#### **Attachment 1**

# EWDP MANUAL WATER LEVEL DATA CENSORING PROCESS

## **SECTION 1: METHODOLOGY**

The method used by the Nye County, Nuclear Waste Repository Project Office (NWRPO) to systematically identify and censor invalid water level data collected at EWDP monitoring wells has identified 1 anomalous data point. Continuous water level data encompassing five phases of well construction were analyzed. The method employed was as follows:

- ◆ A hydrograph was plotted for each well in the EWDP water level database (RGED V. 4.0). Data plotted consisted of manual water level measurements (see the Appendix to this Attachment).
- Each hydrograph was visually examined and anomalous data points identified. An anomalous data point is one that is significantly different from other measured water levels in a given well that cannot be explained on the basis of barometric pressure fluctuations or earth tides.
- ♦ Each anomalous data point was investigated to determine the reason for the apparent discrepancy. This review consisted of researching the wells history as documented in the dedicated Scientific Notebooks and searching for explanations for the inconsistent data. In some cases it was necessary to research the history of nearby wells when it seemed possible that activities at those well sites could have affected the water level measurement in question. Posted metadata for some wells were also referenced. The personnel responsible for the visual review of the hydrographs were Tom Buqo and Bob Wilcoxon, contractors to Nye County. The personnel responsible for the review of the individual data points was Bob Wilcoxon, contractor to Nye County.

#### **SECTION 2: RATIONALE FOR CENSORING DATA**

The research results for each well and associated anomalous data are described in detail in Section 3.

### **SECTION 3: EVALUATION OF ANOMALOUS DATA:**

One anomalous data point was discovered. On 9/20/06 a water level was recorded incorrectly at NC-EWDP-12PB. The field technician responsible for the error entered an

explanation in the RGED data entry field and commented that the anomalous data is a result of clerical error.

# **SECTION 4: SUMMARY**

With the exception of the anomalous data record explained above, the EWDP wells do not require water level data censoring and based upon this review, the RGED is correct and does not need to be updated.