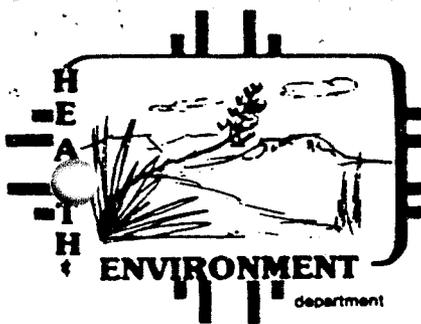


TONEY ANAYA
GOVERNOR

DENISE D. FORT
DIRECTOR



STATE OF NEW MEXICO

ENVIRONMENTAL IMPROVEMENT DIVISION

P.O. Box 968, Santa Fe, New Mexico 87504-0968

(505) 984-0020

August 26, 1985

NOTICE OF VIOLATION

CERTIFIED MAIL-RETURN RECEIPT REQUESTED

Mr. Harold Valencia
Los Alamos Area Office
U.S. Department of Energy
Los Alamos, NM 87544

Mr. Chris Adams
Los Alamos National Laboratory
Mail Stop A120
Los Alamos, NM 87545

Re: LOS ALAMOS NATIONAL LABORATORY
NM0890010515

Gentlemen:

On July 10 and 11, 1985, the New Mexico Environmental Improvement Division (EID) conducted a hazardous waste compliance inspection of Los Alamos National Laboratory (LANL). This letter is EID's notice that, based on our recently completed review of the information obtained during the inspection and a review of our files, EID has determined that LANL has violated several provisions of the New Mexico Hazardous Waste Management Regulations (HWMR-2). At the termination of our on-site inspection, EID orally notified LANL about many of these violations. The purpose of this letter is to delineate in writing the violations noted in the file documentation and observed at the time of the inspection and to require LANL to comply with the New Mexico Hazardous Waste Act and HWMR-2 (a copy of which has been previously supplied to LANL).

It should be noted that portions of the Part B were reviewed for determining compliance with interim status standards. Therefore, the references herein to Part B are based solely on interim status standards, not permitting standards.

The inspection indicated that LANL is in violation of HWMR-2 as follows:

1. HWMR-2 Section 204.B.1.b. requires that the date of accumulation be marked for each container or tank. The tank for plating shop hazardous wastes had no accumulation date readily available for inspection.



16441

2. HWMR-2 Section 206.C.4.b. requires that wastes in containers which are not in good condition be transferred or otherwise managed. One container in TA-54 Area L storage had three holes corroded through the drum wall and the wastes were only restrained by the drum liner.
3. HWMR-2 Section 206.B.4.c. requires that warning signs in English and Spanish be posted at the entrance to the active portions of a facility. No such warning signs were posted at the entrance to TA-50-1 Batch Treatment area.
4. TA-54 Area G Paragraphs cited below refer to the Closure Plan submitted with LANL November 30, 1984 letter.
 - a. HWMR-2 Section 206.C.2.c.(1)(a) requires that the closure plan describe partial closure and identify the maximum extent unclosed. Paragraph I.O.B. states there are no partial closures anticipated, then further states individual landfill shafts or pits are closed as they are filled. This is partial closure and should be addressed as such. There is no statement as to the planned maximum extent Area G will be unclosed.
 - b. HWMR-2 Section 206.C.2.c.(1)(c) requires, at least, a description of the steps needed to decontaminate facility equipment. Paragraph 6.O.C. states that no decontamination is planned. No testing to establish the lack of need for decontamination is proposed. This does not meet the minimum requirements.
 - c. HWMR-2 Section 206.C.2.c.(1)(d) requires an estimate of the total time required to close a facility. Paragraph 6.O.C. provides a schedule for intervening steps only. No total time for closure is provided.
 - d. HWMR-2 Section 206.C.2.C.(1)(a) requires the closure plan to describe how the disposal standards of Section 206.C.2.b. will be met. Paragraph 6.O.C. provides no details for contouring, run-on and run-off protection, cap compaction procedures or specifications, or revegetation details.
 - e. HWMR-2 Section 206.C.2.c.(1)(a) requires the closure plan to describe how the decontamination or proper disposal requirements of Section 206.C.2.e. will be met. This subject is not addressed in the closure plan.
 - f. HWMR-2 Section 206.C.2.f. requires certification of closure completion to be submitted to the Director (of NMEID). Paragraph I.O.G. states that a certification by a registered engineer will be submitted to EPA or the Director. No mention is made of certification by the owner or operator that the closure is completed. This will allow for two violations of Section 206.C.2.f. if the former option, submittal to EPA, is exercised.
5. TA-54 Area L: Review of the Closure Plan in the Part B submitted on May 1, 1985.

