defendants remain responsible for ensuring that performance of the work required under this Consent Decree is undertaken in compliance with the deadlines and requirements contained in this Consent Decree and any appendices hereto.

11. The Defendants shall provide a copy of this Consent Decree to all officers, employees, and agents whose duties might reasonably include compliance with any provision of this Decree. The Defendants shall also provide a copy of the applicable provisions of this



Consent Decree (or a link to the information on the internet) to each consulting or contracting firm that is retained to perform work required under this Consent Decree upon execution of any contract relating to such work. The Defendants shall condition any such contract upon performance of the work in conformity with the terms of this Consent Decree. Copies of the applicable portions of this Consent Decree (or a link to the information on the internet) do not need to be supplied to firms who are retained solely to supply materials or equipment to satisfy the requirements of this Consent Decree.

12. In any action to enforce this Consent Decree, the Defendants agree not to contest the validity of this Consent Decree or its terms. The Defendants shall furthermore not raise as a defense the failure by any of their officers, directors, employees, agents, or contractors to take any actions necessary to comply with the provisions of this Consent Decree.

### **III. OBJECTIVES**

13. The Parties enter into this Consent Decree with the objective of assuring the Toledo Refinery's compliance with the Clean Air Act, EPCRA, CERCLA, and applicable State law, as well as to further the purposes of the Clean Air Act, EPCRA, and CERCLA.

### **IV. DEFINITIONS**

14. Terms used in this Consent Decree that are defined in the Clean Air Act, EPCRA, CERCLA, or regulations promulgated pursuant to those statutes shall have the meanings assigned to them in those statutes or such regulations, unless otherwise provided in this Consent Decree. Whenever the terms set forth below are used in this Consent Decree, the following definitions shall apply:

- a. "BP-Husky" or "BPH" shall mean BP-Husky Refining LLC;

- b. “BP Products” or “BPP” shall mean BP Products North America Inc.;
- c. “CD Emissions Reductions” shall mean any NO<sub>x</sub>, SO<sub>2</sub>, H<sub>2</sub>S, TRS, reduced sulfur compounds, PM, PM<sub>2.5</sub>, PM<sub>10</sub>, VOC, or CO emissions reductions that result from implementing any of the Consent Decree’s compliance requirements in Section VI and environmental mitigation requirements in Section VII;
- d. “CEMS Root Cause Failure Analysis” shall mean a process of analysis and investigation to determine the primary cause(s) for why a CEMS is not in continuous operation within the meaning of Section VI, Paragraph 23;
- e. “Complaint” shall mean the complaint filed by the United States and the State of Ohio in this action;
- f. “Consent Decree” or “Decree” shall mean this Decree and all appendices attached hereto (listed in Section XXIX);
- g. “Continuous Emissions Monitoring System” or “CEMS” shall mean the total equipment required by this Consent Decree, an applicable regulation, permit, or order used to: sample and condition (if applicable), analyze, and provide a permanent record of emissions in the units of measurement of the standard under which compliance must be demonstrated;
- h. “Date of Lodging” shall mean the date this Consent Decree is filed for lodging with the United States District Court for the Northern District of Ohio;
- i. “Day” shall mean a calendar day unless expressly stated to be a business (or “working”) day. Solely for purposes of determining the compliance deadline

for submitting a written deliverable required by the Consent Decree (*e.g.*, a corrective action plan, Semi-Annual Report, or other report), in computing any such period of time, where the compliance deadline would fall on a Saturday, Sunday, or federal holiday, the deadline shall be extended until the close of business of the next business day;

j. “Defendants” shall mean BP Products and BP-Husky;

k. “EPA” shall mean the United States Environmental Protection Agency and any of its successor departments or agencies;

l. “Effective Date” shall have the definition provided in Section XX;

m. “LDAR Program” shall mean the Leak Detection and Repair requirements specified in Section VI.B and Appendix A of this Decree. The LDAR Program requirements include measures required to resolve the Defendants’ alleged non-compliance with 40 C.F.R. Part 60, Subparts VV and GGG, and applicable corresponding state or local equipment leak requirements. The LDAR Program requirements also include measures to mitigate the alleged environmental harm caused by the Defendants’ alleged LDAR non-compliance at the Covered Process Units and Covered Equipment (including “initial attempt at repair” requirements in Paragraph 11 of Appendix A, “Drill and Tap Repair” requirements in Paragraph 14 of Appendix A, and the “Valve Replacement/Improvement Program” requirements in Paragraphs 18-22 of Appendix A);

n. “Paragraph” shall mean a portion of this Decree identified by an Arabic numeral;

- o. “Parties” shall mean the United States, the State of Ohio, and the Defendants;
- p. “Refinery” or “Toledo Refinery” shall mean the petroleum refinery currently operated by BP Products and owned by BP-Husky, which is located at 4001 Cedar Point Road, Oregon, OH 43616;
- q. “Section” shall mean a portion of this Decree identified by a Roman numeral;
- r. “Startup” shall mean, as defined in 40 C.F.R. § 60.2, the setting in operation of equipment for any purpose;
- s. “Shutdown” shall mean, as defined in 40 C.F.R. § 60.2, the cessation of operation of equipment for any purpose;
- t. “State” or “Ohio” shall mean the State of Ohio;
- u. “United States” shall mean the United States of America, acting on behalf of EPA; and
- v. “2001 Consent Decree” shall mean the Consent Decree entered in 2001 in *U.S., et al. v. BP Exploration & Oil Co., et al.*, Civil No. 2:96-cv-095 (N.D. Ind.), and its amendments.

**V. CIVIL PENALTY**

15. The Defendants shall pay civil penalties and stipulated penalties in the amount of \$2,600,000 as set forth in this Section.

16. By no later than 30 Days after the Effective Date, the Defendants shall pay the sum of \$1,425,000 to the United States and the sum of \$200,000 to Ohio as a civil penalty for Clean Air Act and EPCRA violations. Within 30 Days after the Effective Date, the Defendants shall also pay the sum of \$75,000 to the United States, payable to “EPA Hazardous Substance Superfund,” as a civil penalty for CERCLA violations.

17. The Defendants shall pay all civil penalties due to the United States by FedWire Electronic Funds Transfer (“EFT”) to the U.S. Department of Justice account, in accordance with instructions provided to the Defendants by the Financial Litigation Unit (“FLU”) of the United States Attorney’s Office for the Northern District of Ohio after the Effective Date. The payment instructions provided by the FLU will include a Consolidated Debt Collection System (“CDCS”) number, which the Defendants shall use to identify all payments required to be made in accordance with this Consent Decree. The FLU will provide the payment instructions to: (a) Jessica L. Gonzalez, counsel for BPP, via U.S. regular mail at: BP America Inc., 30 S. Wacker Drive, Chicago, IL. 60606, and via e-mail to: [jessica.gonzalez@bp.com](mailto:jessica.gonzalez@bp.com); and (b) Justin Savage, counsel for BPH, via e-mail to: [jsavage@sidley.com](mailto:jsavage@sidley.com). The Defendants may change the individual to receive payment instructions on its behalf by providing written notice of such change to the United States and EPA in accordance with Section XIX (Notices).

18. At the time of the payments, the Defendants shall send notice that the payments have been made: (i) to EPA via email at [cinwd\\_acctsreceivable@epa.gov](mailto:cinwd_acctsreceivable@epa.gov) or via regular mail at EPA Cincinnati Finance Office, 26 W. Martin Luther King Drive, Cincinnati, Ohio 45268; and

(ii) to the United States via email or regular mail in accordance with Section XIX (Notices); and  
(iii) to EPA and Ohio in accordance with Section XIX (Notices). Such notices shall state that the payments are for the civil penalty owed pursuant to the Consent Decree in *U.S., et al. v. BP Products North America Inc., et al.* (N.D. Ohio), and shall reference the civil action number, CDCS Number, and DOJ case number 90-5-2-1-09244/2.

19. Payment of the civil penalty owed pursuant to this Section, and payment of any stipulated penalties owed pursuant to Section X, to the State of Ohio shall be made by wire transfer or certified check payable to the order of “Treasurer, State of Ohio,” and shall reference the civil case number, to:

Sandra Finan, Paralegal (or her successor)  
Office of the Attorney General  
30 E. Broad St., 25<sup>th</sup> Floor  
Columbus, Ohio 43215

20. By no later than 30 Days after the Date of Lodging, the Defendants shall pay a total sum of \$900,000 in stipulated penalties for violations of the 2001 Consent Decree at the Toledo Refinery. Payment shall be made in accordance with Paragraphs 17-18, except that the transmittal letter shall state that the payment is for stipulated penalties owed under the Consent Decree entered in *U.S., et al. v. BP Exploration & Oil Co., et al.*, Civil No. 2:96-cv-095 (N.D. Ind.).

21. The Defendants shall not deduct any penalties paid under this Consent Decree pursuant to this Section or Section X (Stipulated Penalties) in calculating their federal, state, and local income taxes.

## VI. COMPLIANCE REQUIREMENTS

### A. CEMS Downtime Minimization, O&M, and Corrective Actions

#### 22. CEMS Operation and Maintenance Plan.

a. By no later than 180 Days after the Effective Date, the Defendants shall develop and submit for EPA and Ohio EPA review, as provided in Paragraph 22.e, a comprehensive CEMS Operation and Maintenance Plan (“CEMS O&M Plan” or “Plan”) for the Toledo Refinery that is designed to enhance the performance of CEMS components, improve CEMS accuracy and stability, and ensure continuous operation of CEMS in accordance with 40 C.F.R. § 60.13(e). This CEMS O&M Plan shall include at a minimum each of the elements identified in sub-Paragraphs 22.b through 22.d.

b. CEMS Testing and Calibration. The CEMS O&M Plan shall require that the Defendants certify, calibrate, maintain, and operate all CEMS in accordance with: (i) the provisions of 40 C.F.R. §§ 60.13 and 60.7(f) that are applicable to CEMS (excluding those provisions applicable only to Continuous Opacity Monitoring Systems), (ii) Part 60, Appendix F, and (iii) the applicable Performance Specification of 40 C.F.R. Part 60, Appendix B.

c. CEMS Operations and Maintenance Training. The CEMS O&M Plan shall provide for regular training for all individuals involved in CEMS operations and maintenance to maintain necessary levels of monitoring competency. All newly hired individuals involved in CEMS operations and maintenance shall be trained prior to undertaking any CEMS-related responsibilities. The CEMS O&M

Plan shall additionally ensure that all individuals involved in CEMS operations and maintenance have access to and are familiar with the CEMS O&M Plan. The CEMS O&M Plan need not address training requirements for authorized representatives of CEMS vendors or suppliers at the Toledo Refinery.

d. Preventive Maintenance, Quality Assurance/Quality Control (“QA/QC”), and Repair. The Toledo Refinery’s CEMS O&M Plan shall include the following:

- (1) A CEMS preventive maintenance program to provide for a regularly scheduled set of activities designed to prevent problems that render CEMS unable to be in continuous operation in accordance with 40 C.F.R. § 60.13(e). Such activities and procedures may be based initially on the CEMS vendors’ and manufacturers’ recommendations. Routine preventive maintenance procedures shall be reviewed periodically and updated as needed to incorporate necessary or appropriate CEMS preventive maintenance procedures based on operating experience with each CEMS. At a minimum, the preventive maintenance procedures shall be reviewed and updated, as needed, following the submission of a Root Cause Failure Analysis Report. Routine preventive maintenance procedures shall include regular (*e.g.*, daily, weekly, monthly) routine internal (and, as needed, external) maintenance and operation checks designed to minimize periods during which the CEMS is unable to be in continuous operation in accordance with 40 C.F.R. § 60.13(e). Internal checks include, but are not limited to, CEMS inspections, routine cleaning of components, and any other routine maintenance. External checks include, but are not limited to, independent third-party CEMS audits or other assessments to ensure continuous CEMS operations.
- (2) A CEMS QA/QC program that includes provisions for regularly (*e.g.*, daily, weekly, monthly) assessing and maintaining the quality of continuous emission monitoring data in accordance with 40 C.F.R. § 60.13 and 40 C.F.R. Part 60, Appendix F.
- (3) A CEMS repair program to ensure the timely repair of CEMS and that addresses both routine and non-routine maintenance and repair. The Defendants shall maintain a spare parts inventory adequate to meet the normal operating and CEMS preventive



maintenance requirements. The Defendants shall establish procedures for acquisition of parts on an emergency basis (*e.g.*, vendor availability on a next-Day basis). An individual at the Refinery shall be designated with overall responsibility for maintaining the adequacy of the spare parts inventory. The on-site spare parts inventory may be initially based on the CEMS vendor recommendations and shall be modified as-needed based on CEMS operating experience. At a minimum, the CEMS repair program shall be reviewed and modified as necessary following the submission of a Root Cause Failure Analysis Report.

e. EPA and Ohio EPA Review and Comment on CEMS Operation and Maintenance Plan. EPA and/or Ohio EPA may provide written comments on the CEMS O&M Plan submitted by the Defendants, in whole or in part, or EPA may decline to comment, as provided in this sub-Paragraph.

- (1) If EPA and/or Ohio EPA provides written comments within sixty (60) Days of receiving a CEMS O&M Plan, then within forty-five (45) Days of receiving such comments the Defendants shall either: (1) modify and implement the CEMS O&M Plan consistent with EPA's and Ohio EPA written comments, or (2) submit the matter for dispute resolution under Section XIV of the Consent Decree.
- (2) After sixty (60) Days from the date of the Defendants' submission of a CEMS O&M Plan, EPA and/or Ohio EPA may nonetheless provide written comments requiring changes to the Plan, which the Defendants shall thereafter implement unless implementation of the written comments would be unduly burdensome given the degree to which the Defendants have proceeded with implementing the CEMS O&M Plan or is otherwise unreasonable. If the Defendants determine that implementation of the written comments is unduly burdensome or otherwise unreasonable, it shall so notify EPA and Ohio EPA. Within sixty (60) Days of receiving the Defendants' position, EPA and Ohio EPA may either accept the Defendants' position or invoke dispute resolution pursuant to Section XIV of the Consent Decree.
- (3) Upon the expiration of sixty (60) Days from the date of the Defendants' submission of a CEMS O&M Plan, or upon completion of any dispute resolution process under Section XIV of the Consent Decree regarding a submission, the Defendants shall implement the CEMS O&M Plan in accordance with the requirements and schedule within the Plan.

23. CEMS Root Cause Failure Analysis and Corrective Action.

a. CEMS Root Cause Failure Analysis. For any CEMS that is not in continuous operation for at least 95 percent of the total operating time of the process unit(s) being monitored for each of two consecutive calendar quarters, the Defendants shall conduct a CEMS Root Cause Failure Analysis and develop a corrective action plan to promptly address the findings of the CEMS Root Cause Failure Analysis. For purposes of calculating whether a CEMS is in continuous operation for at least 95 percent of the total operating time of the process unit(s) being monitored, the periods of time associated with: (i) QA/QC daily zero and span checks required by 40 C.F.R. § 60.13(d)(1), (ii) an initial certification or re-certification seven-Day calibration drift test (as described in applicable performance specifications in 40 C.F.R. Part 60, Appendix B, including, but not limited to, Performance Specification 2, § 8.3) conducted following a component change on a CEMS, and (iii) quarterly cylinder gas audits shall not be counted as downtime and shall not be included in the calculation.

b. The CEMS Root Cause Failure Analysis shall include the following elements, at a minimum:

- (1) An investigation to identify why the CEMS was not in continuous operation for at least 95 percent of the total operating time for each of two consecutive calendar quarters as required by sub-Paragraph 23.a;
- (2) A detailed analysis setting forth the root cause(s) for why the CEMS was not in continuous operation for at least 95 percent of the total operating time for each of two consecutive calendar quarters as required by sub-Paragraph 23.a;
- (3) The steps, if any, taken to limit the duration of periods when the

CEMS was not in continuous operation for at least 95 percent of the total operating time for each of two consecutive calendar quarters as required by sub-Paragraph 23.a; and

- (4) An analysis of the measures reasonably available to prevent the root cause(s) from recurring. This analysis shall include an evaluation of possible design, operational, and maintenance measures. The measure(s) selected shall be incorporated into a corrective action plan that shall be completed in accordance with the requirements of Paragraphs 24-26.

24. Corrective Action Plan. The corrective action plan required by the preceding Paragraph 23 shall require the Defendants to undertake as expeditiously as reasonably possible such reasonably available corrective actions as are necessary to correct and prevent a recurrence of the root cause(s) identified in the CEMS Root Cause Failure Analysis. The corrective action plan shall include a description of any corrective actions already completed or, if not complete, a schedule for their implementation including proposed commencement and completion dates.

25. Third Party Evaluation. For any CEMS for which a Root Cause Failure Analysis is required twice within 12 consecutive calendar quarters, the Defendants shall retain an independent third party to evaluate the Defendants' Root Cause Failure Analyses and corrective actions. Based on its evaluation, the independent third party shall recommend additional preventive maintenance procedures, corrective actions, and/or modifications to the Defendants' CEMS O&M Plan in order to ensure continuous operation of the Refinery's CEMS in accordance with 40 C.F.R. § 60.13(e).

26. Reporting and Review and Comment on Corrective Action Plans. Following completion of each Root Cause Failure Analysis, the analysis and resulting corrective action plan, including a schedule for implementation, shall be submitted to EPA and Ohio EPA in a written report included with the first Semi-Annual Report required by Section IX of the Consent Decree following completion of the Root Cause Failure Analysis. Following completion of each

independent third party evaluation, the evaluation and resulting recommendations and a schedule for implementation shall be submitted to EPA and Ohio EPA in the first Semi-Annual Report required by Section IX of the Consent Decree following completion of the independent third party evaluation.

- a. After reviewing a CEMS Root Cause Failure Analysis and corrective action plan, EPA and/or Ohio EPA may notify the Defendants in writing of: (i) any deficiencies in the corrective actions listed in the findings; and/or (ii) any objections to the schedules of implementation of the corrective actions along with an explanation of the basis for EPA's and/or Ohio EPA's objections.
- b. If the Defendants have not yet commenced implementation of the corrective plan, the Defendants will implement an alternative or revised corrective action or implementation schedule based on EPA's and/or Ohio EPA's comments.
- c. If a corrective action that EPA and/or Ohio EPA has identified as deficient has already commenced or is already completed, then the Defendants are not obligated to implement any alternative or additional corrective action identified by EPA and/or Ohio EPA. However, the Defendants shall be on notice that EPA and Ohio EPA consider such corrective action deficient and not acceptable for remedying any subsequent, similar root cause(s) of any future CEMS monitor downtime.
- d. If EPA, Ohio EPA, and the Defendants cannot agree on the appropriate corrective action(s) or implementation schedule(s), if any, to be taken in response to a CEMS Root Cause Failure Analysis, either party may invoke the Dispute

Resolution provisions of Section XIV of the Consent Decree.

**B. Leak Detection and Repair**

27. NSPS Applicability. Upon the Effective Date, each “process unit” (as defined by 40 C.F.R. § 60.590a(e)) at the Toledo Refinery shall be an “affected facility” for purposes of 40 C.F.R. Part 60, Subpart GGGa, and shall be subject to and comply with the requirements of Subpart GGGa no later than one year from the Effective Date, except as specifically provided in this Paragraph.

a. The requirements of 40 C.F.R. Part 60, Subpart GGGa, shall not apply to compressors at the Toledo Refinery based solely on the applicability requirements of this Paragraph.

b. Process units on which construction commenced prior to January 4, 1983, shall not be subject to the requirements in 40 C.F.R. § 60.482-7a(h)(2)(ii) regarding difficult-to-monitor valves.

c. Entry of this Consent Decree satisfies the following notification and testing requirements that are triggered by initial applicability of 40 C.F.R. Part 60, Subparts A and GGGa: 40 C.F.R §§ 60.7, 60.8, 60.18 (but only with respect to the following flares and only to the extent they are used to comply with the LDAR Regulations: East and West flares), § 60.482-1a(a), and § 60.487a(e).

d. For any process unit at the Toledo Refinery, any two consecutive months of monitoring that the Defendants conduct in compliance with the monitoring requirements of 40 C.F.R. Part 60, Subpart GGGa, before the Effective Date shall satisfy the requirement to conduct monitoring of those components for two

consecutive months following the initial applicability of 40 C.F.R. Part 60, Subpart GGGa.

Nothing in this Paragraph or in Appendix A to this Consent Decree shall relieve the Defendants of their independent obligation to comply with the requirements of any other federal, state, or local LDAR regulation that may apply to “Equipment” at the Toledo Refinery, as that term is defined in Appendix A.

28. Leak Detection and Repair Program. The Defendants shall implement and comply with the requirements of the Leak Detection and Repair Program (“LDAR Program”) set forth in Appendix A to this Consent Decree by the dates specified therein. The requirements of Appendix A are in addition to the applicable requirements under 40 C.F.R. Part 60, Subpart GGGa; Part 61, Subparts J and V; and Part 63, Subpart CC. The terms “in light liquid service” and “in gas/vapor service” shall have the definitions set forth in the applicable provisions of 40 C.F.R. Part 60, Subpart GGGa, and Part 63, Subpart CC.

**C. NSPS QQQ Audit and Corrective Actions**

29. QQQ Audit. The Defendants shall conduct and complete an audit (“QQQ Audit”) of the Toledo Refinery’s compliance with Subpart QQQ of the NSPS, promulgated at 40 C.F.R. Part 60, Subpart QQQ (“NSPS Subpart QQQ”). The Defendants shall complete the QQQ Audit by the later of September 30, 2019 or 30 Days after the Effective Date. The QQQ Audit will review the following subjects, as specified below:

- a. QQQ Applicability. The QQQ Audit will evaluate the applicability of NSPS Subpart QQQ for all projects that changed or potentially changed either the storm water or the process wastewater collection systems (including all affected facilities listed in 40 C.F.R. § 60.690(a)) since

November 1, 2014. This evaluation will identify affected equipment for those projects that triggered NSPS Subpart QQQ applicability, if any.

- b. QQQ Controls. The QQQ Audit will evaluate all affected facilities currently subject to NSPS Subpart QQQ at the Toledo Refinery, or for which the Defendants accept NSPS QQQ applicability pursuant to Paragraph 31 herein, to ensure that they are controlled in accordance with the requirements of NSPS Subpart QQQ. The Refinery's wastewater system catch basins must be included as part of this evaluation.
- c. Management of Change. The QQQ Audit will evaluate the Defendants' management of change ("MOC") process to ensure that it is both appropriately designed and in fact implemented to:
  - i. Identify any construction, modification, or reconstruction of any facility at the Refinery that will trigger the applicability of NSPS Subpart QQQ before commencing the project, and to specify the appropriate control(s) for the affected facility in accordance with NSPS Subpart QQQ; and
  - ii. Identify any changes to the scope of any construction, modification, or reconstruction project after the initial MOC review (whether or not the initial MOC determined that the project triggered NSPS Subpart QQQ) in order to determine whether those changes will affect the applicability or scope of the project in relation to NSPS Subpart QQQ, and, if they do, to specify the appropriate control(s) in accordance with NSPS Subpart QQQ.

The Defendants may consult with EPA regarding the scope of the QQQ Audit.

30. The QQQ Audit may be performed by either an independent third party contractor or a combination of an independent third party contractor and qualified internal staff from the Toledo Refinery.

31. The Defendants may, at their option, accept applicability of NSPS Subpart QQQ on a potentially affected facility at the Refinery at any time, before or during the audit, in lieu of conducting or completing the element of the QQQ Audit under Paragraph 29.a as to that potentially affected facility.

