October 17, 2011

SEC Petition Division of Compensation Analysis and Support NIOSH 4676 Columbia Parkway MS-C-47 Cincinatti, OH 45226

Attention:

Dear

would like to take this means of submitting a petition for Special Exposure Cohort (SEC) status for the Nuclear Metals, Inc. (NMI) facility in West Concord, MA, for the time period between 1970 and 1983.

We have enclosed the required completed forms along with extensive attachments to support this petition. We have also included many of the supporting documents as pdf format files on CDRoM. We have selected the class of employees as ALL to be covered by this petition. The basis for this class is that there were no restrictions on employee access to all or most areas of processing activity in this time period. It would be therefore difficult to exclude certain employees from the potential exposure to endangerments described in this petition.

The basic justifications for this petition is the lack of airborne exposure data collection and monitoring, the failure to recognize the hazards of Radon gas exposure or to monitor employee work environments to Radon gas exposures, DoE disclosure in 1999 that they recycled spent enriched fuel rods in the depleted uranium process stream and unknown at the time NMI processed DU, the loss of internal exposure data for most employees during this period, repeated AEC or NRC violations of monitoring and safety standards, a NMI production bonus incentive system that encouraged H&S practice shortcuts, and evidence of reported ongoing employee over exposures that demonstrate continuous failures of the Health & Safety program at NMI. All of these factors contribute to the likelihood that NIOSH would be unable to accurately assess employee exposures and accurately perform dose reconstructions.

Supporting documentation for this petition includes the following.

- 1. Affidavits supporting the lack of monitoring for numerous discrete occurrences that created chronic high levels of airborne radioactive contamination.
- 2. Affidavit disclosure that Health Physics and safety personnel oversight of work areas was poor and that inadequate monitoring was standard procedure during the period between 1970 1983.

- 3. Affidavits that support the position that contamination control was very limited in this time period and resulted in the off site spread of this contamination, including to employee homes.
- 4. Supporting AEC reports detailing the release of radiation from the plant that resulted in contamination of employee's homes.
- 5. Affidavits supporting the position that Radon gas exposures were not monitored and exposure mitigation procedures were not considered during this petition period.
- 6. Reports that demonstrate DoE disclosure that recycled spent fuel rods entered the DoE's process stream for DU between 1956 and 1976 and that this elevated the nuclide content of DU that can decay into radon. The true content of radionuclides in the DU was unknown to workers and management during the time period of this petition.
- 7. Supporting NRC and AEC documents that show that NMI corrective action to inadequate health & safety practices yielded ongoing employee overexposures well into the 1990s. This demonstrates a persistent inability to prevent such exposures of monitored employees and implies such over exposures were most likely more frequent than reported for the numerous unmonitored discrete occurrences we document for earlier years. Subsequent internal exposure data in later years would fail to indicate internal exposures of rapidly excreted high solubility compounds of uranium. The petitioners are unaware of the specific consequences for the lack of Radon monitoring during the petition period.
- 8. Affidavits that include photographs, CD movie clip, government contract numbers and published final report reference numbers that support the conduct of specific developmental and standard production processes that were not monitored for airborne exposures and very likely produced high exposures to airborne uranium compounds.
- 9. Several ex NMI employee affidavits demonstrating that eating, smoking and drinking was permitted in most high risk processing areas, including the foundry and chemistry labs, during the period covered by this petition.
- 10. Supporting AEC, NRC and NMI correspondence that reviews various site inspection violations and the failure to take timely corrective actions.
- 11. South Carolina Administrative Law Proceedings in 2002 against Starment (the company that NMI was renamed in the 1990s) that demonstrates NMI management ran a "sham recycling company" between NMI and its'

subsidiary, Carolina Metals, Inc., in order to avoid waste disposal costs. This resulted in the unlawful shipment of wastes at the time of their bankruptcy. This merely demonstrates the character of the management of NMI that contributed to the unmonitored exposures described in this petition.

- 12. A report that details the burial of 3,800 drums of radioactive waste at NMI, West Concord. This waste was transported from the Cambridge, MA Hood Building in their move to West Concord in 1958. The NMI management team in the 1970s were prior employees at the Cambridge Hood Building.
- 13. An independent review and report of the isotopic content of the Holding Basin at NMI that reveals that 800 pounds of U_{235} were contained in this basin. This report further discloses contaminated drinking well exposures to workers along with contaminated grounds that included the employee parking lot and outside eating areas.
- 14. An NRC web site document search indicating other archival documents that may be available on microfiche and may support this petition.
- 15. Independently derived claim statistics that show that only one NMI West Concord claimant has received an award under the EEOICPA program and implying that available data for dose reconstructions are incapable of yielding causality results that merit award. As such, it makes the unlikely statement that there were very few circumstances at NMI where an employee received a sufficient radiation dose to cause their cancer.
- 16. A list of prior NMI employees and their contact information that have consented to add their names in support of this petition and who may be available for future outreach interviews.
- 17. A review of a limited sample of dose reconstruction reports of prior claims that indicate a lack of dose exposure data, particularly internal dosimetry but not excluding a lack of external dosimetry, and demonstrates that this exposure data was unavailable for statistically accurate dose reconstruction.
- 18. A limited list of contracts awarded to NMI by DoE agencies for ongoing contracted work at the West Concord plant. Additional AEC contracts, not specifically identified, were active for enriched CP-5 fuel element and Beryllium braze ring production in the early 1970s.
- 19. Concord Fire department calls for emergency service during the petition period in response to uranium fires and explosions that were quite likely never reported to the NRC. Availability of this report has been delayed due to ongoing renovation at the Concord Fire Department. It will be provided as soon as it becomes available.

We believe that the scope of this documentation sufficiently supports this petition for SEC status consideration. Additional data that supports this petition should be available from sources not available to us at this time, but may be available to NIOSH. These documents are described in the affidavit submitted by and specific appendices that are attached.

We firmly believe that there is a preponderance of evidence of unmonitored and lost dose data for very hazardous airborne radionuclide exposures to make it unlikely for NIOSH to produce accurate dose estimates for claimants during this period of time.

It has been our intent to provide as much supporting documentation with this petition as possible in order to establish the credibility and plausibility for our claims. I appreciate the past guidance you have provided and we look forward to working with you to expedite consideration of our petition.

Sincerely,