

August 31, 2020

Ms. Melissa Harmon Cripple Creek & Victor Gold Mining Company P.O. Box 191 Victor, CO 80860

# Re: Project, Permit No. M-1980-244; Second Adequacy Review, Amendment Application (AM-13), Revision 1

Dear Ms. Harmon:

The Division of Reclamation, Mining and Safety (Division) has reviewed your July 2020 (received August 3, 2020) responses to our April 3, 2020 preliminary adequacy review (PAR) letter for the Cresson Project 112d-3 Reclamation Permit Amendment Application (AM-13). The current <u>decision</u> <u>date for the application</u> is <u>October 7, 2020</u>. Please be advised that if you are unable to satisfactorily address any concerns identified in this review before the decision date, it will be your responsibility to request an extension of the review period. If there are outstanding issues that have not been adequately addressed prior to the end of the review period, and no extension has been requested, the Division will deny this application.

The following comments are based on the DRMS's review of your responses to the PAR and must be addressed by the applicant in order to satisfy the requirements of C.R.S. 34-32-101 et seq. and the Mineral Rules and Regulations of the Mined Land Reclamation Board. The PAR adequacy questions numbering sequence has been retained for tracking purposes. Please be aware the Division is still reviewing your responses to Comments 73, 75, 81, 82 and 86a. Additional responses to these five comments may be required. If so, a supplemental second adequacy will be sent to you.

# **APPLICATION**

- 1. Please provide a list of all acronyms... The response is adequate.
- 2. The Description of the Amendment... The response is adequate.

## **RULE 3.1 - RECLAMATION PERFORMANCE STANDARDS**

## 3.1.6 Water - General Requirements

- 3. Earth Dams. The response is adequate.
- 4. <u>Exhibit G, p. 61</u>. The response is adequate.



- 5. <u>Exhibit G, p. 7, Sec 3.0</u>. Appendix 7 appears to be a combination of QAPP and a Sampling and Analysis Plan (SAP). The Division would like the QAPP to be updated to elaborate on quality objectives and criteria (e.g. accuracy, precision, representativeness, comparability and completeness), quality assurance goals, data management and validation. The Division believes that a refined QAPP will aid in determining the success of future reclamation and ultimately help in releasing the permit. The Division is committed to working with the Operator to update the QAPP, possibly through a Technical Revision, in the future. No response is necessary at this time.
- 6. <u>Exhibit G, p. 7, Sec 3.1</u>. The response is adequate.
- 7. <u>Exhibit G, p. 9, Sec 3.2</u>. The response requires additional clarification. Please clarify that deep diatreme groundwater is not anticipated to be developed for use in the future in light of the lack of groundwater. Also, pursuant to Rule 1.10.1(1), the applicant shall clearly describe where in the original application and supporting documents the information not included in the application, but necessary to render the amendment technically adequate, may be found.
- 8. <u>Exhibit G, p. 12, Sec 3.3</u>. The response requires additional information. During previous site inspections the Division was informed that there were specific protocols for sampling and monitoring however the Division was never provided copies of those protocols. Please provide the specific protocols.
- <u>Exhibit G, p. 12, Sec 3.3</u>. The response requires additional information. What is the number and locations of underdrains, LDSs, HVSCSs, and LVSCSs to be sampled for VLF2 Phase 3?
- 10. <u>PSSA sampling</u>. The response is adequate.
- 11. Last paragraph Exhibit G p. 12. The response is adequate.
- 12. Exhibit G, p. 14 Sec 4. The Division did not formally concur with the findings presented in the demonstration of compliance that groundwater has not been affected by modern mining. The Division points to the pump-back system that was installed to mitigate the impacts of increasing sulfate concentrations in groundwater located in Arequa Gulch due to modern mining. Additionally, the increasing metals concentrations above monitoring standards in wells that previously did not have elevated concentrations, as shown in the 2<sup>nd</sup> Quarter 2020 Groundwater and Surface Water Monitoring Report, indicate that modern mining may have impacted groundwater. The Division is committed to working with CC&V together to resolve any groundwater issues that may exist at the site. No response is necessary at this time.
- 13. Exhibit G, p. 16, Sec 6, Last sentence. The response is adequate.
- 14. <u>Figure G-1</u>. The response is adequate.

