

June 4, 2021

Robert Burrough
Director, Eastern Region
Pipeline and Hazardous Materials Safety Administration
840 Bear Tavern Road, Suite 300
West Trenton, NJ 08628

RE: CPF 1-2021-020-NOPV

Dear Mr. Burrough:

This letter is a formal response by Eastern Gas Transmission and Storage, Inc. (EGTS) to the following alleged probable violations that were identified in Notice of Probable Violation CPF 1-2021-020-NOPV, dated May 6, 2021.

1. § 192.805 Qualification program.

Each operator shall have and follow a written qualification program. The program shall include provisions to:

(a) Identify covered tasks; ...

EGTSI failed to have and follow a written qualification program that identified operations and maintenance (O&M) welding inspection as a covered task.

During the inspection, the PHMSA inspector reviewed EGTSI's *D.O.T Operator Qualification Compliance Plan, Revision date: 12/11/18*¹ (OQ Compliance Plan), and observed that O&M welding inspection was not included as a covered task. When questioned during the inspection, EGTSI failed to provide an explanation as to why the O&M welding inspection was not identified as a covered task using the four-part test prescribed in §192.801(b). EGTSI's OQ Compliance Plan Section 3, Covered Tasks, indicated that EGTSI applied the four-part test to all identified activities to determine which tasks are covered.

Section 192.801(b) states:

For the purpose of this subpart, a covered task is an activity, identified by the operator that:

- 1) Is performed on a pipeline facility;

¹ The document provided to PHMSA contained a revision date of 12/11/18, but EGTSI clarified during and after the inspection that the actual revision date of the version reviewed was 12/31/19.

- 2) Is an operations or maintenance activity;
- 3) Is performed as a requirement of this part; and
- 4) Affects the operation or integrity of the pipeline.

Based on a review of EGTSI's records and procedures for its welding inspection process, it meets the § 192.801(b) 4-part test as follows:

1. EGTSI's welding inspection process is performed on EGTSI's pipeline facility.
2. EGTSI utilizes welding inspection for O&M pipe replacement projects.
3. Welding inspection is an activity required in accordance with § 192.241(a).
4. The inspection of welds affects the operation or integrity of the pipeline. EGTSI's welding inspection process ensures all applicable Welding Procedure Specifications are followed, as well as all visual weld inspections are performed as required.

EGTSI did not respond to PHMSA's written request to show how O&M welding inspection did not meet the § 192.801(b) four-part test. Rather, they only indicated that they do not consider it to be a covered task. EGTSI indicated that they require Company approved training for their welding inspectors.

Therefore, EGTSI failed to have and follow a written qualification program that included the identification of O&M welding inspection as a covered task in accordance with § 192.805(a).

EGTS Response:

EGTS has revised the Operator Qualification Plan to include the covered task E02.0811 Visual Inspection of Welding and Welds. The following is an excerpt from the current Operator Qualification Plan that was submitted to PHMSA on 5/21/2021 and is currently on file:

B31Q #	ITS Task Code	ITS Task Name	SCC	Requal Interval (Months)	Initial & Subsequent Qualification Method
0811	E02.0811	Visual Inspection of Welding and Welds	1:1	36	P & W/O

2. § 192.805 Qualification program.

Each operator shall have and follow a written qualification program. The program will include provisions to:

- (a) ...
- (b) **Ensure through evaluation that individuals performing covered tasks are qualified; ...**

EGTSI failed to ensure through evaluation that 90 individuals performing covered tasks were qualified.

During the inspection, PHMSA inspectors reviewed EGTSI's OQ Compliance Plan and associated OQ records of individual's covered task qualifications. Section 2 of EGTSI's OQ Compliance Plan concurred with the "Qualified" definition found in § 192.803(b), which states:

Qualified means that an individual has been evaluated and can:

- (a) Perform assigned covered tasks; and
- (b) Recognize and react to abnormal operating conditions.

However, it was found that in 90 cases EGTSI had granted covered task initial or requalifications to individuals based on the individual's renewal of training certificates from the same industry professional organization. In these cases, the renewal of training certificates did not include an evaluation of the individual's ability to perform the covered tasks or recognize and react to abnormal operating conditions (AOCs). The certificate renewal process for this organization includes an on-line application, self-certification of recent work history, meetings and workshop attendance, etc. and the renewal fee payment.

