Department of Energy
Washington, DC 20585

April 1, 2019

VIA OVERNIGHT UPS MAIL CARRIER

Mr. Leonard Blackford
President and Chief Executive Officer
CH2M Hill Plateau Remediation Company
P.O. Box 1600
Richland, Washington 99352

NEA-2019-01

Dear Mr. Blackford:

This letter refers to the Department of Energy (DOE) investigation into the facts and circumstances associated with the spread of radiological contamination outside of the established radiological boundary of the Plutonium Finishing Plant at Hanford in 2017 and 2018. The DOE Office of Enterprise Assessments' Office of Enforcement provided the results of the investigation to CH2M Hill Plateau Remediation Company (CHPRC) in an investigation report dated November 26, 2018. An enforcement conference was convened on January 15, 2019, with you and members of your staff to discuss the report's findings and CHPRC's response. A summary of the enforcement conference and attendance roster are enclosed.

DOE considers the spread of radiological contamination outside of the established radiological boundary of the Plutonium Finishing Plant to be of high safety significance. On multiple occasions during December 2017, CHPRC found removable contamination dispersed in a non-uniform manner outside radiological areas. Contamination was found in areas where it would not normally be expected, including next to administrative buildings, on privately- and government-owned vehicles, and within established dining areas. The contamination led to radiological intakes to 11 employees, resulting in committed effective doses of up to 13 millirem. The event revealed deficiencies in: (1) contamination control; (2) monitoring of areas; (3) quality improvement; (4) hazard analysis; and (5) unreviewed safety questions.

Based on an evaluation of the evidence in this matter, including information presented at the enforcement conference, DOE concludes that CHPRC violated requirements enforceable under 10 C.F.R. Part 820, *Procedural Rules for DOE Nuclear Activities*, including 10 C.F.R. Part 830, *Nuclear Safety Management*, Subpart A, *Quality Assurance Requirements*; 10 C.F.R. Part 830, Subpart B, *Safety Basis Requirements*; and 10 C.F.R. Part 835, *Occupational Radiation Protection*. Accordingly, DOE hereby issues the enclosed Preliminary Notice of Violation

(PNOV) which cites three Severity Level II violations, and two Severity Level III violations.

DOE reduced the total contract fee that was awarded to CHPRC in fiscal year 2018 by approximately $1.8 million because of the deficiencies associated with this event, in addition to a fee reduction of approximately $1 million during fiscal year 2017 associated with a precursor event in June 2017. In consideration of these significant adverse contract actions already taken, and in accordance with established DOE enforcement practices, DOE proposes no civil penalty for the violations cited in this PNOV.

CHPRC conducted causal factors and extent-of-condition analyses of the spread of radiological contamination event and developed corrective actions that addressed some of the deficiencies specific to the event. DOE found the CHPRC corrective action plan will likely be adequate to prevent recurrence of a similar radiological event in the future, but also found that it did not address program deficiencies noted in the areas of hazard analysis and unreviewed safety questions.

Pursuant to 10 C.F.R. § 820.24, *Preliminary Notice of Violation*, you are obligated to file a written reply within 30 calendar days after the date of filing of the enclosed PNOV and to follow the instructions specified in the PNOV when preparing your response. If you fail to submit a reply within the 30 calendar days, then in accordance with 10 C.F.R. § 820.33, *Default order*, subsection (a), DOE may pursue a Default Order.

After reviewing your reply to the PNOV, including any proposed additional corrective actions entered into DOE's Noncompliance Tracking System, DOE will determine whether any further activity is necessary to ensure compliance with DOE nuclear safety requirements. DOE will continue to monitor the completion of corrective actions until this matter is fully resolved.

Sincerely,

Kevin L. Dressman
Acting Director
Office of Enforcement
Office of Enterprise Assessments

Enclosures: Preliminary Notice of Violation (NEA-2019-01)
Enforcement Conference Summary
Enforcement Conference Attendance Roster

cc: Brian Vance, DOE-RL
Lynn Nye, CHPRC

Preliminary Notice of Violation

CH2M HILL Plateau Remediation Company
Hanford Site

NEA-2019-01

A U.S. Department of Energy (DOE) investigation into the facts and circumstances associated with the spread of radiological contamination outside of the established radiological boundary of the Plutonium Finishing Plant (PFP) in 2017 and 2018 revealed multiple violations of DOE nuclear safety requirements by CH2M Hill Plateau Remediation Company (CHPRC). On multiple occasions during December 2017, CHPRC found removable contamination dispersed in a non-uniform manner outside radiological areas. Contamination was found in areas where it would not normally be expected, including next to administrative buildings, on privately- and government-owned vehicles, and within established dining areas. The contamination led to radiological intakes to 11 employees, resulting in committed effective doses of up to 13 mrem.

