UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
Washington, DC 20460

OFFICE OF
AIR AND
RADIATION

August 10, 2023

Mr. Mark Bollinger, Manager
Department of Energy
Carlsbad Field Office
P.O. Box 3090
Carlsbad, New Mexico 88221

Subject: Schedule for Future Compliance Recertification Application Submittals

Dear Mr. Bollinger:

In your letter, dated May 1, 2023, the U.S. Department of Energy (DOE) has requested U.S. Environmental Protection Agency concurrence in updating the Waste Isolation Pilot Plant (WIPP) Compliance Recertification Application (CRA) schedule so that submission can occur five years after the date of the most recent completeness determination, as published in the *Federal Register*. With this letter, EPA concurs with DOE's proposed change. EPA agrees that this updated schedule will enable DOE to address the regulatory criteria more fully in 40 CFR 194.15, permit more time for scientific and experimental activities that benefit the performance assessment (PA), allow for more frequent and meaningful scientific exchanges between EPA and DOE, and provide more time for EPA and DOE to interact with the public. As we've both recognized, increasing transparency and providing time for meaningful public engagement is especially important to our organizations when changes are proposed for the WIPP.

EPA's completeness determination for the CRA-2019 was published in the *Federal Register* on November 26, 2021 (86 FR 67424) and DOE was expected to submit the next CRA in March 2024. Under the revised schedule, EPA expects DOE to submit the next CRA on or before November 26, 2026. This change gives DOE up to an additional two years and eight months to address outstanding issues and improve the CRA development process. The Agency has updated its guidance[1] to reflect the revised submittal date for future CRAs, and a copy is enclosed for your records.

We do recognize that relying on the date of EPA's completeness determination as the starting point for the next CRA submittal will increase the overall length of subsequent review cycles. To constrain the process and ensure that it does not become open-ended, we intend to meet with DOE management shortly after each recertification decision to review outstanding issues and DOE's plans for addressing them. While our respective technical staffs interact through technical exchanges and other mechanisms, we look forward to working with DOE management to ensure that any problems are identified early, and the revised process works smoothly for both agencies and serves the interest of WIPP stakeholders.

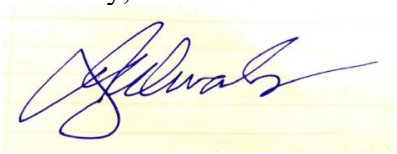
The Agency agrees with DOE's assessment that the completeness process has historically been lengthy. This reflects the highly technical nature of DOE's CRA documentation and calculations and EPA's completeness review, as well as more recent actions taken by DOE to address modifications to the facility and recover from the 2014 release incident. EPA's CRA review involves multiple interactions

between EPA and DOE, and this process has become increasingly constrained by the need for DOE to finalize data and analyses to allow the CRA submission to meet the five-year schedule. As a result, EPA has found numerous instances where new information or requested changes have not been incorporated as expected, which further lengthens the review time. Examples of such instances are provided in the Agency's CRA-2019 recertification decision (see Docket No. EPA-HQ-OAR-2019-0534) and further documented in EPA's July 2023 report on Sandia National Laboratories' application of its internal information review procedures (see Docket No. EPA-HQ-OAR-2001-0012-0777).

With the extra time now in the schedule, EPA looks forward to receiving a CRA that addresses the major issues and concerns identified in the Agency's April 20, 2021, letter from Lee Ann B. Veal to Reinhard Knerr and the CRA-2019 recertification decision (see Docket No. EPA-HQ-OAR-2019-0534). This includes, but is not limited to, choosing an adequate performance assessment (PA) baseline, EPA-approved changes to the approach to plutonium oxidation states and repository chemical conditions, updates to calculations of gas generation from radiolysis of brine and wastes, incorporation of a fully updated and tested geochemistry database, and an acceptable approach to calculations of borehole plugging patterns. We will also expect the CRA documentation to incorporate available results of any long-term experiments (e.g., characterizations of salt creep, plutonium solubility, and/or microbial colloids) for the updated PA calculation.

If you have any questions, please contact Tom Peake at (202) 343-9765.

Sincerely,



Jonathan D. Edwards
Director
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Enclosure

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