Based on the OQ records that EGTSI provided to PHMSA, 90 of the individuals who had been granted qualification had not been evaluated to ensure the individual is able to properly perform the covered task and recognize and react to task specific AOCs.

Therefore, EGTSI failed to ensure through evaluation that 90 individuals performing covered tasks were qualified, in accordance with § 192.805(b).

EGTS Response:

EGTS has revised the Operator Qualification Plan to include that individuals are qualified on their knowledge, skills and abilities through testing and evaluation. EGTS no longer grants collateral credit. EGTS requires that all individuals are qualified on both generic and task specific abnormal operating conditions. The following are excerpts from the current Operator Qualification Plan that was submitted to PHMSA on 5/21/2021 and is currently on file:

6 – ABNORMAL OPERATING CONDITIONS

The Company utilizes both general and task specific abnormal operating conditions (AOCs) as defined in ASME B31Q. Qualified Individuals performing a covered task shall maintain a current qualification in the general AOCs and shall be able to recognize and properly react to task specific AOCs that they might encounter during the performance of the covered task.

AOCs are included in training and testing materials to verify that individuals can recognize and react appropriately. Each AOC and associated reaction is reviewed and approved by SMEs familiar with that task.

8.2.2 Evaluation Criteria

For each covered task, the evaluation criteria are documented in the ITS Onboard system. Evaluation criteria represent the knowledge, skills, and distinctive physical abilities an individual must possess and demonstrate to be considered qualified to perform the covered task.

10.2 Section 9, Qualifications

The Company accepts welder qualifications attained under a properly administered test as defined in API 1104.

- The initial and subsequent qualification (certification) requirements of API 1104 shall govern.
- Recognition and reaction to general and task specific AOC's is delivered and recorded in ITS.

The Company accepts ASNT SNT-TC-1A for NDT: Digital Radiography for Corrosion Screening.

- The initial and subsequent qualification (certification) requirements of ASNT shall govern.
- Recognition and reaction to general and task specific AOC's is delivered and recorded in ITS.

For all tasks, other than welding tasks and NDT: Digital Radiography for Corrosion Screening, the Company only allow individuals qualified through ITS to perform covered functions. The individual's qualification must have been consistent with the ITS Enhanced Series and ASME B31Q-2018 without significant variations in order to be accepted.

3. § 192.805 Qualification program.

Each operator shall have and follow a written qualification program. The program will include provisions to:

(a) ...

(g) Identify those covered tasks and the intervals at which evaluation of the individual's qualifications is needed; ...

EGTSI failed to follow its written qualification program. Specifically, EGTSI failed to follow its OQ Compliance Plan and the OQ Compliance Plan appendix *Process for Determining OQ Re-qualification Intervals* (Requalification Appendix) regarding its process for determining covered task requalification intervals.

EGTSI's OQ Compliance Plan, Section 9, *Qualification Evaluation and Intervals*, describes their process to establish a requalification interval for each covered task, and further, indicates that two of the criteria applied to establish the requalification interval are difficulty of performance and frequency of performance.

EGTSI's Requalification Appendix describes the performance of a D-F analysis (difficulty - frequency) for each covered task to justify the requalification interval. EGTSI indicated this process had been in use since the inception of the OQ rule.

As part of its inspection, the PHMSA team reviewed a summary spreadsheet prepared by EGTSI, DETI Qualification and Requalification Methods (as of 11-14-2019), which lists 93 individual covered tasks and their respective requalification intervals.

EGTSI was unable to produce any records to document the performance of the D-F analysis, in accordance with the OQ Compliance Plan and the Requalification Appendix, to justify the requalification intervals for any of the 93 covered tasks. During the inspection, EGTSI indicated that its review of the archived records did not reveal any documentation that these analyses had been performed for covered tasks. The compliance staff further indicated that this process would be implemented prospectively for all current covered tasks utilized by EGTSI.

Thus, although EGTSI could demonstrate that it had established requalification intervals for each of its covered tasks, it failed to follow its OQ Compliance Plan and Requalification Appendix, and failed to document the results of D-F analyses to justify the established covered task requalification intervals.

