

**MATERIALS LICENSE**

Pursuant to the Atomic Energy Act of 1954, as amended, the Energy Reorganization Act of 1974 (Public Law 93-438), and Title 10, Code of Federal Regulations, Chapter I, Parts 30, 31, 32, 33, 34, 35, 36, 39, 40, and 70, and in reliance on statements and representations heretofore made by the licensee, a license is hereby issued authorizing the licensee to receive, acquire, possess, and transfer byproduct, source, and special nuclear material designated below; to use such material for the purpose(s) and at the place(s) designated below; to deliver or transfer such material to persons authorized to receive it in accordance with the regulations of the applicable Part(s). This license shall be deemed to contain the conditions specified in Section 183 of the Atomic Energy Act of 1954, as amended, and is subject to all applicable rules, regulations, and orders of the Nuclear Regulatory Commission now or hereafter in effect and to any conditions specified below.

<p>Licensee</p> <p>1. Department of the Army Engineer Research and Development Center Cold Regions Research and Engineering Laboratory</p> <p>2. 72 Lyme Road Hanover, New Hampshire 03755-1290</p>	<p>In accordance with the letter dated April 24, 2012,</p> <p>3. License number 28-07946-08 is amended in its entirety to read as follows:</p> <p>4. Expiration date February 28, 2013</p> <p>5. Docket No. 030-36221 Reference No. 28-07946-06</p>	
<p>6. Byproduct, source, and/or special nuclear material</p> <p>A. Carbon 14 B. Cesium 137</p>	<p>7. Chemical and/or physical form</p> <p>A. Any B. Any</p>	<p>8. Maximum amount that licensee may possess at any one time under this license</p> <p>A. 10 millicuries B. 2 millicuries</p>
<p>9. Authorized use:</p> <p>A. and B. Research and development as defined in 10 CFR 30.4.</p>		

**CONDITIONS**

10. Licensed material may be used or stored only at the licensee's facilities located at Department of the Army Engineer Research and Development Center, Cold Regions Research and Engineering Laboratory (CRREL), 72 Lyme Road, Hanover, New Hampshire.
11. Licensed material shall be used by, or under the supervision of, Steven A. Grant, Charles M. Reynolds, and David B. Ringelberg.
12. The Radiation Safety Officer for this license is Charles M. Reynolds.
13. The licensee shall not use licensed material in or on human beings.
14. The licensee shall not use licensed material in field applications where it is released except as provided otherwise by specific condition of this license.
15. The licensee is authorized to transport licensed material in accordance with the provisions of

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SUPPLEMENTARY SHEET**License Number  
**28-07946-08**Docket or Reference Number  
**030-36221**  
**28-07946-06**

Amendment No. 2

10 CFR Part 71, "Packaging and Transportation of Radioactive Material."

16. Except as specifically provided otherwise in this license, the licensee shall conduct its program in accordance with the statements, representations, and procedures contained in the documents, including any enclosures, listed below. The U.S. Nuclear Regulatory Commission's regulations shall govern unless the statements, representations, and procedures in the licensee's application and correspondence are more restrictive than the regulations.

- A. Application dated January 23, 2003 [ML030450427]
- B. Facsimile dated February 24, 2003 [ML030560206]
- C. Letter dated December 31, 2003 [ML040220517]



For the U.S. Nuclear Regulatory Commission

Date May 31, 2012

By

***Original signed by Steve Courtemanche***Steve Courtemanche  
Commercial and R&D Branch  
Division of Nuclear Materials Safety  
Region I  
King of Prussia, Pennsylvania 19406