

March 16, 2012

Mr. Jay Laughlin  
Chief Nuclear Officer and  
Head of Technical Services  
Louisiana Energy Services, LLC.  
P.O. Box 1789  
Eunice, NM 88231

SUBJECT: LICENSE AMENDMENT REQUEST TO REVISE LICENSE CONDITION 13  
(LAR 10-13) AND AMENDMENT 52 (TAC NO L33137)

Dear Mr. Laughlin:

On May 6, 2011, you transmitted License Amendment Request (LAR) 10-13 requesting to amend License Condition (LC) 13 of Materials License SNM-2010 by extending the expiration date. LC 13 states the license will expire 30 years after the date of license issuance. On June 23, 2006, the U.S Nuclear Regulatory Commission (NRC) issued a license to Louisiana Energy Services to construct and operate a uranium enrichment facility. Authorization to introduce uranium hexafluoride ( $UF_6$ ) into Cascade 1.1 was granted on June 10, 2010.

The LAR seeks to recapture the approximately 48 months from the time of license issuance to authorization for operations. During this period, construction, preoperational testing, and the Operational Readiness Review were ongoing. A detailed Safety Evaluation Report (SER) is attached as Enclosure 1.

After initial review of this amendment request, NRC Staff determined that an Environmental Assessment (EA) was warranted. That EA was completed and published in the *Federal Register* on February 29, 2012. It documents a Finding of No Significant Impact. A copy of the Federal Register Notice is attached as Enclosure 2.

With the completion of the SER and the EA, the NRC staff concludes that this request is in accordance with NRC requirements and is, approved. The license expiration has been extended from June 22, 2036, to June 9, 2040.

LC 13 of SNM-2010 has been modified to reflect the extension to the duration of the license with the following statement:

This license was originally issued for a period of 30 years from the date of license issuance. Based on an amendment request dated May 6, 2011, the license expiration date has been extended to June 9, 2040.

Amendment 52 to the license is attached as Enclosure 3, and work performed under the above Technical Assignment Control (TAC) number is complete and the TAC has been closed.

In accordance with Title 10 of the *Code of Federal Regulations* 2.390 of the NRC's "Rules of Practice," a copy of this letter will be available electronically for public inspection in the NRC Public Document Room or from the NRC Agencywide Documents Access and Management System (ADAMS). ADAMS is accessible from the NRC Web site at <http://www.nrc.gov/reading-rm/adams.html>.

If you have any questions regarding this license amendment, please contact Mr. Michael Raddatz via e-mail to [Michael.Raddatz@nrc.gov](mailto:Michael.Raddatz@nrc.gov) or by phone at 301-492-3108.

Sincerely,

/RA/

Brian W. Smith, Chief  
Uranium Enrichment Branch  
Division of Fuel Cycle Safety  
and Safeguards  
Office of Nuclear Material Safety  
and Safeguards

Docket No. 70-7003  
License No. SNM-7003

Enclosures:

1. Safety Evaluation Report
2. Environmental Assessment
3. License SNM-2010, Amendment 52

cc:

William Szymanski/DOE  
Gary Don Reagan/Hobbs  
Sarah Cottrell/NMED  
Glen Hackler/Andrews  
Gary Schubert/Lea County  
Michael Marriotte/NIRS  
Mary Rose/NMED  
Tannis Fox/NMED  
Lindsay Lovejoy/NIRS

Cheryl Chance/Jal  
Daniel Stenger/H&H  
Marilyn Burns/Tatum  
Matt White/Eunice  
Richard Ratliff/Texas  
CO'Claire/Ohio  
Joseph Malherrek/PC  
Gary King/NMAG  
Clint Williamson/LES

Gregory Smith/LES  
Dixie Drummond/Lovington  
David Sexton/LES  
Glenn Smith/NMAG  
Lee Cheney/CNIC  
Roger Mulder/Texas  
David Martin/NMED

In accordance with Title 10 of the *Code of Federal Regulations* 2.390 of the NRC's "Rules of Practice," a copy of this letter will be available electronically for public inspection in the NRC Public Document Room or from the NRC Agencywide Documents Access and Management System (ADAMS). ADAMS is accessible from the NRC Web site at <http://www.nrc.gov/reading-rm/adams.html>.

If you have any questions regarding this license amendment, please contact Mr. Michael Raddatz via e-mail to [Michael.Raddatz@nrc.gov](mailto:Michael.Raddatz@nrc.gov) or by phone at 301-492-3108.