32. A final report detailing the findings and conclusions of the QQQ Audit shall be submitted to EPA within ninety (90) Days of completing the QQQ Audit (the “QQQ Audit Report”). The QQQ Audit Report shall: describe the processes, procedures, and methodology used to conduct the QQQ Audit; clearly identify any violations or potential violations of NSPS Subpart QQQ noted at the Refinery in the course of the QQQ Audit; identify all facilities or equipment for which NSPS Subpart QQQ applicability was accepted in lieu of auditing NSPS Subpart QQQ applicability; and provide details concerning the costs associated with such corrective action(s) and economic benefit(s) obtained by the Defendants, including with respect to any equipment for which the Defendants accept NSPS Subpart QQQ applicability pursuant to Paragraph 31.

33. The QQQ Audit Report shall also include a corrective action plan specifying all projects necessary to bring the applicable parts of the Refinery into compliance with NSPS Subpart QQQ. The corrective action plan shall include an implementation schedule. In the event that further work is required to determine the appropriate corrective action, the QQQ Audit Report shall include an explanation of the additional work and a proposed schedule for completing both the additional work and the chosen corrective action. The corrective action plan and implementation schedule, including for completing any additional work, shall be subject to EPA comment. If EPA does not submit comments, the Defendants shall complete the projects identified in the corrective action plan according to the implementation schedule(s). If EPA



provides written comments on a corrective action plan or implementation schedule, the Defendants shall, within forty-five (45) Days of receiving such comments, either: (a) alter and complete the plan or schedule consistent with EPA's written comments, or (b) submit the matter for dispute resolution under Section XIV of the Consent Decree. If the compliance plan extends for more than two years after the date of the QQQ Audit Report, the Defendants shall submit progress reports every two years until all corrective actions have been completed. These progress reports may be included as part of the Semi-Annual Reports required pursuant to Section IX of the Consent Decree.

34. Within sixty (60) Days of completing all corrective actions identified in the QQQ Audit Report's corrective action plan, the Defendants shall submit a written report (hereinafter the "Final QQQ Notice") to EPA, confirming that the Defendants have completed all corrective actions required by the QQQ Audit Report.

35. Both the QQQ Audit Report and the Final QQQ Notice shall be signed by an appropriate company official and must include the Certification Statement required in Paragraph 133.

36. Inspection and Monitoring under QQQ. Beginning no later than the Effective Date, the Defendants shall conduct semi-annual inspections of the unburied portions of sewer lines in the process wastewater system at the Toledo Refinery that are subject to NSPS Subpart QQQ, including vent pipes and cleanouts, as required by 40 CFR § 60.692-2(c), for indications of cracks, gaps, or other problems that could result in VOC emissions. For cleanouts and manholes, these inspections shall also ensure that each cleanout cover and manhole cover is securely in place and has a tight seal around the edge. Whenever cracks, gaps, or other problems that could result in VOC emissions are detected during these semi-annual inspections, repairs

shall be made as soon as practicable, but not later than 15 Days after identification, except as provided in 40 C.F.R. § 60.692-6.

**D. EPCRA/CERCLA Reporting Requirements and Audit**

37. The Defendants shall comply with the requirements of Section 304 of EPCRA, 42 U.S.C. § 11004, and Section 103(a) of CERCLA, 42 U.S.C. § 9603.

38. By no later than the Effective Date, the Defendants shall report each reportable quantity (“RQ”) release, including releases that occur during startup and shutdown events, immediately as required by Section 103 of CERCLA, 42 U.S.C. § 9603(a), and Section 304 of EPCRA, 42 U.S.C. § 11004, upon knowledge of a release exceeding the reportable quantity.

39. By no later than the Effective Date, the Defendants shall maintain the Pollution Incident Notification Form used by the Toledo Refinery for, *inter alia*, complying with CERCLA Section 103, 42 U.S.C. § 9603(a), and EPCRA Section 304, 42 U.S.C. § 11004, reporting requirements so that the form explicitly requires immediate reporting of reportable quantity releases, including releases that occur during startup and shutdown events.

40. Within thirty (30) Days of the Effective Date, the Defendants shall provide to EPA a copy of the then-current list of substances, along with the associated RQs, that may be reportable under EPCRA or CERCLA and that are stored or used onsite. This list will be readily available in electronic format to all members of the Refinery’s environmental team. Upon request, the Defendants shall promptly supply an electronic copy of any safety data sheets to EPA and/or Ohio EPA.

41. EPCRA/CERCLA Audit. Within one year of the Effective Date, the Defendants shall complete an audit, as described below, of their compliance at the Toledo Refinery with the reporting requirements of CERCLA Section 103, 42 U.S.C. § 9603(a), and EPCRA Section 304,

42 U.S.C. § 11004 (“EPCRA/CERCLA Audit”). The Defendants will retain an independent third-party contractor to perform this audit.

a. This audit shall evaluate the following procedures to assess whether each is appropriately designed and implemented to result in timely and accurate release reporting as required pursuant to CERCLA Section 103(a), 42 U.S.C. § 9603(a), and EPCRA Section 304, 42 U.S.C. § 11004:

(i) The Defendants’ procedures for detecting reportable releases under CERCLA Section 103, 42 U.S.C. § 9603(a), and EPCRA Section 304, 42 U.S.C. § 11004. The audit shall also assess the extent to which all available monitoring data and standardized calculation methods are being used to detect releases exceeding reportable quantities.

(ii) The Defendants’ procedures for calculating quantity released for purposes of CERCLA Section 103(a), 42 U.S.C. § 9603(a), and EPCRA Section 304, 42 U.S.C. § 11004.

(iii) The Defendants’ employee training procedures as they relate to reporting of releases of reportable quantities pursuant to CERCLA Section 103, 42 U.S.C. § 9603(a), and EPCRA Section 304, 42 U.S.C. § 11004. The audit shall also assess the extent to which all employees involved in carrying out the Defendants’ responsibilities to immediately report such releases are adequately trained on the Refinery’s release reporting procedures.

b. A written report of the results of the EPCRA/CERCLA Audit (“EPCRA/CERCLA Audit Report”) shall be provided within ninety (90) Days after completing the EPCRA/CERCLA Audit to: (i) Ohio EPA pursuant to Section XIX

(Notices) and (ii) James Entzinger, U.S. EPA, 77 West Jackson Boulevard, Chicago, IL 60604.

c. The Defendants shall correct any inadequacies or discrepancies identified by the EPCRA/CERCLA Audit Report within one hundred eighty (180) Days of receiving the EPCRA/CERCLA Audit Report.

## **VII. ENVIRONMENTAL MITIGATION**

42. The Defendants shall implement the environmental mitigation actions described in this Section.

43. The Refinery operates a sulfur recovery plant (“SRP”), which consists of the following: three sulfur pits; three Claus Sulfur Recovery Units (referred to as “SRUs 1-3”); Tail Gas Treating Unit (“TGTU”) 1 serving as a control device for SRU 1; and TGTU 2 serving as a control device for SRUs 2 and 3. By no later than 180 Days after the Effective Date, the Toledo Refinery’s SRP shall be designated as an “affected facility” as that term is used in 40 C.F.R. Part 60, Subparts A and Ja, for all pollutants applicable to SRPs, and shall be subject to and comply with all applicable requirements of 40 C.F.R. Part 60, Subparts A and Ja.

44. Entry of this Consent Decree satisfies the following notification and testing requirements for the SRP that are triggered by initial applicability of 40 C.F.R. Part 60, Subparts A and Ja: 40 C.F.R §§ 60.7 and 60.8.

45. Nothing in this Consent Decree shall be interpreted to limit the Refinery’s opportunity to submit for EPA approval alternative monitoring procedures or requirements pursuant to 40 C.F.R. Part 60, Subpart A, for emissions from the SRP.

46. The Refinery shall operate and maintain, to the extent practicable, the SRP, including the TGTUs, its sulfur pits, and any supplemental control devices on the SRPs, in accordance with its obligation to minimize emissions through implementation of good air pollution control practices as required by 40 C.F.R. § 60.11(d), at all times, including, but not limited to, periods of Startup, Shutdown, malfunction, and maintenance.

47. The Defendants certify that: they are not otherwise required by law to perform the environmental mitigation actions required by this Section VII, that the Defendants are unaware of any other person who is required by law to perform the environmental mitigation actions required by this Section VII, and that the Defendants will not use the environmental mitigation actions required by this Section VII to satisfy any obligations that they may have under other applicable requirements of law.

#### **VIII. SUPPLEMENTAL ENVIRONMENTAL PROJECT**

48. The Defendants shall implement and complete a Lead Paint Abatement Supplemental Environmental Project (“Lead Abatement SEP”) in accordance with this Section. The purpose of the Lead Abatement SEP is to reduce children’s exposure to lead-based paint hazards in the following category of structures: “Child-Occupied Facilities,” as defined in 40 C.F.R. § 745.83. Identifying the specific structures to be addressed under the Lead Abatement SEP shall be done in accordance with Paragraph 51.

49. Types of Eligible Abatement Work. The Lead Abatement SEP will involve lead-based paint abatement work that includes, but is not limited to, one or more of the following: removing lead-based paint and lead-contaminated dust; the permanent enclosure or encapsulation of lead-based paint; the replacement of lead-based painted surfaces or fixtures; window replacement, using energy efficient windows that meet EPA Energy Star criteria; and other

activities that must be included as part of the lead abatement work in order for it to be successful, such as lead hazard evaluation, planning, cleaning, clearance, and waste disposal.

50. Schedule for Completing SEP. By no later than 30 Days after the Consent Decree's Effective Date, the Defendants must fund an interest-bearing escrow account with \$1,200,000 that will be used to pay for Eligible Costs under the Lead Abatement SEP. The Defendant must complete the Lead Abatement SEP by no later than 36 months after the Effective Date. However, the completion date for the Lead Abatement SEP may be extended by written agreement of the Parties.

51. Location of Structures Eligible for Abatement. The Defendants shall implement the Lead Abatement SEP at the category of structures referenced in Paragraph 48 that are within an 18-mile radius of the Toledo Refinery and within the State of Ohio. The Defendants or the third parties that it may use in accordance with Paragraph 53 may consult with the relevant local public health agency for Ottawa County, Sandusky County, or Wood County, and the Toledo-Lucas County Health Department for Lucas County to identify the specific structures for lead-based paint abatement work under this SEP. Both commercial and residential property are eligible for this SEP, however, priority shall be given to residential housing where the owners are unable to afford lead paint hazard abatement work and in which: (a) families with children (age six and under) or pregnant women reside or "visit regularly," within the meaning of the first sentence of the definition of Child-Occupied Facility and (b) elevated blood lead levels have been identified.

52. In implementing the Lead Abatement SEP, the Defendants must ensure that the individuals or entities performing the work are certified, knowledgeable, and experienced in conducting lead-based paint abatement work. The Defendants also shall ensure that all work

performed for the Lead Abatement SEP is conducted in accordance with all applicable federal and state work practice and notification requirements including, but not limited to, the United States Department of Housing and Urban Development's ("HUD's") Guidelines for the Evaluation and Control of Lead-Based Paint Hazards in Housing and the State of Ohio.

53. Nothing in this Consent Decree prevents the Defendants from using non-profit organizations, contractors, or consultants in planning and implementing the Lead Abatement SEP. However, the Defendants are responsible for ensuring that all requirements of the Lead Abatement SEP are completed.

54. "Eligible costs" shall include only those costs of conducting lead-based paint abatement work in compliance with the HUD Guidelines, such as family relocation costs, lead inspections/risk assessments, remediation and clearance, purchase of materials, and costs allowed by the HUD Guidelines, and any other costs necessary to conduct the lead-based paint abatement work in compliance with federal, state, and/or local requirements for such work, except that up to ten percent of the total costs billed by any contractor retained by the Defendants as overhead costs may be considered "Eligible Costs."

55. The Defendants are jointly responsible for the satisfactory completion of the Lead Abatement SEP in accordance with the requirements of this Consent Decree. "Satisfactory completion" means that the Defendants have completed all requirements of the Lead Abatement SEP and no less than \$1,200,000 (plus any interest that the escrow account has accrued) in Eligible Costs have been expended performing eligible abatement work.

56. With regard to the Lead Abatement SEP, the Defendants certify the truth and accuracy of each of the following:

- a. that all cost information provided to EPA in connection with EPA's approval of the Lead Abatement SEP is complete and accurate and that the Defendants in good faith estimate that the cost to implement the Lead Abatement SEP is \$1,200,000;
- b. that, as of the date of executing this Decree, the Defendants are not required to perform or develop the Lead Abatement SEP by any federal, state, or local law or regulation and are not required to perform or develop the Lead Abatement SEP by agreement, grant, or as injunctive relief awarded in any other action in any forum;
- c. that the Lead Abatement SEP is not a project that either Defendant was planning or intending to construct, perform, or implement other than in settlement of the claims resolved in this Decree;
- d. that the Defendants have not received and will not receive credit for the Lead Abatement SEP in any other enforcement action;
- e. that the Defendants will not receive any reimbursement for any portion of the Lead Abatement SEP from any other person; and
- f. that: (i) neither Defendant is a party to any open federal financial assistance transaction that is funding or could fund the same activity as the Lead Abatement SEP described in this Section; and (ii) the Defendants have inquired of the Lead Abatement SEP recipient and/or Lead Abatement SEP implementer whether either is a party to an open federal financial assistance transaction that is



funding or could fund the same activity as the Lead Abatement SEP and has been informed by the recipient and/or the implementer that neither is a party to such a transaction. For purposes of these certifications, the term “open federal financial assistance transaction” refers to a grant, cooperative agreement, loan, federally guaranteed loan guarantee, or other mechanism for providing federal financial assistance whose performance period has not yet expired.

57. SEP Completion Report. By no later than 45 Days after the date set for completing the Lead Abatement SEP, the Defendants shall submit a SEP Completion Report to the United States and Ohio, in accordance with Section XIX (Notices). The SEP Completion Reports shall contain the following information:

- g. a detailed description of the Lead Abatement SEP as implemented;
- h. a description of any problems encountered in completing the Lead Abatement SEP and the solutions thereto;
- i. an itemized list of all eligible SEP costs expended;
- j. certification that the Lead Abatement SEP has been fully implemented pursuant to the provisions of this Consent Decree; and
- k. a description of the environmental and public health benefits resulting from implementing the Lead Abatement SEP (with a quantification of the benefits and pollutant reductions, if feasible).

58. EPA may, in its sole discretion, require information in addition to that described in the preceding Paragraph, in order to evaluate the Defendants’ completion report.

59. After receiving the SEP Completion Report, the United States shall notify the Defendants whether or not they have satisfactorily completed the Lead Abatement SEP. If the

Defendants have not completed the Lead Abatement SEP in accordance with this Consent Decree, stipulated penalties may be assessed under Section X.

60. Disputes concerning the satisfactory performance of the Lead Abatement SEP and the amount of eligible SEP costs may be resolved under Section XIV (Dispute Resolution). No other disputes arising under this Section shall be subject to Dispute Resolution.

61. Each submission required under this Section shall be signed by an official with knowledge of the Lead Abatement SEP and shall bear the Certification Statement required in Paragraph 133.

62. Any public statement, whether oral or written, in print, film, or other media, made by either Defendant making reference to the Lead Abatement SEP under this Consent Decree shall include the following language: “This project was undertaken in connection with the settlement of an enforcement action, *United States and State of Ohio v. BP Products North America Inc. and BP-Husky Refining LLC*, taken on behalf of the U.S. Environmental Protection Agency and Ohio EPA under the Clean Air Act, EPCRA, and CERCLA.”

63. For federal income tax purposes, the Defendants agree that they will neither capitalize into inventory or basis nor deduct any costs or expenditures incurred in performing the Lead Abatement SEP.

#### **IX. REPORTING REQUIREMENTS**

64. Beginning six (6) months after the Effective Date, on or before February 15 and August 15 of each year until termination of this Consent Decree pursuant to Section XXIII, the Defendants shall jointly submit to EPA and Ohio a semi-annual report (“Semi-Annual Report”) containing the following information:

a. General. Each Semi-Annual Report shall contain the following information for the previous six month period (*i.e.*, January to June will be addressed in the report to be submitted by August 15, and July to December will be addressed in the report submitted by February 15):

- (1) A description of the status of work performed and progress made toward implementing all requirements of Section VI (Compliance Requirements) and Section VII (Environmental Mitigation). This topic should describe any major milestones completed and remaining to be completed;
- (2) A description of any problems encountered or anticipated in complying with the requirements of Section VI (Compliance Requirements) and Section VII (Environmental Mitigation), together with implemented or proposed solutions;
- (3) A description of the status of any permit applications, including a summary of all permitting activity, pertaining to compliance with this Consent Decree;
- (4) A copy of any reports that were submitted only to Ohio and that pertain to compliance with this Consent Decree;
- (5) A discussion of the Defendants' progress in satisfying its obligations in connection with the Lead Abatement SEP under Section VIII including, at a minimum, a narrative description of activities undertaken; the status of any construction or compliance measures, including the completion of any milestones; and a summary of costs incurred since the previous report;
- (6) The specific content required by the following sub-Paragraphs of this Section; and
- (7) Any additional matters that either Defendant believes should be brought to the attention of EPA and Ohio.

b. Reporting regarding CEMS Downtime Minimization, O&M, and Corrective Actions. Each Semi-Annual Report shall contain the following information:

- (1) For each CEMS at the Toledo Refinery, a calculation of the total amount of time per calendar quarter that the CEMS is not in

continuous operation (“downtime”). This calculation must be expressed as a percentage of the operating time of the process unit(s) being monitored; and

- (2) For each CEMS that is not in continuous operation for at least 95 percent of the total operating time of the process unit(s) being monitored per calendar quarter, a listing of the times and dates for the periods when the CEMS was inoperative as well as an explanation of the cause(s) of the downtime (such as maintenance or malfunction). If the cause of the downtime included a malfunction, the Semi-Annual Report must include an explanation and a description of any corrective action(s) taken.

c. Reporting regarding LDAR Program. The date that the annual “Compliance Status Report” required by LDAR Appendix A, Part N, Paragraphs 34-36 was submitted to EPA shall be referenced in the Semi-Annual Reports.

d. Notification of Non-Compliance. Each Semi-Annual Report shall also include a description of any non-compliance with the requirements of this Consent Decree and an explanation of the violation’s likely cause and of the remedial steps taken, or to be taken, to prevent or minimize such violation.

65. Each Semi-Annual Report shall be submitted to the persons designated in Section XIX (Notices).

66. Each Semi-Annual Report submitted by the Defendants under this Section shall be signed by an official of each submitting party and must include the Certification Statement required in Paragraph 133.

67. Reporting regarding EPCRA/CERCLA Compliance Requirements. The Defendants shall submit any written follow-up report prepared under EPCRA Section 304(c), 42 U.S.C. § 11004(c), at the same time that the written follow-up report is submitted to the State Emergency Response Commission and the Local Emergency Planning Committee for the Toledo Refinery. These written follow-up reports shall be submitted to: James Entzminger, U.S. EPA,

77 West Jackson Boulevard, Chicago, IL 60604, and may be submitted electronically to:  
entzminger.james@epa.gov.

68. The reporting requirements of this Consent Decree do not relieve either Defendant of any reporting obligations required by the Clean Air Act, EPCRA, CERCLA, or any implementing regulations of those statutes, or by any other federal, state, or local law, regulation, permit, or other requirement.

69. Any information provided pursuant to this Consent Decree may be used by the United States in any proceeding to enforce the provisions of this Consent Decree and as otherwise permitted by law.

#### **X. STIPULATED PENALTIES**

70. The Defendants shall be jointly and severally liable for stipulated penalties to the United States and Ohio for violations of this Consent Decree as specified below, unless excused under Section XIII (Force Majeure). A violation includes failing to perform any obligation required by the terms of this Decree, including any work plan or schedule approved under this Decree, according to all applicable requirements of this Decree and within the specified time schedules established by or approved under this Decree. For those provisions where a stipulated penalty of either a fixed amount or 1.2 times the economic benefit of delayed compliance is available, the decision of which alternative to seek rests exclusively within the discretion of the United States.

71. Late Payment of Civil Penalty. If the Defendants fail to pay the civil penalty required to be paid under Section V (Civil Penalty) when due, the Defendants shall pay a stipulated penalty of \$15,000 per Day for each Day that the payment is late plus interest on the amount overdue at the rate specified in 28 U.S.C. § 1961(a).

72. Stipulated Penalties for CEMS Downtime Minimization, O&M, and Corrective Action Requirements. The following stipulated penalties shall accrue per Day for each violation of the following requirements:

- a. For failing to timely develop, submit, and/or implement any requirement of the CEMS O&M Plan required by Paragraph 22:

<u>Period of Delay or Non-Compliance</u>	<u>Penalty per Violation per Day</u>
1 <sup>st</sup> through 30 <sup>th</sup> Day after deadline	\$200
31 <sup>st</sup> through 60 <sup>th</sup> Day after deadline	\$1,000
Beyond 60 <sup>th</sup> Day after deadline	\$2,000

- b. For failing to timely conduct a CEMS Root Cause Failure Analysis required by Paragraph 23: \$5,000 per month overdue, per analysis.

- c. For failing to timely develop or implement any corrective actions identified in the findings of a CEMS Root Cause Failure Analysis, as required by Paragraphs 24 and 26, or in the findings of a CEMS third party evaluation, as required by Paragraph 25:

<u>Period of Delay or Non-Compliance</u>	<u>Penalty per Violation per Day</u>
1 <sup>st</sup> through 30 <sup>th</sup> Day after deadline	\$1,250
31 <sup>st</sup> through 60 <sup>th</sup> Day after deadline	\$3,000
Beyond 60 <sup>th</sup> Day after deadline	\$5,000

- d. For failing to timely perform the CEMS third party evaluation required by Paragraph 25: \$10,000 per month overdue.

73. Stipulated Penalties for Leak Detection and Repair Program Requirements. The following stipulated penalties shall accrue per violation per Day, unless otherwise specified below, for each violation of a requirement of the LDAR Program as set forth in Section VI.B of this Consent Decree (“Leak Detection and Repair Program”) and Appendix A (“LDAR Program”):

- a. For failing to timely develop and complete a written facility-wide LDAR Program plan, or to timely update the LDAR Program plan in accordance with the requirements of Paragraph 3 of Appendix A:

<u>Period of Delay or Non-Compliance</u>	<u>Penalty per Day</u>
1 <sup>st</sup> through 15 <sup>th</sup> Day after deadline	\$300
16 <sup>th</sup> through 30 <sup>th</sup> Day after deadline	\$400
Beyond 30 <sup>th</sup> Day after deadline	\$500

- b. For failing to timely perform monitoring at the frequencies set forth in Paragraph 4 or 5 of Appendix A: \$100 per component per Day, but no more than \$25,000 per month.
- c. For failing to comply with Method 21 (or the Alternative Work Practice (“AWP”), as applicable) in performing LDAR monitoring, as indicated by the leak percentage ratio calculated under Paragraph 29.c. of Appendix A, but only if the auditor identifies a leak rate of at least 0.5 percent per component type in the process unit:

<u>Comparative Monitoring Leak Ratio As Determined Under Paragraph 29.c. of the LDAR Program</u>	<u>Penalty per Process Unit</u>
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3.0 or greater but less than 4.0	\$15,000
4.0 or greater but less than 5.0	\$30,000
5.0 or greater but less than 6.0	\$45,000
6.0 or greater	\$60,000

- d. For failing to: (i) use a monitoring device that is attached to a data logger, and/or (ii) failing, during each monitoring event, to directly electronically record the Screening Value, date, time, identification number of the monitoring equipment, or the identification of the technician, in accordance with the requirements of Paragraph 6 of Appendix A: \$100 per failure per piece of Covered Equipment, but not greater than \$5,000 per unit per month.
- e. For failing to transfer monitoring data to an electronic database on at least a weekly basis, in accordance with the requirements of Paragraph 6 of Appendix A: \$150 per Day for each Day that the transfer is late.
- f. For failing to timely perform calibrations of LDAR monitoring equipment in accordance with the requirements of Paragraph 7 of Appendix A: \$100 per failure per piece of monitoring equipment.
- g. For failing to conduct timely re-monitoring of components in accordance with the requirements of Paragraph 7 of Appendix A: \$200 per Day per piece of monitoring equipment not re-monitored.



