

**NEW MEXICO ENVIRONMENT DEPARTMENT
HAZARDOUS WASTE BUREAU
RECORD OF COMMUNICATION (ROC)**

Date: March 24, 2003		Person Contacted: Terry Rust, LANL RRES-R
Recorded by: Vickie Maranville	Telephone Number: (505) 428-2546	Telephone No.: (505) 665-8843

Approved By:
Vickie Maranville, NMED HWB *V Maranville*
Terry Rust, LANL RRES-R *Terry Rust*

Discussion: This record of communication documents a telephone conversation between Terry Rust (LANL RRES-R) and Vickie Maranville (NMED HWB) pertaining to the Airport Landfill VCM Plan submitted by LANL to NMED for review and approval.

BACK GROUND:

On October 18, 2002 LANL submitted a VCM Plan for SWMU 73-001(a)-99 and 73-001(b)-99. The VCM Plan proposed an alternative earthen final cover for the Airport Landfill mesa top. The VCM Plan addresses conceptual design options for the construction of a landfill cover or covers at the SWMUs. The VCM Plan submitted represents the first of two phased plans for the mesa top project. The Airport Landfill HPT proposed a phased corrective measure approach for the Airport Landfill during an HPT meeting in March of 2000. NMED formally approved the phased VCM approach in a letter dated December 20, 2000. NMED reviewed the VCM Plan and based on subsequent conversations between Vickie Maranville (NMED HWB) and Terry Rust (LANL RRES-R), it was determined the comments could be addressed informally using a ROC.

NMED COMMENT AND LANL RESPONSE:

(NMED comment contains report citation, report text (italics), and NMED comment followed by LANL response)

NMED Comment:

Page 13, Section 2.3.2.1 Monitoring Well Sampling *"Therefore, the new data are of little or no use when evaluating the effectiveness of the run-on controls, and the monitoring well sampling results are not presented in this plan."* NMED inquired as to why data was collected and results not reported.

LANL Response:

The above referenced data collected will be provided to NMED in the Phase II VCM Plan.

NMED Comment:

Page 26, Section 4.2.1.2 Input Parameters *"The geosynthetic fabric will last for the duration of methane generation."* NMED inquired how long the methane generation was calculated to be and what actions will be taken if the fabric does not outlast methane generation.

LANL Response:

Methane generation generally occurs for a period of 20 years then, based on research, a radical decrease in the production of methane gas is seen between 20 and 30 years from waste generation in the landfill. Based on the life of the landfill (i.e. date waste was in placed) a substantial portion of the methane gas generation is well underway. Data obtained from the landfill indicates the older portion of the landfill is generating less methane gas than the newer portion of the landfill. The average life expectancy of the membrane is estimated to be in excess of 30 years. Based on the decreasing trend of methane gas generation in the older portion of the landfill, the life expectancy of the membrane is determined to be ample.

NMED Comment:

Page 26, Section 4.2.1.2 Input Parameters *"The properties - from Carsel and Parrish (1988, 70224) - that were used for the venting layer..."* Are the input parameters appropriate for New Mexico's arid climate and conditions observed at the site?



LANL Response:

The values are standard values based on fill material anticipated to be used at the site (crushed tuff). The calculation will be verified based on the actual fill material selected. NMED will be notified in the appropriate plan or report of the actual fill material used and any changes that affect the input parameters and calculation.

NMED Comment:

Page 27, Section 4.2.1.2 Input Parameters *"Dates for the last frost in the spring and the first frost in the fall were used, along with other site-specific knowledge, to determine the growing season at TA-73."* What is the source of the frost dates?

LANL Response:

The frost dates are from a standard source used in the industry. The dates are taken from a published table readily available for the State of New Mexico. Frost dates can be obtained from nurseries, garden centers, etc. and are very similar (may vary a day or two).

Distribution:

V. Maranville, NMED-HWB

T. Rust, RRES-R

File: NMED HWB LANL TA-73 Reading and HSWA