

January 28, 2009

MEMORANDUM TO: Peter J. Habighorst, Chief
Fuel Manufacturing Branch
Fuel Facility Licensing Directorate
Division of Fuel Cycle Safety
and Safeguards
Office of Nuclear Material Safety
and Safeguards

FROM: Kevin M. Ramsey, Project Manager */RA/*
Fuel Manufacturing Branch
Fuel Facility Licensing Directorate
Division of Fuel Cycle Safety
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SUBJECT: SUMMARY OF DECEMBER 9, 2008, MANAGEMENT MEETING
WITH NUCLEAR FUEL SERVICES, INC. REGARDING
APPLICATION TO OPERATE NEW COMMERCIAL
DEVELOPMENT LINE

On December 9, 2008, an open management meeting was conducted with Nuclear Fuel Services, Inc. (NFS) in Rockville, MD. The purpose of the meeting was to discuss significant, unresolved issues in the NFS application to operate the new Commercial Development (CD) line. A copy of the agenda is attached.

The following individuals participated:

<u>NFS</u>	<u>NRC</u>	<u>Public</u>
Marie Moore	Dan Dorman	Chris Tipton
Rik Droke	Mike Tschiltz	Linda Modica
Jennifer Wheeler	Pete Habighorst	Barbara O'Neal
	Patricia Silva	
	Amy Luebbering	
	Kevin Ramsey	
	Manuel Crespo	
	Steve Burris	

The following unresolved issues were discussed:

1. Criticality Safety - In May 2008, the U.S. Nuclear Regulatory Commission (NRC) requested an additional item relied on for safety (IROFS) for accident sequences involving a criticality accident caused by too much uranium in a glovebox. NFS identified an IROFS as being a trained operator that complied with a regulated limit of uranium in the container (glovebox). The control was failed twice. The NRC concluded that failing the same control twice is not sufficiently independent to demonstrate compliance with criticality safety requirements.

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2. In November, NFS committed to an overcheck by a second operator. A letter documenting specific changes was received just before the meeting. NRC is reviewing the letter at this time.
3. Chemical Safety - In May 2008, the NRC requested additional information regarding accident scenarios involving dermal exposure (e.g., skin or eye contact) with hydrofluoric acid (HF). The CD Line produces a liquid HF solution that will be pumped through an overhead pipe. In August 2008, NFS provided additional information and noted that there is no standard for dermal exposure to liquid HF solutions. The NRC stated that it would accept other information if it provided a reasonable basis for assessing consequences. Despite ongoing discussions, this issue is still unresolved. NFS provided new information just before the meeting. NRC is evaluating the new information at this time.
4. Decommissioning Financial Assurance - In May 2008, the NRC requested a letter of intent from a Government agency stating that it intends to budget funds to decommission the CD line. NFS responded with an excerpt from the U.S. Department of Energy Prime Contract. In August 2008, the NRC informed NFS that the issue was still open because the contract stated that a private company and the Government assumed the obligation to pay for decommissioning. It was unclear what portion each party intended to pay. NFS stated that it would obtain a letter of intent to clarify that the Government intends to fund all decommissioning costs. Efforts to obtain the letter are ongoing.

The NRC management expressed its concern that these issues remained unresolved after extensive staff level discussions. NFS management agreed that the issues needed to be resolved and committed to apply the oversight needed to close the open items.

After the business portion of the meeting ended, members of the public were asked, if they had any questions. The following questions were discussed:

1. The NRC was asked to provide the numbers for the retrieving various documents discussed from the Agencywide Document Access and Management System (ADAMS). Enclosure 2 provides the numbers requested.
2. The NRC was asked if the Integrated Safety Analysis (ISA) Summary for the CD line is available to the public. The NRC stated no, the ISA Summary is withheld because details about the accidents with highest consequences, and the controls that prevent them, would be useful to an adversary. A member of the public noted that the ISA Summary is not available for peer review which would be beneficial.
3. The NRC was asked who determines the probability and consequences of accidents in the ISA Summary. The NRC responded that the licensee performs the analysis and provides its results in the ISA Summary. NUREG-1513 provides guidance on how an ISA is performed.
4. The NRC was asked about the report written by the Safety Culture Board of Advisors (SCUBA). The SCUBA report described degraded controls. The NRC was asked if all of the controls have been replaced. The NRC discussed the inspections that have been performed to confirm adequate corrective actions for each problem reported. It was

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noted that many problems have been reported over the years. The NRC stated that it was aware of the problems and has inspected and reviewed each issue.