- a. HWMR-2 Section 206.C.2.c.(1)(a) requires a description of partial closure, if applicable. Paragraph 9.1.2. states that no partial closures are anticipated, then states that closure of individual disposal shafts occurs as each is filled. This is partial closure and should be addressed as such.
 - b. HWMR-2 Section 206.C.2.e. requires all facilities and equipment to be properly disposed of or decontaminated. Paragraph 9.4.1.2. provides no disposal destination or service to establish that proper disposal or decontamination will occur. Visual inspection and wipe or swab tests with unspecified analyses are proposed. This is insufficient information to establish proper disposal or decontamination.
 - c. HWMR-2 Section 206.C.2.c.(1)(d) requires an estimate of total time to complete closure activities. Paragraph 9.4.1.2. provides estimates of time to complete individual steps. No total time to close is estimated.
 - d. HWMR-2 Section 206.C.2.f. requires certification of closure completion by an independent registered professional engineer. Paragraph 9.1.6. specifies only that a registered professional engineer will attest to closure. A registered professional engineer independent of the laboratory, i.e. not a regular employee of the laboratory, must attest to closure.
 - e. HWMR-2 Section 206.C.9.d. requires that the closure plan address pollutant migration, water infiltration and prevention of erosion. Paragraph 9.4.3.1. states only the area will be graded, bermed and replanted. Insufficient details are provided to establish that the criteria of Section 206.C.9.d. are met.
6. TA-40: Review of Part B dated May 1, 1985.

HWMR-2 Section 206.C.2.c.(1) requires a closure plan which identifies the steps needed to partially or totally close a facility. Technical Area 40 was identified in the Part A submittal of November 1, 1984, as a potential disposal area for explosive wastes. No closure plan for TA-40, or alternatively, a certification of non-use of TA-40 for disposal of hazardous wastes, has been provided.

7. TA's-14, 15, 36 and 39: Review of the Closure Plan submitted with the Part B dated May 1, 1985.

HWMR-2 Section 206.C.2.c.(1)(a) requires that the closure plan explain how the closure standards of Section 206.C.2.b. are met. Paragraph 9.2.1.1. specifies that the soil from the explosive treatment pads will be sampled and analyzed. No sampling protocol to establish that the explosive treatment has not contaminated the surrounding areas is provided. Paragraph 9.2.1.2. also specifies only EP-Tox analyses will be performed. The LANL Part A has identified numerous other toxic wastes that are handled. An analysis protocol sufficient to establish the absence of hazardous waste residues should be provided.

8. TA-16: Review of the Closure Plan submitted with the Part B dated May 1, 1985.

HWMR-2 Section 206.C.2.c.(1)(a) requires that the closure plan explain how the closure standards of Section 206.C.2.b. will be met. Paragraph 9.2.2. describes sand filter beds and a burn pad surrounded on at least two sides by a berm or hillside. Paragraph 9.2.2.2. describes only closure for the sand filter beds. No closure actions, sampling or analysis protocols are described to establish that the explosive burn pads have been properly closed. Additionally, explosive treatment occasionally spreads fragments beyond the treatment pad. No sampling and analysis protocol is described to properly close the explosive treatment facility.

9. TA-50-1 Treatment/Storage Area: Review of the Closure Plan submitted with the Part B dated May 1, 1985.

a. HWMR-2 Section 206.C.2.e. requires proper disposal or decontamination of facility equipment. Paragraph 9.3.1.2. states only that hazardous residues will be disposed of as hazardous wastes. Insufficient details of planned disposal services, facilities or actions are provided to establish that proper disposal has occurred.

b. HWMR-2 Section 206.C.2.c.(1)(d) requires an estimate of total time to complete closure. Paragraph 9.3.1.2. provides only estimates for completing intervening steps. No total closure time is estimated.

c. HWMR-2 Section 206.C.2.c.(1)(a) requires that the closure plan describe how the closure standards of Section 206.C.2.b. will be met. Paragraph 9.3.1.2. does not specify what analyses will be performed on decontamination wastes. The LANL Part A identifies numerous hazardous wastes which may be present. Insufficient analysis protocol details are provided to establish that Section 206.C.2.b. standards will be met.

