May 28, 2021

Gregory A. Ochs
Director, Central Region
Pipeline and Hazardous Materials Safety Administration
901 Locust Street, Suite 480
Kansas City, MO 64106

Re: CPF 3-2021-027-NOPV
Request for Informal Conference & Request for a Hearing on Items 1, 3 & 7
Request for Violation Report and Civil Penalty Worksheet

Dear Mr. Ochs:

This letter contains Northern Natural Gas’ (Northern) response to the above-referenced Notice of Probable Violation, Proposed Civil Penalty and Proposed Compliance Order, dated April 28, 2021 (“Notice”). Northern respectfully requests an informal conference to discuss and provide additional information related to Items 1, 3 and 7 in the Notice. Northern believes these items can be clarified or resolved through further, good-faith discussion of the facts and circumstances. To support a full discussion of the issues, Northern requests PHMSA’s violation report and civil penalty worksheet for this case.

Northern is hopeful that Items 1, 3, and 7 can be addressed to PHMSA’s satisfaction through an informal conference, and that no hearing will be necessary. However, should those discussion not produce a resolution, Northern requests a hearing pursuant to 49 C.F.R. §§ 190.208 (b)(4) and 190.211(b). If a hearing is held, Northern will be represented by counsel.

Northern does not contest Item 2 in the Notice, and because Items 4, 5, 6, and 8 were Warning Items, they are not addressed here.

1. § 192.465 External corrosion control: Monitoring.
   (a) . . .
   (b) Each cathodic protection rectifier or other impressed current power source must be inspected six times each calendar year, but with intervals not exceeding 2½ months, to ensure that it is operating.

*Northern Natural Gas Company (NNG) failed to ensure that cathodic protection (CP) rectifiers were operating. PHMSA reviewed NNG’s records for CP monitoring and found*
that four rectifiers at the Clifton storage field were out of service for multiple consecutive inspection intervals. The rectifiers were found to be generating zero amps of protective current and were therefore not operating. NNG’s inspections recording the zero-output condition are not insurance that the rectifiers are protecting the pipeline from corrosion. To ensure that the rectifiers are operating, NNG must take action to repair or replace the rectifier before the next scheduled inspection after finding the rectifier out of service.

M600A-CLI:14.24
M600A-CLI:22.77
M600D-CLI:14.34
M600D-CLI:9.42

3 intervals in 2019
3 intervals in 2017
3 intervals in 2017
4 intervals from 2019 to 2020

Northern’s preliminary statement of the issues for Item 1:

Northern has compared the outage intervals stated in the Notice to company records provided during the inspection. The intervals set forth in the Notice do not match our records. To better understand this apparent discrepancy, Northern requests a copy of the violation report and civil penalty worksheet.

If a hearing is held, Northern intends to discuss the scope of this allegation, related supporting documentation, and the amount of the proposed civil penalty.

2. § 192.481 Atmospheric corrosion control: Monitoring.
   (a) Each operator must inspect each pipeline or portion of pipeline that is exposed to the atmosphere for evidence of atmospheric corrosion, as follows:
   If the pipe is located: Then the frequency of inspection is:
   Onshore At least once every 3 calendar years, but with intervals not exceeding 39 months.
   Offshore At least once each calendar year, but with intervals not exceeding 15 months.

NNG failed inspect pipe exposed to the atmosphere under the floors of its meter buildings during inspections for atmospheric corrosion. During the inspection, PHMSA requested records of atmospheric inspections pertaining to known locations with above ground pipe that is not readily accessible to visual observation, which had been identified by NNG at its facilities. To address the need for inspection at these locations, NNG provided records of an annual inspection task in addition to the 3-year inspection for atmospheric corrosion for 38 facilities in Kansas and Nebraska that had piping inaccessible to visual inspection. Although these inspections are more frequent than the 3-year requirement, they are inadequate because they do not provide for inspection of above ground pipe concealed in spaces under the floors of the meter buildings where pipe penetrates the floor and runs between the floor and the ground.
Northern’s response:

Northern is addressing the facilities with above ground piping not readily accessible to visual observation, and will complete remediation of the 38 sites referenced in the Notice prior to the due date specified in the Proposed Compliance Order.

3. § 192.605 Procedural manual for operations, maintenance, and emergencies.
   (a) General. Each operator shall prepare and follow for each pipeline, a manual of written procedures for conducting operations and maintenance activities and for emergency response. For transmission lines, the manual must also include procedures for handling abnormal operations. This manual must be reviewed and updated by the operator at intervals not exceeding 15 months, but at least once each calendar year. This manual must be prepared before operations of a pipeline system commence. Appropriate parts of the manual must be kept at locations where operations and maintenance activities are conducted.