- h. For failing to timely perform a first attempt at repair or initial attempt at repair in accordance with the requirements of Paragraph 11 or 12 of Appendix A. For purposes of this sub-Paragraph, the term “repair” includes the required Repair Verification Monitoring in Paragraph 13 of Appendix A after the first repair attempt (in which case the stipulated penalties of Consent Decree Paragraph 73.j do not apply): \$150 per Day for each Day after deadline, not to exceed \$1,500 per leak.
  
- i. For failing to timely perform a final attempt at repair in accordance with the requirements of Paragraph 12 of Appendix A. For purposes of this sub-Paragraph, the term “repair” includes the required Repair Verification Monitoring in Paragraph 13 of Appendix A after the first repair attempt (in which case the stipulated penalties of Consent Decree Paragraph 73.j do not apply):

<u>Equipment Type</u>	<u>Penalty per Day, per Component</u>	<u>Not to Exceed per Component</u>
Valves	\$300	\$27,500
Pumps	\$1,200	\$108,000

- j. For failing to timely perform Repair Verification Monitoring, in accordance with the requirements of Paragraph 13 of Appendix A, where the first attempt to repair was made within 5 Days and the final attempt to repair was made within 15 Days:

<u>Equipment Type</u>	<u>Penalty per Day, per Component</u>	<u>Not to Exceed per Component</u>
Valves	\$250	\$18,750
Pumps	\$1,000	\$75,000

- k. For failing to undertake drill-and-tap repairs in accordance with the requirements of Paragraph 14 of Appendix A:

<u>Period of Delay or Non-Compliance</u>	<u>Penalty per Day per Valve</u>
1 <sup>st</sup> through 15 <sup>th</sup> Day after deadline	\$200
16 <sup>th</sup> through 30 <sup>th</sup> Day after deadline	\$350
Beyond 30 <sup>th</sup> Day after deadline	\$500, not to exceed \$37,500

- l. For failing to record the information required by Paragraph 15 of Appendix A: \$100 per component, per item of missed information.

- m. For improperly placing a piece of Covered Equipment on the delay of repair (“DOR”) list (*i.e.*, placing a piece of Covered Equipment on the DOR list even though it is feasible to repair without a process unit shutdown), as prohibited by Paragraph 17 of Appendix A:

<u>Equipment Type</u>	<u>Penalty per Day, per Component</u>	<u>Not to Exceed per Component</u>
Valves	\$300	\$75,000
Pumps	\$1,200	\$150,000

- n. For a failure of the relevant manager or official to sign-off on placing a piece of Covered Equipment on the DOR list in accordance with the requirements of Paragraph 17.a of Appendix A, and/or failure to perform

periodic monitoring in accordance with the requirements of Paragraph 17.b of Appendix A: \$250 per piece of Covered Equipment.

- o. For failing to comply with the 0.10 percent limit on valves that may be placed on the DOR list in accordance with the requirements of Paragraph 17.c of Appendix A: \$5,000 per valve that exceeds the 0.10 percent limit.
- p. For failing to install a Certified Low-Leaking Valve or to fit a valve with Certified Low-Leaking Valve Packing in accordance with the requirements of Paragraph 19 of Appendix A: \$1,000 per valve required by Paragraphs 19.a – 19.c of Appendix A and \$5,000 per valve required by Paragraph 19.d of Appendix A.
- q. For failing to add a piece of Covered Equipment to the LDAR program in accordance with the requirements of Paragraph 23 of Appendix A: \$300 per piece of Covered Equipment (plus an amount, if any, due under Paragraph 73.b of the Consent Decree for any missed monitoring for each component that should have been added to the LDAR program).
- r. For failing to remove a piece of Covered Equipment from the LDAR program in accordance with the requirements of Paragraph 23 of Appendix A: \$150 per piece of Covered Equipment.
- s. For failing to timely develop a training protocol in accordance with the requirements of Paragraph 24 of Appendix A: \$50 per Day of noncompliance.

- t. For failing to perform initial, refresher, or new personnel training in accordance with the requirements of Paragraph 24 of Appendix A: \$1,000 per person, per month of noncompliance.
- u. For failing of a monitoring technician to complete the certification required by Paragraph 25 of Appendix A: \$100 per failure, per technician.
- v. For failing to perform any of the requirements of Paragraph 26 of Appendix A: \$1,000 per missed requirement, per year.
- w. For failing to conduct an LDAR audit in accordance with the schedule set forth in Paragraph 28 of Appendix A:

<u>Period of Delay or Non-Compliance</u>	<u>Penalty per Day</u>
1 <sup>st</sup> through 15 <sup>th</sup> Day after deadline	\$300
16 <sup>th</sup> through 30 <sup>th</sup> Day after deadline	\$400
Beyond 30 <sup>th</sup> Day after deadline	\$500, not to exceed \$100,000 per audit

- x. For failing to use a third-party auditor, or for using a third-party auditor that is not experienced in LDAR audits in accordance with the requirements of Paragraph 28 of Appendix A: \$25,000 per audit.
- y. For failing to comply with the requirements in Paragraph 29 of Appendix A (except for Paragraphs 29.a-c of Appendix A): \$10,000 per missed requirement, not to exceed \$100,000 per audit.
- z. For failing to comply with the requirements of Paragraphs 29.a-c of Appendix A: \$50,000 per audit.

- aa. For failing to timely develop and/or submit a Corrective Action Plan in accordance with the requirements of by Paragraph 31 of Appendix A:

<u>Period of Delay or Non-Compliance</u>	<u>Penalty per Day</u>
1 <sup>st</sup> through 15 <sup>th</sup> Day after deadline	\$100
16 <sup>th</sup> through 30 <sup>th</sup> Day after deadline	\$250
Beyond 30 <sup>th</sup> Day after deadline	\$500, not to exceed \$50,000 per audit

- bb. For failing to implement corrective action within ninety (90) Days after the LDAR Audit Completion Date or pursuant to the approved schedule in accordance with the requirements of Paragraph 31 of Appendix A:

<u>Period of Delay or Non-Compliance</u>	<u>Penalty per Day</u>
1 <sup>st</sup> through 15 <sup>th</sup> Day after deadline	\$500
16 <sup>th</sup> through 30 <sup>th</sup> Day after deadline	\$750
Beyond 30 <sup>th</sup> Day after deadline	\$1,000, not to exceed \$100,000 per audit

- cc. For failing to timely submit a Certification of Compliance, as required by Paragraph 32 of Appendix A:

<u>Period of Delay or Non-Compliance</u>	<u>Penalty per Day</u>
1 <sup>st</sup> through 15 <sup>th</sup> Day after deadline	\$100
16 <sup>th</sup> through 30 <sup>th</sup> Day after deadline	\$250
Beyond 30 <sup>th</sup> Day after deadline	\$500, not to exceed \$100,000 per audit

- dd. For failing to follow the process for determining the availability of Certified Low-Leaking Valve or Certified Low-Leaking Valve Packing Technology in accordance with the requirements of Paragraph 38 of

Appendix A: \$100 per missed requirement.

74. Stipulated Penalties for NSPS QQQ Audits and Corrective Action Requirements.

The following stipulated penalties shall accrue per Day for each violation of the following requirements:

- a. For failing to complete the QQQ Audit by the specified deadlines in Paragraph 29:

<u>Period of Delay or Non-Compliance</u>	<u>Penalty per Violation per Day</u>
1 <sup>st</sup> through 30 <sup>th</sup> Day after deadline	\$1,500
31 <sup>st</sup> through 60 <sup>th</sup> Day after deadline	\$2,500
Beyond 60 <sup>th</sup> Day after deadline	\$5,000

- b. For failing to submit the QQQ Audit Report by the specified deadlines in Paragraph 32 and/or failing to submit a corrective action plan or progress reports as required by Paragraph 33:

<u>Period of Delay or Non-Compliance</u>	<u>Penalty per Violation per Day</u>
1 <sup>st</sup> through 30 <sup>th</sup> Day after deadline	\$750
31 <sup>st</sup> through 60 <sup>th</sup> Day after deadline	\$1,500
Beyond 60 <sup>th</sup> Day after deadline	\$2,500

- c. For failing to complete any project identified in a corrective action plan in accordance with the implementation schedule, as required by Paragraph 33:

<u>Period of Delay or Non-Compliance</u>	<u>Penalty per Violation per Day</u>
1 <sup>st</sup> through 30 <sup>th</sup> Day after deadline	\$1,500
31 <sup>st</sup> through 60 <sup>th</sup> Day after deadline	\$2,500
Beyond 60 <sup>th</sup> Day after deadline	\$5,000

- d. For failing to complete the semi-annual inspections or complete necessary repairs as required by Paragraph 36:

<u>Period of Delay or Non-Compliance</u>	<u>Penalty per Missed Inspection/Missed Repair per Day</u>
1 <sup>st</sup> through 30 <sup>th</sup> Day after deadline	\$750
31 <sup>st</sup> through 60 <sup>th</sup> Day after deadline	\$1,500
Beyond 60 <sup>th</sup> Day after deadline	\$3,000

- e. BPH shall pay a stipulated penalty of \$75,000 with respect to all violations disclosed and corrected as part of the QQQ Audit Report. In the event that EPA determines that the economic benefit of non-compliance of violations disclosed and corrected as part of the QQQ Audit Reports exceeds \$75,000, BPH shall be liable for an additional stipulated penalty equal to the difference between such economic benefit and \$75,000 within 30 Days of receiving EPA's written notification of its determination.

75. Stipulated Penalties for EPCRA/CERCLA Reporting and Audit Requirements.

The following stipulated penalties shall accrue per Day for each violation of the following requirements:

- a. For failing to maintain the Pollution Incident Notification Form so that it explicitly requires immediate reporting of reportable quantity releases,

including releases that occur during startup and shutdown events, as required by Paragraph 39:

<u>Period of Delay or Non-Compliance</u>	<u>Penalty per Violation per Day</u>
1 <sup>st</sup> through 30 <sup>th</sup> Day after deadline	\$750
31 <sup>st</sup> through 60 <sup>th</sup> Day after deadline	\$1,500
Beyond 60 <sup>th</sup> Day after deadline	\$3,000

- b. For failing to complete the EPCRA/CERCLA Audit by the specified deadline and/or failing to complete the EPCRA/CERCLA Audit in accordance with all requirements of Paragraph 41:

<u>Period of Delay or Non-Compliance</u>	<u>Penalty per Violation per Day</u>
1 <sup>st</sup> through 30 <sup>th</sup> Day after deadline	\$1,500
31 <sup>st</sup> through 60 <sup>th</sup> Day after deadline	\$2,500
Beyond 60 <sup>th</sup> Day after deadline	\$5,000

76. Environmental Mitigation. If the Defendants fail to satisfactorily complete the requirements of Section VII by the deadlines set forth therein, the Defendants must pay the following stipulated penalties:

- a. For failing to comply with the NSPS Subpart Ja requirements for sulfur recovery plants as required by Paragraph 43:



<u>Period of Delay or Non-Compliance</u>	<u>Penalty per Violation per Day</u>
1 <sup>st</sup> through 30 <sup>th</sup> Day after deadline	\$1,000
31 <sup>st</sup> through 60 <sup>th</sup> Day after deadline	\$1,500
Beyond 60 <sup>th</sup> Day after deadline	\$2,000

b. For failing to operate the SRP, TGTUs, sulfur pits, and supplemental control devices on the SRP in accordance with 40 C.F.R. § 60.11(d), at all times, as required by Paragraph 46:

<u>Period of Delay or Non-Compliance</u>	<u>Penalty per Violation per Day</u>
1 <sup>st</sup> through 30 <sup>th</sup> Day after deadline	\$500
31 <sup>st</sup> through 60 <sup>th</sup> Day after deadline	\$1,500
Beyond 60 <sup>th</sup> Day after deadline	\$2,000

77. SEP Compliance. If the Defendants fail to satisfactorily complete the Lead Abatement SEP by the deadline(s) set forth in Section VIII, the Defendants shall pay stipulated penalties for each Day for which they fail to satisfactorily complete the Lead Abatement SEP, as follows:

<u>Period of Delay or Non-Compliance</u>	<u>Penalty per Violation per Day</u>
1 <sup>st</sup> through 30 <sup>th</sup> Day after deadline	\$1,000
31 <sup>st</sup> through 60 <sup>th</sup> Day after deadline	\$3,500
Beyond 60 <sup>th</sup> Day after deadline	\$5,000

78. Reporting Requirements. The following stipulated penalties shall accrue per violation per Day for each violation of the reporting requirements of Section IX:

<u>Period of Delay or Noncompliance</u>	<u>Penalty per Violation per Day</u>
1 <sup>st</sup> through 30 <sup>th</sup> Day after deadline	\$200
30 <sup>th</sup> through 60 <sup>th</sup> Day after deadline	\$500
Beyond the 60 <sup>th</sup> Day after deadline	\$1,000

79. Incorporation of Consent Decree Requirements into Federally Enforceable Permits. For each failure to timely submit an application to incorporate Consent Decree requirements into relevant local, state, and/or federal permits as required by Paragraph 89:

<u>Period of Delay or Non-Compliance</u>	<u>Penalty per Violation per Day</u>
1 <sup>st</sup> through 30 <sup>th</sup> Day after deadline	\$500
31 <sup>st</sup> through 60 <sup>th</sup> Day after deadline	\$1,500
Beyond 60 <sup>th</sup> Day after deadline	\$3,000

80. Stipulated penalties under this Section shall begin to accrue on the Day after performance is due or on the Day a violation occurs, whichever is applicable, and shall continue to accrue until performance is satisfactorily completed or until the violation ceases. Stipulated penalties may accrue simultaneously for separate violations of this Consent Decree.

81. Except as provided in Paragraph 83, the Defendants shall pay stipulated penalties within thirty (30) Days of receiving a written demand by the United States. The United States shall simultaneously send a copy of a demand for payment of a stipulated penalty to the State. The Defendants shall pay 100 percent of the total stipulated penalty amount due to the United States, except for violations of Section VI.A (CEMS Downtime Minimization, O&M, and Corrective Actions), in which case the Defendants shall pay 50 percent of the total stipulated penalty amount due to the United States and 50 percent to the State.

82. The United States may, in the unreviewable exercise of its discretion, reduce or waive stipulated penalties otherwise due to it under this Consent Decree. Solely with respect to stipulated penalties for violations of Section VI.A (CEMS Downtime Minimization, O&M, and Corrective Actions), either Plaintiff may, in the unreviewable exercise of its discretion, reduce or waive stipulated penalties otherwise due to that Plaintiff under this Consent Decree.

83. Stipulated penalties shall continue to accrue, as provided in Paragraph 80, during any Dispute Resolution, but need not be paid until the following:

- a. If the dispute is resolved by agreement or by a decision of EPA or (for violations of Section VI.A (CEMS Downtime Minimization, O&M, and Corrective Actions)) Ohio that is not appealed to the Court, the Defendants shall pay accrued penalties determined to be owing, together with interest, to the United States or Ohio within thirty (30) Days of the effective date of the agreement or the receipt of EPA's or Ohio's decision or order.
- b. If the dispute is appealed to the Court and the United States or Ohio prevails in whole or in part, the Defendants shall pay all accrued penalties determined by the Court to be owing, together with interest, within sixty (60) Days of receiving the Court's decision or order, except as provided in sub-Paragraph c, below.
- c. If any Party appeals the District Court's decision, the Defendants shall pay all accrued penalties determined to be owing, together with interest, within 15 Days of receiving the final appellate court decision.

84. BPH shall pay stipulated penalties owing to the United States in the manner set forth in Paragraph 17 and with the confirmation notices required by Paragraph 18, except that the transmittal letter shall state that the payment is for stipulated penalties and shall state for which violation(s) the penalties are being paid.

85. The Defendants shall pay stipulated penalties owing to Ohio in the manner set forth in Paragraph 19. The payment shall be accompanied by a letter stating the case number and an explanation of the violation(s) for which the penalties are being paid.

86. If the Defendants fail to pay stipulated penalties according to the terms of this Consent Decree, the Defendants shall be liable for interest on such penalties, as provided for in 28 U.S.C. § 1961, accruing as of the date payment became due. Nothing in this Paragraph shall be construed to limit the United States or Ohio from seeking any remedy otherwise provided by law for Defendants' failure to pay any stipulated penalties.

87. Subject to the provisions of Section XVI (Effect of Settlement/Reservation of Rights), the stipulated penalties provided for in this Consent Decree shall be in addition to any other rights, remedies, or sanctions available to the United States and/or Ohio (including, but not limited to, statutory penalties, additional injunctive relief, mitigation or offset measures, and/or contempt) for the Defendants' violation(s) of this Consent Decree or applicable law. Where a violation of this Consent Decree is also a violation of the Clean Air Act, EPCRA, CERCLA, comparable provisions of state law, or any implementing regulations of those statutes, the Defendants shall be allowed a credit, for any stipulated penalties paid, against any statutory penalties imposed for such violation(s).

## **XI. PERMITS**

88. Permits Required for Compliance Obligations. The Defendants shall obtain all required federal, state, and local permits necessary for performing any compliance obligation under this Consent Decree and the SEP, including, without limitation, permits for the construction of pollution control technology and the installation of equipment at the Toledo Refinery. The Defendants may seek relief under the provisions of Section XIII (Force Majeure) of this Consent Decree for any delay in the performance of any such obligation resulting from a failure to obtain, or a delay in obtaining, any permit or approval required to fulfill such obligation if the Defendants have submitted timely and complete applications and have taken all other actions necessary to obtain such permit(s) or approval(s). If the Defendants fail to submit a timely or complete permit application, the Defendants will be barred from asserting a claim under Section XIII (Force Majeure) of the Consent Decree that is based on delays in receiving necessary permits.

89. Permits to Ensure Survival of Consent Decree Limits and Standards after Termination of Consent Decree. Before the Defendants may seek to terminate this Consent Decree, they must complete and submit appropriate applications to the preconstruction (or other federally enforceable Title I permit) and Title V Clean Air Act permitting programs for the Ohio Environmental Protection Agency's Division of Air Pollution Control. The required federally enforceable Title I permit includes, but is not limited to, a Permit-to-Install under O.A.C. Rule 3745-31-05(D). These applications shall request incorporation of the following requirements into federally enforceable Title I and Title V permit(s) for the Toledo Refinery such that the following requirements: (i) become "applicable requirements" as that term is defined in 40

C.F.R. § 70.2; (ii) are incorporated into federally enforceable Title V permits for the Toledo Refinery; and (iii) survive the termination of this Consent Decree:

- a. Each “process unit” (as defined by 40 C.F.R. § 60.590a(e)) at the Toledo Refinery shall be an “affected facility” for purposes of 40 C.F.R. Part 60, Subpart GGGa, and shall be subject to and comply with the requirements of Subpart GGGa no later than one year from the Effective Date;
- b. Each individual drain system, oil-water separator, and aggregate facility (as defined by 40 C.F.R. § 60.691) at the Toledo Refinery that the Defendants identify as being subject to NSPS Subpart QQQ either before the Date of Lodging or as a result of the audit required by Section VI.C (*NSPS QQQ Audit and Corrective Actions*) Paragraph 29(a)-(b) (accepting NSPS QQQ applicability for affected facilities and NSPS QQQ control requirements) and Paragraph 31 (stipulating to NSPS QQQ applicability) shall be an “affected facility” for purposes of 40 CFR Part 60, Subpart QQQ;
- c. The SRP, including the three Sulfur Pits, SRUs 1-3, TGTU 1, and TGTU 2, shall be designated as an “affected facility” for purposes of 40 C.F.R. Part 60, Subparts A and Ja, for all pollutants applicable to SRP, and shall be subject to and comply with all applicable requirements of 40 C.F.R. Part 60, Subparts A and Ja; and
- d. All of Section XII (*Emission Credit Generation*).

90. This Consent Decree shall not terminate until:

- a. The requirements set forth in Paragraph 89 are incorporated into a federally enforceable Title I permit including, but not limited to, a Permit-to-Install under O.A.C. Rule 3745-31-05(D), and
- b. The Defendants submit appropriate applications to the Ohio Environmental Protection Agency’s Division of Air Pollution Control to incorporate the requirements set forth in Paragraph 89 and in the federally

enforceable Title I permit into federally enforceable Title V operating permits for the Toledo Refinery.

91. Following submission of the complete permit applications, the Defendants shall cooperate with Ohio by promptly submitting all information that the State seeks following its receipt of the permit application.

92. Requirements incorporated into Title V operating permits or other operating permits pursuant to Paragraph 89 shall survive termination of this Consent Decree.

93. The permit applications and process of incorporating the requirements of this Consent Decree into Title V permits shall be in accordance with State Title V rules, including applicable administrative amendment provisions of such rules.

94. For any permit applications required by this Section XI that are filed after the Effective Date of this Consent Decree, the Defendants shall submit to EPA and Ohio, in the manner set forth in Section XIX (Notices), a copy of each application, as well as a copy of any permit proposed as a result of such application, to allow for timely participation in any public comment process. If, as of the Effective Date, the Defendants have already received any permit necessary to implement the requirements of this Consent Decree, then no later than thirty (30) Days after the Effective Date, the Defendants shall submit copies of such permits to EPA and Ohio in the manner set forth in Section XIX (Notices).

## **XII. EMISSION CREDIT GENERATION**

95. Prohibition on Use or Sale of Emission Credits and Offsets.

- a. The Defendants shall not use, purchase, or otherwise obtain any netting credits or emission offsets in order to comply with any requirement of the

Consent Decree.

- b. The Defendants shall not use any CD Emissions Reductions for the purpose of applying for or obtaining netting credits or emissions offsets in any Prevention of Significant Deterioration (“PSD”), non-attainment New Source Review (“NSR”), and/or minor NSR permit or permit proceeding for the Toledo Refinery. In any PSD, non-attainment NSR, and/or minor NSR permit or permit proceeding for the Toledo Refinery, baseline actual emissions during any 24-month period selected by the Defendants shall be adjusted downward to exclude any portion of the baseline emissions that would have been eliminated as: (i) CD Emissions Reductions had the Defendants been complying with this Consent Decree during that 24-month period, and (ii) emission reductions resulting from the compliance requirements of the 2001 Consent Decree, except as authorized pursuant to the 2001 Consent Decree.
- c. The Defendants shall not sell or trade any CD Emissions Reductions.