10. TA-3-102 Lithium hydride storage: Review of the Closure Plan submitted with LANL letter dated November 30, 1984.

a. HWMR-2 Section 206.C.2.e. requires all facilities to be properly decontaminated or disposed of. Paragraph 2.O.B. states only that all residues will be properly disposed of. No details of how such disposal will occur are provided to establish that such disposal is proper.

b. HWMR-2 Section 206.C.2.c.(1)(c) requires that the closure plan include steps to decontaminate facility equipment. Paragraph 2.O.B. states no decontamination is proposed. No testing to establish that decontamination is not necessary is proposed. This does not meet the minimum requirements.

c. HWMR-2 Section 206.C.2.c.(2) requires that closure plans be amended within 60 days of changes in operating plans. The Part A submittal of April 2, 1985, documents a deletion of TA-3-102 as a storage facility and the operational intent to change to less than 90 day storage. The

Closure Plan paragraph 1.O.B. has not been amended to show this planned closure in 1985 instead of the planned closure in 2100.

- d. HWMR-2 Section 206.C.2.c.(1)(a) requires the closure plan to demonstrate how the standards of Section 206.C.2.b. will be met. Paragraph 2.O.B. states a visual inspection will be performed. No sampling or testing protocol is described to establish that the standards have been met.
 - e. HWMR-2 Section 206.C.2.c.(1)(d) requires the closure schedule estimate the total time for closure. Paragraph 2.O.B. provides estimates of times for individual actions only. No total time for closure is estimated.
11. Post-Closure Plans: Review of the Post-Closure Plan submitted with LANL letter dated November 30, 1984.
- a. HWMR-2 Section 206.C.2.h.(1)(c) requires that the post-closure plan include the telephone number of the individual or office responsible for post-closure care. The post-closure plan for TA-3-102 and TA-54 Area G does not include in paragraph 1.O.H. the telephone number of the post-closure care office.
 - b. HWMR-2 Section 206.C.2.h.(1)(b) requires that the post-closure plan describe maintenance activities which will ensure containment. Paragraph 6.O.D.3. describes only inspection and paragraph 6.O.D.4. states only that repairs shall be made. Insufficient detail is provided to determine if the proposed actions will ensure containment.
12. Contingency Plan: Review of LANL Part B dated May 1, 1985.
- a. HWMR-2 Section 206.B.10.g. requires that a primary emergency coordinator and a succession order be designated when more than one individual is qualified. Paragraph 7.4.1. states that the HSE-7 Group Leader or his designee is primary. Table 7 - 6 lists six possible coordinators with no indication of succession order. One individual must be named primary and the succession order or other prioritization must be clearly stated.
 - b. HWMR-2 Section 206.A.4.g. states that the clean-up activities subsequent to an emergency response to a discharge of material which becomes a hazardous waste are subject to the requirements of Section 206 and Part III. Paragraph 7.4.2.1., Guidelines for Implementation, does not address events such as spills or fires of materials which are not wastes before the event, i.e. raw materials. HWMR-2 Section 201.A.1. includes such spills in the definition of solid wastes. The Contingency Plan does not address all probable events creating hazardous wastes.

13. LANL Waste Analysis Plan: Review of LANL Part B dated May 1, 1985.

- a. HWMR-2 Section 206.B.3.a. requires that a representative sample be analyzed in detail. The Waste Analysis Plan has no provision for detailed analyses of representative samples of laboratory wastes.
- b. HWMR-2 Section 206.B.3.b. requires the waste analysis plan to describe procedures and rationale for analyses. LANL has notified of the potential for handling listed wastes which may be acutely hazardous. The Waste Analysis Plan provides no details for determining the presence or absence of such wastes. Table 3-2 specifies only "chemical analysis" for unknown composition wastes from the laboratories. The narrative description on page 3-5 states that wastes are characterized by knowledge of the source or analysis for reactivity, pH or ignitability. This is insufficient detail to adequately handle potentially acutely hazardous wastes.
- c. HWMR-2 Section 206.B.3.b.(4) requires that analysis be repeated periodically to ensure accuracy and currency. The Waste Analysis Plan has no provision for periodic reanalysis of wastes from the laboratories.
- d. HWMR-2 Section 206.B.3.a. requires analysis of a representative sample of wastes. Paragraph 3.1.4. states that the Shops Department works with "almost any metal, alloy or other materials." Table 3-2 states that no analyses are performed for wastes from the Shops Department. Failure to analyse Shops Department wastes violates HWMR-2 Section 206.B.3.a.

