



NATIONAL LABORATORY

EST. 1943

Environmental Programs

Corrective Actions Project
PO Box 1663, Mail Stop M992
Los Alamos, New Mexico 87545
(505) 667-0819/FAX (505) 665-4747

TA/6



National Nuclear Security Administration

Los Alamos Site Office, MS A316
Environmental Restoration Program
Los Alamos, New Mexico 87544
(505) 667-7203/FAX (505) 665-4504

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Date: October 22, 2006
Refer to: EP2006-0899

Mr. John Young
Permits Management Program
NMED – Hazardous Waste Bureau
2905 Rodeo Park Drive East, Building 1
Santa Fe, NM 87505-6303



SUBJECT: SEPTEMBER 2006 MONTHLY PROGRESS REPORT FOR CORRECTIVE MEASURES STUDY FOR POTENTIAL RELEASE SITE 16-021(c)-99

Dear Mr. Young:

Enclosed are two hard copies with electronic files of the September 2006 Corrective Measures Study (CMS) Progress Report for Potential Release Site (PRS) 16-021(c)-99, the 260 Outfall. The report is submitted according to the approved CMS plan for PRS 16-021(c)-99.

If you have questions, please call Don Hickmott at (505) 667-8753 (dhickmott@lanl.gov) or Woody Woodworth at (505) 665-5820 (lwoodworth@doeal.gov).

Sincerely,

Andrew Phelps, Associate Director
Environmental Programs
Los Alamos National Laboratory

Sincerely,

David Gregory, Federal Project Director
Department of Energy
Los Alamos Site Office



6649

DM/DG/DH/ew

Enclosure: Two hard copies with electronic files - Monthly Progress Report Corrective Measures Study (CMS) for Potential Release Site (PRS) 16-021(c)-99, September 2006

Cy: (w/enc)

D. Hickmott, EES-6, MS D462 (with CD)
W. Woodworth, DOE LASO, MS A316 (with CD)
CAP File, MS M992 (with CD)
RPF, MS M707 (with CD)
SAFE S7, MS F674 (without CD)

Cy: (letter and CD only)

P. Reneau, EP-ERSS, MS M992
J. Heikoop, EES-6, MS D462
L. King, EPA Region 6

Cy: (w/o enc)

A. Dorries, ERSS-DO, MS M992
G. Dover, EP-CAP, MS M992
D. Gregory, DOE LASO, MS A316
C. Mangeng, ADEP, MS J591
A. Phelps, ADEP, MS J591
T. Skibitski, NMED-OB
IRM-RMMSO, MS A150

Monthly Progress Report
Corrective Measures Study (CMS)/Corrective Measures Implementation (CMI) for
Consolidated Unit 16-021(c)-99
September 2006

This report summarizes Los Alamos National Laboratory (LANL) activities completed during September of fiscal year (FY) 2006 on the CMS/CMI for Consolidated Unit 16-021(c)-99, the TA-16-260 Outfall. Both the activities described in the CMS plan ([LA-UR-98-3918], approved by NMED-HWB on 9/8/99), and other related activities are described herein.

Description of Activities and Contacts

High Performing Team (HPT) – The HPT did not meet during September, 2006. The next HPT meeting is tentatively scheduled for October. Topics will include a TA-16-260 update, the Corrective Measures Evaluation (CME) for groundwater, and a discussion of groundwater modeling.

RCRA Facility Investigation (RFI) Phase II Report and CMS Plan– No activities this month.

Best Management Practices (BMPs) – BMPs are inspected quarterly and following significant precipitation events. There were several precipitation events in September; however, these did not require repair of BMPs in the 260 outfall area.

CMS Hydrogeologic Investigations– Investigations include ongoing Phase II RFI sampling as well as continuing investigations outlined in the CMS plan. The ongoing Phase II RFI sampling program, currently focused on capturing high-flow events, includes biannual stable isotope sampling at Martin and Burning Ground Springs. These sampling activities are now being accomplished under the auspices of the interim facility-wide groundwater monitoring plan.