DOE provided CHPRC with an investigation report dated November 26, 2018, and convened an enforcement conference on January 15, 2019, with CHPRC representatives to discuss the report's findings and CHPRC's response. A summary of the conference and list of attendees is enclosed.

Pursuant to Section 234A of the Atomic Energy Act of 1954, as amended, and DOE regulations set forth at 10 C.F.R. Part 820, *Procedural Rules for DOE Nuclear Activities*, DOE hereby issues this Preliminary Notice of Violation (PNOV) to CHPRC. The violations include deficiencies in: (1) contamination control; (2) monitoring of areas; (3) quality improvement; (4) hazard analysis; and (5) unreviewed safety questions (USQs). DOE has grouped and categorized the violations as three Severity Level II violations and two Severity Level III violations.

Severity Levels are explained in Part 820, Appendix A, *General Statement of Enforcement Policy*. Paragraph VI(b) states that "Severity Level II violations represent a significant lack of attention or carelessness toward responsibilities of DOE contractors for the protection of public or worker safety which could, if uncorrected, potentially lead to an adverse impact on public or worker safety at DOE facilities." Paragraph VI(b) also states that "Severity Level III violations are less serious but are of more than minor concern: i.e., if left uncorrected, they could lead to a more serious concern."

DOE reduced the total contract fee that was awarded to CHPRC in fiscal year 2018 by approximately $1.8 million because of the deficiencies associated with this event, in addition to a fee reduction of approximately $1 million during fiscal year 2017 associated with a precursor event in June 2017. In consideration of these significant adverse contract actions already taken, and in accordance with established DOE enforcement practices, DOE proposes no civil penalty for the violations cited in this PNOV.

As required by 10 C.F.R. § 820.24(a) and consistent with Part 820, Appendix A, the violations are listed below. Citations specifically referencing the quality assurance criteria of 10 C.F.R. § 830.122 represent violations of § 830.121(a), which requires compliance with those quality assurance criteria.

I. VIOLATIONS

A. Contamination Control

Title 10 C.F.R. § 835.101, *Radiation protection programs*, subsection (a), states that "[a] DOE activity shall be conducted in compliance with a documented radiation protection program (RPP) as approved by the DOE."

CHPRC describes the policies and procedures that comprise the DOE-approved RPP in CHPRC-00072, *CH2M Hill Plateau Remediation Company Radiation Protection Program*, Revision 7, dated April 13, 2017, as required by 10 C.F.R. § 835.101. Section 1.0, *Summary*, of this CHPRC document states that "[t]he CHPRC RPP has been developed and revised to ensure compliance with the requirements of Title 10, Code of Federal Regulations, Part 835." Section 1.0 also states that "Appendix A of this RPP is a requirements matrix identifying CHPRC's commitments to 10 C.F.R. Part 835 requirements."

Title 10 C.F.R. § 835.1102, *Control of Areas*, subsection (a), states that "[a]ppropriate controls shall be maintained and verified which prevent the inadvertent transfer of removable contamination to locations outside of radiological areas under normal operating conditions."

Title 10 C.F.R. § 835.2, *Definitions*, states that "[h]igh contamination area [HCA] means any area, accessible to individuals, where removable surface contamination levels exceed or are likely to exceed 100 times the removable surface contamination values specified in [Appendix D, *Surface Contamination Values*, of 10 C.F.R. Part 835]." Section 835.2 also states that "[c]ontamination area [CA] means any area, accessible to individuals, where removable surface contamination levels exceed or are likely to exceed the removable surface contamination values specified in [Appendix D of Part 835], but do not exceed 100 times those values." Appendix D of Part 835 identifies that removable surface contamination levels for transuranic radionuclides is 20 disintegrations per minute (dpm) per 100 cm^2.

CHPRC implements the requirements of 10 C.F.R. § 835.1102(a) as requirement #219 in Appendix A, *Requirements Matrix*, of the RPP.

