

File: GRC Rad 96

**NEW MEXICO ENVIRONMENT DEPARTMENT  
Hazardous and Radioactive Materials Bureau**

**MEMORANDUM**

---

**Date:** June 4, 1996  
**To:** Michael Chacón, RCRA Permitting Program  
**Thru:** Ron Kern, RCRA Technical Compliance Program Manager *RK*  
**From:** Bob Sweeney, RCRA Technical Compliance Program *BS*  
**Re:** Giant Refining Company request to plug and abandon  
Observation Well #5 at the Ciniza facility.

---

The RCRA Technical Compliance Program (TCP) has reviewed Giant Refining Company's (GRC) May 13, 1996 request to plug and abandon Observation Well #5 (OW-5) at the Ciniza facility. TCP agrees with GRC that the well should be plugged and abandoned.

OW-5 was one of seventeen observation wells installed in late 1980 by Shell Oil Company (owners of the refinery at that time) as part of a facility-wide geology and hydrology study. OW-5 was drilled to a total depth of 92 feet on November 12, 1980. A sandstone, thought to be the Sonsela, was encountered from 82 feet to total depth and some thin beds of sandstone, probably the Ciniza, were seen at shallower depths. The boring collapsed from 25.3 feet to total depth before casing could be set and 4 inch perforated casing was installed from 0 to 25.3 feet. Gravel was placed from 17.4 to 25.3 feet and the annular space from 0 to 17.4 feet was sealed with a cement-bentonite slurry. Finally, a protective steel casing, with locking cap, was cemented in place over the top of the PVC. Depth to water was measured at 16.2 feet in January 1981 but no groundwater samples were collected due to the well's improper completion. OW-5 is located approximately 500 feet southeast (upgradient) of the Land Treatment Area and should be plugged because it is a potential avenue for contaminant migration to groundwater.