The hydrologic system in Cañon de Valle is wetting up following the long dry out due to a lack of precipitation from December through June. Martin Spring is flowing at ~1000 mL/min., Burning Ground Spring is flowing at a rate of ~300 mL/ sec., and SWSC spring is dry.

The 90s Line Pond and downgradient surface locations in Martin Spring Canyon and Cañon de Valle are wetting up. The alluvial wells in lower Cañon de Valle, Fishladder Canyon, and lower Martin Spring Canyon are wet. Surface water in Cañon de Valle was present from Burning Ground spring to just east of MDA P and water was present at the Cañon de Valle headwaters. In the non-perennial reaches of Cañon de Valle, Martin Spring canyon, and Fishladder canyon there are intermittent pockets of ponded water present at the surface.

Ecological Risk Pilot–

The ecological risk pilot study is complete; results are presented in the Phase III RFI Report.

CMS Bench and Pilot Studies– Write-up of bench and pilot studies, many of which were conducted under the auspices of the Innovative Technology Remediation Demonstration (ITRD) program, have been completed. The ITRD HE program is focused on two DOE sites: LANL and Pantex. Ongoing studies include:

1. A study of the passive barrier technology of Stormwater Management, Inc., potentially useful for removing HE and barium from waters (LANL). Monitoring of barrier effectiveness has recommenced after several quarters of drought conditions during which Martin spring was dry.
2. A study of in situ anaerobic bioremediation of HE using gas-phase carbon additions (Pantex).
3. Oxidation, reduction, and in-situ bioremediation studies of groundwater contamination (Pantex).

Interim Measure (IM) –

The IM Report was approved by NMED in a letter dated January 13, 2003. No new activities occurred during this reporting period.

RFI and CMS Reports –

The CMS Report was completed and submitted to NMED on November 26, 2003; the RFI Report was completed and submitted in September of 2003. A response to the NOD on the RFI Report was submitted on January 28, 2004 and an addendum to that NOD response was submitted on February 25, 2004. An approval with modifications for the RFI was received on June 23, 2004, and a response to the approval was submitted to NMED on July 23, 2004. The RFI text modifications were completed during December 2004 and submitted to NMED. An NOD on the CMS Report was received on May 16, 2005. A response to that NOD was submitted on June 15, 2005. LANL has responded to several recent NMED queries concerning the CMS Report.

NMED issued the “Intent to Public Notice Remedy Selection for the Solid Waste Management Unit 16-021(c)” on May 15, 2006. Public comments on this notice were due to NMED by July 14, 2006. LANL provided comments on this public notice

The Investigation Report for TA-16 groundwater was completed and submitted to NMED on August 31, 2006.

Public and Stakeholder Involvement – A tour was completed for NMED and EPA personnel.

Percentage of CMS Completed

LANL estimates 100% of the surface CMS has been completed (please note this percentage does not reflect either the deep or intermediate boreholes being drilled per the CMS plan addendum).

Problems Encountered/Actions to Rectify Problems

None.

Key Personnel Issues

None.

Projected Work for October 2006

Investigation Reports and CMS/CME Reports

- Discussions regarding the CMS Report with NMED personnel.
- Distributing copies of the Groundwater Investigation Report.
- Initiation of Groundwater Modeling for the Groundwater CME Report

BMPs

- Continued inspection of existing BMPs following significant precipitation events.

CMS Hydrogeologic Investigations

- Site maintenance at the TA-16 trailers.
- Checking for presence and levels of water in alluvial wells.
- Precipitation monitoring.
- Data analysis.

Ecological Risk Pilot

- None.

CMS Bench and Pilot Studies

- Planning for column studies to support the CMI

CMI

- Formulation of study designs for barrier materials for use in permeable reactive barriers.

Public and Stakeholder Involvement

None