NNG failed to follow its procedures for excavation. Specifically, NNG did not follow its operations and maintenance procedure section 080.111, “Excavation Observation and Protection” (Procedure), by failing to ensure that the mechanical excavation equipment did not come within 24 inches of the pipeline. Section 5.4.8 of the Procedure prohibits the motion of an excavator bucket within a 24-inch “exclusion zone” of a pipeline. During the inspection, PHMSA requested records of excavation damage. In response, NNG provided records of the following instances of excavation damage caused by its own contractors:

- On August 16, 2019, NNG’s contractor damaged its M580B 24” Palmyra to Oakland pipeline when the excavator used excessive downward force, striking the pipeline with the backhoe bucket.
- On October 27, 2019, NNG’s contractor damaged its pipeline at the Sunray, Texas compressor station when the excavator and NNG representative inspector agreed to use a jackhammer to remove concrete above a 20” pipe without confirming the pipe depth.

Northern’s preliminary statement of the issues for Item 3:

While the contractor damage to the pipeline in these cases was minor with no release of gas, Northern takes any pipeline damage or near miss very seriously and conducts detailed post-incident investigations with action items to prevent recurrence and document lessons learned. Northern updated its policies and procedures in response to these events and continuously updates and improves its damage prevention procedures.

If a hearing is held, Northern intends to discuss the facts and circumstance related to this allegation and the company’s efforts to prevent pipeline damage.
7. § 192.935 What additional preventive and mitigative measures must an operator take?

(a) . . . .
(c) *Automatic shut-off valves (ASV) or Remote-control valves (RCV).*

If an operator determines, based on a risk analysis, that an ASV or RCV would be an efficient means of adding protection to a high consequence area in the event of a gas release, an operator must install the ASV or RCV. In making that determination, an operator must, at least, consider the following factors—swiftness of leak detection and pipe shutdown capabilities, the type of gas being transported, operating pressure, the rate of potential release, pipeline profile, the potential for ignition, and location of nearest response personnel.

NNG's risk analysis failed to consider swiftness of leak detection and pipe shutdown capabilities, the type of gas being transported, operating pressure, the rate of potential release, pipeline profile, the potential for ignition, and location of nearest response personnel when it concluded that ASVs or RCVs would not be an efficient means of protecting high consequence areas. The regulation requires that an operator consider, at least, those factors prior to making such a determination.

During the inspection, PHMSA requested records of the consideration for installation of ASVs. NNG responded by providing a short position paper that broadly applies an assessment of ASVs and RCVs as ineffective. The paper states: "NNG does not use automatic shutoff valves" and "Northern's position is not to install RCVs" and bases the rationale against the use of ASVs on the need for deliveries. Additionally, the paper bases the rationale against RCVs on reasoning that most injuries will have already occurred due to an incident, citing the conclusions of a 1998 white paper sponsored by the Gas Research Institute (GRI-98/0076) in favor of more recent studies.

NNG also provided a guideline for application of its paper which shows how other preventive and mitigative measures are applied to reduce risk, however this application fails to technically justify the conclusions on the need for, or lack of need for, the installation of ASVs or RCVs in specific HCA's. The primary consideration used in ruling out ASVs and RCVs given in the guideline is that there are no HCA's that had an unmitigated high risk of failure (ROF). Accordingly, NNG's integrity management process eliminates the use of ASVs and RCVs to reduce risk by concluding their use to be inherently inefficient, without consideration of the mandated criteria, and has therefore failed to comply with § 192.935.

Northern's preliminary statement of the issues for Item 7:

Northern received a Final Order (CPF No. 4020-1008) from the PHMSA Southwest Region on April 23, 2021, a few days before receiving the April 28, 2021, Notice in this case. That Final Order includes a compliance order that provides Northern until July 23, 2021, to update its risk analysis related to ASVs and RCVs. Northern was in the process of making the changes required by the Final Order when it received the new Notice in this case. The April 23, 2021, Final Order makes a finding of violation of 49 C.F.R. § 192.935(c) related
to the same risk analysis issues that are now raised again in the Central Region Notice. The Final Order requires Northern to take the same actions, but on a systemwide basis, that are now proposed in the Notice in this case. These enforcement actions address the same issue and the Notice duplicates PHMSA’s finding of violation and compliance order that was just issued.

If a hearing is held in this case, Northern intends to discuss the duplicate nature of the recent Southwest Region Final Order and the Central Region Notice in this case.

I will reach out to you shortly to discuss scheduling an informal meeting. In the meantime, should you have any questions, please feel free to contact me directly at (402) 398-7715.

Sincerely,

Tom Correll
Vice President, Pipeline Safety and Risk
Northern Natural Gas