Social Acceptance

Sandia National Laboratories has been the “honest broker” for the scientific community, the regulator, other stakeholders, and the host community.

In their report, the Blue Ribbon Commission (BRC) recommends a consent-based approach to the future siting of nuclear storage and disposal facilities, and recognized the WIPP as a successful example of this method. Simply put, a consent-based approach is one in which state and local governments, along with the host community support or at the very least are willing to accept the proposed facility. At the heart of this approach is the idea of “social acceptance” or public trust and confidence in those managing and overseeing the process. Sandia has been this “honest broker” for the scientific community, the regulator, other stakeholders, and the host community.

In 1996, the EPA issued criteria to implement and interpret the radioactive waste disposal regulations for WIPP. These “WIPP Compliance Criteria” are found in 40CFR 194. In the same year the DOE submitted its application for certification. In 1998 the WIPP was certified by the EPA. The EPAs decision was primarily based on the technical results from a PA conducted by Sandia. Key to the ability of the DOE to submit an application for certification within the same year the compliance criteria were established was the iterative approach to performance assessment the Sandia analysts implemented. Sandia conducted four preliminary PAs which laid the foundation for the final certification PA. During the PA iterations Sandia conducted peer reviews of their models, assumptions, and data. Each iteration refined and improved the models and data. The EPA and other stakeholders were involved in technical exchanges during this period to discuss technical concerns, and educate them on model and parameter development. The approach led to the certification by the EPA in 1998, a mere 18 months after submittal.

Sandia has been successful in implementing its repository responsibilities because the importance of establishing good communication with oversight organizations, regulators and the public has been recognized. Good science is necessary but not enough. Responsiveness to technical oversight reviews and utilization of technical peer review panels not only enhances the scientific programs, but also improves technical and public credibility. Sandia has shown it can balance these needs with the degree of a technical understanding required to achieve acceptance of repository performance.

References