96. Outside the Scope of the Prohibition. Notwithstanding the prohibitions in the preceding Paragraph, nothing in this Section is intended to prohibit the Defendants from seeking to:

- a. Use or generate netting credits or emissions offsets from Refinery units that are covered by this Consent Decree to the extent that the proposed credits or reductions represent the difference between an emissions limitation required by this Consent Decree and a more stringent emissions limitation that the Defendants may elect to accept for these Refinery units in a permitting process. Provided,



however, that this sub-Paragraph is not an exception to the prohibition contained in the preceding Paragraph. Furthermore, any netting credits or emissions offsets allowed under this sub-Paragraph may be used only at the Toledo Refinery; or

b. Use or generate netting credits or emissions offsets from Refinery units that are not subject to an emission limitation pursuant to this Consent Decree; provided that such netting credits or emissions offsets were not generated from any project conducted pursuant to the 2001 Consent Decree; or

c. Use emissions reductions pursuant to this Consent Decree for the Toledo Refinery's compliance with any rules or regulations designed to address regional haze or the non-attainment status of any area (excluding PSD and Non-Attainment NSR Rules, but including, for example, Reasonably Available Control Technology ("RACT") rules) that apply to the Toledo Refinery; provided that the Defendants will not trade or sell any CD Emissions Reductions.

### **XIII. FORCE MAJEURE**

97. "*Force majeure*," for purposes of this Consent Decree, is defined as any event arising from causes beyond the control of the Defendants, any entity controlled by the Defendants, or the Defendants' contractors that delays or prevents the performance of any obligation under this Consent Decree despite the Defendants' best efforts to fulfill the obligation. The requirement that the Defendants exercise "best efforts to fulfill the obligation" includes using best efforts to anticipate any potential *force majeure* event and best efforts to address the effects of any potential *force majeure* event: (a) as it is occurring and (b) following the potential *force majeure*, such that the delay and any adverse effects of the delay are minimized. "*Force*

*Majeure*” does not include the Defendants’ financial inability to perform any obligation under this Consent Decree.

98. If any event occurs or has occurred that may delay or prevent the performance of any obligation under this Consent Decree, whether or not caused by a *force majeure* event, the Defendants shall notify EPA and Ohio in writing as soon as practicable, but in no event later than fifteen (15) Days following the date the Defendants first knew, or by the exercise of due diligence should have known, that the event caused or may cause such delay. The notice shall include an explanation and description of the reasons for the delay or inability to perform; the anticipated duration of the delay; all actions taken or to be taken to prevent or minimize the delay or inability to perform; a schedule for implementing any measures that will be taken to prevent or mitigate the inability to perform, the delay, or the effect of the delay; Defendants’ rationale for attributing such delay or inability to perform to a *force majeure* event if it intends to assert such a claim; and a statement as to whether, in the opinion of the Defendants, such event may cause or contribute to an endangerment to public health, welfare, or the environment. The Defendants shall include with any notice all available documentation supporting the claim that the delay was attributable to a *force majeure*. Failure to comply with the above requirements shall preclude the Defendants from asserting any claim of *force majeure* for that event for the period of time of such failure to comply, and for any additional delay caused by such failure. The Defendants shall be deemed to know of any circumstance of which the Defendants, any entity controlled by the Defendants, or the Defendants’ contractors knew or should have known.

99. If EPA, after a reasonable opportunity for review and comment by Ohio, agrees that the delay or anticipated delay is attributable to a *force majeure* event, the time for performance of the obligations under this Consent Decree that are affected by the *force majeure*

event shall be extended by EPA, after a reasonable opportunity for review and comment by Ohio, for such time as is necessary to complete those obligations. An extension of the time for performance of the obligations affected by the *force majeure* event shall not, of itself, extend the time for performance of any other obligation. EPA will notify the Defendants in writing of the length of the extension, if any, for performing the obligations affected by the *force majeure* event.

100. If EPA, after a reasonable opportunity for review and comment by Ohio, does not agree that the delay or anticipated delay has been or will be caused by a *force majeure* event, EPA will notify the Defendants in writing of its decision.

101. If the Defendants elect to invoke the dispute resolution procedures set forth in Section XIV (Dispute Resolution), it shall do so by no later than fifteen (15) Days after receiving EPA's notice pursuant to Paragraph 99 or 100. In any such proceeding, the Defendants shall have the burden of demonstrating by a preponderance of the evidence that the delay or anticipated delay has been or will be caused by a *force majeure* event, that the duration of the delay or the extension sought was or will be warranted under the circumstances, that best efforts were exercised to avoid and mitigate the effects of the delay, and that the Defendants complied with the requirements of Paragraphs 97 and 98. If the Defendants carry this burden, the delay at issue shall be deemed not to be a violation by the Defendants of the affected obligation of this Consent Decree identified to EPA and the Court.

#### **XIV. DISPUTE RESOLUTION**

102. Unless otherwise expressly provided for in this Consent Decree, the dispute resolution procedures of this Section shall be the exclusive mechanism to resolve disputes arising under or with respect to this Consent Decree. The Defendants' failure to seek resolution of a

dispute under this Section shall preclude the Defendants from raising any such issue as a defense to an action by the United States to enforce any obligation of the Defendants arising under this Decree.

103. Informal Dispute Resolution. Any dispute subject to Dispute Resolution under this Consent Decree shall first be the subject of informal negotiations. The dispute shall be considered to have arisen when the Defendants send the United States a written Notice of Dispute. Such Notice of Dispute shall state clearly the matter in dispute. The period of informal negotiations shall not exceed sixty (60) Days from the date the dispute arises, unless that period is modified by written agreement. If the Parties cannot resolve a dispute by informal negotiations, then the position advanced by the United States shall be considered binding unless, within thirty (30) Days after the conclusion of the informal negotiation period, the Defendants invoke the formal dispute resolution procedures set forth below.

104. Formal Dispute Resolution. The Defendants shall invoke formal dispute resolution procedures, within the time period provided in the preceding Paragraph, by serving on the United States a written Statement of Position regarding the matter in dispute. The Statement of Position shall include, but need not be limited to, any factual data, analysis, or opinion supporting Defendants' position and any supporting documentation relied upon by the Defendants.

105. The United States shall serve its Statement of Position within forty-five (45) Days of receipt of Defendants' Statement of Position. The United States' Statement of Position shall include, but need not be limited to, any factual data, analysis, or opinion supporting that position and any supporting documentation relied upon by the United States. The United States'

Statement of Position shall be binding on the Defendants, unless the Defendants file a motion for judicial review of the dispute in accordance with the following Paragraph.

106. The Defendants may seek judicial review of the dispute by filing with the Court and serving on the United States, in accordance with Section XIX (Notices), a motion requesting judicial resolution of the dispute. The motion must be filed within twenty (20) Days of receipt of the United States' Statement of Position pursuant to the preceding Paragraph. The motion shall contain a written statement of the Defendants' position on the matter in dispute, including any supporting factual data, analysis, opinion, or documentation, and shall set forth the relief requested and any schedule within which the dispute must be resolved for orderly implementation of the Consent Decree.

107. The United States shall respond to the Defendants' motion within the time period allowed by the Local Rules of this Court. The Defendants may file a reply memorandum, to the extent permitted by the Local Rules.

108. Standard of Review. Except as provided in Paragraph 141, in all disputes arising under this Consent Decree, the Defendants shall bear the burden of demonstrating that their position complies with this Consent Decree, better furthers the objectives of the Consent Decree, and that they are entitled to relief. The United States reserves the right to argue that its position is reviewable only on the administrative record and must be upheld unless arbitrary and capricious or otherwise not in accordance with law. The Defendants reserve the right to argue the contrary.

109. The invocation of dispute resolution procedures under this Section shall not, by itself, extend, postpone, or affect in any way any obligation of the Defendants under this Consent Decree, unless and until final resolution of the dispute so provides. Stipulated penalties with

respect to the disputed matter shall continue to accrue from the first Day of noncompliance, but payment shall be stayed pending resolution of the dispute as provided in Paragraph 83. If the Defendants do not prevail on the disputed issue, stipulated penalties shall be assessed and paid as provided in Section X (Stipulated Penalties).

**XV. INFORMATION COLLECTION AND RETENTION**

110. The United States, the State, and their representatives, including attorneys, contractors, and consultants, shall have the right of entry into the Toledo Refinery, at all reasonable times, upon presentation of credentials, to:

- a. monitor the progress of activities required under this Consent Decree;
- b. verify any data or information submitted to the United States or the State in accordance with the terms of this Consent Decree;
- c. obtain samples and, upon request, splits of any samples taken by the Defendants or their representatives, contractors, or consultants;
- d. obtain documentary evidence, including photographs and similar data; and
- e. assess Defendants' compliance with this Consent Decree.

111. Until one (1) year after the date of Termination under Section XXIII of this Decree, unless applicable regulations require the records to be maintained longer, the Defendants shall retain, and shall instruct their contractors and agents to preserve, all non-identical copies of all documents, records, or other information (including documents, records, or other information in electronic form) in their or their contractors' or agents' possession or control, or that come into their or their contractors' or agents' possession or control, and that relate in any manner to the Defendants' performance of their obligations under this Consent Decree. This information-retention requirement shall apply regardless of any contrary corporate or institutional policies or

procedures. At any time during this information-retention period, upon request by the United States or the State, the Defendants shall provide copies of any documents, records, or other information required to be maintained under this Paragraph.

112. At the conclusion of the information-retention period provided in the preceding Paragraph, the Defendants shall notify the United States and the State at least ninety (90) Days prior to the destruction of any documents, records, or other information subject to the requirements of the preceding Paragraph and, upon request by the United States or the State, the Defendants shall deliver any such documents, records, or other information to EPA or the State. The Defendants may assert that certain documents, records, or other information is privileged under the attorney-client privilege or any other privilege recognized by federal law. If the Defendants assert such a privilege, it shall provide the following: (a) the title of the document, record, or information; (b) the date of the document, record, or information; (c) the name and title of each author of the document, record, or information; (d) the name and title of each addressee and recipient; (e) a description of the subject of the document, record, or information; and (f) the privilege asserted by the Defendants. However, no documents, records, or other information created or generated pursuant to the requirements of this Consent Decree shall be withheld on grounds of privilege.

113. The Defendants may also assert that information required to be provided under this Section is protected as Confidential Business Information (“CBI”) under 40 C.F.R. Part 2. As to any information that the Defendants seek to protect as CBI, the Defendants must follow the procedures set forth in 40 C.F.R. Part 2.

114. This Consent Decree in no way limits or affects any right of entry and inspection, or any right to obtain information, held by the United States or the State pursuant to applicable

federal or state laws, regulations, or permits, nor does it limit or affect any duty or obligation of the Defendants to maintain documents, records, or other information imposed by applicable federal or state laws, regulations, or permits.

**XVI. EFFECT OF SETTLEMENT/RESERVATION OF RIGHTS**

115. This Consent Decree resolves the civil claims of the United States and the State for the violations alleged in the Complaint filed in this action through the Date of Lodging.

116. Resolution of Claims Alleged in Notices of Violation (“NOVs”) and Finding of Violation (“FOV”). Entry of this Consent Decree resolves the civil claims of the United States and the State for the violations that occurred through the Date of Lodging as alleged in the following NOVs and FOV:

- a. FOV – EPA-5-13-OH-4 (Dec. 27, 2012); and
- b. Ohio STARS2 NOVs:
  - i. 4087 (Nov. 30, 2007, March 4, 2008, and Oct. 6, 2008);
  - ii. 12501 (Jan. 14, 2013);
  - iii. 12500 (Feb. 26, 2014);
  - iv. 10642 (Feb. 17, 2015);
  - v. 10742 (May 19, 2015); and
  - vi. 11424 (July 14, 2016).

Copies of these NOVs and FOV are attached hereto in Appendix B.

117. Resolution of Claims under NSPS QQQ. Entry of this Consent Decree resolves the civil claims of the United States and the State of Ohio against the Defendants for the following violations of 40 C.F.R. Part 60, Subpart QQQ, as well as related violations of 40 C.F.R. Part 60, Subpart A:



- a. Violations at NSPS QQQ affected facilities at the Toledo Refinery that were disclosed to EPA by the Defendants in the Refinery's Title V Deviation Reports submitted before November 1, 2014, and
- b. Provided that the Defendants pay the stipulated penalty required in Paragraph 74.e and complete the corrective action plan required in Paragraph 33, violations disclosed in the QQQ Audit Report.

118. Resolution of LDAR violations. Entry of this Consent Decree resolves the civil claims of the United States and the State of Ohio against the Defendants for violations of the following that occurred from December 1, 2002 through the Date of Lodging at each process unit (as defined by 40 C.F.R. § 60.590a(e)) at the Toledo Refinery: (i) 40 C.F.R. Part 60, Subpart GGG and GGGa; (ii) 40 CFR Part 61, Subparts J and V; (iii) the LDAR provisions of 40 C.F.R. Part 63, Subpart CC; and (iv) Ohio Admin. Code §§ 3745-21-09(T) and 10(f).

119. Resolution of Title V violations. Entry of this Consent Decree resolves the civil claims of the United States and the State of Ohio against the Defendants for the violations at the Toledo Refinery of:

- a. Sections 502(a), 503(c), and 504(a) of the Clean Air Act, 42 U.S.C. §§ 7661a(a), 7661b(c), 7661c(a);
- b. 40 C.F.R. §§ 70.1(b), 70.5(a) and (b), 70.6(a) and (c), and 70.7(b); and
- c. the analogous provisions of Ohio Admin. Code § 3745-77.

Provided, however, that the resolution in this Paragraph is based upon, and limited to, the violations resolved by the preceding Paragraphs in this Section for the time frames set forth in those Paragraphs.

120. Resolution of 2001 Consent Decree violations. Payment of the stipulated penalties required under Paragraph 20 and the Court's granting of the motion to terminate the 2001 Consent Decree resolves the stipulated penalty claims of the United States against the Defendants for the following violations of the 2001 Consent Decree that occurred prior to the Date of Lodging at the Toledo Refinery:

- a. Violations of Paragraphs 14.B and 14.H.iii for exceeding the rolling 365-Day NO<sub>x</sub> limit and the carbon monoxide (CO) limit at the Toledo Refinery's FCCU; and
- b. Violations of Paragraphs 20.H. (LDAR Monitoring Frequency) and 20.O (Delay of Repair).

121. The United States and the State reserve all legal and equitable remedies available to enforce the provisions of this Consent Decree. This Consent Decree shall not be construed to limit the rights of the United States or the State to obtain penalties or injunctive relief under the Clean Air Act, EPCRA, CERCLA, or any of those statutes' implementing regulations, or under other federal or state laws, regulations, or permit conditions, except as expressly specified in Paragraphs 115-120. The United States and the State further reserve all legal and equitable remedies to address any imminent and substantial endangerment to the public health or welfare or the environment arising at, or posed by, the Toledo Refinery, whether related to the violations addressed in this Consent Decree or otherwise.

122. In any subsequent administrative or judicial proceeding initiated by the United States or the State for injunctive relief, civil penalties, or other appropriate relief relating to the Toledo Refinery or the Defendants' violations, the Defendants shall not assert, and may not maintain, any defense or claim based upon the principles of waiver, res judicata, collateral estoppel, issue preclusion, claim preclusion, claim-splitting, or other defenses based upon any contention that the claims raised by the United States or the State in the subsequent proceeding

were or should have been brought in the instant case, except with respect to claims that have been specifically resolved pursuant to Paragraph 115-120.

123. This Consent Decree is not a permit, or a modification of any permit, under any federal, state, or local laws or regulations. The Defendants are responsible for achieving and maintaining complete compliance with all applicable federal, state, and local laws, regulations, and permits, including, but not limited to, more stringent standards or requirements than those imposed by this Consent Decree. The Defendants' compliance with this Consent Decree shall be no defense to any action commenced pursuant to any such laws, regulations, or permits, except as set forth herein. The United States and the State do not, by their consent to the entry of this Consent Decree, warrant or aver in any manner that the Defendants' compliance with any aspect of this Consent Decree will result in compliance with provisions of the Clean Air Act, 42 U.S.C. § 7401 *et seq.*, EPCRA, 42 U.S.C. § 11001 *et seq.*, CERCLA, 42 U.S.C. § 9601 *et seq.*, or with any other provisions of federal, state, or local laws, regulations, or permits. Notwithstanding the review or approval by EPA or Ohio of any plans, reports, policies, or procedures formulated pursuant to the Consent Decree, the Defendants will remain solely responsible for compliance with the terms of the Consent Decree, all applicable permits, and all applicable federal, state, regional, and local laws and regulations, except as provided in Section XIII (Force Majeure).

124. This Consent Decree does not limit or affect the rights of the Defendants or of the United States or the State against any third parties, not party to this Consent Decree, nor does it limit the rights of third parties, not party to this Consent Decree, against the Defendants, except as otherwise provided by law.

125. This Consent Decree shall not be construed to create rights in, or grant any cause of action to, any third party not party to this Consent Decree.

## **XVII. GENERAL PROVISIONS**

126. All EPA and State approvals or comments required under this Consent Decree shall be in writing.

127. Other Laws. Nothing in this Consent Decree will be construed to prohibit or prevent the United States or Ohio from developing, implementing, and enforcing more stringent standards after the Date of Lodging of this Consent Decree through rulemaking, the permit process, or as otherwise authorized or required under federal, state, regional, or local laws and regulations. Subject to Section XVI (Effect of Settlement), Section X (Stipulated Penalties), and Paragraph 128 (Permit Violations) of this Consent Decree, nothing contained in this Consent Decree will be construed to prevent or limit the rights of the United States or Ohio to seek or obtain other remedies or sanctions available under other federal, state, regional, or local statutes or regulations by virtue of the Defendants' violations of the Consent Decree or of the statutes and regulations upon which the Consent Decree is based, or for the Defendants' violations of any applicable provision of law. This includes the right of the United States or Ohio to invoke the authority of the Court to order the Defendants' compliance with this Consent Decree in a subsequent contempt action. The requirements of this Consent Decree do not exempt the Defendants from complying with any and all new or modified federal, state, regional, and/or local statutory or regulatory requirements that may require technology, equipment, monitoring, or other upgrades after the Date of Lodging of this Consent Decree.

128. Permit Violations. Except as specifically identified in Section X (Stipulated Penalties) and Section XVI (Effect of Settlement), nothing in this Consent Decree will be construed to prevent or limit the right of the United States or Ohio to seek injunctive or monetary relief for violations of permits; provided, however, that with respect to monetary relief, the

United States and Ohio must elect between filing a new action for such monetary relief or seeking stipulated penalties under this Consent Decree, if stipulated penalties are available for the alleged violation(s).

129. Alternative Monitoring Plans (“AMPs”). If, for any monitoring required by this Consent Decree (other than CEMS), the Defendants submit an AMP to EPA for approval, then the Defendants shall comply with the proposed AMP pending EPA’s approval or disapproval of the submitted AMP. If an AMP is not approved, then within ninety (90) Days of the Defendants’ receipt of disapproval, the Defendants will submit to EPA for approval a plan and schedule that provide for compliance with the applicable monitoring requirements as soon as practicable. Such plan may include physical or operational changes to the equipment, or additional or different monitoring.

130. Public Documents. All information and documents submitted by the Defendants pursuant to this Consent Decree shall be subject to public inspection in accordance with applicable federal law, unless subject to legal privileges or protection, or identified and supported as trade secrets or CBI in accordance with the applicable federal statutes or regulations.

131. Paperwork Reduction Act. The information required to be maintained or submitted pursuant to this Consent Decree is not subject to the Paperwork Reduction Act of 1980, 44 U.S.C. § 3501 *et seq.*

132. Effect of Shutdown. The permanent Shutdown of an emissions unit or equipment and the surrender of all permits for that emissions unit or equipment shall be deemed to satisfy all requirements of this Consent Decree applicable to that emissions unit or equipment on and after the later of: (i) the date of the permanent Shutdown of the emissions unit or equipment or

(ii) the date of the surrender of all permits applicable to the unit or piece of equipment. The permanent Shutdown of the Toledo Refinery and the surrender of all air permits for the Toledo Refinery shall be deemed to satisfy all requirements of this Consent Decree applicable to the Toledo Refinery on and after the later of: (i) the date of the Shutdown of the Toledo Refinery or (ii) the date of the surrender of all air permits.

133. Certification Statement. Where the Consent Decree requires that any document or other deliverable submitted by the Defendants be signed by an official of the Defendants, it shall include the following certification:

*I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations.*

#### **XVIII. COSTS**

134. The Parties shall bear their own costs of this action, including attorneys' fees, except that the United States and the State shall be entitled to collect the costs incurred in any action necessary to collect any portion of the civil penalty or any stipulated penalties due but not paid by the Defendants.

#### **XIX. NOTICES**

135. Unless otherwise specified in this Decree, whenever notifications, submissions, or communications are required by this Consent Decree, they shall be made in writing and addressed as follows:

**As to the United States by email:** [eescdcopy.enrd@usdoj.gov](mailto:eescdcopy.enrd@usdoj.gov)  
Re: DJ # 90-5-2-1-09244/2

**As to the United States by mail:** EES Case Management Unit  
Environment and Natural Resources Division  
U.S. Department of Justice  
P.O. Box 7611  
Washington, D.C. 20044-7611  
Re: DJ # 90-5-2-1-09244/2

**As to EPA:**

As to EPA OECA by email:

foley.patrick@epa.gov

As to EPA OECA by hard-copy mail:

Director, Air Enforcement Division  
Office of Civil Enforcement (2242A)  
Office of Enforcement and Compliance Assurance  
U.S. Environmental Protection Agency  
1200 Pennsylvania Ave., N.W.  
Washington, D.C. 20004

As to EPA Region 5:

Hard-copy submissions shall be addressed to:

Office of Regional Counsel  
U.S. EPA, Region 5  
77 West Jackson Blvd. (C-14J)  
Chicago, IL 60604

Electronic submissions shall be sent to:

r5ardreporting@epa.gov

**As to the State of Ohio:**

Ohio EPA  
Division of Air Pollution Control  
50 West Town Street, Suite 700  
Columbus, Ohio 43216-1049  
**Attention:** James Kavalec, Manager  
Compliance and Enforcement Section

and

City of Toledo  
Division of Environmental Services  
348 South Erie Street  
Toledo, Ohio 43604  
**Attention:** Karen Granata, Administrator

**As to the Defendants:**

Refinery Manager  
BPH Toledo Refinery  
4001 Cedar Point Road  
P.O. Box 696  
Toledo, OH 53697

HSSE Manager  
BPH Toledo Refinery  
4001 Cedar Point Road  
P.O. Box 696  
Toledo, OH 53697

Managing Attorney – HSSE  
BP America Inc.  
30 S. Wacker Drive  
Chicago, IL 60606

and submitted electronically to:  
gtolconsentdecree@bp.com

136. Any Party may, by written notice to the other Parties, change its designated notice recipient or notice address provided above. In addition, the nature and frequency of reports required by this Consent Decree may be modified by mutual consent of the Parties. The consent of the United States to such modification must be in the form of a written notification from EPA, but need not be filed with the Court to be effective.

137. Notices submitted pursuant to this Section shall be deemed submitted on the date they are postmarked, unless otherwise provided in this Consent Decree or by mutual agreement of the Parties in writing.



**XX. EFFECTIVE DATE**

138. The Effective Date of this Consent Decree shall be the date upon which this Consent Decree is entered by the Court or a motion to enter the Consent Decree is granted, whichever occurs first, as recorded on the Court's docket.