Sincerely,

/RA/

Brian W. Smith, Chief  
 Uranium enrichment Branch  
 Division of Fuel Cycle Safety  
 and Safeguards  
 Office of Nuclear Material Safety  
 and Safeguards

Docket No. 70-7003  
 License No. SNM-7003

**Enclosures:**

1. Safety Evaluation Report
2. Environmental Assessment
3. License SNM-2010, Amendment 52

cc:

William Szymanski/DOE  
 Gary Don Reagan/Hobbs  
 Sarah Cottrell/NMED  
 Glen Hackler/Andrews  
 Gary Schubert/Lea County  
 Michael Marriotte/NIRS  
 Mary Rose/NMED  
 Tannis Fox/NMED  
 Lindsay Lovejoy/NIRS

Cheryl Chance/Jal  
 Daniel Stenger/H&H  
 Marilyn Burns/Tatum  
 Matt White/Eunice  
 Richard Ratliff/Texas  
 CO'Claire/Ohio  
 Joseph Malherrek/PC  
 Gary King/NMAG

Gregory Smith/LES  
 Dixie Drummond/Lovington  
 David Sexton/LES  
 Clint Williamson/LES  
 Lee Cheney/CNIC  
 Roger Mulder/Texas  
 David Martin/NMED  
 Glenn Smith/NMAG

**DISTRIBUTION:**

RidsNmssOd r/f	UEB r/f	JWeil, OCA	WMaier, RIV
DSeymour, RII	RHannah, RII	AGody, RII	CTaylor, RII
LES website			

**ML111580519**

OFFICE	FCSS/UEB	FCSS/UEB	FCSS/UEB
NAME	MRaddatz	TRichmond	BSmith
DATE	03/08/2012	03/15/2012	03/16/2012

**OFFICIAL RECORD COPY**

DOCKET NO.: 70-3103  
LICENSE NO.: SNM-2010

LICENSEE: Louisiana Energy Services  
National Enrichment Facility  
Lea County, New Mexico

SUBJECT: LICENSE AMENDMENT REQUEST TO REVISE LICENSE CONDITION  
13 (LAR 10-13) (TAC NO L33137)

### INTRODUCTION

License Amendment Request (LAR) 10-13 seeks to amend License Condition (LC) 13 of Materials License SNM-2010 by extending the expiration date. LC 13 states the license will expire 30 years after the date of license issuance. The requested amendment would extend the expiration date of the license by the amount of time that passed from granting the license until Louisiana Energy Services (LES) was authorized to introduce uranium hexafluoride ( $UF_6$ ) into Cascade 1.1 and commence production. This time period is approximately 48 months.

### BACKGROUND

On June 23, 2006, the U.S. Nuclear Regulatory Commission (NRC) issued a license to LES to construct and operate a uranium enrichment facility. Title 10 *Code of Federal Regulations* (10 CFR) 70.32(k) requires that the NRC verify that a uranium enrichment facility has been constructed in accordance with its license prior to commencing operations. Between the date of issuance of the license and the authorization to introduce  $UF_6$  into Cascade 1.1, construction, testing, and the NRC's Operational Readiness Review were completed. Authorization to introduce  $UF_6$  into Cascade 1.1 was granted on June 10, 2010.

### REGULATORY REQUIREMENTS

10 CFR 30.36, 40.42, and 70.38 specifies that a license will expire at the end of the day on the expiration date stated in the license. 10 CFR 70.34 requires applications for amendment of a licensee to be filed in accordance with 10 CFR 70.21(a) and must specify the respects in which the licensee desires the license to be amended and the grounds for such amendment.

### STAFF REVIEW AND EVALUATION

#### Safety Review

NUREG-1827, "Safety Evaluation Report (SER) for the National Enrichment Facility in Lea County, New Mexico," assessed the production of enriched uranium<sup>1</sup> anticipated to begin in 2008. Due to construction delays and other factors, actual production did not begin until June 2010, prompting the request for an extension to the life of the license. Neither the production of enriched uranium nor the accumulation of depleted uranium (DU) Uranium Byproduct Cylinders (UBC) has occurred on the schedule originally evaluated or anticipated. Environmental impacts as evaluated in NUREG-1790, "Environmental Impact Statement (EIS) for the Proposed

---

<sup>1</sup> The safety review evaluated safety and security issues associated with operation of the NEF and considered the maximum generation of 15,727 UBCs as a bounding assessment.