Contrary to these requirements:

1. CHPRC failed to address the normal operating conditions that were present during demolition, including those that occurred during December 2017, as evidenced by the following:

    a. CHPRC's evaluation of the potential for spread of contamination during demolition is documented in PNNL-20173, *Air Dispersion Modeling of Radioactive Releases During the Proposed PFP Complex Demolition Activities*, Rev. 4, dated October 2016 (ADM report). Section 2.2 of the ADM report identifies that "historical weather patterns are assumed representative of conditions that will occur during the demolition period." CHPRC did not evaluate the presence of other factors that could impact the spread of contamination during normal operating conditions, such as the presence of fogging equipment that produces nozzle exit velocities of 10,000 feet per minute (approximately 114 miles per hour). CHPRC was aware that it did not address all normal operating conditions, as evidenced by:

        (1) The Apparent Cause Evaluation (ACE) for an inadvertent transfer of removable contamination in June 2017 was documented in EM-RL--CPRC-PFP-2017-0013, *Contamination Spread during Demolition of Plutonium Reclamation Facility (PRF)*, CHPRC, July 18, 2017. ACE Section 5.1, *Cause Evaluation Description*, identified that "the fogger had the potential to create a mode of force for pushing or dislodging contamination past the suppression efforts."

        (2) ACE Section 5.1, *Cause Evaluation Description*, identified that "the contamination was dispersed in a spotty and non-uniform manner beyond the boundary. Actual quantities were a factor of two times what was anticipated from the ADM report. The airborne radioactivity was more concentrated; greater than ten times higher than was modeled." The ADM report expected a uniform distribution of contamination.

        (3) CHPRC documented an April 2017 management assessment in PFP-2017-MA-18836, *Plutonium Finishing Plant (PFP) 234-5Z and 291-Z Management Assessment*, May 22, 2017. The *Radiological Controls* section of the *Description of Assessment Results* identified that "during the management assessment a release of radioactive material occurred during demolition activities that exceeded the predicted levels…. Further investigation appears to be warranted to determine the reason for the difference between the predicted contamination levels and the actual contamination levels seen during some of the demolition activities."

2. CHPRC failed to prevent the inadvertent transfer of removable contamination to locations outside of radiological areas under normal operating conditions.

a. On multiple occasions, CHPRC found removable contamination dispersed in a non-uniform manner outside radiological areas, often exceeding the values for a CA (i.e., greater than 20 dpm per 100 cm^2 but less than 2,000 dpm per 100 cm^2) or even an HCA (i.e., greater than 2,000 dpm per 100 cm^2). Contamination was found in areas where it would not normally be expected, including next to administrative buildings, on privately- and government-owned vehicles, and within established dining areas. Specific examples include:

   (1) A compilation of radiological surveys in *PFP Post Event Surveys – Map*, dated December 22, 2017, identified that administrative buildings had up to 3,000 dpm per 100 cm^2 removable alpha contamination on their exterior.

   (2) A radiological survey performed on December 18, 2017, was documented in Radiological Survey Report Z-1704589. This report identified that a privately owned vehicle (POV) had 8,000 dpm per 100 cm^2 removable alpha contamination on its exterior. *PFP Post Event Surveys – Map* identified six additional POVs that were identified as contaminated as a result of surveys on December 18, 2017.

   (3) A radiological survey performed on December 18, 2017, was documented in Radiological Survey Report Z-1704572, which identified 13,500 dpm per 100 cm^2 total alpha contamination within a dining area.

b. Two POVs that were identified as being contaminated were driven off the Hanford Site into offsite areas accessible to the public without being approved for release.

c. Uncontrolled removable contamination resulted in radiological intakes to 11 employees, resulting in committed effective doses of up to 13 mrem; these were in addition to 31 radiological intakes from the June 2017 event.

3. CHPRC failed to identify appropriate controls to prevent inadvertent transfer of removable contamination to locations outside of radiological areas.

   a. The *Policy and Commitment Basis* identified in the RPP for implementing requirement #219 in Appendix A, *Requirements Matrix,* focuses on the transfer of contamination via the egress of personnel, tools, and equipment. CHPRC did not discuss controls for preventing inadvertent transfer of contamination via natural phenomena (e.g., strong winds), water and fixative application, and other conditions present during an open-air demolition activity.

   b. CHPRC diluted a fixative used during demolition activities; however, the manufacturer of the fixative does not recommend any dilution. CHPRC did

not document a technical basis or analysis to provide assurance that the diluted fixative would prevent inadvertent transfer of removable contamination.

Collectively, these noncompliances constitute a Severity Level II violation.

B. Monitoring of Areas

Title 10 C.F.R. § 835.401, *General requirements*, states in part that "[m]onitoring of … areas shall be performed to: … (3) [d]etect changes in radiological conditions; (4) [d]etect the gradual buildup of radioactive material, [and] (5) [v]erify the effectiveness of engineered and administrative controls in containing radioactive material."

