

Summary of the Value of State Oversight in DOE Waste Disposal Operations

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In the early 1980's new legislation was enacted that allowed States, Indian Tribes and affected local units of government review and oversight authority. Initially this was not readily accepted by the US DOE after operating for decades as a largely self-regulating authority.

Data were not always readily available to the States and Tribes and the opportunity to share in the development and understanding of technical analyses were rare. Generally the approach was named "preach and defend" and alternative concepts were not easily accepted as State and Tribal viewpoints were not taken seriously.

In the mid to late 80's technical disagreements started to form between the State of Nevada and the OCRWM. Two primary areas of disagreement concerned the interpretations of groundwater flow and volcanism. State scientists did not accept the OCRWM concept of matrix flow moving from west to east across the mountain block; favoring the interpretation of fracture flow and fault controlled hydrology. OCRWM did not accept this concept for many years and ignored the States arguments and the data.

Even when presented with evidence that bomb-pulse Chlorine-36 had reached tunnel depth along fracture zones, OCRWM continued to defend their matrix flow conceptual models and actually set out to disprove the fracture flow concept. They conducted sampling at regularly spaced intervals in the matrix, not at fractures and determined that there was little possibility of fracture-flow occurring and therefore characterization efforts didn't focus on fractures or fault zones. In the end, the latest flow models did include faults and fractures and flow paths looked very similar to those the State had proposed a decade or more earlier. It is my opinion that ignoring the State's interpretation was costly as it resulted in high uncertainty and less useful data for the License Application.

DOE EM Office of Compliance has recognized that to obtain site permits and to close facilities in a timely fashion, that regulator and stakeholder involvement is critical to success. They have initiated the Performance Assessment Scoping Process designed to bring all parties to the table while planning the technical analyses. Some of the discussions are educational, but all have the opportunity to provide input into the analyses before pen is put to paper. This has resulted in a cost savings to DOE EM in both time and money and perhaps more importantly, has resulted in an informed and largely supportive regulatory and stakeholder community.