EGTS Response:

EGTS has revised the Operator Qualification Plan to state how requalification intervals are determined. EGTS has adopted requalification intervals that are equal to or more restrictive than ASME B31Q-2018 and determines the requalification intervals for covered tasks that are not included in ASME B31Q-2018 (i.e. custom covered tasks) using a Difficulty, Importance, and Frequency (DIF) analysis as described in the Operator Qualification Plan, Section 9.6.4. The following are excerpts from the current Operator Qualification Plan that was submitted to PHMSA on 5/21/2021 and is currently on file:

9.6 Subsequent Qualification Interval

9.6.1 Adoption of ASME B31Q Subsequent Qualification Intervals

The Company is using requalification intervals that are equal to or more restrictive than ASME B31Q-2018. Requalification intervals are listed in Appendix 1 and 2.

9.6.2 Development and Implementation

Subsequent qualification intervals have been established with a three-month grace period.

- One-year subsequent qualification intervals may be stated as one year not to exceed 15 months.
- Three years subsequent qualification interval may be stated as three years not to exceed 39 months.
- Five-year subsequent qualification intervals may be stated as five years not to exceed 63 months.

The subsequent qualification intervals are established by subject matter expert (SME) consensus.

9.6.3 Subject Matter Expert Consensus

At a minimum, SMEs will set the subsequent qualification interval considering such factors as:

- Difficulty and importance of the tasks associated with the qualification.
- Potential for loss of knowledge, skill, or distinctive physical abilities over time.
- Manufacturer or vendor recommendations.
- Other technical issues that may impact the safety or integrity of the pipeline.

9.6.4 Difficulty, Importance, and Frequency Analysis

The Company has chosen to adopt ITS subsequent qualification intervals that are at least as stringent or more stringent than those defined in ASME B31Q-2018 as indicated in Appendix 1 and 2. For custom tasks a DIF is completed. During a DIF analysis process, for non-ASME B31Q-2018 tasks, SMEs:

1. Review tasks in their area of competence.
2. Thoroughly review the DIF factors, corresponding scales, and intended use of the information.
3. Ensure that they clearly understand how each rating value is distinguished.
4. Rate these tasks using rating scales for each DIF factor under analysis.

SMEs may provide these ratings through a consensus.

PROPOSED COMPLIANCE ORDER

Pursuant to 49 United States Code § 60118, the Pipeline and Hazardous Materials Safety Administration (PHMSA) proposes to issue to Eastern Gas Transmission and Storage, Inc. (EGTSI) a Compliance Order incorporating the following remedial requirements to ensure the compliance of EGTSI with the pipeline safety regulations:

1. In regard to Item Number 1 of the Notice pertaining to EGTSI's failure to have and follow a written operator qualification (OQ) program that identified covered tasks in accordance with § 192.805(a):
 - a. EGTSI must ensure all activities associated with operations and maintenance (O&M) welding inspection on its pipeline facilities, which meet the four-part test, are identified as a covered task in its written OQ program as prescribed in § 192.805(a).²² EGTSI is required to submit the related amendment(s) from its covered task list.

EGTS Response:

EGTS has revised the Operator Qualification Plan to include the covered task E02.0811 Visual Inspection of Welding and Welds. The following is an excerpt from the current Operator Qualification Plan that was submitted to PHMSA on 5/21/2021 and is currently on file:

B31Q #	ITS Task Code	ITS Task Name	SOC	Requal Interval (Months)	Initial & Subsequent Qualification Method
0811	E02.0811	Visual Inspection of Welding and Welds	1:1	36	P & W/O

1. In regard to Item Number 1 of the Notice pertaining to EGTSI's failure to have and follow a written operator qualification (OQ) program that identified covered tasks in accordance with § 192.805(a):
 - b. EGTSI must amend its OQ Compliance Plan to ensure through evaluation that individuals who perform O&M welding inspection covered task(s) in the amended cover task list are qualified as prescribed in § 192.805(b). EGTSI must submit the related amendments from its OQ Compliance Plan, which must include but is not limited to: evaluation method and criteria, and evaluation for recognition and reaction to abnormal operating conditions.

²² A covered task is defined as an activity that (1) is performed on a pipeline facility; (2) is an operation and maintenance task; (3) is performed as a requirement of Part 192; and (4) affects the operation or integrity of the pipeline (referred to as the "four-part test"). See 49 C.F.R. §192.801.

