



EM Environmental Management

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DOE Packaging Certification Program

**Safety Evaluation Report for
Certificate of Compliance No. 9204 Letter of Authorization
Extension for the Model 10-160B Package**

Docket No. 24-31-9204

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This Safety Evaluation Report (SER) documents the U.S. Department of Energy (DOE) Packaging Certification Program (PCP) independent review of the request submitted for the Oak Ridge Office of Environmental Management (OREM) by the package Certificate Holder, EnergySolutions (ES), to extend the Letter of Authorization (LoA) issued January 5, 2023, to authorize use of the 10-160B for a one-time shipment of a Radium-226 Boron (RaB) neutron source from the TRU Waste Processing Center (TWPC) to Nevada National Security Site (NNSS) for disposal.

Evaluation

By letter dated June 14, 2024, the certificate holder, ES requested an extension to the LoA to CoC No. 9204, Revision 12, for the Model No. Model 10-160B package design that was issued on January 5, 2023, with its SER, to authorize use of the package for a one-time shipment of a RaB neutron source from the TWPC to NNSS for disposal.

The current LoA expires December 31, 2024. However, due to NNSS and TWPC facility operations beyond the control of ES, ES requested a 1-year extension to the LoA, which should be sufficient time for TWPC to complete the shipment.

Based on the statements and representations in the ES request, and with the conditions listed below, DOE PCP staff has reasonable assurance that the regulatory requirements of 10 CFR Part 71 have been met and recommends extension of the LoA to CoC 9204 by the DOE Headquarters Certifying Official (HCO).

Conditions of Approval

The following conditions are required in the LoA to amend the CoC per this SER.

1. The LoA is limited to use of the 10-160B package for a one-time exclusive use shipment of the RaB content configuration described in *Addendum for Transportation of Radium-226 Boron Source in a 10-160B Packaging*, ESCD-000081, Rev. 1, September 2022, Chapter 1, by ground transport from DOE Oak Ridge TRU Waste Processing Center to Nevada National Security Site for disposal.
2. The cribbing design for the RaB content configuration must be fabricated and inspected per Drawing No ESCD-000078, Rev 0.
3. In addition to the requirements of Subparts G and H of 10 CFR Part 71, the package must be prepared for shipment and operated in accordance with the *Operating Procedures* of ESCD-000081, Rev.1, Chapter 7.
4. All other conditions of DOE CoC 9204, Rev. 12 shall remain the same unless superseded by this LoA.
5. This authorization shall expire on December 31, 2025.