**XXI. RETENTION OF JURISDICTION**

139. The Court shall retain jurisdiction over this case until termination of this Consent Decree, for the purpose of: (i) resolving disputes arising under this Decree, (ii) entering orders modifying this Decree pursuant to Sections XIV (Dispute Resolution) and XXII (Modification), and (iii) effectuating or enforcing compliance with the terms of this Decree.

**XXII. MODIFICATION**

140. Except as otherwise set forth in Paragraphs 17 and 136 (Notice recipients and addresses), the terms of this Consent Decree, including any attached appendices, may be modified only by a subsequent written agreement signed by all the Parties. Where the modification constitutes a material change to this Decree, it shall be effective only upon approval by the Court. Non-material modifications to this Consent Decree will be effective when signed by the United States and the Defendants. The United States will file non-material modifications with the Court on a periodic basis. For purposes of this Paragraph, non-material modifications include, but are not limited to, modifications to the frequency of reporting obligations and modifications to schedules that do not extend the date for compliance with emissions limitations following the installation of control equipment, provided that such changes are agreed upon in writing by the United States and the Defendants.

141. Any disputes concerning modification of this Decree shall be resolved pursuant to Section XIV (Dispute Resolution), provided, however, that, instead of the burden of proof provided by Paragraph 108, the Party seeking the modification bears the burden of demonstrating that it is entitled to the requested modification in accordance with Federal Rule of Civil Procedure 60(b).

### **XXIII. TERMINATION**

142. Termination: Conditions Precedent. Before seeking termination, the Defendants must have:

- a. Complied with all compliance requirements contained in Section VI of this Consent Decree, including, but not limited to, completing any pending required corrective actions and performing the initial LDAR audit and at least two follow-up LDAR audits as required by Paragraph 27 of Appendix A.
- b. Paid in full the civil penalty, any stipulated penalties, and any other monetary obligations due under the terms of the Consent Decree;
- c. Completed the environmental mitigation requirements in Section VII;
- d. Completed the Lead Abatement SEP required by Section VIII;
- e. Received all final federally enforceable Title I permits and applied for all final federally enforceable Title V permits (or permit modifications) incorporating the emission limits and standards specified under Section XI (Permits); and

f. Operated for the one (1) year period prior to seeking Termination in satisfactory compliance with the requirements of Section VI.A (CEMS) and Section VI.B and Appendix A (LDAR).

143. Termination: Procedure.

a. At such time as the Defendants believe that they have satisfied the conditions for termination set forth in Paragraph 142, the Defendants may submit a “Request for Termination” to the United States and the State by certifying such compliance in accordance with the certification language in Paragraph 133. In the Request for Termination, Defendants must demonstrate that the conditions for termination set forth in Paragraph 142 have been satisfied. The Request for Termination shall include all necessary supporting documentation, including, but not limited to, all documentation necessary to demonstrate compliance with the requirements of Section XI (Permits).

b. Unless either the United States or the State objects within 180 Days after receiving the Defendants’ Request for Termination, the Court may, upon motion by the Defendants, order that this Consent Decree be terminated. If either the United States or the State objects to the Defendants’ Request for Termination within 180 Days after receiving the Defendants’ Request for Termination, then the Defendants may submit the matter for dispute resolution under Section XIV of the Consent Decree.

c. If the United States and the State agree that the Consent Decree may be terminated, the Parties shall submit a joint stipulation terminating this Consent Decree.

144. Notwithstanding termination of the Consent Decree pursuant to this Section, the requirements of Sections XI (Permits) and XII (Emissions Credit Generation) and the information retention requirements of Paragraph 111 shall survive termination in accordance with the terms of those requirements.

**XXIV. 26 U.S.C. SECTION 162(f)(2)(A)(ii) IDENTIFICATION**

145. For purposes of the identification requirement of Section 162(f)(2)(A)(ii) of the Internal Revenue Code, 26 U.S.C. § 162(f)(2)(A)(ii), performance of Section II (Applicability), Paragraph 11; Section VI (Compliance Requirements); Section VII (Environmental Mitigation), Paragraphs 42-46; Section IX (Reporting Requirements), Paragraphs 64(a)(1)-(4), (6) and (b)-(d) and 65-67; Section XI (Permits), Paragraphs 88 (except with respect to the Lead Abatement SEP) - 89 and 94; Section XV (Information Collection and Retention), Paragraphs 110-112; and Appendix A (LDAR Program), is restitution or required to come into compliance with law.

**XXV. PUBLIC PARTICIPATION**

146. This Consent Decree shall be lodged with the Court for a period of not less than thirty (30) Days for public notice and comment in accordance with 28 C.F.R. § 50.7. The United States reserves the right to withdraw or withhold its consent if the comments regarding the Consent Decree disclose facts or considerations indicating that the Consent Decree is inappropriate, improper, or inadequate. The Defendants consent to entry of this Consent Decree without further notice and agree not to withdraw from or oppose entry of this Consent Decree by the Court or to challenge any provision of the Decree, unless the United States has notified the Defendants in writing that it no longer supports entry of the Decree.

**XXVI. SIGNATORIES/SERVICE**

147. Each undersigned representative of the Defendants, the EPA, the State, and the Assistant Attorney General for the Environment and Natural Resources Division of the Department of Justice certifies that he or she is fully authorized to enter into the terms and conditions of this Consent Decree and to execute and legally bind the Party he or she represents to this document.

148. This Consent Decree may be signed in counterparts, and its validity shall not be challenged on that basis. The Defendants agree to accept service of process by mail with respect to all matters arising under or relating to this Consent Decree and to waive the formal service requirements set forth in Rules 4 and 5 of the Federal Rules of Civil Procedure and any applicable Local Rules of this Court, including, but not limited to, service of a summons.

**XXVII. INTEGRATION**

149. This Consent Decree constitutes the final, complete, and exclusive agreement and understanding among the Parties with respect to the settlement embodied in the Decree and supersedes all prior agreements and understandings, whether oral or written, concerning the settlement embodied herein. Other than deliverables that are subsequently submitted and approved pursuant to this Decree, no other document, nor any representation, inducement, agreement, understanding, or promise, constitutes any part of this Decree or the settlement it represents, nor shall it be used in construing the terms of this Decree.

**XXVIII. FINAL JUDGMENT**

150. Upon approval and entry of this Consent Decree by the Court, this Consent Decree shall constitute a final judgment of the Court as to the United States, the State, and the

Defendants. The Court finds no just reason for delay and therefore enters this judgment as a final judgment pursuant to Federal Rule of Civil Procedure 58.

**XXIX. APPENDICES**

151. The following Appendices are attached to and incorporated as part of the Consent Decree:

“Appendix A” is the LDAR Program; and

“Appendix B” are copies of the NOV’s and FOV issued to the Defendants for the Toledo Refinery.

Dated and entered this \_\_\_\_\_ day of \_\_\_\_\_, 20\_\_\_\_\_

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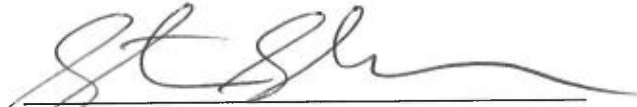
UNITED STATES DISTRICT JUDGE  
Northern District of Ohio

Subject to the notice and comment provisions of 28 C.F.R. § 50.7, THE UNDERSIGNED PARTIES enter into this Consent Decree entered in the matter of *United States, et al., v. BP Products North America Inc., et al.* (N.D. Ohio).

**FOR PLAINTIFF, THE UNITED STATES OF AMERICA:**

JONATHAN D. BRIGHTBILL  
Principal Deputy Assistant Attorney General  
Environment and Natural Resources Section  
United States Department of Justice

1-8-20  
DATE




STEVEN D. SHERMER  
Senior Attorney  
Environmental Enforcement Section  
Environment and Natural Resources Division  
U.S. Department of Justice  
P.O. Box 7611 Washington, DC 20044-7611

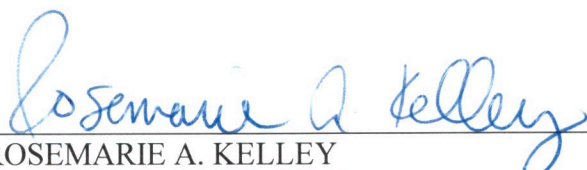
Subject to the notice and comment provisions of 28 C.F.R. § 50.7, THE UNDERSIGNED PARTIES enter into this Consent Decree entered in the matter of *United States, et al., v. BP Products North America Inc., et al.* (N.D. Ohio).

**FOR THE UNITED STATES  
ENVIRONMENTAL PROTECTION AGENCY:**

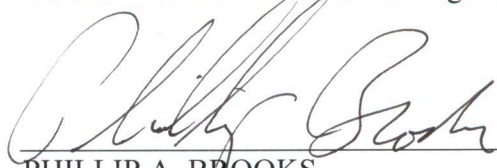
Date: 1/27/2020

  
SUSAN PARKER BODINE  
Assistant Administrator  
Office of Enforcement and Compliance Assurance  
U.S. Environmental Protection Agency  
1200 Pennsylvania Avenue, NW  
Washington, D.C. 20460


Date: 1/23/2020

  
ROSEMARIE A. KELLEY  
Director, Office of Civil Enforcement  
Office of Enforcement and Compliance Assurance  
U.S. Environmental Protection Agency

Date: 1/9/2020

  
PHILLIP A. BROOKS  
Director, Air Enforcement Division  
Office of Civil Enforcement  
Office of Enforcement and Compliance Assurance  
U.S. Environmental Protection Agency

Date: 12/20/19

  
SABRINA ARGENTIERI  
Attorney-Advisor, Air Enforcement Division  
Office of Enforcement and Compliance Assurance  
U.S. Environmental Protection Agency



Subject to the notice and comment provisions of 28 C.F.R. § 50.7, THE UNDERSIGNED PARTIES enter into this Consent Decree entered in the matter of *United States, et al., v. BP Products North America Inc., et al.* (N.D. Ohio).

**FOR THE UNITED STATES  
ENVIRONMENTAL PROTECTION AGENCY,  
REGION 5:**

Date: 12/5/2019



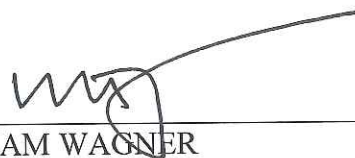
T. LEVERETT NELSON  
Regional Counsel  
United States Environmental Protection Agency  
Region 5  
77 West Jackson Blvd.  
Chicago, IL 60604-3590

Date: November 20, 2019



MARY T. McAULIFFE  
Associate Regional Counsel  
United States Environmental Protection Agency  
Region 5  
77 West Jackson Blvd.  
Chicago, IL 60604-3590

Date: 11.20.2019



WILLIAM WAGNER  
Associate Regional Counsel  
United States Environmental Protection Agency  
Region 5  
77 West Jackson Blvd.  
Chicago, IL 60604-3590

Subject to the notice and comment provisions of 28 C.F.R. § 50.7, THE UNDERSIGNED PARTIES enter into this Consent Decree entered in the matter of *United States, et al., v. BP Products North America Inc., et al.* (N.D. Ohio).

**FOR THE STATE OF OHIO:**

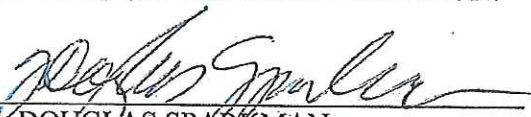
DAVE YOST  
OHIO ATTORNEY GENERAL

Date: January 2, 2020

Wednesday M. Szollosi  
WEDNESDAY M. SZOLLOSI (0075655)  
Assistant Attorney General  
Environmental Enforcement Section  
Toledo Regional Office  
One Government Center, Suite 1340  
Toledo, OH 43604  
Telephone: (419) 245-2550  
Facsimile: (877) 626-9316  
[wednesday.szollosi@ohioattorneygeneral.gov](mailto:wednesday.szollosi@ohioattorneygeneral.gov)

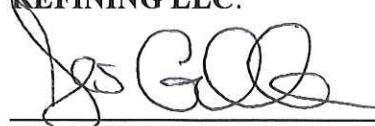
We hereby consent to entry of this Consent Decree in the matter of *United States, et al., v. BP Products North America Inc., et al.* (N.D. Ohio).

**FOR THE DEFENDANT BP  
PRODUCTS NORTH AMERICA INC.:**

  
\_\_\_\_\_  
J. DOUGLAS SPARKMAN  
President, BP Products North America Inc.

We hereby consent to entry of this Consent Decree in the matter of *United States, et al.*,  
v. *BP Products North America Inc., et al.* (N.D. Ohio).

**FOR THE DEFENDANT BP-HUSKY  
REFINING LLC:**

A handwritten signature in black ink, appearing to read "Des Gillen", written over a horizontal line.

DES GILLEN

President, BP-Husky Refining LLC

## **APPENDIX A - LDAR PROGRAM**

### **Definitions:**

1. The definitions set forth in the Consent Decree shall apply for purposes of this Appendix A. For purposes of this Appendix A to the Consent Decree, the following definitions shall also apply:
  - a. “Certified Low-Leaking Valves” shall mean valves for which a manufacturer has issued either: (i) a written guarantee that the valve will not leak above 100 parts per million (ppm) for five years; or (ii) a written guarantee, certification or equivalent documentation that the valve has been tested pursuant to generally-accepted good engineering practices and has been found to be leaking at no greater than 100 ppm.
  - b. “Certified Low-Leaking Valve Packing Technology” shall mean valve packing technology for which a manufacturer has issued either: (i) a written guarantee that the valve packing technology will not leak above 100 ppm for five years; or (ii) a written guarantee, certification or equivalent documentation that the valve packing technology has been tested pursuant to generally-accepted good engineering practices and has been found to be leaking at no greater than 100 ppm.
  - c. “Covered Equipment” shall mean all pumps and valves in light liquid, heavy liquid, or gas/vapor service in all Covered Process Units.
  - d. “Covered Process Units” shall mean any process unit that is, or under the terms of this Consent Decree becomes, subject to the equipment leak provisions of 40 C.F.R. Part 60, Subpart GGGa.
  - e. “DOR” shall mean Delay of Repair.
  - f. “LDAR Program” shall mean the Leak Detection and Repair Program specified in this Appendix A.
  - g. “Equipment” shall mean any equipment as defined in 40 C.F.R. § 60.591a.
  - h. “LDAR” shall mean Leak Detection and Repair.
  - i. “LDAR Audit Commencement Date” or “Commencement of an LDAR Audit” shall mean the first Day of the on-site inspection that accompanies an LDAR audit.
  - j. “LDAR Audit Completion Date” or “Completion of an LDAR Audit” shall mean one hundred twenty (120) Days after the LDAR Audit Commencement Date.
  - k. “Maintenance Shutdown” shall mean a shutdown of a Covered Process Unit that lasts longer than thirty (30) Days.
  - l. “Method 21” shall mean the test method found at 40 C.F.R. Part 60, Appendix A, Method 21.

m. “Repair Verification Monitoring” shall mean the utilization of monitoring (or another method that indicates the relative size of the leak) by no later than the end of the next Day of each attempt at repair of a leaking piece of Covered Equipment to achieve the best repair/lowest emission rate possible.

n. “Screening Value” shall mean the highest emission level that is recorded at each piece of Covered Equipment as it is monitored in compliance with Method 21.

### **Part A: General**

2. The requirements of the LDAR Program shall apply to all Covered Equipment. In addition, the requirements of Paragraphs 3, 23, 26.a., 26.b., 27-28, 31 (except the non-federally enforceable provisions of Paragraph 31.c), and 32 of this Appendix shall also apply to all Equipment at the Toledo Refinery that is regulated under any federal, state, or local LDAR program. The requirements of this LDAR Program are in addition to, and not in lieu of, the requirements of any federal, state or local LDAR regulation that may be applicable to a piece of Covered Equipment. If there is a conflict between a federal, State, or local LDAR regulation and this LDAR Program, the Defendants shall follow whichever regulation is more stringent.
3. By no later than sixty (60) Days after the Effective Date, the Defendants shall develop a written facility-wide LDAR Program that describes: (i) their facility-wide LDAR program (*e.g.*, applicability of regulations to process units and/or specific Equipment; leak definitions; monitoring frequencies); (ii) a tracking program (*e.g.*, Management of Change) that ensures that new pieces of Equipment added to the Toledo Refinery for any reason are integrated into the LDAR program and that pieces of Equipment that are taken out of service are removed from the LDAR program; (iii) the roles and responsibilities of all employee and contractor personnel assigned to LDAR functions at the Toledo Refinery; (iv) how the number of personnel dedicated to LDAR functions is sufficient to satisfy the requirements of the LDAR program; and (v) how the Toledo Refinery plans to implement this LDAR Program. The Defendants shall review this document on an annual basis and update it as needed by no later than December 31 of each year, beginning the first December 31 which occurs at least six months after the Effective Date.

### **Part B: Monitoring Frequency**

4. By no later than the Effective Date, for all Covered Equipment, the Defendants shall comply with the monitoring frequency for valves as required by 40 C.F.R. § 60.482-7a, 40 C.F.R. § 60.482-4a, 40 C.F.R. § 60.482-8a, and 40 C.F.R. § 60.482-10a, except as provided in 40 C.F.R. § 60.482-1a, and for pumps as required by 40 C.F.R. § 60.482-2a and 40 C.F.R. § 60.482-8a.
5. Alternative Standards for Valves – Skip Period Leak Detection and Repair. The Defendants may elect to comply with the skip period monitoring requirements set forth in 40 C.F.R. § 60.483-2a, if applicable.

**Part C: Monitoring Methods and Equipment**

6. Method 21 and Alternative Work Practice Monitoring.

a. Except as provided in sub-Paragraph 6.b, by no later than the Effective Date, for all Covered Equipment, the Defendants shall comply with Method 21 in performing LDAR monitoring, using a Flame Ionization Detector (FID) attached to a data logger, or equivalent equipment, which directly electronically records the Screening Value detected at each piece of Covered Equipment, the date and time that each Screening Value is taken, and the identification numbers of the monitoring instrument and technician. The Defendants or their contractor shall transfer this monitoring data to an electronic database on at least a weekly basis for recordkeeping purposes. Notwithstanding the foregoing, the Defendants may use paper logs where necessary or more feasible (*e.g.*, small rounds, re-monitoring, or when data loggers are not available or broken). Any manually recorded monitoring data shall be transferred to the electronic database within seven (7) Days of monitoring.

b. Alternative Work Practice.

(i) From the Effective Date, the Defendants may utilize the Alternative Work Practice as defined at 40 C.F.R. 60.18(g) (“the AWP”) for monitoring Equipment that meets the “difficult to monitor” criteria set out at 40 C.F.R. § 60.482-7a(h)(1).

(ii) No sooner than three (3) years from the Effective Date, the Defendants may submit a request for review and approval of an AWP for LDAR monitoring of all Covered Equipment. Such request shall include a protocol that, at a minimum, addresses the following operational criteria:

(A) calibration procedures;

(B) startup (*i.e.*, warming-up the Optical Gas Imaging (OGI) Instrument)/shutdown procedures;

(C) video recording and storage;

(D) site-specific impact of weather conditions (*e.g.*, wind speed, temperature, and visibility);

(E) maintenance of the OGI Instrument;

(F) certification of personnel to use the OGI instrument;

(G) minimum number of hours of field use by certified personnel prior to certified personnel performing compliance monitoring; and

(H) identification of process unit(s) where certified personnel may monitor with an OGI instrument.

If such request is approved by EPA, the Defendants may utilize the AWP for monitoring all

Covered Equipment.

7. The Defendants shall conduct all calibrations of LDAR monitoring equipment as required by Subpart GGGa in accordance with 40 C.F.R. Part 60, EPA Reference Test Method 21, prior to each time LDAR monitoring equipment is placed into service before each monitoring shift or is restarted during a monitoring shift, except as provided below. The Defendants shall conduct calibration drift assessment rechecks of the LDAR monitoring equipment at the end of each monitoring shift and prior to each time LDAR monitoring equipment is turned off during each monitoring shift, except when LDAR monitoring equipment is unable to function such that the calibration drift assessment recheck cannot be performed before the LDAR monitoring equipment turns off. The Defendants are not required to conduct a calibration drift assessment re-check during the same monitoring shift in the event of a “flame-out” of the instrument if the instrument can be immediately re-ignited. The calibration drift assessment shall be conducted using calibration gas as provided in 40 C.F.R. § 60.485a(b)(1) with a concentration approximately equal to the applicable internal leak definition. If any calibration drift assessment after the initial calibration shows a negative drift of more than 10 percent from the previous calibration, the Defendants shall re-monitor all components that had a reading greater than 250 ppm. The Defendants shall retain all calibration records for at least one year, or as otherwise required by any federal, state, or local law, whichever provides the longest retention requirement.

**Part D: Leak Detection and Repair Action Levels**

8. To the extent required by 40 C.F.R. Part 60, Subpart GGGa, the Defendants shall identify leaks through Method 21 monitoring (or the AWP pursuant to Paragraph 6.b.), and audio, visual, and olfactory sensing inspections.
9. Leak Definitions and Repairs for Valves and Pumps.
  - a. By no later than the Effective Date, for each leak detected at or above the leak definition for valves defined at 40 C.F.R. § 60.482-7a(b), the Defendants shall perform repairs in accordance with Paragraphs 11 - 16 of this Appendix.
  - b. By no later than the Effective Date, for each leak detected at or above the leak definition for pumps defined at 40 C.F.R. §60.482-2a(b)(1)(ii), the Defendants shall perform repairs in accordance with Paragraphs 12 - 16 of this Appendix.
10. By no later than the Effective Date, for all Covered Equipment, at any time, including outside of periodic monitoring, that a leak is detected through audio, visual, or olfactory sensing, the Defendants must monitor and/or repair the piece of Covered Equipment in accordance with 40 C.F.R. Part 60, Subpart GGGa, and with Paragraphs 12 - 16 of this Appendix.

**Part E: Leak Repairs**

11. The Defendants shall make an “initial attempt” at repair on any valve that has a reading greater than 100 ppm of VOCs, excluding control valves and other valves that LDAR personnel are not authorized to repair.
12. For each leak subject to Paragraph 9 of this Appendix, by no later than five (5) Days after detecting a leak, the Defendants shall perform a first attempt at repair. By no later than



fifteen (15) Days after detection, the Defendants shall perform a final attempt at repair or may place the valve or pump covered by Paragraph 9 on the Delay of Repair list provided that the Defendants have complied with 40 C.F.R. Part 60, Subpart GGGa and with the requirements of Paragraphs 13 – 15 and 17 of this Appendix.

13. For each attempt at repair as set forth in paragraphs 11 and 12 of this Appendix, the Defendants shall perform Repair Verification Monitoring.
14. Drill-and-Tap Repairs.
  - a. Except as provided in sub-Paragraph 14.b, for leaking valves (excluding control valves), when other repair attempts have failed to reduce emissions below the applicable leak definition and the Defendants are not able to remove the leaking valve from service, the Defendants shall attempt at least one drill-and-tap repair (with a second injection of sealant if the first injection is unsuccessful at repairing the leak) before placing the valve on the DOR list.
  - b. Drill-and-tap is not required when there is a major safety, mechanical, product quality, or environmental issue with repairing the valve using the drill-and-tap method, in which case the Defendants shall document the reason(s) why any drill-and-tap attempt was not performed prior to placing any valve on the DOR list.
15. For each leak, the Defendants shall record the following information: the date of all repair attempts; the repair methods used during each repair attempt; the date, time and Screening Values for all re-monitoring events; and, if relevant, the information required under Paragraph 14 and 17 of this Appendix for Covered Equipment placed on the DOR list.
16. Nothing in Paragraphs 12 - 15 of this Appendix is intended to prevent the Defendants from taking a leaking piece of Covered Equipment out of service; provided however, that prior to placing the leaking piece of Covered Equipment back in service, the Defendants must either repair the leak or comply with the requirements of Part F of this Appendix (Delay of Repair) to place the piece of Covered Equipment on the DOR list.