CHPRC implements the requirements of 10 C.F.R. § 835.401 as requirements #64 through #69 in Appendix A, *Requirements Matrix*, of the RPP.

Contrary to these requirements, CHPRC failed to monitor areas effectively. CHPRC documented the As Low as Reasonably Achievable (ALARA) review of the PRF demolition in Z-AMW-1018, *CHPRC ALARA Management Worksheet* (AMW), Rev. 20, signed on November 16, 2017. AMW Section Q, *Contamination control considerations*, limits surveys to discrete fixed points (e.g., flat metal plates referred to as "cookie sheets") and controlled area boundaries. CHPRC did not require surveys of other areas (e.g., the 236-Z building footprint and surrounding areas) until after demolition was complete, consistent with the PRF demolition work package *Building 236-Z Demolition*, 22-15-06342 / M WCN #006. This methodology was not effective in detecting changes in radiological conditions caused by non-uniformly distributed contamination.

This noncompliance constitutes a Severity Level II violation.

C. Quality Improvement

Title 10 C.F.R. § 830.121, *Quality Assurance Program (QAP)*, subsection (b), states that "[t]he contractor responsible for a DOE nuclear facility must:…(4) conduct work in accordance with the QAP."

Title 10 C.F.R. § 830.122(c), *Criterion 3—Management/Quality Improvement*, requires contractors to "(2) [i]dentify, control, and correct items, services, processes that do not meet established requirements [and] (3) [i]dentify the causes of problems and work to prevent recurrence as a part of correcting the problem."

CHPRC established its QAP in PRC-MP-QA-599, *Quality Assurance Program*, Rev. 4, Chg. 2, dated July 3, 2017. CHPRC implemented the requirements of 10 C.F.R. § 830.122(c)(2) in part through Section 3.3, *Implementation*, of its QAP, which states that "[q]uality improvement processes shall be established and

implemented to detect, prevent, and correct quality problems. The quality improvement processes shall include, at a minimum, issue identification, evaluation, control, and tracking; issues management; and feedback and improvement."

Contrary to these requirements, CHPRC failed to adequately identify the causes of problems and take steps to prevent recurrence as a part of correcting the problem, as evidenced by:

1. CHPRC developed and documented the corrective actions for the June 2017 spread of contamination event in condition report CR-2017-1136, *Group 6(B), SC3: Contamination during Gallery Glovebox Removal Demolition Activities*, submitted on June 12, 2017. These corrective actions were inadequate in the following ways:

    a. Action Statement #2 required CHPRC to "determine controls for the use of the foggers" and "revise or incorporate additional controls into the work package." CHPRC documented that the action taken to address this action statement was to revise the AMW to include the following statement: "When applying fixative using a 'water cannon,' use the 'fog' mode with a width of 10 feet minimum." However, by the time of the December 2017 spread of contamination, CHPRC had revised the AMW to remove the minimum width.

    Additionally, CHPRC did not identify actions for the use of fogging equipment other than the water cannons, even though ACE Section 5.1, *Cause Evaluation Description*, identified that "the fogger also had potential to create a mode of force pushing or dislodging contamination past the suppression efforts." CHPRC substantiated this potential in condition report CR-2017-2640, *Contamination found on Truck and Van*, dated December 15, 2017, which identified that "the winds had shifted during demolition and mist was going across the boundaries" and went on to state that the mist resulted in contamination levels up to 613 dpm/100 cm^2 alpha removable. These values are greater than those identified for CAs in Appendix D of Part 835, which identifies that the removable surface contamination level limit for transuranic radionuclides is 20 dpm per 100 cm^2.

    b. Action Statement #4 required CHPRC to "determine the appropriate fixative concentration" and "revise or incorporate additional controls into the work package." CHPRC documented that the action taken was to test various fixative concentrations. After finding that a 100 percent concentration of fixative was too thick to adequately spray, CHPRC ultimately selected a 50 percent mixture of fixative. The basis for CHPRC's determination of the 50 percent mixture's effectiveness was limited to visual observation, with no action to determine whether that mixture could meet the requirement to prevent the spread of radioactive contamination. CHPRC also did not evaluate how effective the mixture would be when further diluted by application on wet materials.

c. Action Statement #5 required CHPRC to "determine if additional contamination engineering controls were needed" and then to "revise or incorporate additional controls into the work package." CHPRC documented that the action taken was, in part, to revise the AMW to add a commentary about controls that posited "a set of alternative controls [that] could significantly reduce the probability of a release of radioactive material." These alternative controls included providing containment over the remainder of the building or changing the process for removing metal beams that provided structural support for process equipment (i.e., "strongbacks"). However, CHPRC did not determine whether these additional contamination controls were needed, as required by the action statement. The closure rationale provided in the condition report concluded by stating that "all options need to be weighed in the context of ALARA taking into account social, technical, economic, practical, and public policy considerations." There is no evidence that CHPRC performed an evaluation that accounted for all these factors.

