



**Department of Energy**  
Carlsbad Field Office  
P. O. Box 3090  
Carlsbad, New Mexico 88221  
July 28, 2010

Mr. Mike Flynn, Director  
Office of Radiation and Indoor Air  
U. S. Environmental Protection Agency  
1310 L Street, NW  
Washington, D.C. 20005

Subject: Request for Extension in the Passive Institutional Controls Program Schedule

Dear Mr. Flynn:

The purpose of this letter is to request an extension of the Passive Institutional Controls (PICs) testing schedule outlined in the Environmental Protection Agency (EPA) letter of March 7, 2008. In December 2009, EPA requested that Department of Energy (DOE) representatives from the Waste Isolation Pilot Plant (WIPP) become more involved with international efforts for nuclear waste disposal (December 2009 meeting in Washington, D.C.). One of the spinoffs of that involvement is to take advantage of international lessons learned, especially as they may relate to PICs. DOE recent interactions with the Nuclear Energy Agency (NEA) (as described below) provide justification for postponing WIPP PICs decisions until the international community has had more time to provide input.

As a member of the NEA and the International Atomic Energy Agency, the DOE, EPA and the Nuclear Regulatory Commission represent the United States (U.S.) in maintaining and further developing the scientific, technological and legal bases required for the safe, environmentally friendly and economical use of nuclear energy for peaceful purposes.

In March 2010, the NEA's Radioactive Waste Management Committee (RWMC) issued and approved the Draft Vision Document for the Long-Term Preservation of Information and Memory project. Relative to long term institutional controls the RWMC has concluded:

*"Conversely, the approach to handling timescales can affect aspects of repository planning and implementation including regulatory requirements, siting decisions, repository design, the development and presentation of safety cases and the planning of pre- and post-closure institutional controls such as monitoring requirements. This is an area still under discussion among NEA member countries. (NEA, 2009)<sup>1</sup>*

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<sup>1</sup> NEA, 2009 -Considering Timescales in the Post-closure Safety of Geological Disposal of Radioactive Waste  
Language: English, Published: 13-MAR-09, 160 pages. NEA#06424, ISBN: 978-92-64-06058-6

The RWMC met on June 29-30, 2010 to discuss long-term preservation of information and knowledge for geologic repositories. The result of that meeting is:

*“The RWMC is implementing its programme of work in the field of long-term preservation of information and memory. This document describes proposed goals and deliverables of a RWMC project over the period of 2010-2013, based on agreements at the March 2010 meeting of the Committee and at the meeting of the Project’s Advisory Group on June 29-30, 2010.”<sup>2</sup> (NEA, 2010)*

Mr. Russell Patterson of the DOE Carlsbad Field Office has been identified as the U.S. point of contact for this initiative.

The paper, “Geological disposal of radioactive waste: records, markers and people”, (NEA News, 2008)<sup>3</sup> that was authored by Dr. Claudio Pescatore, the NEA’s, Radiological Protection and Radioactive Waste Management Division principal administrator further suggests:

*“The conceptualization and design of markers of records by technologists has typically focused on durability and has assumed that the repository is—and will be—something totally separate from its cultural environment. A new vision is emerging, however, that it may be worthwhile to consider the repository as a part of a societal fabric. The task of maintaining memory would thus be facilitated by measures that would foster community involvement and would go as far as foreseeing that these communities will in time build their own new markers to replace old ones that have become obsolete or are fading away.”*

In the same paper, Dr. Pescatore also stated:

*“Hence, there is perhaps the need to conceptualize a “rolling future” in which each generation takes responsibility to ensure continuity and safety for the succeeding several generations, including a need for flexibility and adaptability to circumstances as they change.”*

With this potential for international standards to change guidance on how permanent markers and record archives are maintained, DOE is recommending that WIPP specific work be put on hold until more concrete decisions are made. Therefore, DOE is requesting an extension of the PICs testing schedule until the RWMC has established international standards for markers and record archives.

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<sup>2</sup> NEA, 2010) Long-Term Preservation of Information and Knowledge. Draft Vision Document of the RWMC Project 2010-2013. NEA/RWM(2010)9/PROV. May 18, 2010.

<sup>3</sup> NEA, 2008. Geological disposal of radioactive waste: records, markers and people. NEA Updates, NEA News 2008 – No. 26.

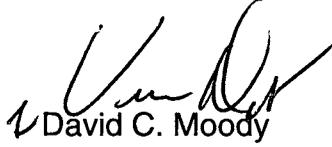
Mr. Mike Flynn

-3-

July 28, 2010

If you have any questions, please contact Russell Patterson at (575) 234-7457.

Sincerely,

  
David C. Moody  
Manager

cc:

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\*ED

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ED

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CBFO M&RC

\*ED denotes electronic distribution