**Part F: Delay of Repair**

17. By no later than the Effective Date, for all Covered Equipment placed on the DOR list, the Defendants shall require the following:
  - a. Sign-off from the refinery manager, an official responsible for environmental management and compliance at the refinery, an official responsible for plant engineering, an operations manager, or an area superintendent or unit supervisor that the piece of Covered Equipment is technically infeasible to repair without a process unit shutdown;
  - b. Periodic monitoring, at the frequency required for other pieces of Covered Equipment of that type in the process unit, of the Covered Equipment placed on the DOR list;
  - c. No more than 0.10 percent of all valves may be on the DOR list at any one time. If a valve (i) is isolated and taken out of VOC and/or HAP service at the same

time it is placed on the DOR list and is later repacked with Certified Low-Leaking Valve Packing Technology or is replaced with Certified Low-Leaking Valves before it is placed back into VOC and/or HAP service, or (ii) is repacked with Certified Low-Leaking Valve Packing Technology or replaced with Certified Low-Leaking Valves at the next Maintenance Shutdown, such valve shall not be included in computing the applicable percentage limitation of valves that may be on the DOR list at any one time; and

- d. Covered Equipment may be removed from the DOR list if it is monitored at the frequency required for other pieces of Covered Equipment of that type in the process unit for two successive monitoring periods without detecting a leak greater than the Leak Definition as set forth in 40 C.F.R. Part 60, Subpart GGGa for that type of Covered Equipment.

### **Part G: Valve Replacement/Improvement Program**

18. Commencing no later than the Effective Date, and continuing until termination, the Defendants shall implement the program set forth in Paragraphs 19 through 22 of this Appendix to replace and/or improve the emissions performance of the valves in each Covered Process Unit.

#### 19. Valves.

- a. By no later than the Effective Date:
  - (i) The Defendants shall implement modified purchasing procedures that evaluate the availability of valves and valve packing that meet the requirements for a Certified Low-Leaking Valve or Certified Low-Leaking Valve Packing Technology at the time that the valves and/or valve packing is acquired.
  - (ii) Except as provided in Paragraph 20, the Defendants shall install valve packing material that meets the requirements for Certified Low-Leaking Valve Packing Technology whenever repacking any valve in gas/vapor or light liquid VOC service in a Covered Process Unit.
- b. By no later than ninety (90) Days after the Effective Date (except as provided in Paragraph 20), the Defendants shall ensure that each new valve in gas/vapor or light liquid VOC service that they purchase for use in any Covered Process Unit either is a Certified Low-Leaking Valve or is fitted with Certified Low-Leaking Valve Packing Technology.
- c. By no later than the dates specified below (except as provided in Paragraph 20), the Defendants shall ensure that each new valve in gas/vapor or light liquid VOC service that Defendants install in any Covered Process Unit either is a Certified Low-Leaking Valve or is fitted with Certified Low-Leaking Valve Packing Technology:
  - (i) For all Process Units other than Coker 3, the Crude 1 Unit, the Vacuum 1 Unit, and the new coker gas plant, by no later than eighteen (18) months after the Effective Date; and

(ii) For Coker 3, the Crude 1 Unit, the Vacuum 1 Unit, and the new coker gas plant, by no later than twenty-four (24) months after the Effective Date.

- d. Replacing or Repacking Existing Valves that have Screening Values At or Above 5,000 ppm. Except as provided in Paragraph 20, for each Existing Valve (excluding control valves) in each Covered Process Unit that has both a Screening Value at or above 5,000 ppm and a single subsequent Screening Value at or above 500 ppm any time within the forty-eight (48) months following the date the initial 5,000 ppm screening value is detected, the Defendants shall either replace the Existing Valve with a Certified Low-Leaking Valve or repack it with Certified Low-Leaking Valve Packing Technology. The Defendants shall undertake this replacement, or repacking by no later than thirty (30) Days after the monitoring event that triggers the replacement or repacking requirement, unless the replacement or repacking requires a process unit shutdown. If the replacement or repacking requires a process unit shutdown, the Defendants shall undertake the replacement or repacking during the first Maintenance Shutdown that follows the monitoring event that triggers the requirement to replace or repack the valve. If the Defendants complete the replacement or repacking within thirty (30) Days of detecting the leak, the Defendants shall not be required to comply with Part E of this Appendix. If the Defendants do not complete the replacement or repacking within thirty (30) Days, or if, at the time of the leak detection, the Defendants reasonably can anticipate that they might not be able to complete the replacement or repacking within thirty (30) Days, the Defendants shall comply with all applicable requirements of Part E of this Appendix in addition to the requirements of this sub-Paragraph 19.d.

20. Commercial Unavailability of a Certified Low-Leaking Valve or Certified Low-Leaking Valve Packing Technology.

- a. The Defendants shall not be required to utilize a Certified Low-Leaking Valve or Certified Low-Leaking Valve Packing Technology to replace or repack a valve if a Certified Low-Leaking Valve or Certified Low-Leaking Valve Packing Technology is commercially unavailable in accordance with the provisions in Part O of this Appendix. Prior to claiming this commercial unavailability exemption, the Defendants must contact a reasonable number of vendors of valves and obtain a written representation or equivalent documentation from each vendor that the particular valve that the Defendants need is commercially unavailable either as a Certified Low-Leaking Valve or with Certified Low-Leaking Valve Packing Technology. In the Compliance Status Reports due under Part N of this Appendix, the Defendants shall:
- (i) identify each valve for which it could not comply with the requirement to replace or repack the valve with a Certified Low-Leaking Valve or Certified Low-Leaking Valve Packing Technology due to commercial unavailability pursuant to this Paragraph 20;
- (ii) identify the vendors it contacted to determine the unavailability of such a Valve or Packing Technology; and

(iii) include the written representations or documentation that the Defendants secured from each vendor regarding the unavailability.

- b. Ongoing Assessment of Availability. The Defendants may use a prior determination of Commercial Unavailability of a valve or valve packing pursuant to this Paragraph and Part O of this Appendix for a subsequent Commercial Unavailability claim for the same valve or valve packing (or valve or valve packing in the same or similar service), provided that the previous determination was completed within the preceding 12-month period. After one year, the Defendants must conduct a new assessment of the availability of a valve or valve packing meeting Certified Low-Leaking Valve or Certified Low-Leaking Valve Packing Technology requirements.
- c. In the event a claim for commercial unavailability has been made by the operator of the Whiting Refinery pursuant to the Consent Decree in Civil Action No. 2:12 CV 207 (N.D. Ind.), the Defendants may rely on that previous determination as though such commercial unavailability determination had been made by the Defendants, so long as:
- (i) The previous commercial unavailability determination was made within the preceding 12-month period; and
  - (ii) The Defendants retain records of such previous commercial unavailability determination at the Toledo Refinery.

21. Records of Certified Low-Leaking Valves and Certified Low-Leaking Valve Packing Technology. Upon acquisition of any Certified Low-Leaking Valves or Certified Low-Leaking Valve Packing Technology, the Defendants shall secure from each manufacturer documentation that demonstrates that the proposed valve or packing technology meets the definition of “Certified Low-Leaking Valve” and/or “Certified Low-Leaking Valve Packing Technology.” The Defendants shall retain that documentation for the duration of this Consent Decree and make it available upon request.
22. Valve Replacement/Improvement Report. In each Compliance Status Report due under Part N of this Appendix, the Defendants shall include a separate section in the Report that: (i) describes the actions it took to comply with this Part G; and (ii) identifies the schedule for any future replacements or upgrades. For the first Compliance Status Report due after the date twenty-four (24) months from the Effective Date, the Defendants shall certify that to the best of their knowledge, after due inquiry, there remains in inventory at the Defendants’ Toledo Refinery no replacement valves or valve packing for Covered Equipment, other than (i) those that meet the definition of “Certified Low-Leaking Valve” and/or “Certified Low-Leaking Valve Packing Technology,” or (ii) valves for which a Commercial Unavailability determination is applicable, pursuant to Paragraph 20 hereof.

#### **Part H: Management of Change**

23. Management of Change: For each Management of Change process or analysis, the Defendants shall ensure that each piece of Equipment added to the Toledo Refinery or removed from the Toledo Refinery for any reason is evaluated to determine if it is or was

subject to LDAR requirements and that such pieces of Equipment are integrated into or removed from the LDAR program.

**Part I: Training**

24. By no later than six (6) months after the Effective Date, the Defendants shall have ensured that all personnel (whether employed by the Operator of the Toledo Refinery or contractors) responsible for LDAR monitoring, maintenance of LDAR monitoring equipment, LDAR repairs, and/or any other duties generated by the LDAR program have completed training on all aspects of LDAR that are relevant to the person's duties. By that same time, the Defendants shall develop a training protocol to ensure that refresher training is performed once per calendar year and that new personnel are sufficiently trained prior to any involvement in the LDAR program.

**Part J: Quality Assurance ("QA")/Quality Control ("QC")**

25. Daily Certification by Monitoring Technicians. Commencing no later than the Effective Date, on each Day that monitoring occurs, at the end of such monitoring Day to the extent practical but in no case later than the next work day for the monitoring technician, the Defendants shall ensure that each monitoring technician certifies that the data collected represents the monitoring performed for that Day by requiring the monitoring technician to sign a form that includes the following certification:

On [insert date], I reviewed the monitoring data that I collected on [insert date] and, to the best of my knowledge and belief, the data accurately represents the monitoring I performed on that date.

In lieu of a form for each technician for each Day of monitoring, a log sheet may be created that includes the certification that the monitoring technicians would date and sign each Day that the technician collects data.

26. Commencing by no later than the first full calendar quarter after the Effective Date, the Defendants shall undertake the following:
- a. Maintain their Management of Change ("MOC") processes to continue to require the following:
    - i. For each MOC that involves the addition of a component or components subject to LDAR requirements, an action item will be generated for the LDAR coordinator to instruct an LDAR technician to tag each component affected by the MOC and enter it into the electronic LDAR database (registry); and
    - ii. The action item required pursuant to (i) may not be closed with respect to a particular MOC until an LDAR technician has confirmed and reported to the LDAR Coordinator that the component or components have been tagged and entered into the LDAR database (registry).
  - b. An LDAR-trained employee or contractor of the Defendants, who does not serve as an LDAR monitoring technician on a routine basis, shall conduct process unit

walk-throughs, at unannounced times, to assure that all Covered Process Units are reviewed at least once per year, and in the course of those walk-throughs conduct spot checks of Equipment to verify that the Equipment checked is included in the LDAR database and is properly tagged;

- c. On a quarterly basis, review the LDAR database's electronic records to:
  - (i) verify that Covered Equipment was monitored at the appropriate frequency;
  - (ii) verify that proper documentation and sign-offs have been recorded for all Covered Equipment placed on the shutdown or DOR list;
  - (iii) verify that repairs have been performed within the required timeframe;
  - (iv) review monitoring data and Covered Equipment counts (*e.g.*, number of pieces of Covered Equipment monitored per Day) for feasibility and unusual trends; and
  - (v) verify that proper calibration records and monitoring instrument maintenance information are stored and maintained.
- d. On a quarterly basis, at unannounced times, conduct spot checks of LDAR program records to verify that those records are maintained as required; and
- e. On a quarterly basis, at unannounced times, observe each LDAR monitoring technician in the field to ensure monitoring is being conducted as required.

The Defendants shall correct any deficiencies detected or observed as soon as practicable. The Defendants shall maintain a log that: (i) records the date and time that the reviews, verifications, and observations required by this Paragraph were undertaken; and (ii) describes the nature and timing of any corrective actions taken.

#### **Part K: LDAR Audits and Corrective Action**

- 27. The Defendants shall conduct LDAR audits pursuant to the schedule in Paragraph 28 and the requirements of Paragraph 29 of this Appendix. The Defendants shall retain a third-party with experience in conducting LDAR audits to conduct no less than the initial audit and follow-up audits every two (2) years until termination of the Consent Decree. To perform the third-party audit, the Defendants shall select a different company than their regular LDAR contractor. At their discretion, for alternate two-year audits, the Defendants may conduct the audit internally by using personnel from one or more owners of the Defendants (or a combination of third party personnel and personnel from owners of the Defendants), provided that the personnel the Defendants use are not employed at the Toledo Refinery but rather are employed at a facility that currently uses Certified Low-Leaking Valve and/or Certified Low-Leaking Valve Packing Technology. All such internal audits must be conducted by personnel familiar with regulatory LDAR requirements and this LDAR Program.
- 28. Until termination of this Consent Decree, the Defendants shall ensure that an LDAR audit at the Toledo Refinery is conducted by an independent contractor with expertise in LDAR program requirements to perform a third party audit for all regulatory LDAR requirements

and this LDAR Program every twenty-four (24) months in accordance with the following schedule, except as provided in Paragraph 27 with respect to internal audits: for the first LDAR audit at the Toledo Refinery, the LDAR Audit Commencement Date shall be no later than December 31, 2018. For each subsequent LDAR audit, the LDAR Audit Completion Date shall occur within the same calendar quarter that the first LDAR Audit Completion Date occurred.

29. Each LDAR audit shall include, but not be limited to, reviewing compliance with all applicable regulations, reviewing and/or verifying the same items that are required to be reviewed and/or verified in Paragraph 26 of this Appendix, and performing the following activities for Covered Equipment:
- a. Calculating a Comparative Monitoring Audit Leak Percentage. Covered Equipment, excluding pumps and valves in heavy liquid service, shall be monitored to calculate a leak percentage for each Covered Process Unit that is covered in the audit, broken down by Covered Equipment type (*i.e.*, valves and pumps). The monitoring that takes place during the audit shall be called “comparative monitoring” and the leak percentages derived from the comparative monitoring shall be called the “Comparative Monitoring Audit Leak Percentage.” Until termination of this Consent Decree, the Defendants shall conduct a comparative monitoring audit pursuant to this Paragraph during each LDAR audit. Each Covered Process Unit at the Toledo Refinery that is not the subject of the current audit shall have a comparative monitoring audit at least once before a previously-audited Covered Process Unit is audited again.
  - b. Calculating the Historic, Average Leak Percentage from Prior Periodic Monitoring Events. For the Covered Process Unit that is audited, the historic average leak percentage from prior monitoring events, broken down by Covered Equipment type (*i.e.*, valves and pumps) shall be calculated. The following number of complete monitoring periods immediately preceding the comparative monitoring audit shall be used for this purpose: valves - 4 periods; and pumps -12 periods.
  - c. Calculating the Comparative Monitoring Leak Ratio. For the Covered Process Unit that is audited, the ratio of the comparative monitoring audit leak percentage from Paragraph 29.a to the historic average leak percentage from Paragraph 29.b shall be calculated. If a calculated ratio yields an infinite result, the Defendants shall assume one leaking piece of Covered Equipment was found in the process unit through their routine monitoring during the 12-month period before the audit, and the ratio shall be recalculated.

In addition to these items, LDAR audits after the first audit shall include reviewing the Toledo Refinery’s compliance with this LDAR Program.

30. When More Frequent Periodic Monitoring is Required. If a comparative monitoring audit leak percentage calculated pursuant to Paragraph 29.a triggers a more frequent monitoring schedule under any applicable federal, state, or local law or regulation than the frequencies listed in Paragraphs 4, 5 or 6 of this Appendix for the equipment type in that Covered Process Unit, the Defendants shall monitor the affected type of Covered Equipment at the greater

frequency unless and until less frequent monitoring is again allowed under the specific federal, state, or local law or regulation. At no time may the Defendants monitor at intervals less frequently than those in the applicable Paragraph in Part B of this Appendix.

31. Corrective Action Plan.

- a. Requirements of a CAP. By no later than thirty (30) Days after each LDAR Audit Completion Date, the Defendants shall develop a preliminary corrective action plan (“CAP”) if the results of an LDAR audit identify any deficiencies or if the Comparative Monitoring Leak Ratio calculated pursuant to sub-Paragraph 29.c is 3.0 or higher, and a Comparative Monitoring Audit Leak Percentage calculated pursuant to Paragraph 29.a is 0.5 percent or higher. The CAP shall describe the actions that the Defendants shall take to correct the deficiencies and/or the systemic causes of a Comparative Monitoring Leak Ratio that is 3.0 or higher and a Comparative Monitoring Audit Leak Percentage of 0.5 percent or higher. The CAP also shall include a schedule by which those actions shall be undertaken. The Defendants shall complete each corrective action as expeditiously as possible with the goal of completing each action within ninety (90) Days after the LDAR Audit Completion Date. If any action is not completed or is not expected to be completed within ninety (90) Days after the LDAR Audit Completion Date, the Defendants shall explain the reasons in the final CAP to be submitted under sub-Paragraph 31.b, together with a proposed schedule for completion of the action(s) as expeditiously as practicable.
- b. Submissions of the CAP to EPA. By no later than one hundred twenty (120) Days after the LDAR Audit Completion Date, the Defendants shall submit the final CAP to EPA, together with a certification of the completion of corrective action(s). For any corrective actions requiring more than ninety (90) Days to complete, the Defendants shall include an explanation together with a proposed schedule for completion as expeditiously as practicable.
- c. Approval/Disapproval of All or Parts of a CAP.
  - (i) Unless within sixty (60) Days after receipt of the CAP, EPA disapproves all or part of a CAP’s proposed actions and/or schedules, the CAP shall be deemed approved.
  - (ii) By no later than sixty (60) Days after receipt of the Defendants’ CAP, EPA may disapprove any or all aspects of the CAP. Each item that is not specifically disapproved shall be deemed approved. Except for good cause, EPA may not disapprove any action within the CAP that already has been completed. Within forty-five (45) Days of receipt of any disapproval from EPA, the Defendants shall submit a revised CAP that addresses the deficiencies that EPA identified. The Defendants shall implement the revised CAP either pursuant to the schedule that EPA proposed, or, if EPA did not specify a schedule, as expeditiously as practicable.
  - (iii) A dispute arising with respect to any aspect of a CAP shall be resolved in accordance with the dispute resolution provisions of this Consent Decree.



**Part L: Certification of Compliance**

32. By the later of one hundred eighty (180) Days after the initial LDAR Audit Completion Date or 30 Days after the Effective Date, the Defendants shall submit a certification to EPA and OEPA that, to the best of the certifier's knowledge and belief after reasonable inquiry: (i) the Toledo Refinery is in compliance with all applicable LDAR regulations, except for any corrective actions not yet completed, as described in part (ii) of this Paragraph; (ii) the Defendants have completed all corrective actions, if applicable, or is in the process of completing all corrective actions pursuant to a CAP; and (iii) all Equipment at the Toledo Refinery that is regulated under any federal, state, or local leak detection program has been identified and included in the Toledo Refinery's LDAR program.

**Part M: Recordkeeping**

33. The Defendants shall keep all records, including copies of all LDAR audits, to document compliance with the requirements of this LDAR Program in accordance with Section IX (Reporting Requirements). All monitoring data, leak repair data, training records, and audits will be retained for five (5) years, except for the calibration records (including calibration drift assessments) which will be retained for one (1) year. Upon request by EPA, the Defendants shall make all such documents available to EPA and shall provide, in their original electronic format, all LDAR monitoring data generated during the life of this Consent Decree.

**Part N: Reporting**

34. Compliance Status Reports. On the dates and for the time periods set forth in Paragraph 35 of this Appendix, the Defendants shall submit, in the manner set forth in Section IX (Reporting Requirements) of the Consent Decree, a Compliance Status Report regarding compliance with this LDAR Program. The Compliance Status Report shall include the following information with respect to the relevant reporting period:

- a. The number of personnel assigned to LDAR functions at the Toledo Refinery and the percentage of time each person dedicated to performing his/her LDAR functions;
- b. An identification and description of any non-compliance with the requirements of this Appendix;
- c. An identification of any problems encountered in complying with the requirements of this Appendix;
- d. The information required in Paragraphs 20 and 22 of this Appendix;
- e. Identification of any LDAR training conducted in accordance with Part I of this Appendix;
- f. Any deviations identified in the QA/QC performed under Part J of this Appendix A, as well as any corrective actions taken under Part K;
- g. A summary of LDAR audit results for audits that were completed during the reporting period, including specifically identifying all deficiencies; and

- h. The status of all actions under any CAP that was submitted pursuant to Part K of this Appendix during the reporting period.

35. **Due Dates.** The first Compliance Status Report shall be due thirty-one (31) Days after the first full half-year after the Effective Date (*i.e.*, either: (i) January 31 of the year after the Effective Date, if the Effective Date is between January 1 and June 30 of the preceding year; or (ii) July 31 of the year after the Effective Date, if the Effective Date is between July 1 and December 31). The initial report shall cover the period between the Effective Date and the first full half year after the Effective Date (a “half year” runs between January 1 and June 30 and between July 1 and December 31). Until termination of this Consent Decree, each subsequent report will be due on the same date in the following year and shall cover the prior two half years (*i.e.*, either January 1 to December 31 or July 1 to June 30).
36. Each Compliance Status Report submitted under this Part shall be signed by the refinery manager, an official responsible for environmental management and compliance at the refinery, or an official responsible for plant engineering management, and shall include the following certification:

I certify under penalty of law that I have examined and am familiar with the information in the enclosed document(s), including all attachments. Based on my inquiry of those individuals with primary responsibility for obtaining the information, I certify that the statements and information are, to the best of my knowledge and belief, true and complete. I am aware that there are significant penalties for knowingly submitting false statements and information, including the possibility of fines or imprisonment pursuant to Section 113(c)(3) of the Clean Air Act and 18 U.S.C. Sections 1001 and 1341.

**Part O: Process and Factors for “Commercial Unavailability” of Low-Leaking Valve or Packing Technology**

**Summary:** This Part outlines a process to be followed and factors to be taken into consideration to establish that a Certified Low-Leaking Valve or Certified Low-Leaking Valve Packing Technology is not “commercially available” pursuant to Paragraph 20 of this Appendix. Factors and procedures other than those identified in this Part may also be utilized to establish that a Certified Low-Leaking Valve or Certified Low-Leaking Valve Packing Technology is not commercially available.

37. **Factors.** The following factors shall be taken in to account for determining the availability of safe and suitable Certified Low-Leaking Valve or Certified Low-Leaking Valve Packing Technologies:
- (1) Valve type;
  - (2) Valve service and operating conditions;
  - (3) Type of refinery process equipment in which the valve is used;

- (4) Seal performance;
- (5) Service life;
- (6) Packing friction;
- (7) Temperature and pressure limitations; and
- (8) Retrofit applications (*e.g.*, re-piping or space limitations).
- (9) The following factors may also be relevant for consideration, depending on the process unit or equipment in use at the refinery:
  - (a) Valve or valve packing specifications identified by the licensor of the process unit or equipment in use at the refinery (including components that are part of a design package by a specialty-equipment provider as part of a larger process unit); or
  - (b) Valve or valve packing vendor or manufacturer recommendations for the relevant refinery unit and/or process unit components.

