



International Isotopes Inc.

March 07, 2011

Dr. Matthew Bartlett
U.S. Nuclear Regulatory Commission
Mail Stop E2C40M
6003 Executive Blvd.
Rockville, MD 20852

Subject: Request for 40-Year Licensing Term for International Isotope Fluorine Products' Proposed Fluorine Extraction Process & Depleted Uranium De-conversion (FEP/DUP) Plant.

Dear Dr. Bartlett,

The purpose of this letter is to formally request a 40-year licensing term for the International Isotopes Fluorine Products' (IIFP) proposed Fluorine Extraction Process & Depleted Uranium De-conversion (FEP/DUP) Plant.

IIFP believes the request for a 40-year license term is reasonable and appropriate considering the facility is being licensed and will be operated in a manner consistent with the justification cited in the U.S. Nuclear Regulatory Commission's (NRC) August 24, 2006 Commission Paper, SECY-06-0186. In this paper the NRC requested Commission approval of the staff's recommendation "*to implement maximum license terms of 40 years for license renewals and new applications, for facilities required to submit integrated safety analysis summaries in accordance with 10 CFR Part 70 Subpart H, requirements*". The Commission approved this recommendation and published a notice of the new policy in the December 4, 2006 Federal Register (FR Vol. 71 No. 232 70441).

On March 22, 2007, the Commission issued a Staff Requirements Memorandum (SRM) stating that NRC would license future major fuel cycle facilities licensed under Part 40 (e.g., uranium conversion and depleted uranium deconversion facilities). The SRM also requested the staff to propose options for imposing 10 CFR Part 70, Subpart H, requirements for uranium conversion and depleted uranium deconversion facilities.

During a May 7, 2009 Public Meeting between International Isotopes Inc. (INIS) and NRC, the NRC staff acknowledged that Part 40 does not currently contain Integrated Safety Analysis (ISA) requirements, and consistent with Commission's direction in SECY-07-0146, the NRC will impose the ISA requirements through orders. During this meeting the NRC informed the INIS that the license application should be prepared in a manner that will demonstrate

compliance with the applicable acceptance criterion listed in NUREG-1520. During this meeting INIS committed to preparing the license application as suggested by the NRC. The NRC reiterated the need to include an ISA Summary and appropriate emergency and security planning assessments be included along with our license application in the NRC's May 26, 2009 letter acknowledging INIS's intention to submit a license application for the FEP/DUP facility.

INIS submitted the license application prepared in accordance with Part 70 Subpart H on December 30, 2009. This license application was prepared and is being reviewed in accordance with NUREG-1520, with the exception of Chapter 5 Criticality, which is not a risk associated with depleted uranium. IIFP has completed an ISA and submitted the ISA Summary to the NRC. The ISA was a systematic analysis to identify facility and external hazards, potential accident sequences, including likelihood and consequences, and items relied on for safety (IROFS) to prevent potential accidents or mitigate the consequences. The ISA Summary submitted to the NRC provided a synopsis of the results of the ISA and contained the information specified in §70.65(b).

After the license is issued, IIFP will maintain the ISA process in accordance with requirements of 10 CFR Part 70 Subpart H including the §70.72 facility change process and the change documentation submittals required by §70.72 paragraphs d(1), d(2) and d(3). The IIFP management measure commitments in the IIFP License Application Chapter 11 will further ensure configuration management and structured maintenance measures for safety related structures, systems and components. The management measures and change processes will systematically manage the aging phenomena such as not to pose technical issues that preclude longer license terms of 40 years. Through this change process and updates, the NRC will be kept informed of changes due to material degradation and aging throughout the lifetime of the IIFP Facility. Thus, material degradation and aging do not affect the duration of the license term. Therefore, these Subpart H requirements permit the NRC to continue to support safe operations of licensed facilities on an ongoing basis, regardless of the duration of the license.

IIFP will update the cost estimates for decommissioning every 3 years. These updates provide sufficiently frequent reviews such that NRC does not have to rely on the license renewal review to perform a time evaluation of the adequacy of financial assurance. Thus, decommissioning funding requirements would be satisfied regardless of the duration of the license term.

The IIFP Environmental Report (ER) addresses cumulative effects from the combination of individually actions for the proposed license action (a Phase 1 facility) and for a future expansion action resulting in a Phase 2 Facility. The ER is the basis on which NRC will prepare an Environmental Assessment (EA) or Environmental Impact Statement (EIS). The current License Application addresses only the Phase 1 Facility, and IIFP will submit an application to amend the License for the Phase 2 Facility. For any facility expansions beyond Phase 2 IIFP will issue an

ER. Based on the new ER, the NRC would write an EA or EIS at that time. If the EA reveals that the licensing action could have significant environmental impacts, an EIS is prepared. NRC will continue to evaluate environmental impacts and cumulative effects occurring over a period of time. Thus, NEPA requirements would be satisfied regardless of the duration of the license term.

Because the IIFP license application was prepared in accordance with Part 70 Subpart H using the applicable guidance from NUREG-1520, and the facility will be operated in a manner consistent with the Part 70 Subpart H Fuel Cycle Facilities; authorizing the maximum 40-year license term for IIFP is consistent with NRC's Strategic Plan that will allow the NRC to continue to support safe operations of the IIFP Facility, to reduce regulatory burden, to enhance effectiveness and efficiency.

Please contact me by phone at 208 524-5300 or email at jjmiller@intisoid.com if you have any questions regarding this letter or require additional information.

Sincerely,



John J. Miller, CHP
Radiation Safety Officer

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