National Enrichment Facility in Lea County, New Mexico," have essentially been delayed and remain unchanged. This was verified by an Environmental Assessment (EA) preformed in support of this evaluation and documented in the Environmental Review section that follows.

The extension of the period of licensing effectively shifts the schedule for production of enriched uranium and depleted uranium (DU) by a period of 48 months, ending in 2040. DU production is necessarily a consideration in terms of storage and disposal because of the magnitude of the materials involved. Table 2-5 of the EIS addressed the anticipated and maximum production and storage of DU over the original 30 years license term for the LES facility. The SER and EIS assumed that, following issuance of the license in 2006, LES would construct the facility for two years and begin operations in 2008, with an anticipated accumulation of 1,006 UBCs by 2011. Production was not authorized by the NRC, consistent with 10 CFR 70.32(k), until June 2010 and, to date, only 37 UBCs have accumulated. There is no impact on UBC accumulation such that the cumulative count of UBCs over the period of licensing, including the additional 48 months, would exceed that which was evaluated in the EIS<sup>2</sup>. A separate license condition limits the total UBC accumulation to that which was specified in the EIS.

10 CFR 40.36 requires that, every 3 years, decommissioning funding be re-evaluated. The last assessment was completed in correspondence dated January 11, 2010, based on documents which included an updated cost estimate for DUF<sub>6</sub> disposal. This assessment is adequate, at this time, to cover costs associated with disposal.

Extending the expiration date of the license, under the terms of this request, will not result in a new accident sequence, new accident initiators, an increase in the probability of occurrence or consequences of a previously evaluated accident or malfunction of equipment important to safety. Thus, compliance with the performance requirements of 10 CFR 70.61 is not affected.

The change in expiration date will not decrease the overall level of security system performance needed to protect against the loss or compromise of classified matter. The change does not affect plant safety, safeguards, or security programs or any other programs or plans contained in the License Application (LA), the Emergency Plan, or the Quality Assurance Program Description. Therefore, this change will not decrease the effectiveness of any program or plan contained in the LA and supporting documents.

Granting the requested amendment to extend the expiration date of the license by approximately 48 months will not impact the design, function, or method of performing or controlling design functions, structures, systems, and components, nor will it decrease the effectiveness of any program or plan. The amendment will not change the assumptions or change, degrade, or prevent actions described or assumed in accident sequences evaluated and described in the Integrated Safety Analysis (ISA) Summary nor will any items relied on for safety be affected.

After careful review of the application, the staff has determined that it is acceptable for the expiration date of the license to be extended by 48 months to recapture the time between issuance of the license and authorizing LES to begin operations. This time was used by LES to complete construction, implement its health, safety, and security programs, and for the NRC staff to conduct its operational readiness review of the facility, which was a precondition to commencement of operation.

---

<sup>2</sup> NUREG-1790 evaluated environmental issues associated with the operation of the NEF and evaluated an anticipated 25 year production of 12, 592 UBCs and a maximum 30 year production of 15, 727 UBCs.

## Environmental Review

The NRC staff prepared an environmental assessment (EA) for this action as required by 10 CFR 51.45 and 10 CFR 51.60. On the basis of the EA, the staff reached a finding of no significant impact. That finding was published in the *Federal Register* on February 29, 2012 (FR 12333). Thus, the Environmental Review, as supported by the EA, did not identify any impediment to the approval of this amendment request. A copy of the *Federal Register* Notice is attached as (Enclosure 3).

## CONCLUSIONS

The proposed amendment would recapture the construction and testing time expended after issuance of facility Materials License SNM-2010 and give LES permission to operate 48 months beyond the current license expiration date. Although the request would increase plant operations by two years, all impacts are still bounded by the analysis in the EIS as was supported by the attached EA. Granting the requested amendment will not adversely affect the safe operation of the facility or result in an increase in the radiological or chemical consequences of accident scenarios described in the ISA Summary. The staff concludes that the LAR dated May 6, 2011, is consistent with the requirements of 10 CFR Parts 30.36, 40.42, and 70.38, and should be approved. LC 13 should be modified to reflect the extension to the duration of the license with the following statement:

This license was originally issued for a period of 30 years from the date of license issuance. Based on an amendment request dated May 6, 2011, the license expiration date has been extended to June 9, 2040.

## PRINCIPAL CONTRIBUTOR

Michael Raddatz