38. Process. The following procedure shall be followed for determining the availability of a Certified Low-Leaking Valve or Certified Valve Packing Technology:

- a. The Defendants must contact a reasonable number of vendors of valves and valve packing technologies, taking into account the relevant factors identified above, prior to asserting a claim that Certified Low-Leaking Valve or Certified Low-Leaking Valve Packing Technology is not commercially available.
  - (i) For purposes of this Consent Decree, a reasonable number of vendors shall mean at least three vendors of valves and three vendors of valve packing technologies;
  - (ii) If fewer than three vendors of valve or valve packing technologies are contacted, the determination of whether such fewer number is reasonable for purposes of this Consent Decree shall be based on Factors (9)(a) and/or (9)(b) above, or on a demonstration that fewer than three vendors offer valves or valve packing technologies for the service and operating conditions of the valve to be replaced, in consideration of Factors (1) through (8) above, as applicable.
- b. The Defendants shall obtain a written representation from each vendor contacted or equivalent documentation that the valve or valve packing does not meet the specifications for a Certified Low-Leaking Valve or Certified Low-Leaking Valve Packing Technology.
- c. The Defendants shall prepare a written report fully explaining the basis for each claim that a valve or valve packing is not commercially available, to include all relevant documentation and other information supporting the claim. In the event the Defendants rely on a commercial unavailability determination made pursuant to Paragraph 20.c., above, the Defendants shall provide a copy to EPA of the written report associated with such commercial unavailability determination.

Such report shall also identify the commercially available valve or packing technology that comes closest to meeting the requirements for a Certified Low-Leaking Valve or Certified Low-Leaking Valve Packing Technology that is selected and installed by the Defendants pursuant to Paragraph 19 of this Appendix. Such report shall be included in the Semi-Annual Report required by Section IX of the Consent Decree, for the period in which the valve or valve packing is replaced.

39. EPA Review of Claim of Commercial Unavailability. Upon discretionary review by EPA of any claim of commercial unavailability, if EPA disagrees that a valve or valve-packing technology is commercially unavailable, EPA shall notify the Defendants in writing, specifying the valve or valve packing EPA believes to be commercially available and the basis for its availability for the service and operating conditions of the valve. Following receipt by the Defendants of EPA's notice, the following shall apply:

- a. The Defendants are not required to retrofit any valves or valve packing for which the unavailability claim was asserted (unless otherwise required to do so pursuant to some other provision of this Consent Decree).
- b. EPA's notification shall serve as notice to the Defendants of EPA's intent that a future claim of commercial unavailability will not be accepted for: (a) the valve or valve packing that was the subject of the unavailability claim, or (b) for a valve or valve packing in the same or similar service, taking into account the factors identified in this Appendix. If the Defendants disagree with EPA's notification, the Defendants and EPA may informally discuss the basis for the claim of commercial unavailability. EPA may thereafter revise its notification, if necessary.
- c. If the Defendants make a subsequent commercial unavailability claim for the same valve or valve packing (or valve or valve packing in the same or similar service) that was the subject of a prior unavailability claim which was not accepted by EPA, and such subsequent claim is also denied by EPA on the same basis as provided in EPA's prior notification, the Defendants shall retrofit the valve or valve packing with the commercially available valve or valve packing technology at the next Maintenance Shutdown.
- d. Any disputes concerning EPA's notification to the Defendants of the commercial availability of a valve or valve packing technology in a particular application pursuant to Paragraph 39.c of this Appendix shall be addressed under the Dispute Resolution provisions in Section XIV of this Consent Decree.

# Appendix B



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY  
REGION 5  
77 WEST JACKSON BOULEVARD  
CHICAGO, IL 60604-3590

DEC 27 2012

REPLY TO THE ATTENTION OF:

**CERTIFIED MAIL**  
**RETURN RECEIPT REQUESTED**

David L. Bell, Esquire  
BP-Husky Refining LLC  
3040 Scarborough Road  
Cleveland Heights, Ohio 44118

Jessica L. Gonzalez, Senior Attorney  
Health, Safety, Security and Environmental  
BP America Inc.  
4101 Winfield Road # 4W  
Warrenville, Illinois 60555-3521

**Re: Finding of Violation**  
**BP Products North America Inc. and BP-Husky Refining LLC**  
**Oregon, Ohio**

Dear Mr. Bell and Ms. Gonzalez:

The U.S. Environmental Protection Agency is issuing the enclosed Finding of Violation (FOV) to BP Products North America Inc. and BP-Husky Refining LLC (you). We find that you have violated Section 111 of the Clean Air Act (CAA), 42 U.S.C. § 7411, at your Oregon, Ohio facility.

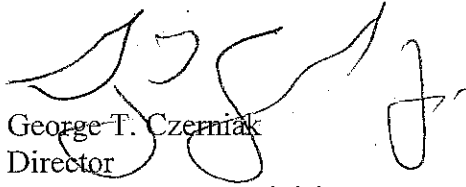
We have several enforcement options under Section 113(a)(3) of the CAA, 42 U.S.C. § 7413(a)(3). These options include issuing an administrative compliance order, issuing an administrative penalty order and bringing a judicial civil or criminal action.

We are offering you an opportunity to confer with us about the violations alleged in the FOV. The conference will give you the opportunity to present information on the specific findings of violation, the efforts you have taken to comply, and the steps you will take to prevent future violations.

Please plan for your facility's technical and management personnel to attend the conference to discuss compliance measures and commitments. You may have an attorney represent you at this conference.

The EPA contact in this matter is Virginia Galinsky. You may call her at 312.353.2089 to request a conference. You should make the request within 10 calendar days following receipt of this letter. We should hold any conference within 30 calendar days following receipt of this letter.

Sincerely,

A handwritten signature in black ink, appearing to read 'G. Czerniak', is written over the typed name.

George T. Czerniak  
Director  
Air and Radiation Division

Enclosure

cc: Peter Park, Toledo Division of Environmental Services  
Bob Hodanbosi, Ohio Environmental Protection Agency

UNITED STATES ENVIRONMENTAL PROTECTION AGENCY  
REGION 5

IN THE MATTER OF: )  
)  
BP Products North America Inc. and ) FINDING OF VIOLATION  
BP-Husky Refining, LLC, )  
Oregon, Ohio )  
) EPA-5-13-OH-4  
)  
Proceedings Pursuant to )  
the Clean Air Act, )  
42 U.S.C. §§ 7401 et seq. )  
)

**FINDING OF VIOLATION**

The U.S. Environmental Protection Agency finds that BP Products North America Inc. (BP) and BP-Husky Refining LLC (BP-Husky) are violating Section 111 of the Clean Air Act, 42 U.S.C. § 7411. Specifically, BP and BP-Husky are violating the General Provisions of the New Source Performance Standards and the Standards of Performance for VOC Emissions from Petroleum Refinery Wastewater Systems at 40 C.F.R. Part 60, Subpart QQQ as follows:

**Regulatory Authority**

**Clean Air Act**

1. The Clean Air Act (the Act) is designed to protect and enhance the quality of the nation's air so as to promote the public health and welfare and the productive capacity of its population. Section 101(b)(1) of the Act, 42 U.S.C. § 7401(b)(1).
2. Section 111(f) of the Act, 42 U.S.C. § 7411(f), requires the promulgation of standards of performance for new stationary sources.
3. Section 111(e) of the Act, 42 U.S.C. § 7411(e), prohibits the operation of a new source in violation of any applicable standard of performance.
4. Section 111(b) of the CAA, 42 U.S.C. § 7411(b) requires EPA to publish a list of categories of stationary sources and, within a year after the inclusion of a category of stationary sources in the list, to publish proposed regulations establishing federal standards of performance for new sources within the source category.

**40 C.F.R. Part 60, Subpart QQQ**

5. EPA proposed Standards of Performance for VOC Emissions from Petroleum Refinery Wastewater Systems on May 4, 1987 (NSPS Subpart QQQ). *See* 42 Fed. Reg. 16334. EPA promulgated NSPS Subpart QQQ on November 23, 1988. *See* 43 Fed. Reg. 616. NSPS



Subpart QQQ is codified at 40 C.F.R. § 60.690 *et. seq.* The Subpart has been subsequently amended.

6. NSPS Subpart QQQ applies to affected facilities located in petroleum refineries for which construction, modification, or reconstruction is commenced after May 4, 1987. Affected facilities are individual drain systems, oil-water separators and aggregate facilities (an individual drain system together with ancillary downstream sewer lines and oil-water separators, down to and including the secondary oil-water separator, as applicable).

7. 40 C.F.R. § 60.690(a)(2) provides that “the construction or installation of a new individual drain system shall constitute a modification to an affected facility described in § 60.690(a)(4). For purposes of this paragraph, a new individual drain system shall be limited to all process drains and the first common junction box.”

8. 40 C.F.R. § 60.691 defines “individual drain system” to mean “all process drains connected to the first common downstream junction box. The term includes all such drains and common junction box, together with their associated sewer lines and other junction boxes, down to the receiving oil-water separator.”

9. 40 C.F.R. § 60.691 defines “junction box” to mean “a manhole or access point to a wastewater sewer system line.”

10. 40 C.F.R. § 60.691 defines “water seal controls” to mean “a seal pot, p-leg trap, or other type of trap filled with water that has a design capability to create a water barrier between the sewer and the atmosphere.”

11. 40 C.F.R. § 60.692-1(a) provides that “[e]ach owner or operator subject to the provisions of this subpart shall comply with the requirements of §§ 60.692-1 to 60.692-5 and with §§ 60.693-1 and 60.693-2, except during periods of startup, shutdown, or malfunction.”

12. 40 C.F.R. § 60.692-2(a)(1) provides that “[e]ach drain shall be equipped with water seal controls.”

13. 40 C.F.R. § 60.692-2(a)(2) provides that “[e]ach drain in active service shall be checked by visual or physical inspection initially and monthly thereafter for indications of low water levels or other conditions that would reduce the effectiveness of the water seal controls.”

14. 40 C.F.R. § 60.692-2(a)(3) provides that “[e]xcept as provided in paragraph (a)(4) of this section, each drain out of active service shall be checked by visual or physical inspection initially and weekly thereafter for indications of low water levels or other problems that could result in VOC emissions.”

15. 40 C.F.R. § 60.692-2(a)(4) provides that “[a]s an alternative to the requirements in paragraph (a)(3) of this section, if an owner or operator elects to install a tightly sealed cap or plug over a drain that is out of service, inspections shall be conducted initially and semiannually to ensure caps or plugs are in place and properly installed.”

16. 40 C.F.R. § 60.692-2(b)(1) provides that “[j]unction boxes shall be equipped with a cover and may have an open vent pipe. The vent pipe shall be at least 90 cm (3 ft) in length and shall not exceed 10.2 cm (4 in) in diameter.”

17. 40 C.F.R. § 60.692-2(b)(2) provides that “[j]unction box covers shall have a tight seal around the edge and shall be kept in place at all times, except during inspection and maintenance.”

18. 40 C.F.R. § 60.692-2(b)(3) provides that “[j]unction boxes shall be visually inspected initially and semiannually thereafter to ensure that the cover is in place and to ensure that the cover has a tight seal around the edge.”

19. 40 C.F.R. § 60.696(a) provides that “[b]efore using any equipment installed in compliance with the requirements of § 60.692-2, § 60.692-3, § 60.692-4, § 60.692-5, or § 60.693, the owner or operator shall inspect such equipment for indications of potential emissions, defects, or other problems that may cause the requirements of this subpart not to be met. Points of inspection shall include, but are not limited to, seals, flanges, joints, gaskets, hatches, caps, and plugs.”

20. 40 C.F.R. § 60.698(b)(1) provides that “[e]ach owner or operator of a facility subject to this subpart shall submit to the Administrator within 60 days after initial startup a certification that the equipment necessary to comply with these standards has been installed and that the required initial inspections or tests of process drains, sewer lines, junction boxes, oil-water separators, and closed vent systems and control devices have been carried out in accordance with these standards. Thereafter, the owner or operator shall submit to the Administrator semiannually a certification that all of the required inspections have been carried out in accordance with these standards.”

21. 40 C.F.R. § 60.698(c) provides that “[a] report that summarizes all inspections when a water seal was dry or otherwise breached, when a drain cap or plug was missing or improperly installed, or when cracks, gaps, or other problems were identified that could result in VOC emissions, including information about the repairs or corrective action taken, shall be submitted initially and semiannually thereafter to the Administrator.”

### **Factual Information**

22. Prior to 2008, BP and its predecessors owned and operated the petroleum refinery at 4001 Cedar Point Road, Oregon, Ohio (the Toledo Refinery). Since 2008, BP operates the Toledo Refinery and jointly owns the Toledo Refinery with Husky Energy, Inc., as BP-Husky Refining LLC.

23. The Toledo Refinery has affected facilities under NSPS Subpart QQQ.

24. BP and BP-Husky submitted reports on January 23, 2008, July 24, 2008, January 30, 2009, July 30, 2009, January 29, 2010, July 2010, January 13, 2011, July 29, 2011, January 27, 2012 and July 30, 2012 pursuant to 40 C.F.R. § 60.698(c). In these reports, BP and BP-Husky generally state that they conducted the inspections required under NSPS Subpart QQQ. Regarding the water seals, it generally states that it added water to the water seals “as needed.”

BP-Husky does not provide specific information about the number of water seals found to be low and to which water was added.

25. The January 13, 2011 report identified the dike drain valves around tanks T155 and T159 as open, and the post indicator valve on the secondary containment dike for tanks T166 and T167 as open although it appeared to be closed from a visual inspection.

26. The January 13, 2011 report also identified that tank T164 and its drain were in active service, though they had only been being monitored semiannually instead of monthly. The report did not indicate when the tank returned to active service or how many monitoring events were missed.

27. The July 29, 2011 report identified that tanks T163, T166 and T167 were in active service, though the drain valves in the secondary containment dikes surrounding the tanks had been being monitored semiannually instead of monthly. The report did not indicate when the tank returned to active service nor how many monitoring events were missed.

28. The July 29, 2011 report identified that the drain hub in the serving tank T164 had an active steam condensate line discharging into it. The drain hub had been being monitored semiannually instead of monthly. The report did not indicate when the tank returned to active service nor how many monitoring events were missed.

29. The January 27, 2012 report stated that an audit identified "certain process drains in the Isocracker 2 Unit" that were subject to NSPS Subpart QQQ but were not included in the inspection program.

30. The July 30, 2012 report stated that the semiannual inspection of 36 manholes identified "several" manhole covers that had either 1-inch diameter holes or perimeter notches for lifting.

31. The July 30, 2012 report clarified that the audit described in the January 27, 2012 report had found an Individual Drain System that had been installed in 2005, but for which an inspection program under NSPS Subpart QQQ had not been developed.

32. The July 30, 2012 report also indicated that, subsequent to the audit described in the January 27, 2012 report, BP and BP-Husky conducted a field review to identify additional parts of the refinery wastewater system that were subject to NSPS Subpart QQQ that were not identified in the inspection program. Across 5 process units, BP and BP-Husky found 46 drain hubs, 7 drain valves, 186 cleanouts, 48 vent pipes, 62 manholes and a lift station that had not been included in the existing program but which were subject to NSPS Subpart QQQ.

33. Out of the 186 cleanouts that were found, 2 were damaged and not sealed.

34. Out of the 62 manholes that were found, two had damaged covers and 10 were covered by catch basin (open grating) covers instead of solid covers.

35. Out of the 48 vent pipes that were found, one had a diameter larger than 4 inches.

Violations

36. As described in further detail in Paragraphs 37 – 40, below, BP and BP-Husky failed to comply with the standards for individual drain systems at 40 C.F.R. § 60.692-1 through 40 C.F.R. § 60.692-5, in violation of 40 C.F.R. § 60.692-1(a).

37. BP and BP-Husky failed to monitor all drain hubs, drain valves, cleanouts, vent pipes, manholes and lift stations subject to NSPS Subpart QQQ, in violation of 40 C.F.R. § 60.692-2(a)(2), 40 C.F.R. § 60.692-2(a)(3), and 40 C.F.R. § 60.692-2(b)(3).

38. BP and BP-Husky failed to cover 2 cleanouts with a tight seal, in violation of 40 C.F.R. § 60.692-2(b)(1).

39. BP and BP-Husky failed to cover all manholes with a tight seal, in violation of 40 C.F.R. § 60.692-2(b)(2).

40. BP and BP-Husky failed to keep the diameter of one of its vent pipes under 4 inches, in violation of 40 C.F.R. § 60.692-2(b)(1).

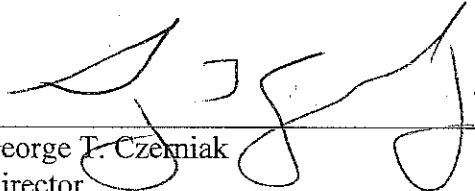
41. BP and BP-Husky failed to inspect at least 46 drain hubs, 7 drain valves, 186 cleanouts, 48 vent pipes, 62 manholes and a lift station for indications of potential emissions, defects, or other problems prior to using the equipment, in violation of 40 C.F.R. § 60.696(a).

42. For at least the individual drain system installed in the Isocracker 2 Process Unit in 2005, BP failed to submit a certification of compliance within 60 days of initial startup, in violation of 40 C.F.R. § 60.698(b)(1).

43. In its semiannual reports, BP and BP-Husky failed to summarize all inspections when a water seal was dry or otherwise breached, including information about the repairs or corrective action taken, in violation of 40 C.F.R. § 60.698(c).

44. BP and BP-Husky's failure to comply with NSPS Subpart QQQ constitutes a violation of Section 111(e) of the Act, 42 U.S.C. § 7411(e).

12/27/12  
\_\_\_\_\_  
Date

  
\_\_\_\_\_  
George T. Czerniak  
Director  
Air and Radiation Division

**CERTIFICATE OF MAILING**

I, Loretta Shaffer, certify that I sent a Finding of Violation, No. EPA-5-13-OH-4, by Certified Mail, Return Receipt Requested, to:

David L. Bell, Esquire  
BP-Husky Refining, LLC  
3040 Scarborough Road  
Cleveland Heights, Ohio 44118

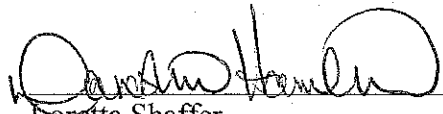
Jessica L. Gonzalez, Senior Attorney  
HSSE  
BP America Inc.  
4101 Winfield Road # 4W  
Warrenville, Illinois 60555-3521

I also certify that I sent copies of the Finding of Violation by first-class mail to:

Bob Hodanbosi  
Chief, Division of Air Pollution Control  
Ohio Environmental Protection Agency  
1800 WaterMark Drive  
Columbus, Ohio 43266-1049

Peter Park  
Engineer, City of Toledo  
Division of Environmental Services  
348 S. Erie St.  
Toledo, Ohio 43604

On the 28<sup>th</sup> day of December 2012.

  
Loretta Shaffer  
Administrative Program Assistant  
AECAB, PAS

CERTIFIED MAIL RECEIPT NUMBER:

7009 1680 0000 7669 7255 QB.  
7009 1680 0000 7669 7262 JG.

# CITY OF TOLEDO



## DEPARTMENT OF PUBLIC UTILITIES

November 30, 2007

### CERTIFIED MAIL

Ronald J. Unnerstall  
Business Unit Leader  
BP Toledo Refinery  
4001 Cedar Point Road  
Oregon, Ohio 43616

Re: Notice of Violation

Dear Mr. Unnerstall:

Enclosed, please find a "Notice of Violation" for BP Toledo Refinery (Ohio EPA Source No. 0448020007), emission units P007 (FCCU/CO Boiler), P009 (SRU #1), and P037 (SRU #2&3). Please review this document carefully as some action is required on your part.

If you have any questions, please feel free to contact me.

Yours from Toledo - a City of the Future!\*

A handwritten signature in cursive script that reads 'Peter Park'.

Peter Park

\* fDi Magazine-April 2007

### Enclosure

cc: Karen Granata, P.E., Chief of Air Resources, TDES  
Leslie Kovacic, Law Department, City of Toledo  
John Paulian, OEPA  
Lisa Holscher, USEPA Region V

---

T. Casey Stephens, Commissioner  
DIVISION OF ENVIRONMENTAL SERVICES  
Quilter Environmental Center  
348 South Erie Street, Toledo, Ohio 43604-8633 USA  
Telephone: 419-936-3015 Fax: 419-936-3959 E-mail: casey.stephens@toledo.oh.gov

**NOTICE OF VIOLATION**

November 30, 2007

The City of Toledo Division of Environmental Services hereby serves notice that:

BP Toledo Refinery  
4001 Cedar Point Road  
Oregon, Ohio 43616

has violated the following environmental laws, orders, rules, or regulations on the indicated dates at the above address.

Dates of Violation(s)

From April 1, 2007 to June 30, 2007

Regulation(s) violated

OAC rule 3745-77-07(C)(1) - ...to assure compliance with federally enforceable terms and conditions of the [Title V] permit.

40 CFR 60.13 - ...all continuous monitoring systems shall be in continuous operation.

40 CFR 60.104(a) - No owner or operator subject to the provisions of this subpart shall:

(2) Discharge or cause the discharge of any gases into the atmosphere from any Claus sulfur recovery plant containing in excess of:

(i) For an oxidation control system or a reduction control system followed by incineration, 250 ppm by volume (dry basis) of sulfur dioxide (SO<sub>2</sub>) at zero percent excess air.

Description of Source(s) and Violations(s)

OEPA Premise number 0448020007  
OEPA Source Number: P007, P009, and P037

Failure to continuously monitor CO, NOx, and SO2 emissions from FCCU and SO2 emissions from SRU #2&3.

Failure to keep SO2 emissions from Sulfur Recovery Unit #1,2, and 3 below 250 ppm by volume (dry basis) at zero percent excess air.

The above violation(s) may subject the violator to penalties of up to \$25,000 per violation. It is possible that a penalty may be assessed in this case. If a penalty is to be assessed, the amount will be determined after your response is reviewed.

Required Actions

Within 2 weeks of receipt of this Notice of Violation, you shall:

1. Abate the violation(s) or provide for an acceptable remedy.
2. Reply in writing to this Notice of Violation. The reply shall include:
  - a. description(s) and date(s) of action(s) taken thus far to abate the violation(s).
  - b. description(s) and expeditious time schedule of action(s) yet to be taken to remedy the violation(s).
  - c. description(s) of action(s) taken or to be taken to prevent recurrence of the violation(s).

Your written response and any questions regarding this Notice of Violation should be directed to Peter Park at the Division of Environmental Services, 348 S. Erie Street, Toledo, Ohio 43604, or call 419-936-3936.

The submission of the above requested information does not constitute a waiver of Ohio EPA's authority to seek civil penalties pursuant to Ohio Revised Code § 3704.06. Ohio EPA will make a decision on whether to pursue or decline to pursue such penalties regarding this matter at a later date.



# CITY OF TOLEDO



## DEPARTMENT OF PUBLIC UTILITIES

March 4, 2008

### CERTIFIED MAIL

Ronald J. Unnerstall  
Business Unit Leader  
BP Toledo Refinery  
4001 Cedar Point Road  
Oregon, Ohio 43616



Re: Notice of Violation

Dear Mr. Unnerstall:

Enclosed, please find a "Notice of Violation" for BP Toledo Refinery (Ohio EPA Source No. 0448020007), emission units B001 (Hydrogen Furnace), B006 (Reformer 2 Furnace), B008 (Iso 2 Feed Heater), B009 (Iso 2 Stabilizer Reboiler), B010 (Iso 2 Splitter Reboiler), B019 (Asphalt Heaters), B024 (Crude Vac 2 Furnace), B029 (DHT A-Train Furnace), B032 (Coker 3 Furnace), P007 (FCCU) and P037 (SRU #2&3). Please review this document carefully as some action is required on your part.

