



Technical Analysis and Findings

Utah Coal Regulatory Program

November 10, 2016

PID: C0070013
TaskID: 5296
Mine Name: HORSE CANYON MINE
Title: DRAINAGE REVISIONS

Operation Plan

Mining Operations and Facilities

Analysis:

The amendment now meets all the State of Utah R645 requirements for Mining Operations and Facilities.

The amendment now meets the requirements of R645-301-512.120, 512.200, -542.800, and -553 by updating cut/fill certified engineered drawings and narrative for the proposed changes in reclamation. The narrative of grading activities within Chapter 5 was updated to include the new plates and that fans will be dismantled and taken underground. The amendment now includes an update to cut/fill tables provided for the proposed earthwork detailed on Plate 7-6a and 7-6b.

Narrative within Chapter 5 Section 533.200 was updated to reflect the two impoundments. The detailed designs of the ponds can be found in Appendix 7-4, Section 3.1 and on Plate 7-6a and 7-6b. Narrative within page 14 of Chapter 5 is correctly as the lengths and diameters of the culverts presented matches the information presented in Table 9 of Chapter 7. The Mine facility list in Chapter 5 was also updated to fix housekeeping errors. Plate references added to Section 533.220 do meet the requirements but additional narrative describing the ditch operations, or references to Chapter 7 narrative, are missing.

Additional language was added to clarify the Northern Ventilation fan facilities was included with this amendment when it was submitted in May 2016 under Task 5095 on page 11 of Chapter 5. These changes to the MRP should have remained within this current application. The permittee re-added narrative clarifying the North Ventilation fan facilities that was presented in Task 5095 back Chapter 5, pages 11/12. The text originally said, "Ventilation fans will be located on Portal and on the Northern Breakouts. The ventilation fan will be accessed and installed from inside the mine. The need for surface access is not anticipated at this time. A concrete pad will be poured as a permanent support for the north fan. The highwall and approximately 40 feet of slope above the north breakout ledge will be chain-linked and shotcreted for stability. Prior to installing the chainlink." Chapter 5 page 64 also had clarifying text that needs to be re added under Section 553.120 stating, "During reclamation, the fans will be dismantled and either salvaged or taken underground. The chainlink bolts will be cut off 6 inches below the surface and the shot-crete and mesh will be disposed of underground. The concrete will be buried during highwall reclamation and suitable material will be placed against the portals. This material will be shaped to eliminate the highwall and to bring the slope back to the approximate original contour."

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Relocation or Use of Public Roads

Analysis:

The amendment conditionally meets the State of Utah R645 requirements for the Relocation or Use of Public Roads.

The Permittee did provide updated narrative within Appendix 5-4 for the Division to be able to determine if the requirements of R645-301-527, -534 and -552 are met within the amendment. The additional text was added detailing road grading is primary to build an access road for the Pond 1 and expanded the bank/storage capacity of the pond. The road is open to the public and still owned and the BLM has jurisdiction regarding the proposed work on the Emery County Road in lieu of Emery County. The cover letter of the amendment states that Utah American Energy submitted an application for a right-of-way encompassing the proposed road work and area around the dam of Sediment Pond #1 on May 24, 2016. The permittee has yet to receive approval and will send a copy of the approval to the Division upon the letter's arrival. Utah American Energy recognizes that work will not commence on the roadway until the right of way has been approved. The Division recommends conditional approval upon the receipt of a copy of the BLM's application for right-of-way approval.

The amendment narrative in Appendix 5-4 meets R645-301-521.133 by detailing general mining methods that would be employed under or within 100 ft of public roads to protect interest of the public. The amendment must also address R645-103.224.422 by providing proof of a weekly public notice. In addition, narrative in the corresponding sections of Chapter 5 and/or Appendix 5-4 would need to be updated to reflect the changes proposed within this amendment.

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Hydrologic Water Quality Standards

Analysis:

The amendment meets the State of Utah R645 requirements for water monitoring of mine water discharge.

Table 7-3 on page 65 shows Mine Water will be monitored at L-5-G monthly as it occurs. The discharge will be monitored for parameters set in the UPDES permit.

adaniels

Maps Facilities

Analysis:

The amendment meets the State of Utah R645 requirements Mining Facilities Maps.

The Plates provided within the application provide competing information with the amendment narrative and maps. Plate 8-1 shows the final construction plan proposed for Lila Canyon Mine. Plate 5-2 was updated to reflect the current facilities and grading of the main facilities area. Detailed designs of both sediment ponds at the main facilities were updated on Plate 7-6a and 7-6b.

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Reclamation Plan

Backfill and Grading General

Analysis:

The amendment now meets the State of Utah R645 requirements for Backfill and Grading.

The amendment now meets the general requirements of R645-301-553 by providing updated bond earthwork sheets and a general discussion of grading at reclamation for the fans and ponds. The Permittee provided updated reclamation volumes of the additional grading required to reclaim the culverts and larger pond that match the estimated volumes of fill as shown on Drawing 7-6.

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Maps Reclamation Final Surface Configuration

Analysis:

The amendment meets the State of Utah R645 requirements for Reclamation Backfilling and Grading Maps.

The requirements of R645-301-542 are met within the amendment due to no changes suggested to the final reclamation backfill maps.

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Maps Reclamation Certification Requirments

Analysis:

The amendment meets the State of Utah R645 requirements for Certification Requirements.

R645-3010-512 requirements are met as all mine drawings and plates are stamped by a Utah certified professional engineer, David W Hibbs.

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Bonding Determination of Amount

Analysis:

The amendment does not meet the State of Utah R645 requirements for Determination of Bond Amount.

The amendment does not meet the requirements of R645-301-830.140 as the Permittee did provide detailed bond information but the sheets contained within the amendment do not appear to be for the Horse Canyon mine. The permittee must add the relevant additional bond information to the correct Horse Canyon demolition and earthwork sheets.

Deficiencies Details:

R645-301-843.140: The Permittee must provide the correct Horse Canyon mine sheets showing the updated information regarding the amendment.

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