

WARNING LETTER

OVERNIGHT EXPRESS DELIVERY

September 12, 2017

John Pickering
Senior Vice President, Manufacturing
Philadelphia Energy Solutions Refining and Marketing, LLC
3144 Passyunk Avenue
Philadelphia, PA 19145

CPF 1-2017-6006W

Dear Mr. Pickering:

Between October 14 and November 16, 2015, a representative of the Pipeline and Hazardous Materials Safety Administration (PHMSA), Office of Pipeline Safety (OPS) pursuant to Chapter 601 of 49 United States Code (U.S.C.) inspected certain procedures of Philadelphia Energy Solutions Refining and Marketing, LLC's (PES) operation and maintenance manual and integrity management program along with associated records in Philadelphia, Pennsylvania.

As a result of the inspection, it is alleged that you have committed probable violations of the Pipeline Safety Regulations, Title 49, Code of Federal Regulations (CFR). The items inspected and the probable violations are:

1. §195.412 Inspection of rights-of-way and crossings under navigable waters.

(b) Except for offshore pipelines, each operator shall, at intervals not exceeding 5 years, inspect each crossing under a navigable waterway to determine the condition of the crossing.

PES failed to inspect each crossing under navigable waterways to determine the condition of the crossing at intervals not exceeding 5 years.

During this inspection, the PHMSA representative requested to review the most recent and previous navigable waterway inspection reports, respectively

- 1) PES presented a report titled *Summary of Inspection Findings* dated December 22, 2014 for an inspection conducted from September 18-19, 2014 at four Schuylkill River Crossings in Philadelphia, Pennsylvania.
- 2) PES presented a report titled *Summary of Inspection Findings* dated July 22, 2009 for an inspection conducted on March 11 and 23, 2009 at four Schuylkill River Crossings in Philadelphia, Pennsylvania.

The PHMSA representative requested a copy of the referenced drawings titled Sunoco Dwg. No. 1-0-3H/85001D in the report. PES produced the drawings that showed the location and names of the jurisdictional pipelines at the four crossings.

The time interval between the September 19, 2014 and March 23, 2009 inspection of crossing under four navigable waterways exceeded 5 years by 180 days. Therefore, PES failed to inspect each crossing under navigable waterways to determine the condition of the crossing at intervals not exceeding 5 years as prescribed in § 195.412(b).

2. §195.452 Pipeline integrity management in high consequence areas.

(b) *What program and practices must operators use to manage pipeline integrity? Each operator of a pipeline covered by this section must:...*

(5) Implement and follow the program.

PES failed to implement and follow its written integrity management program. Specifically, PES did not utilize a leak detection system for detecting leaks on its FM1 pipeline between Schuylkill River Tank Farm (SRFT) and West Yard for 2 years and # 7 Line for an undetermined time frame in accordance with its *Pipeline Integrity Management Plan, Revision Date: 3/6/2015, 5.6.2. Preventive and Mitigative Measures, 3) Leak Detection* (Procedure).

Pursuant to § 195.452(f)(6), an operator must include the element of identifying preventive and mitigative measures to protect the high consequence area as seen in § 195.452(i). Section 195.452(i)(3) states an operator must have a means to detect leaks on its pipeline system.

According to the Procedure, PES utilizes a computational pipeline monitoring (computer based) system which was referred to as Siemens/Controlotron to, among other things, detect leaks on its pipelines.

During this inspection, the PHMSA representative requested PES to produce records of its leak detection to review. Subsequently, PES presented an e-mail dated October 29, 2015 from the SRFT lead operator to the Inspection Superintendent stating, “[t]he following lines need to be addressed to repair the leak detection system at SRTF: 1) The FM1 line is not working at SRTF. Strap on equipment not functioning both at SRTF and N1 (Has not worked for 2 years)... 4) 7 Line reading bad...” PES’s Inspection Superintendent sent an e-mail to GP Instrument Reliability Engineer on November 13, 2015 stating “What do we need to do to correct these issues?” Therefore, PES was not able to utilize a leak detection system to detect leaks on the pipeline FM1 and # 7 Line in accordance with the Procedure *Section 5.6.2. Preventive and Mitigative Measures, 3) Leak Detection*.

Therefore, PES failed to implement and follow its Procedure as prescribed in § 195.452(b)(5) and in accordance with § 195.452(f)(6).

3. §195.452 Pipeline integrity management in high consequence areas.

(j) What is a continual process of evaluation and assessment to maintain a pipeline's integrity? –

(5) Assessment methods. An operator must assess the integrity of the line pipe by any of the following methods. The methods an operator selects to assess low frequency electric resistance welded pipe or lap welded pipe susceptible to longitudinal seam failure must be capable of assessing seam integrity and of detecting corrosion and deformation anomalies.

(iv) Other technology that the operator demonstrates can provide an equivalent understanding of the condition of the line pipe. An operator choosing this option must notify OPS 90 days before conducting the assessment, by sending a notice to the address or facsimile number specified in paragraph (m) of this section.

PES failed to notify OPS 90 days before conducting an assessment using “other technology”, by sending a notice to the address or facsimile number specified in § 195.452(m).