EGTS Response:

EGTS has revised the Operator Qualification Plan to include that all individuals are qualified on their knowledge, skills and abilities through testing and evaluation. EGTS no longer grants collateral credit. EGTS requires that all individuals are qualified on both generic and task specific abnormal operating conditions. The following are excerpts from the current Operator Qualification Plan that was submitted to PHMSA on 5/21/2021 and is currently on file:

6 – ABNORMAL OPERATING CONDITIONS

The Company utilizes both general and task specific abnormal operating conditions (AOCs) as defined in ASME B31Q. Qualified Individuals performing a covered task shall maintain a current qualification in the general AOCs and shall be able to recognize and properly react to task specific AOCs that they might encounter during the performance of the covered task.

AOCs are included in training and testing materials to verify that individuals can recognize and react appropriately. Each AOC and associated reaction is reviewed and approved by SMEs familiar with that task.

8.2.2 Evaluation Criteria

For each covered task, the evaluation criteria are documented in the ITS Onboard system. Evaluation criteria represent the knowledge, skills, and distinctive physical abilities an individual must possess and demonstrate to be considered qualified to perform the covered task.

2. In regard to Item Number 2 of the Notice pertaining to EGTSI's failure to ensure through evaluation that individuals performing covered tasks were qualified in accordance with § 192.805(b):
 - a. EGTSI must review and amend their OQ Compliance Plan and current list of acceptable means of qualification, including all industry certifications and/or renewal of certifications to ensure all individuals performing covered tasks have been evaluated in accordance with the requirements of 49 CFR 192 - Subpart N, Qualification of Pipeline Personnel. EGTSI must submit their revised OQ Compliance Plan, with attachments, to the Eastern Region Director for approval.

EGTS Response:

EGTS has revised the Operator Qualification Plan to include that all individuals are qualified on their knowledge, skills and abilities through testing and evaluation. EGTS no longer grants collateral credit. EGTS requires that all individuals are qualified on both generic and task specific abnormal operating conditions. The following are excerpts from the current Operator Qualification Plan that was submitted to PHMSA on 5/21/2021 and is currently on file:

6 – ABNORMAL OPERATING CONDITIONS

The Company utilizes both general and task specific abnormal operating conditions (AOCs) as defined in ASME B31Q. Qualified Individuals performing a covered task shall maintain a current qualification in the general AOCs and shall be able to recognize and properly react to task specific AOCs that they might encounter during the performance of the covered task.

AOCs are included in training and testing materials to verify that individuals can recognize and react appropriately. Each AOC and associated reaction is reviewed and approved by SMEs familiar with that task.

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- Recognition and reaction to general and task specific AOC's is delivered and recorded in ITS.

For all tasks, other than welding tasks and NDT: Digital Radiography for Corrosion Screening, the Company only allow individuals qualified through ITS to perform covered functions. The individual's qualification must have been consistent with the ITS Enhanced Series and ASME B31Q-2018 without significant variations in order to be accepted.

b. EGTSI must prepare and implement a written plan that will ensure that all individuals who had been qualified without evaluation are evaluated to ensure they are qualified to perform their assigned covered tasks, and recognize and react to abnormal operating conditions. Documentation must be submitted that verifies the employees in question have been evaluated for both performing the covered task(s) and recognizing AOCs based on EGTSI's amended procedures in accordance with item 2. (a) requirement, and must be submitted to the Eastern Region Director for approval.

EGTS Response:

Based on the qualification records that were submitted to PHMSA on June 12, 2020, EGTS submits the following plan to implement corrective actions for Compliance Order Item #2b. The individuals that were granted qualification for covered tasks through collateral credit are scheduled for requalification. These requalifications shall be established through knowledge, skills, and abilities as well as task specific abnormal operating conditions and will be completed as soon as possible, but no later than 180 days

from the date of the Final Order. Records of the requalifications will be documented in the ITS OnBoard System for training, written exams and performance evaluations and will be submitted to the PHMSA Eastern Region Director no later than 180 days from the date of the Final Order.

If you have any questions, concerns, or should require additional information, please do not hesitate to contact Dan Stahl at 681-842-3365 (Office) or 304-266-6062 (Mobile).

Respectfully,



John M. Lamb
Vice President, Eastern Pipeline Operations
Eastern Gas Transmission and Storage, Inc.
June 4, 2021