U.S. NUCLEAR REGULATORY COMMISSION

Amendment No. 13

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, 37, 39, 40, 70 and 71, 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.

Licensee	In accordance with application dated July 18, 2021,	4. Expiration Date: December 31, 2037
1. Radiological Physics Service, Inc. 2. 3839 Napier Road Plymouth, MI 48170	3. License No.: 21-26253-01 is renewed in its entirety to read as follows:	5. Docket No.: 030-31952 Reference No.:

6. Byproduct, source, and/or special nuclear material	7. Chemical and/or physical form	8. Maximum amount that licensee may possess at any one time under this license	9. Authorized use
A. Cesium-137	A. Sealed sources (QSA Global, Inc., Model 77302)	A. 165 millicuries per source and 165 millicuries total	A. For use in performing instrument calibration as a commercial service for any person as defined in 10 CFR 30.4.
B. Cesium-137	B. Sealed sources (QSA Global, Inc., Model 77302)	B. 153 millicuries per source and 153 millicuries total	B. For use in performing instrument calibration as a commercial service for any person as defined in 10 CFR 30.4.
C. Cesium-137	C. Sealed sources (Eckert & Ziegler, Model RV-XXX Series)	C. 300 microcuries total	C. For use in performing instrument calibration as a commercial service for any person as defined in 10 CFR 30.4.
D. Barium-133	D. Sealed sources (Eckert & Ziegler, Model RV-XXX Series)	D. 300 microcuries total	D. For use in performing instrument calibration as a commercial service for any person as defined in 10 CFR 30.4.
E. Cesium-137	E. Sealed sources	E. 30 millicuries total	E. For possession and storage only incident to disposal.
F. Barium-133	F. Sealed sources	F. 30 millicuries total	F. For possession and storage only incident to disposal.

MATERIALS LICENSE SUPPLEMENTARY SHEET

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6. Byproduct, source, and/or special nuclear material	7. Chemical and/or physical form	8. Maximum amount that licensee may possess at any one time under this license	9. Authorized use
G. Cobalt-57	G. Sealed sources	G. 10 millicuries total	G. For possession and storage only incident to disposal.
H. Any byproduct material with Atomic Nos. 1 through 83	H. Analytical samples	H. Not to exceed 1 millicuries per sample and 10 millicuries total	H. For use and/or possession incident to leak test sample analysis as a service for other persons as defined in 10 CFR 30.4.
I. Technetium-99m	I. Any	I. 100 millicuries total	I. For use and/or possession incident to radiation surveys as a service for other persons as defined in 10 CFR 30.4.

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CONDITIONS

10. A. Licensed material shall be used or stored at the licensee's facilities located at 3839 Napier Road, Plymouth, Michigan and 3847 Napier Road, Plymouth, Michigan.

B. Licensed material listed in Item No. 6.B. may be used or stored at the licensee's facilities located at 119 Church Street, Kalamazoo, Michigan.

C. Licensed material listed in Items 6.C., D., H. and I. may be used or stored at the licensee's facilities located at 119 Church Street, Kalamazoo, Michigan, and may be used at temporary job sites of the licensee anywhere in the United States where the U.S. Nuclear Regulatory Commission maintains jurisdiction for regulating the use of licensed material, including areas of exclusive Federal jurisdiction within Agreement States. If the jurisdiction status of a Federal facility within an Agreement State is unknown, the licensee should contact the Federal agency controlling the job site in question to determine whether the proposed job site is an area of exclusive Federal jurisdiction. Authorization for use of radioactive materials at job sites in Agreement States not under exclusive Federal jurisdiction should be obtained from the appropriate state regulatory agency.