During this inspection, the PHSMA inspector requested to review PES’s integrity assessment schedule for its pipelines which are located in a high consequence area (HCA). PES provided the PHMSA representative with a copy of its *DOT Inspection Schedule* spreadsheet. The PHMSA representative noted that the in-service Line ID Nos. 11178 and 11179 was assessed using guided wave ultrasonic (GWUT) in 2010 and then in 2015. GWUT is considered to be “other technology.” Subsequently, the PHMSA representative requested PES to provide records of submitting the notification for using an “other technology” assessment method for Line ID Nos. 11178 and 11179 in 2015. PES did not provide records to show it submitted notification to OPS 90 days prior to using GWUT. In addition, the PHMSA representative confirmed with OPS that it did not receive a notification from PES for using an “other technology” assessment method in 2015.

Therefore, PES failed to notify OPS 90 days before conducting an assessment using “other technology”, by sending a notice to the address or facsimile number specified in § 195.452(m), as prescribed in § 195.452(j)(5)(iv).

4. §195.452 Pipeline integrity management in high consequence areas.

(i) What records must an operator keep to demonstrate compliance? (1) An operator must maintain, for the useful life of the pipeline, records that demonstrate compliance with the requirements of this subpart. At a minimum, an operator must maintain the following records for review during an inspection:

(ii) Documents to support the decisions and analyses, including any modifications, justifications, deviations and determinations made, variances, and actions taken, to implement and evaluate each element of the integrity management program listed in paragraph (f) of this section.

PES failed to maintain, for the useful life of the pipeline, documents that support the decisions and analyses, including any modifications, justifications, deviations and determinations made, variances, and actions taken, to implement and evaluate each element of the integrity management program. Specifically, PES failed to maintain adequate documentation to support its decision for determining whether an emergency flow restricting device (EFRD) was needed, to implement and evaluate preventive and mitigative measures pursuant to § 195.452(f)(6).

Pursuant to § 195.452(f)(6), an operator must include in its written integrity management program identification of preventive and mitigative measures to protect the high consequence area as seen in § 195.452(i).

According to § 195.452(i)(4), an operator must determine whether an EFRD is needed on a pipeline segment to protect a high consequence area in an event of a hazardous liquid pipeline release. The operator must, at least, consider the following factors in making the determination if a EFRD is needed — the swiftness of leak detection and pipeline shutdown capabilities, the type of commodity carried, the rate of potential leakage, the volume that can be released, topography or pipeline profile, the potential for ignition, proximity to power sources, location of nearest response personnel, specific terrain between the pipeline segment and the high consequence area, and benefits expected by reducing the spill size.

During this inspection, the PHMSA requested PES to produce records of the EFRD evaluation. Subsequently, PES presented its *Pipeline Integrity Management Plan, Revision Date: 3/6/2015, 5.6.2. Preventive and Mitigative Measures, a. Emergency Flow Restricting Devices* which states in part:

“Sunoco, Inc. R&M, and subsequently PES, considered the use of EFRD’s but determined the use of EFRD’s are not an appropriate course of action since they could potentially cause more problems than they can solve. For this reason this specific action is not included in the Risk Model. Most of the lines are within five miles of the refinery, and a majority of the lines are short river crossings linking one part of the refinery to the other. The closeness of the lines to the refinery and refinery operations means that they are monitored frequently.”

The document did not include details about the consideration made to the factors listed in § 195.452(i)(4). For instance, this document did not include information about considering type of commodity carried, potential ignition, or proximity to power source. In addition, this document did not include a detailed explanation for why EFRD was not needed or needed; instead of stating it will “cause more problems.” Furthermore, the document did not describe when the evaluation was done, who was involved in the decision making, and other pertinent information.

Therefore, PES failed to maintain adequate documentation to support its decision for determining whether an EFRD was needed, to implement and evaluate § 195.452(f)(6), as prescribed in § 195.452(l)(1)(ii).

As of April 27, 2017, under 49 U.S.C. § 60122 and 49 CFR § 190.223, you are subject to a civil penalty not to exceed \$209,002 per violation per day the violation persists up to a maximum of \$2,090,022 for a related series of violations. We have reviewed the circumstances and supporting documents involved in this case, and have decided not to conduct additional enforcement action

or penalty assessment proceedings at this time. We advise you to correct the items identified in this letter. Failure to do so will result in Philadelphia Energy Solutions Refining and Marketing, LLC being subject to additional enforcement action.

No reply to this letter is required. If you choose to reply, please submit all correspondence in this matter to Robert Burrough, Acting Director, PHMSA Eastern Region, 820 Bear Tavern Road, Suite 103, West Trenton, NJ 08628. Please refer to **CPF 1- 2017-6006W** on each document you submit, and whenever possible provide a signed PDF copy in electronic format. Smaller files may be emailed to robert.burrough@dot.gov. Larger files should be sent on a CD accompanied by the original paper copy to the Eastern Region Office.

Be advised that all material you submit in response to this enforcement action is subject to being made publicly available. If you believe that any portion of your responsive material qualifies for confidential treatment under 5 U.S.C. 552(b), along with the complete original document you must provide a second copy of the document with the portions you believe qualify for confidential treatment redacted and an explanation of why you believe the redacted information qualifies for confidential treatment under 5 U.S.C. 552(b).

Sincerely,

Robert Burrough
Acting Director, Eastern Region
Pipeline and Hazardous Materials Safety Administration