5. The NRC was asked how the public can have confidence that new pipes installed in the CD line are not connected to an old, broken-down valve. The NRC discussed the operational readiness review inspections that will be performed before processing operations are allowed to begin.
6. The NRC was asked if the uranium hexafluoride (UF₆) to be processed in the CD line has been stored at NFS since 1999. The NRC stated that the UF₆ has been stored at NFS for several years, but the specific date of receipt was unknown to the meeting attendees.
7. The NRC was asked how storage of UF₆ at the site would affect the public. The person asking the question believed the material was explosive. The NRC stated that UF₆ is not explosive. It can be stored safely and has been stored safely at other sites for many years. The storage of UF₆ at the site has been evaluated and is expected to have no adverse impact to the public.
8. The NRC was asked about the possible life span of the facility. The NRC had no speculation on the life span of the facility. It was noted that portions of the facility have been shut down, removed, and replaced with new equipment. This process could continue for many years.
9. The NRC was asked for the ADAMS number of the 2007 Safety Evaluation Report for the Balance of Plant ISA Summaries. A copy was available at the meeting. The ADAMS number is ML072130189.
10. The NRC was asked if it could provide a redacted copy of the ISA Summary for the CD line. The NRC agreed to consider the request.
11. The NRC was asked about a new analysis of earthquake risks posted on the U.S. Geological Survey (USGS) website. The report is dated August 2008. The study shows that Tennessee would suffer great shakes. USGS has updated the National Seismic Map. The NRC stated that it would look for the document.
12. The NRC was asked about a 1967 study done by the Tennessee Valley Authority regarding floods, of the Nolichucky River and Indian Creek near Erwin. This study is discussed in a letter from the Erwin Citizens Awareness Network. The NRC stated that it is reviewing the letter.

Docket No.: 70-143

License No.: SNM-124

Enclosures:

1. Meeting Agenda
2. ADAMS Numbers for Documents

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DISTRIBUTION:

FFLD r/f NRC participants

MI090150597

OFFICE	FMB	FMB	FMB
NAME	KRamsey	VCheney	PHabighorst
DATE	1/15/09	1/28/09	1/28/09

OFFICIAL RECORD COPY

MEETING AGENDA

**Open Meeting with Nuclear Fuel Services, Inc.
December 9, 2008
8:00 am - 10:00 pm**

The purpose of this management meeting is to discuss significant, unresolved issues in the Nuclear Fuel Services, Inc. (NFS) application to operate the new Commercial Development Line.

- 8:00 a.m. Sign-in
- 8:10 a.m. Welcome and Introductions – U. S. Nuclear Regulatory Commission (NRC)
- 8:20 a.m. Description of Unresolved Issues - NRC
 - Criticality Safety
 - Chemical Safety
- 8:40 a.m. Plans to Resolve the Issues - NFS
- 9:30 a.m. Public Comments and Closing Remarks
- 10:00 a.m. Meeting Adjourned

**ADAMS Numbers for Documents Discussed at
Public Meeting on December 9, 2008**

ML081560737 - U.S. Nuclear Regulatory Commission (NRC) Request for Additional Information (RAI), 5/23/08
ML081790147 - Reply to RAI Concerning Commercial Development Line, 6/25/08

Criticality Safety Issue

ML082110478 - Summary of Call, 7/17/08
ML082140071 - Summary of Call, 7/29/08
ML083190210 - Additional Information in Reply to RAI, 11/10/08
ML083290208 - NRC E-mail Requesting Clarification, 11/24/08
ML083520543 - Additional Information in Reply to RAI, 12/5/08

Chemical Safety Issue

ML082340119 - Summary of Call, 8/12/08
ML082960096 - Additional Information in Reply to RAI, 10/20/08
ML083400027 - Summary of Call, 12/3/08

Decommissioning Financial Assurance

ML082260291 - Summary of Call, 8/6/08
ML090150065 - NFS E-mail Stating Intent to Submit Letter, 8/18/08