If you have any questions, please feel free to contact me.

Yours from Toledo - a City of the Future!\*

  
Peter Park

\* fDi Magazine-April 2007

Enclosure

cc: Karen Granata, P.E., Chief of Air Resources, TDES  
Leslie Kovacik, Law Department, City of Toledo  
John Paulian, OEPA  
Lisa Holscher, USEPA Region V

---

Timothy D. Murphy, Commissioner  
DIVISION OF ENVIRONMENTAL SERVICES  
Quilter Environmental Center  
348 South Erie Street, Toledo, Ohio 43604-8633 USA  
Telephone: 419-936-3015 Fax: 419-936-3959 E-mail: tim.murphy@toledo.oh.gov

**NOTICE OF VIOLATION**

March 4, 2008

The City of Toledo Division of Environmental Services hereby serves notice that:

BP Toledo Refinery  
4001 Cedar Point Road  
Oregon, Ohio 43616

has violated the following environmental laws, orders, rules, or regulations on the indicated dates at the above address.

Dates of Violation(s)

From October 1, 2007 to December 31, 2007

Regulation(s) violated

Description of Source(s) and Violations(s)

OAC rule 3745-77-07(C)(1) - ...to assure compliance with federally enforceable terms and conditions of the [Title V] permit.

OEPA Premise number 0448020007  
OEPA Source Number: B001, B006, B008, B009, B010, B019, B024, B029, B032, P007, and P037

40 CFR 60.13 - ...all continuous monitoring systems shall be in continuous operation.

Failure to continuously monitor H2S from Hydrogen Furnace, Reformer 2 Furnace, Iso 2 Feed Heater, Iso 2 Stabilizer Reboiler, Iso 2 Splitter Reboiler, Crude Vac 2 Furnace, Asphalt Heaters, DHT A-Train Furnace, and Coker 3 Furnace, and CO, NOx, and SO2 emissions from FCCU and SO2 from SRU #2&3.

The above violation(s) may subject the violator to penalties of up to \$25,000 per violation. It is possible that a penalty may be assessed in this case. If a penalty is to be assessed, the amount will be determined after your response is reviewed.

Required Actions

Within 2 weeks of receipt of this Notice of Violation, you shall:

1. Abate the violation(s) or provide for an acceptable remedy.

2. Reply in writing to this Notice of Violation. The reply shall include:
  - a. description(s) and date(s) of action(s) taken thus far to abate the violation(s).
  - b. description(s) and expeditious time schedule of action(s) yet to be taken to remedy the violation(s).
  - c. description(s) of action(s) taken or to be taken to prevent recurrence of the violation(s).

Your written response and any questions regarding this Notice of Violation should be directed to Peter Park at the Division of Environmental Services, 348 S. Erie Street, Toledo, Ohio 43604, or call 419-936-3936.

The submission of the above requested information does not constitute a waiver of Ohio EPA's authority to seek civil penalties pursuant to Ohio Revised Code § 3704.06. Ohio EPA will make a decision on whether to pursue or decline to pursue such penalties regarding this matter at a later date.

# CITY OF TOLEDO



## DEPARTMENT OF PUBLIC UTILITIES

October 6, 2008

CERTIFIED MAIL

WARNING LETTER

Bill Rupert  
BP-Husky Refining LLC.  
P.O. Box 696  
Toledo, Ohio 43697-0696

Re: TIU Mix Drum CEMS Excessive Downtime

Dear Mr. Rupert:

This letter is in regards to the second quarter of 2008 report submitted on July 18, 2008, for H<sub>2</sub>S Continuous Emissions Monitoring Systems (CEMS) which monitors refinery fuel from the TIU Mix Drum serving the following emissions units: B013, B014, B015, B017, B018, B019, B022, B029, B030, B031, B033, and P007. The report indicates that the percent of CEMS downtime was greater than 5 % of the total operating time during the reported quarter.

Please be aware that future quarters of excess emissions/CEMS downtime may result in a Notice of Violation.

If you have any questions, please feel free to contact me at 419-936-3936.

Yours from Toledo - a City of the Future!

A handwritten signature in cursive script that reads "Peter Park".

Peter Park  
Engineer

cc: Karen Granata  
Leslie A. Kovacik, City of Toledo  
John Paulian, Ohio EPA  
Lisa Holscher, US EPA

# CITY OF TOLEDO



## DEPARTMENT OF PUBLIC UTILITIES

### CERTIFIED MAIL

Mark C. Dangler  
President – BP-Husky Refining LLC  
4001 Cedar Point Road  
Oregon, Ohio 43616

Re: Notice of Violation

Dear Mr. Dangler:

Enclosed, please find a "Notice of Violation" for BP-Husky Refining LLC (Ohio EPA Source No. 0448020007), emission unit P007 (FCCU/CO Boiler). Please review this document carefully as some action is required on your part.

If you have any questions, please feel free to contact me.

Sincerely,

Peter Park

### Enclosure

cc: Karen Granata, P.E., Chief of Air Resources, TDES  
John Paulian, OEPA  
Brian H. Dickens, USEPA Region V

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Timothy D. Murphy, Commissioner  
DIVISION OF ENVIRONMENTAL SERVICES  
Quilter Environmental Center  
348 South Erie Street, Toledo, Ohio 43604-8633 USA  
Telephone: 419-936-3015 Fax: 419-936-3959 E-mail: tim.murphy@toledo.oh.gov

**NOTICE OF VIOLATION**

January 14, 2013

The City of Toledo Division of Environmental Services hereby serves notice that:

BP-Husky Refining LLC  
4001 Cedar Point Road  
Oregon, Ohio 43616

has violated the following environmental laws, orders, rules, or regulations on the indicated dates at the above address.

Dates of Violation(s)

From July 1, 2012 to September 30, 2012

<u>Regulation(s) violated</u>	<u>Description of Source(s) and Violations(s)</u>
OAC rule 3745-77-07(C)(1) - ...to assure compliance with federally enforceable terms and conditions of the TV permit.  40 CFR 60.13 - ...all continuous monitoring systems shall be in continuous operation.	OEPA Premise number 0448020007 OEPA Source Number: P007  BP Toledo Refanery has failed to continuously monitor SO2 emissions from FCCU.

The above violation(s) may subject the violator to penalties of up to \$25,000 per violation. It is possible that a penalty may be assessed in this case. If a penalty is to be assessed, the amount will be determined after your response is reviewed.

Required Actions

Within 2 weeks of receipt of this Notice of Violation, you shall:

1. Abate the violation(s) or provide for an acceptable remedy.
2. Reply in writing to this Notice of Violation. The reply shall include:
  - a. description(s) and date(s) of action(s) taken thus far to abate the violation(s).
  - b. description(s) and expeditious time schedule of action(s) yet to be taken to remedy the violation(s).

- c. description(s) of action(s) taken or to be taken to prevent recurrence of the violation(s).

Your written response and any questions regarding this Notice of Violation should be directed to Peter Park at the Division of Environmental Services, 348 S. Erie Street, Toledo, Ohio 43604, or call 419-936-3936.

The submission of the above requested information does not constitute a waiver of Ohio EPA's authority to seek civil penalties pursuant to Ohio Revised Code § 3704.06. Ohio EPA will make a decision on whether to pursue or decline to pursue such penalties regarding this matter at a later date.

# CITY OF TOLEDO



## DEPARTMENT OF PUBLIC UTILITIES

### CERTIFIED MAIL

Mark C. Dangler  
President – BP-Husky Refining LLC  
4001 Cedar Point Road  
Oregon, Ohio 43616

Re: Notice of Violation

Dear Mr. Dangler:

Enclosed, please find a "Notice of Violation" for BP-Husky Refining LLC (Ohio EPA Source No. 0448020007), emission units B036 (Reformer 3) and P009 (Sulfur Recovery Unit #1). Please review this document carefully as some action is required on your part.

If you have any questions, please feel free to contact me at 419-936-3936.

Sincerely,

A handwritten signature in black ink that reads "Peter Park".

Peter Park  
Engineer

### Enclosure

cc: Karen Granata, P.E., Chief of Air Resources, TDES  
Leslie Kovacik, City of Toledo  
John Paulian, OEPA  
Brian H. Dickens, USEPA Region V

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Timothy D. Murphy, Commissioner  
DIVISION OF ENVIRONMENTAL SERVICES  
Quilter Environmental Center  
348 South Erie Street, Toledo, Ohio 43604-8633 USA  
Telephone: 419-936-3015 Fax: 419-936-3959 E-mail: tim.murphy@toledo.oh.gov



**NOTICE OF VIOLATION**

February 26, 2014

The City of Toledo Division of Environmental Services hereby serves notice that:

BP-Husky Refining LLC  
4001 Cedar Point Road  
Oregon, Ohio 43616

has violated the following environmental laws, orders, rules, or regulations on the indicated dates at the above address.

Dates of Violation(s)

From July 1, 2013 to September 30, 2013

<u>Regulation(s) violated</u>	<u>Description of Source(s) and Violations(s)</u>
OAC rule 3745-77-07(C)(1) - ...to assure compliance with federally enforceable terms and conditions of the TV permit.  40 CFR 60.13 - ...all continuous monitoring systems shall be in continuous operation.	OEPA Premise number 0448020007 OEPA Source Number: B036 and P009  BP Toledo Refinery has failed to continuously monitor NOx emissions in pound per hour from B036 (Reformer 3) and SO <sub>2</sub> emissions in ppm from P009 (Sulfur Recovery Unit #1).

The above violation(s) may subject the violator to penalties of up to \$25,000 per violation. It is possible that a penalty may be assessed in this case. If a penalty is to be assessed, the amount will be determined after your response is reviewed.

Required Actions

Within 2 weeks of receipt of this Notice of Violation, you shall:

1. Abate the violation(s) or provide for an acceptable remedy.
2. Reply in writing to this Notice of Violation. The reply shall include:
  - a. description(s) and date(s) of action(s) taken thus far to abate the violation(s).
  - b. description(s) and expeditious time schedule of action(s) yet to be taken to remedy the violation(s).

- c. description(s) of action(s) taken or to be taken to prevent recurrence of the violation(s).

Your written response and any questions regarding this Notice of Violation should be directed to Peter Park at the Division of Environmental Services, 348 S. Erie Street, Toledo, Ohio 43604, or call 419-936-3936.

The submission of the above requested information does not constitute a waiver of Ohio EPA's authority to seek civil penalties pursuant to Ohio Revised Code § 3704.06. Ohio EPA will make a decision on whether to pursue or decline to pursue such penalties regarding this matter at a later date.

# CITY OF TOLEDO



## DEPARTMENT OF PUBLIC UTILITIES

February 17, 2015

### CERTIFIED MAIL

### NOTICE OF VIOLATION

Mark C. Dangler, President  
BP-Husky Refining LLC  
P.O. Box 696  
Toledo, OH 43697-0696

Re: Notice of Violation – Regarding SRU#1 SO<sub>2</sub> CEM Excess Downtime, 4<sup>th</sup> quarter 2014

Dear Mr. Dangler:

Enclosed is a "Notice of Violation" for BP-Husky Refining LLC (Ohio EPA premise number 0448020007), emission unit P009 (#1 Clause Sulfur Recovery Unit with SCOT Unit). Please review this document carefully as some action is required on your part.

If you have any questions regarding this matter, feel free to contact me at (419) 936-3955.

Sincerely,

A handwritten signature in blue ink that reads "Pamela Barnhart".

Pamela Barnhart  
Environmental Engineer

cc: Jeanette Ball, Acting Commissioner, TES  
Karen Granata, TES  
Leslie Kovacik, City of Toledo  
John Paulian, Ohio EPA  
Brian Dickens, U.S. EPA

**NOTICE OF VIOLATION**

The City of Toledo Environmental Services (TES) hereby serves notice that:

BP-Husky Refining LLC  
Premise No. 0448020007  
4001 Cedar Point Rd.  
Oregon, Ohio 43616

has violated the following environmental laws, orders, rules, or regulations on the indicated dates at the above address.

**Dates of Violations**

Fourth Quarter, 2014 (total of 6,060 minutes downtime on the SRU#1 SO<sub>2</sub> CEM)

<u>Regulations Violated and Permit Terms</u>	<u>Description of Violations</u>
40 CFR Part 60.13(e); ORC 3704.05(C); Title V permit, P0088527 issued 10/13/2004, emissions unit P009: Term A.III.1.a.; and PTI P0111667 issued 9/20/2013, P009, Term d)(3): "The permittee shall operate and maintain an instrument for continuously monitoring and recording the concentration (dry basis, zero percent excess air) of SO <sub>2</sub> emissions into the atmosphere."	The fourth quarterly report of 2014 for emissions unit, P009, the #1 sulfur recovery unit, indicates that the continuous emissions monitor for sulfur dioxide (SO <sub>2</sub> ) had excess downtime greater than 5% (6.8%) of the operating time for the fourth quarter.

The above violation(s) may subject the violator to **penalties** of up to \$25,000 per violation. It is possible that a penalty will be assessed in this case. If a penalty is to be assessed, the amount will be determined after your response is reviewed.

**Required Actions**

Within 14 days of receipt of this Notice of Violation, you shall:

1. Abate the violations or provide for an acceptable remedy.
2. Reply in writing to this Notice of Violation. The reply shall include:

- a. detailed descriptions and dates of actions taken thus far to abate the violations;
- b. detailed descriptions and expeditious time schedule of actions taken or yet to be taken to remedy the violations and excess emissions, including options reviewed but not implemented; and
- c. descriptions of actions taken or to be taken to prevent recurrence of the violations.

**Recommended Actions**

1. Review BP-Husky's QA/QC program for the installed SO<sub>2</sub> monitor and revise (if necessary) to ensure timely repair of the monitors.
2. Perform future CEM repairs in a timely manner to ensure that the operating time with unavailable monitoring data is less than 5% of the operating time of the source.

Your written response and any questions regarding this Notice of Violation should be directed to Pam Barnhart at the City of Toledo, Division of Environmental Services, 348 S. Erie Street, Toledo, Ohio 43604, or call (419) 936-3955.

# CITY OF TOLEDO



## DEPARTMENT OF PUBLIC UTILITIES

May 19, 2015

CERTIFIED MAIL

NOTICE OF VIOLATION

Mark C. Dangler, CEO  
BP-Husky Refining LLC  
P.O. Box 696  
Toledo, OH 43697-0696

Re: Notice of Violation – Regarding Fluid Catalytic Cracking Unit Excess Downtime of the CEMs, 1<sup>st</sup> quarter 2015

Dear Mr. Dangler:

Enclosed is a "Notice of Violation" for BP-Husky Refining LLC (Ohio EPA premise number 0448020007), emission unit P007 (Fluid Catalytic Cracking Unit with a CO steam Boiler, Selective Non-Catalytic Reduction (SNCR) control system, and Electrostatic Precipitator (ESP)). Please review this document carefully as some action is required on your part.

If you have any questions regarding this matter, feel free to contact me at (419) 936-3955.

Sincerely,

Pamela Barnhart  
Environmental Engineer

cc: Jeanette Ball, Acting Commissioner, TES  
Karen Granata, TES  
Leslie Kovacik, City of Toledo  
John Paulian, Ohio EPA  
Brian Dickens, U.S. EPA

**NOTICE OF VIOLATION**

The City of Toledo Environmental Services (TES) hereby serves notice that:

BP-Husky Refining LLC  
 Premise No. 0448020007  
 4001 Cedar Point Rd.  
 Oregon, Ohio 43616

has violated the following environmental laws, orders, rules, or regulations on the indicated dates at the above address.

**Dates of Violations**

First Quarter, 2015

Regulations and/or Permit Terms Violated	Description of Violations
<p>40 CFR Part 60.13(e);                      ORC 3704.05(C);</p> <p>Sulfur Dioxide (SO<sub>2</sub>) CEM:                      Title V permit, P0088527 issued 10/13/2004, emissions unit P007: Term A.III.2.</p> <p>Nitrogen Oxide (NO<sub>x</sub>) CEM:                      PTI P0108887 issued 5/4/2012, emissions unit P007: Term d)(5)d.</p> <p>Carbon Monoxide (CO) CEM:                      Consent Decree, Civil No. 2:96 CV 095 RL, emissions unit P007.</p> <p>The permittee shall operate and maintain an instrument for continuously monitoring and recording the concentration of SO<sub>2</sub>, NO<sub>x</sub> and CO emissions into the atmosphere.</p>	<p>The first quarterly report of 2015 for emissions unit, P007, the Fluid Catalytic Cracking Unit, indicates that the continuous emissions monitors for sulfur dioxide, nitrogen oxide and carbon monoxide had excess continuous monitoring system (CMS) downtime greater than 5% (5.1%).</p>
<p>40 CFR Part 60.13(e);                      ORC 3704.05(C);</p> <p>Nitrogen Oxide CEM:                      PTI P0108887 issued 5/4/2012, emissions unit P007: Term b)(2)p.</p>	<p>The first quarterly report of 2015 for emissions unit, P007, the Fluid Catalytic Cracking Unit, indicates that the continuous emissions monitors for nitrogen oxide (NO<sub>x</sub>) had excess emissions (35.3%) of the 58.1 ppmvd NO<sub>x</sub> at 0% oxygen on a rolling 365-day average</p>

<p>"Final Long-Term NOx Limit: ..... BP-Husky shall comply with a long-term limit of 58.1 ppmvd NOx at 0% O<sub>2</sub> on a 365-day rolling average basis. This long-term limit shall apply at all times when the FCCU is operating, including during periods of startup, shutdown, and malfunction. The limit also shall apply during periods of scheduled maintenance of equipment other than the FCCU."</p>	
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The above violation(s) may subject the violator to **penalties** of up to \$25,000 per violation. It is possible that a penalty will be assessed in this case. If a penalty is to be assessed, the amount will be determined after your response is reviewed.

### **Required Actions**

Within 14 days of receipt of this Notice of Violation, you shall:

1. Abate the violations or provide for an acceptable remedy.
2. Reply in writing to this Notice of Violation. The reply shall include:
  - a. detailed descriptions and dates of actions taken thus far to abate the violations;
  - b. detailed descriptions and expeditious time schedule of actions taken or yet to be taken to remedy the violations and excess emissions, including options reviewed but not implemented; and
  - c. descriptions of actions taken or to be taken to prevent recurrence of the violations.

Your written response and any questions regarding this Notice of Violation should be directed to Pam Barnhart at the City of Toledo, Environmental Services, 348 S. Erie Street, Toledo, Ohio 43604, or call (419) 936-3955.



# CITY OF TOLEDO



## DEPARTMENT OF PUBLIC UTILITIES

July 14, 2016

Mr. Mark C. Dangler  
Business Unit Leader, and CEO  
BP-Husky Refining LLC  
Toledo Refinery  
P.O. BOX 696  
Oregon, OH 43697-0696

**Re: BP-Husky Refining LLC  
Notice of Violation (NOV)  
Air Permit  
Lucas County  
0448020007**

### Toledo Division of Environmental Services

#### Subject: Notice of Violation

Dear Mr. Dangler:

On January 29, 2016, this office received a quarterly CEMS Excess Emissions report for BP Husky Refining, LLC. Toledo Division of Environmental Services reviewed the quarterly CEMS Excess Emissions report for compliance with the terms and conditions of Permit-to-Install (PTI) P0115518 and 40 CFR Part 60, Subpart Ja.

#### Findings

Based on review of the quarterly report, Toledo Division of Environmental Services has determined that emissions unit P003 was not in compliance with PTI P0115518, and P004 is not in compliance with PTI P0115518. In order to bring your facility into compliance, we recommend promptly addressing these violations within the timeframe outlined in this letter.

1. ORC chapter 3704.05(C): "*No person who is the holder of a permit issued under division (F) or (G) of section 3704.03 of the Revised Code shall violate any of its terms or conditions.*"

*40 CFR 60.107a(a)(2)(vi): "The owner or operator of a modified flare that meets all three criteria in paragraphs (a)(2)(vi)(A) through (C) of this section shall comply with the requirements of paragraphs (a)(2)(i) through (v) of this section no later than November 11, 2015. The owner or operator shall comply with the approved alternative monitoring plan or plans pursuant to 40 CFR Part 60.13(i) until the flare is in compliance with requirements of paragraphs (a)(2)(i) through (v) of this section."*

Jeanette Ball, Administrator  
DIVISION OF ENVIRONMENTAL SERVICES  
Quilter Environmental Center  
348 South Erie Street, Toledo, Ohio 43604-8633 USA  
Telephone: 419-936-3015 Fax: 419-936-3959 E-mail: [jeanette.ball@toledo.oh.gov](mailto:jeanette.ball@toledo.oh.gov)

The terms and conditions of PTI P0115518 for emissions unit P803 (Reformer 3) specify the following under paragraph C.2.b)(2)c: *The permittee shall comply with the flare requirements of the final 40 CFR 60 Subpart Ja upon its promulgation in the Federal Register.*

(a) Certification testing for the hydrogen sulfide (H<sub>2</sub>S) continuous emissions monitoring systems (CEMS) of the East and West Hydrocarbon Flares (P003 & P004) was to be completed by November 11, 2015. Certification testing was conducted on 10/20/2015 and 10/21/2015. The test on the East Hydrocarbon Flare (P003) failed, and the test for the West hydrocarbon Flare (P004) was subsequently cancelled. The violations began on November 11, 2015. The H<sub>2</sub>S Continuous Emissions Monitor on the East Hydrocarbon Flare (P003) was successfully tested and certified on 2/24/2016. The West Hydrocarbon Flare (P004) is currently uncertified.

(b) *Requested action:*

Within 30 days of receipt of this letter, BP-Husky Refining LLC shall submit a compliance plan to Toledo Division of Environmental Services which will address how the facility will address the emissions exceedances identified above.

### **Conclusion**

The Toledo Division of Environmental Services requests that BP-Husky Refining LLC promptly undertake the necessary measures to return to compliance with Ohio's environmental laws and regulations. Within 30 days of receipt of this letter, please provide documentation to Toledo Division of Environmental Services of the actions taken to resolve the violations cited above. If you have already resolved the violations listed above, thank you, and please provide documentation supporting compliance.

Failure to comply with Chapter 3704 of the Ohio Revised Code and rules promulgated thereunder may result in an administrative or civil penalty. If circumstances delay resolution of violations, BP-Husky Refining LLC is requested to submit written correspondence describing the steps that will be taken by date certain to attain compliance.

Please note that the submission of any requested information to respond to this letter does not constitute waiver of Ohio EPA's authority to seek administrative or civil penalties as provided in Section 3704.06 of the Ohio Revised Code.

Thank you for your time and cooperation and if you have any questions, please contact Philip Stiff by phone at (419) 936-5043 or by e-mail at Philip.Stiff@toledo.oh.gov.

Sincerely,

A handwritten signature in cursive script that reads "Philip C. Stiff III". The signature is written in black ink and is positioned below the word "Sincerely,".

Philip Stiff III  
Engineering Associate  
Toledo Division of Environmental Services

Enclosure

Jeanette Ball, Administrator, TES  
Karen Granata, TES  
Leslie Kovacik, City of Toledo  
Jim Kavalec, Ohio EPA  
John Paulian, Ohio EPA  
Brian Dickens, U.S. EPA Region 5