11. The Radiation Safety Officer (RSO) for this license is Ray A. Carlson, M.S.

12. Licensed material shall only be used by, or under the supervision of:

Authorized User	Material and Use
Mufeed Al-Otaibey	All
Ray A. Carlson, M.S.	All
Eric B. Ramsay, Ph.D.	All
Laura Speer Smith, M.S.	All

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13. A. Sealed sources shall be tested for leakage and/or contamination at intervals not to exceed the intervals specified in the certificate of registration issued by the U.S. Nuclear Regulatory Commission under 10 CFR 32.210 or by an Agreement State. In the absence of a registration certificate, sealed sources shall be tested for leakage and/or contamination at intervals not to exceed six months, or at such other intervals as specified.

B. In the absence of a certificate from a transferor indicating that a leak test has been made within the intervals specified in the certificate of registration issued by the U.S. Nuclear Regulatory Commission under 10 CFR 32.210 or by an Agreement State, prior to the transfer, a sealed source received from another person shall not be put into use until tested and the test results received.

C. Sealed sources need not be tested if they contain only hydrogen-3; or they contain only a radioactive gas; or the half-life of the isotope is 30 days or less; or they contain not more than 100 microcuries of beta- and/or gamma-emitting material or not more than 10 microcuries of alpha-emitting material.

D. Sealed sources need not be tested if they are in storage and are not being used. However, when they are removed from storage for use or transferred to another person, and have not been tested within the required leak test interval, they shall be tested before use or transfer. No sealed source shall be stored for a period of more than 10 years without being tested for leakage and/or contamination.

E. The leak test shall be capable of detecting the presence of 185 becquerels (0.005 microcuries) of radioactive material on the test sample. If the test reveals the presence of 185 becquerels (0.005 microcuries) or more of removable contamination, a report shall be filed with the U.S. Nuclear Regulatory Commission in accordance with 10 CFR 30.50(c)(2), and the source shall be removed immediately from service and decontaminated, repaired, or disposed of in accordance with Commission regulations.

F. Tests for leakage and/or contamination, including leak test sample collection and analysis, shall be performed by the licensee or other persons specifically licensed by the U.S. Nuclear Regulatory Commission or an Agreement State to perform such services.

G. Records of leak test results shall be kept in units of becquerels (microcuries) and shall be maintained for three years.

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14. The licensee shall conduct a physical inventory every six months, or at other intervals approved by the U.S. Nuclear Regulatory Commission, to account for all sealed sources and/or devices received and possessed under the license. Records of inventories shall be maintained for three years from the date of each inventory, and shall include the radionuclides, quantities, manufacturer's name and model numbers, and the date of the inventory.

15. Sealed sources containing licensed material shall not be opened or sources removed from source holders by the licensee, except as specifically authorized.

16. The licensee is authorized to hold radioactive material with a physical half-life of less than or equal to 120 days for decay-in-storage before disposal in ordinary trash provided:

    A. Before disposal as ordinary trash, the waste shall be surveyed at the container surface with the appropriate survey instrument set on its most sensitive scale and with no interposed shielding to determine that its radioactivity cannot be distinguished from background. All radiation labels shall be removed or obliterated, except for radiation labels on materials that are within containers and that will be managed as biomedical waste after they have been released from the licensee.

    B. A record of each such disposal permitted under this license condition shall be retained for three years. The record must include the date of disposal, the date on which the byproduct material was placed in storage, the radionuclides disposed, the survey instrument used, the background dose rate, the dose rate measured at the surface of each waste container, and the name of the individual who performed the disposal.

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17. 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. This license condition applies only to those statements, representations, and procedures that are required to be submitted in accordance with the regulations. The U.S. Nuclear Regulatory Commission's regulations shall govern unless the statements, representations, and procedures in the licensee's application and correspondence impose on the licensee requirements that are more restrictive than or in addition to the regulations.

A. Application dated July 18, 2021 (received March 15, 2022) (ML22074A228)
B. Letter received September 9, 2022 (ML22263A277)
C. Letter received December 5, 2022 (ML22339A242)

FOR THE U. S. NUCLEAR REGULATORY COMMISSION

Bryan A. Parker

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Date: 2022.12.20 14:29:49 -05'00'

Date: December 20, 2022

By: _____

Bryan A. Parker
Region III