2. CHPRC's actions in response to similar events, including the January and June 2017 spreads of contamination and the spread of contamination at the Separations Process Research Unit (SPRU), were insufficient to prevent the December 2017 events. The similarities of these past events to the December 2017 events are as follows:

   a. The ACE for the June 2017 event identified two apparent causes: (1) the work package controls set was inadequate to prevent the release and maintain control of contamination, and (2) water did not keep the particulate contained within the radiological boundary. Both of these apparent causes are also true of the December 2017 spread of contamination.

   b. Two of the three contributing causes of the June 2017 event directly apply to the December 2017 spread of contamination: (1) the contamination and airborne radioactivity were not uniformly distributed on the ground and in the air as anticipated in the ADM report, and (2) the positioning or mode of force of the water either may have pushed the contamination past fogging, or overcame the application. Both of these contributing causes also apply to the December 2017 spread of contamination.

   c. CHPRC documented the root cause evaluation for a January 2017 spread of contamination in EM-RL--CPRC-PFP-2017-0003, *Contamination Discovered inside the Demolition Zone*, dated January 27, 2017, which identified that the work package instruction to use water or fixative suppression to "adequately control dust and airborne radioactivity" was a causal factor for contamination outside the demolition zone – specifically, the use of subjective terminology that did not clearly identify the expectations of the work package. This causal factor also applies to the December 2017 spread of contamination.

d. CHPRC reviewed other plutonium facility demolitions, including SPRU. The Type B accident investigation for the demolition challenges at SPRU was documented in *Radiological Contamination Event During Separations Process Research Unit Building H2 Demolition September 29, 2010*, dated November 23, 2010. Section 4.0 of SPRU investigation, *Conclusions and Judgments of Need*, identified that the SPRU contractor had relied too much on the application and effectiveness of fixatives to control contamination during demolition and prevent the spread of contamination off site and that there was no plan for applying or verifying the effectiveness of the fixative.

   CHPRC's document, *Comparison of PFP versus SPRU*, Rev 2, did not evaluate this judgment of need for applicability beyond the specific situation at SPRU, which involved internally contaminated equipment. Based on that comparison, CHPRC established expectations for application of fixatives in its data quality objectives and technical safety requirements. However, these expectations did not include verification of the coverage or effectiveness of the fixative.

Collectively, these noncompliances constitute a Severity Level II violation.

D. Hazard Analysis

Title 10 C.F.R. § 830.202, *Safety basis*, subsection (b), states that "[i]n establishing the safety basis for a hazard category 1, 2, or 3 DOE nuclear facility, the contractor responsible for the facility must: … (2) [i]dentify and analyze the hazards associated with the work." Title 10 C.F.R. § 830.3, *Definitions*, states that "[h]azard means a source of danger (i.e., material, energy source, or operation) with the potential to cause illness, injury, or death to a person or damage to a facility or to the environment (without regard to the likelihood or credibility of accident scenarios or consequence mitigation)."

CHPRC implements this requirement through procedure PRC-PRO-NS-700, *Safety Basis Development*, Rev. 1, Chg. 4, dated September 14, 2017. Section 3.3.1.5 requires the Hazard Identification Team Leader to perform "a systematic, comprehensive and unmitigated hazard identification [and] the hazard identification must specify the form, quantity, and location of the hazard."

Contrary to these requirements, CHPRC failed to identify and analyze all the hazards associated with the demolition of PFP, as evidenced by the following:

1. The CHPRC documented safety analysis (DSA) did not properly evaluate the impact of strong winds on the rubble piles or structures degraded by demolition activities. The hazard analysis for the PFP DSA is documented in HNF-15501, *Plutonium Finishing Plant Deactivation & Decommissioning Hazard Analysis*, Rev. 1, dated April 2015. Event 3.3.7-9 of the PFP hazard analysis, *Strong wind*

impact PFP facilities, states that strong winds will not impact the facility's material at risk during demolition because the buildings "have been demonstrated to withstand both the wind forces and standard missiles associated with the wind."

