Progress through Action

June 2019

Waste Acceptance Program

Summary

DOE operates waste treatment, storage, and disposal facilities at its sites for the various types of radioactive waste. For example, DOE's *Radioactive Waste Management Manual* (DOE Manual 435.1-1, Chapter IV, Paragraphs G-L) establishes the Department's waste acceptance program.

In addition, commercial entities operate waste treatment, storage, and disposal facilities for both commercial- and DOE-generated radioactive waste. All DOE and commercial facilities establish waste acceptance programs to ensure that waste generators understand and comply with facility requirements, including waste acceptance criteria (WAC) and requirements for characterization, certification, and packaging of waste.

The waste acceptance program ensures that waste sent to these waste management units complies with all environmental, safety, and operational requirements, established in the facility's WAC.

- WAC are the technical and administrative requirements that a waste must meet in order for it to be accepted at a storage, treatment, or disposal facility. WAC are required by all regulators as part of the licensing process for a facility. The initial WAC and any revisions are subject to regulatory review.
- WAC identify the requirements, terms, and conditions under which the facilities will accept wastes for disposal.
 The criteria specify, among other things, the allowable types and quantities of radioactive materials; the types of containers required; and any restrictions on specific wastes, materials, or containers.
- The technical criteria define the physical, chemical, and radiological characteristics of a waste form, integrated closely with the performance assessment for the entire facility, to ensure that the performance objectives and measures to protect the public and workers will be met.
- Though designed to meet the requirements for waste acceptance, these technical criteria are also structured in accordance with U.S. Department of Transportation regulations, the Resource Conservation and Recovery Act, and other federal, state, and local laws and regulations.
- For example, Waste Control Specialists' Andrews Texas low-level radioactive waste disposal facility uses its website (http://www.wcstexas.com/documents-and-forms/) to provide customers with waste acceptance documentation, including a Generator Handbook that documents the facility's waste acceptance program.

Other elements of a waste acceptance program:

- Generators must characterize their wastes to identify composition and properties needed to comply with applicable storage, treatment, handling, transportation, and disposal requirements. Characterization is accomplished by process knowledge on the generation of waste and by nondestructive examination, nondestructive assay, sampling and analysis.
- Waste certification is the process by which a waste generator demonstrates to the facility licensee that a given
 waste or waste stream meets the WAC of the facility to which the generator intends to transfer waste for
 treatment, storage, or disposal. Certification includes waste characterization records and quality assurance
 requirements, as well as the practices associated with waste inspection, packaging, shipping, and disposal.
- Once a proposed waste is identified, the generator must submit a detailed profile for review by the facility licensee (waste origin, quantity, composition, packaging, and the analytical and preparatory methods used to characterize the waste) and waste certification.
- Waste acceptance procedures may include waste generator on-site inspections and/or reviews prior to acceptance of waste shipments at a disposal facility.