

**WATER QUALITY
MEMORANDUM
Utah Coal Regulatory Program**

April 7, 2009

TO: Internal File

THRU: Jim Smith, Permit Supervisor *DS 04/09/09*

FROM: David W. Darby, Senior Reclamation Specialist/Hydrology *[Signature]*

RE: 2007, 4th Quarter Water Monitoring, UtahAmerican Energy Corp., Horse Canyon Complex, C/007/0013, WQ07-4, Task ID #3124

1. Was data submitted for all of required sites?

This report was prepared from on monitoring data stored in the UDOGM database. The data that supports this report was collected by mine personnel and sent to a laboratory that analyzed the samples. Data was submitted to the database by UtahAmerican Energy Corp. The data was downloaded into File: O:\007013.HOR\Water Quality\datacheck2007-2009(1).xls for this review.

Geneva Mine

Mining has been suspended at the Geneva Mine since October 15, 1985. The Permit for the Geneva Mine (Horse Canyon Mine, MRP-A) was reissued on May 18, 2007. UEI has received Phase 1 and Phase II bond release on most of the acreage of the Geneva Mine Permit. UtahAmerican Energy received conditional approval for Phase II bond release on November 10, 1999 for 51.56 acres, 6.5 acres associated with the borrow site, were given an alternative postmining land use change and 0.02 acres are associated with a bridge abutment, left unreclaimed, since it is County property and needed to support the bridge. Exempt areas had remained in the disturbed permit area, which included the water tank, the explosives area, fan portal area buildings area and Pond #2. Initially, the exempt areas were going to be used as facilities in conjunction with the proposed Lila Canyon Extension to the Horse Canyon Mine.

Eventually, UtahAmerican decided the exempt areas were not needed for the new mine and changed the post mining land use to recreational/institutional. They donated the property to the University of Utah and College of Eastern Utah in October 2005. Prior to donating the exempt areas UtahAmerican removed the fan and collars around the two remaining portal sites (they had previously been sealed prior to Phase I bond release), then gouged and seeded the

portal area. They backfilled all the mechanic pits in the warehouse, and boarded up all the windows. They also removed the oil skimmer collar on the spillway of Sedimentation Pond #1 and backfilled the decant culvert with concrete (the pond is now designed for total storage of the 100 year-24 hour precipitation event.

On July 10, 2006 the Division received a revised submittal of the Phase III bond release from UtahAmerican Energy, Inc. The previous submittal on January 3, 2006 was not recommended for approval, because of numerous deficiencies. The Permittee has identified 51.56 acres remaining under the partial bond. That acreage has gone through Phase I and Phase II bond releases. UtahAmerican is seeking Phase III bond release on 51.07 acres. A small 0.49 acre area, which includes an access road to the Refuse Pile channel and the storm damaged channel section, will remain in the bond until the area attains the ten year liability period and reclamation standards for stability and vegetation are met.

UEI contends any changes resulting from subsidence to surface and groundwater resources would have occurred and been identified long ago. No impacts have been detected. All monitoring sites proposed for suspension are located upstream of the reclaimed surface facilities. UEI described the monitoring history at the three sites and provided graphs showing their flow and TDS levels. Surface monitoring is required for the Geneva Mine (MRP-A) under the reclamation plan. Reclamation water monitoring schedules for surface (Table-1) is identified in Appendix VI-5. The Division found that all but one monitoring site were not necessary, because they no longer provide pertinent resource information for mining affects or influence.. Surface monitoring site B-1, located downstream of the mine on Horse Canyon Creek will still be monitored.

Currently, UEI has not received Phase III bond release. There are some deficiencies outstanding that they still need to address. When the deficiencies are addressed UEI can receive partial bond release, because they have indicated the area under disturbance surrounding Ditch 31 will remain in the Permit until it is released. UtahAmerican Energy Inc. (UEI) will still be responsible for the mentioned reclaimed sites until Phase III bond release is approved.

Lila Canyon Mine

Jay Marshall sent an email October 25, 2004 stating that as of the second quarter of 2004, UEI has collected two years of baseline information, and announced they will discontinue monitoring the Lila Canyon Extension sites, and will continue when the permit is approved. Monitoring was never discontinued .

The Permit for the Geneva Mine (Horse Canyon Mine, MRP-A) was reissued on May 18, 2007 with an attachment of special conditions that UEI had to comply with.

UtahAmerican received permit approval for the Lila Canyon Mine on April 18, 2007 with special conditions attached. The Conditions were clarified on August 3, 2007. Water monitoring sites, location and type of site are shown in Table 7-3 of the Lila Canyon MRP. Table 7-4 lists the surface water monitoring parameters to be assessed during operation and post-mining phases. Table 7-5 lists the parameters for groundwater sites. Plate 7-4 shows the water monitoring sites.

Springs No springs are monitored at the Geneva Mine. UtahAmerican is now monitoring springs and reporting operational data for the Lila Canyon Mine. The Springs L-7-G, L-8-G, L-9-G, L-11-G, L-12-G, L-16-G and L-17-G will be monitored and reported quarterly when sites were accessible.

YES **NO** All springs were monitored according to the schedule and data submitted.

Streams Surface water site B-1 is the only monitoring site monitored at the Geneva Mine. It will be monitored for flow and chemistry once each calendar quarter. Sites L-1-S, L-2-S, L-3-S, L-13-S and L-14-S will monitoring surface flows on the Lila Canyon Mine permit.

YES **NO** All required stream sites were monitored for the quarter.

Wells There are no active wells on the Geneva Mine. Three piezometers were monitored on the Lila Canyon Mine permit, they are IPA-1, IPA-2 and IPA-3.

YES **NO** **N/A**

UPDES Sedimentation Pond #2, UPDES Site 002, has been, modified for full containment and transferred to the College of Eastern Utah. The sediment pond will be monitored at the Lila Canyon Mine site when the pond is constructed.

YES **NO** **N/A**

2. Were all required parameters reported for each site?

Springs YES NO

Streams YES NO

Wells YES NO NA

UPDES YES NO NA, Pond is not constructed.

3. Were irregularities found in the data?

Springs YES NO

Streams YES NO

Wells YES NO NA

UPDES YES NO NA

4. On what date does the MRP require a five-year resampling of baseline water data.

Re-sampling due date is July 2009.

5. Based on your review, what further actions, if any, do you recommend?

None

Does the Mine Operator need to submit more information to fulfill this quarter's monitoring requirements? Yes No

6. Follow-up from last quarter, if necessary.

Did the Mine Operator submit all the missing and/or irregular data (datum)?

This report and the previous report were delayed to facilitate the permit review process. The same parameters issues occurred with previous quarters. The Permittee will be contacted to ensure quarterly reporting will match the water monitoring schedule from the date posted on this review.