2. CHPRC did not evaluate fogging equipment as a potential initiator for a release of material at risk in the DSA. Table A-1, *Hazard Identification Checklist and Energy Designators*, and Table B-1, *PFP D&D* [Decontamination and Decommissioning] *Identified Hazards*, do not identify the hazard associated with the use of fogging equipment that produces nozzle exit velocities of 10,000 feet per minute (approximately 114 miles per hour).

Collectively, these noncompliances constitute a Severity Level III violation.

E. Unreviewed Safety Questions

Title 10 C.F.R. § 830.203, *Unreviewed safety question process*, subsection (a), states that "[t]he contractor responsible for a hazard category 1, 2, or 3 DOE nuclear facility must establish, implement, and take actions consistent with a USQ process that meets the requirements [stated in that] section." Section 830.203, subsection (d), states that "[t]he contractor responsible for a hazard category 1, 2, or 3 DOE nuclear facility must implement the DOE-approved USQ procedure in situations where there is a:… (2) [t]emporary or permanent change in the procedures as described in the existing documented safety analysis."

CHPRC implements this requirement in PRC-PRO-NS-062, *Unreviewed Safety Question Process*, Rev. 3, Chg. 0, dated October 1, 2016, which states: "[t]his procedure implements 10 CFR 830.203, Unreviewed Safety Question Process."

Contrary to these requirements, CHPRC failed to implement the USQ process consistent with the requirements of 10 C.F.R. § 830.203, as evidenced by:

1. CHPRC did not perform a USQ for a permanent change to a procedure during the approval of PRC-PRO-RP-1622, *Radiological Design Review Process*, Rev. 2, Chg. 0, dated September 27, 2017. PRC-PRO-NS-062 Appendix B, *Applicability to the USQ Process*, states that the Radiation Protection topical area is "excluded from further review under the USQ Process…except PRC-PRO-RP-1622."

2. CHPRC improperly applied categorical exclusion GCX-7 for a pen-and-ink change to *Building 236-Z Demolition,* 2Z-15-06342/ M WCN #006, dated November 30, 2017. PRC-PRO-NS-062 Appendix C, *CHPRC Categorical Exclusions*, states that GCX-7 applies to "small changes in the method of work performance…where these changes cause…no reduction in the effectiveness of any hazard control [and] no new hazard of any type." The pen-and-ink change removed a discussion of how quickly to remove strongbacks during PRF demolition, thus allowing the demolition to proceed faster than assumed in the ADM report. Consequently, the pen-and-ink change was not a small change in

the work process and could have introduced unevaluated hazards, so GCX-7 did not apply.

Collectively, these noncompliances constitute a Severity Level III violation.

III. REPLY

Pursuant to 10 C.F.R. § 820.24(b), CHPRC is hereby obligated to submit a written reply within 30 calendar days after the date of filing of this PNOV. The reply should be clearly marked as a "Reply to the Preliminary Notice of Violation" and must be signed by the person filing it.

If CHPRC's reply states that CHPRC waives any right to contest this PNOV, then, pursuant to 10 C.F.R. § 820.24(d), this PNOV will constitute a Final Order upon the filing of the reply.

If CHPRC disagrees with any aspect of this PNOV, then as applicable and in accordance with 10 C.F.R. § 820.24(c), the reply must: (1) state any facts, explanations, and arguments that support a denial of an alleged violation; and (2) discuss the relevant authorities that support the position asserted, including rulings, regulations, interpretations, and previous decisions issued by DOE. In addition, 10 C.F.R. § 820.24(c) requires that the reply include copies of all relevant documents.

Please send the appropriate reply by overnight carrier to the following address:

Director, Office of Enforcement
Attention: Office of the Docketing Clerk
U.S. Department of Energy
19901 Germantown Road
Germantown, Maryland 20874-1290

A copy of the reply should also be sent to the Manager of the Richland Operations Office.

Pursuant to 10 C.F.R. § 820.33, *Default order*, subsection (a), if CHPRC fails to submit a written reply within 30 calendar days after the date of filing of this PNOV, the Director of the Office of Enforcement may pursue a Default Order.

IV. CORRECTIVE ACTIONS

Corrective actions that have been or will be taken to avoid further violations should be delineated, with target and completion dates, in DOE's Noncompliance Tracking System.

Kevin L. Dressman
Acting Director
Office of Enforcement
Office of Enterprise Assessments

Washington D.C.
This 1st day of April 2019