14. Personnel Training: Review of LANL Part B dated May 1, 1985.

HWMR-2 Section 206.B.6. requires a personnel training program at the facility. This is the subject of EID letter of May 7, 1985, (Compliance Order) paragraphs 20-22 inclusive. The required implementation date is October 1, 1985.

15. HWMR-2 Section 302.C. requires owners of existing facilities to submit Part A applications. LANL operates a landfill in TA-16 Area P for disposal of waste materials associated with explosives testing. The landfill has received, since November 18, 1980, wastes which exhibit at least Extraction-Procedures Toxicity (EP Tox) levels of barium. This facility was not listed on any Part A notifications and therefore is in violation of Section 302.C.

- a. HWMR-2 Section 206.C.1. requires a ground water monitoring program for facilities with interim status. There is no ground water monitoring program for TA-16 Area P.
- b. HWMR-2 Section 206.C.2. requires a closure plan and a post-closure plan for facilities with interim status. There is neither a closure plan nor a post-closure plan for TA-16 Area P.

- c. HWMR-2 Section 206.C.9. specifies additional requirements for landfills without interim status. None of the specific requirements were apparent at the time of the inspection.

In accordance with Section 74-4-10 NMSA, you have thirty (30) calendar days from receipt of this notice to provide documentation that the aforementioned violations have been corrected. Within this thirty (30) day period you may request a hearing at which LANL may negotiate a legally binding compliance schedule. A request for a hearing on the part of LANL will not stop the thirty (30) day clock. This documentation must include:

1. LANL must establish a system to document the accumulation start date on hazardous wastes stored in areas approved only for less than ninety day storage. A written description of the procedure and LANL management's follow-up plan must be submitted;
2. LANL must establish a written policy that wastes in deteriorated containers be promptly repackaged or otherwise managed. A copy of the policy statement must be submitted;
3. Warning signs worded in accordance with HWMR-2 Section 206.B.4.c. must be posted at the entrance to all areas where hazardous wastes may be stored. Certification of completion must be submitted;
4. The closure plans for all areas must be amended to correct the deficiencies cited above in violations 4 through 10 inclusive. Sufficient design details must be included to allow for technical review and approval;
5. The post-closure plans for all areas must be amended to correct the deficiencies cited above in violation 11. Sufficient design details must be included to allow for technical review and approval;
6. The Contingency Plan must be amended to correct the deficiencies cited;
7. The Waste Analysis Plan must be amended to correct the deficiencies cited;
8. A correct Part A reflecting TA-16 Area P must be submitted.
9. A ground-water monitoring program for the landfill in TA-16 must be designed and submitted for NMEID approval. All requirements of Section 206.C.1. must be specifically addressed; and
10. Closure and post-closure plans for the TA-16 landfill, addressing all the requirements of 206.C.2. and 206.C.9., must be submitted for NMEID approval.

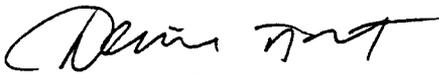
If you fail to submit the documentation requested herein within the specified time frame or do not arrange for a legally binding compliance schedule within the required time frame, you shall be subject to one or more of the following:

1. an order requiring compliance within a specified period, pursuant to 74-4-10 NMSA 1978;
2. a civil action in district court for appropriate relief, including a temporary or permanent injunction, pursuant to 74-4-10 NMSA 1978; and/or
3. the assessment of civil penalties up to \$10,000 per violation for each day of continued non-compliance, pursuant to 74-4-12 NMSA 1978.

Compliance with the requirements of this notice does not relieve LANL of its obligation to comply with HWMR-2 in other activities which it carries on nor does it relieve LANL of its obligation to comply with any other applicable laws and regulations.

If you have any questions regarding this notice, please contact Peter H. Pache, Program Manager, New Mexico Environmental Improvement Division, P.O. Box 968, Crown Building, Santa Fe, New Mexico 87504, or call (505) 984-0020, ext. 340. Please address to Mr. Peter Pache's attention the information you provide in response to this letter.

Sincerely,



Denise Fort
Director

DF/CKC/mt

cc: Pat Hull, EPA Region VI
Duff Westbrook, EID Legal
Tito Madrid, EID District II