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HSWA File
Ste

Date: January 12, 1998
 Refer to: EM/ER:98-013



Dr. Robert S. Dinwiddie
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**SUBJECT: RESPONSE TO REQUEST FOR SUPPLEMENTAL
 INFORMATION ON THE RFI REPORT FOR TAs-8 AND 9
 (FORMER OU 1157)**

Dear Dr. Dinwiddie:

Enclosed is the Los Alamos National Laboratory's response to the New Mexico Environment Department Hazardous and Radioactive Materials Bureau's request for supplemental information (RSI) on the Resource Conservation and Recovery Act Facility Investigation Report for Technical Areas 8 and 9. The RSI was received on November 10, 1997, and an extension request was submitted on December 12, 1997, seeking an extension to submit a response until January 12, 1998.

If you have any questions, please contact Don Krier at (505) 665-7834 or Mike Gilgosch at (505) 667-5794.

Sincerely,

Julie A. Canepa, Program Manager
 LANL/ER Project

Sincerely,

Theodore J. Taylor, Program Manager
 DOE/LAAO

JC/TT/ss

Enclosure Response to Request for Supplemental Information on the RFI Report for TAs-8 and 9 (Former OU 1157)



HSWA LANL 5/1157/849

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EM/ER File (CT# C398), MS M992
EM/ER File, MS M992

**Response to
Request for Supplemental Information on the
RCRA Facility Investigation Report for
Technical Areas 8 and 9**

INTRODUCTION

To facilitate review of this response, the New Mexico Environmental Department's (NMED's) comments are included verbatim. The comments are divided into general and specific categories, as presented in the original request. Los Alamos National Laboratory's (LANL's) responses follow each NMED comment.

GENERAL COMMENTS

NMED Comment

1. *Based on the site characterization information provided within the RFI Report, RPMP has determined that LANL may request a permit modification to remove the following PRSs from the HSWA Module of the RCRA Operating Permit based on "No Further Action" Criterion 5 (Document of Understanding, Annex B dated February 1, 1996): 8-004(d) and 9-009.*

LANL Response

1. LANL agrees with this comment and will proceed to remove Potential Release Sites (PRSs) 8-004(d) and 9-009 from Module VIII of the Resource Conservation and Recovery Act operating permit.

SPECIFIC COMMENTS

NMED Comment

1. *At C-8-010, LANL failed to obtain depth samples (to 24 inches) as specified within the approved RFI Workplan; therefore, LANL must resample this area of concern as specified by the approved Workplan.*

LANL Response

1. In the work plan, the depth of sediment is tentatively identified as up to 12 inches thick. Although the depth of sediments in the area of the drum storage site had not been defined, a reasonable estimate of the sample collection depth for volatile organic compounds (VOCs) in these sediments was 24 inches. Therefore, this 24-inch deep VOC sampling interval was proposed in the work plan without actual knowledge of the depth to tuff at the site. In a previous communication with NMED (Attachment 1), LANL stated that soil sampling would continue at 1-foot intervals down to the tuff surface as long as field-monitoring instruments continued to detect potential contaminants. When the sampling was conducted, the upper 8 to 9 inches of soil was found to consist of a loose, silty material of apparent recent deposition. A clay soil was found below the sediment, and tuff was encountered at 12 to 15 inches below ground surface. The boring was terminated upon encountering the tuff surface. Organic vapor field monitoring, using a photoionization detector throughout the sampling, did not indicate the presence of any organic compounds.

No organic compounds were reported in the analytical samples that were collected within the planned soil interval of concern, i.e., below the recent sediment deposition and above the tuff. There is no documented knowledge of a release at the site, all field monitoring as well as analytical results indicated no organic compounds were present in any site soil sampled, and the LANL field investigation implemented the intent of the sampling plan. Therefore, LANL believes that the sampling effort verifies that no release has occurred, that further investigation is not warranted, and the site should be approved for no further action (NFA).

NMED previously submitted the same comment on this PRS on March 11, 1997, and LANL responded to this comment on April 16, 1997 (Attachment 1).

NMED Comment

2. *At 8-009(d), LANL must conduct further sampling since LANL failed to determine the extent of contamination.*

LANL Response

2. LANL will take additional samples to bound extent.

NMED Comment

3. *For PRSs 9-005(a), 8-009(d-e), 9-001 (a-b, d) and 9-003(g-i), LANL should revise the screening assessment (multiple chemical evaluation concept) with the following human health-based screening assessment process:*

The screening assessment should compare the maximum concentration or activity of each contaminant at the site to a screening action level (SAL) which is a risk-based concentration calculated using a conservative target risk. SALs should be obtained from EPA Region 6's Human Health Media-Specific Screening Levels.

SALs for carcinogens are calculated based on the lower end of 1E-04 to 1E-06 "risk range" to account for multiple carcinogenic contaminants. SALs for noncarcinogens do not account for chemical mixtures; therefore, if more than one non-carcinogen has been identified or is expected, then the non-carcinogenic chemical SAL should be divided by a safety factor of 10.

If maximum detected concentrations or activities of contaminants in a given medium are below 1E-06 cancer risk or below 0.1 hazard quotient SAL, then contaminants can be eliminated from further evaluation as chemicals of potential concern (COPCs). Any COPCs failing this screening should be carried forward through a risk assessment.

LANL Response

3. LANL technical guidance resulting from joint LANL/Hazardous and Radioactive Materials Bureau (HRMB) NMED workshops on October 15, 1997, and November 5, 1997, states that

"LANL does not need to revisit previously submitted reports that used Region 9 SALs and MCE calculations when the calculations were done correctly"

The multiple chemical evaluation (MCE) calculations for all PRSs were done correctly using Region 9 SALs, as required at the time the report was written; therefore, the MCE for these PRSs need not be revisited. However, resampling at PRS 8-009(d), discussed in Comment 2, will require a recalculated MCE.

NMED Comment

4. *All future Corrective Action documents should utilize and cite the "No Further Action Criteria" (NFA) presented within Annex B of the Document of Understanding (DOU) and not those within the Project Consistency Team Policy number 015. LANL should provide a table of the DOU Criteria appropriate to those PRSs proposed for NFA within this RFI Report.*

LANL Response

4. LANL agrees with this request. The report cites the correct NFA criteria that was applicable at the time the report was written (PCT#015).

SUMMARY OF POTENTIAL RELEASE SITES

Set	PRS	NFA Criterion*	Rationale	Section
Sr-90 spill	08-004(d)	5	COPCs below SALs	5.1.1
	09-005(a)	5	COPCs within background	5.1.2
	09-005(d)	5	COPCs below SALs	5.1.3
	09-008(b)	5	COPCs below SALs	5.1.4
	09-009	5	COPCs within background	5.1.5
	08-009(d)	5	COPCs below SALs	5.2
	08-009(e)	5	COPCs below SALs	5.3
Far Point	09-001(a)	5	COPCs below SALs	5.4
	09-001(b)	5	COPCs below SALs	5.4
Old Anchor East	09-003(g)	5	COPCs below SALs	5.5
	09-003(h)	5	COPCs below SALs	5.5
	09-003(i)	5	COPCs below SALs	5.5
	09-001(d)	5	COPCs below SALs	5.5
	C-8-010	5	COPCs within background	5.6

* See Annex B, NFA Process and Criteria, "Environmental Restoration Document of Understanding," Revision 0, February 1, 1996.