- 15. <u>Figure G-2</u>. The response is adequate.
- 16. <u>Tables G-2 and G-4</u>. The response requires additional information. The Division is requesting a summary table that one can refer to that captures all the various standards that are used to evaluate concentrations in water and what those concentrations are referenced to. The Division feels it would be beneficial to have a summary table so one can refer to one place to get the majority of information rather than going to all the other areas within the permit documents. Searching through the permit file can lead to erroneous interpretation of a standard agreed upon at the site.
- 17. Maps. The response is adequate.

# **RULE 6.4 - SPECIFIC EXHIBIT REQUIREMENTS - 112 RECLAMATION OPERATION**

6.4.3 EXHIBIT C - Pre-mining & Mining Plan Map(s) of Affected Lands

- 18. <u>Drawings C-1 and C-1a format</u>. The response is adequate.
- 19. <u>Drawing C-1 errors and/or omissions</u>. The response requires additional information and/or clarification. [Note: *Many items listed in this comment were not addressed adequately and this may be due to the complex and sometimes confusing nature of the material. Writing comments to explain a mapping issue is difficult and is not always clear. It may be beneficial to arrange a meeting, video or in-person, to address the mapping issues listed below.*]
  - a. Veronic Pedesky property... The response is adequate.
  - b. Property R0045180... The response is adequate.
  - c. Property R0003403... The response is incomplete: Property R0003403 is actually located within the permit boundary according to Drawing C-1. The Teller County Assessor shows that it is owned by CR CK & Victor Narrow Gauge RR and therefore needs to be label as such on Drawing C-1.
  - d. Property S0056178... The response is adequate.
  - e. The property R0002309... The response is adequate.
  - f. Property S0056181... The response is adequate.
  - g. Property S0056183... The response is adequate.
  - h. The label on C-1 for Property R0002467... The response is adequate.
  - i. Properties R0003761, R0002492 and R0002495... The response is incomplete:
    - Property R0003761 (2 separate parcels) is labeled as a third party property. The Teller County Assessor has it listed as belonging to Cripple Creek & Victor Gold Mining Co LLC and it therefore should be labeled green.
    - Property R0002495 has two parcels. The southern parcel is labeled as third party (yellow) and should be labeled as CCV (green).

- j. Property R0002494... The response is incomplete. Property R0002494 is a third party property and should be labeled yellow on Drawing C-1. This property is colored green on the most recent version of Drawing C-1.
- k. Property S0005006... The response is incomplete. Property S0005006 is a third party property and should be colored yellow. It is labeled green on the latest version of Drawing C-1.
- 1. Property S0005007... The response is incomplete. Property S0005007 is a third party property and should be colored yellow. It is labeled green on the latest version of Drawing C-1.
- m. Property R0048633... The response is adequate.
- n. Property R0003603... The response is incomplete. The recent submittal of Drawing C-1 still shows Property R0003603 being owned by CC&V (green) and needs to be changed to third party (yellow).
- o. Property R0054127... The response is incomplete. The hash marks are visible on Property R0054127 which is owned by the City of Cripple Creek. The hash mark symbol is not described in the legend and there is no label indicating property number or ownership. This property needs to be identified on Drawing C-1.
- p. Property R0001994... The response is adequate.
- q. Property R0001993... The response is adequate.
- r. Properties N0025785 and N0025784... The response is incomplete. The triangle wedge of Property N0025785 is colored yellow and should be green indicating ownership by CC&V.
- s. Property R0026792... The response is adequate.
- t. Property N0025747 is labeled as N0025746... The response is incomplete. Property N0025747 is colored yellow on the most recent submittal of Drawing C-1 and should be colored green.
- u. Properties R0002282, R0002719, R0002616 and R0002470... The response is adequate.
- v. Property R0001252... The response is incomplete. Property R0001252 was not added to Drawing C-1 and was not added to Exhibit T.
- w. Property R0002447... The response is incomplete. Property R0002447 is green on the most recent submittal of Drawing C-1 and should be colored yellow.
- x. Property R0055891... The response is adequate.
- y. Property R0002258... The response is incomplete. Property R0002258 is green on the most recent submittal of Drawing C-1 and should be colored yellow.
- z. Several properties on the southeast permit boundary... The response is adequate.
- 20. <u>Drawing C-1a</u>. The black dashed line... The response is incomplete.
  - a. The thick dashed line on Drawing C1-a is the current CCMOD. The weight (or thickness) of this dashed lined is not the same as the weight of the dashed line in the legend for

CCMOD. The weight of the dashed line needs to be the same in the legend as it is on the map to prevent confusion.

- b. On Drawing C-1a, plate 1 of 4, the City Limit symbol in the legend contains a solid black line but the symbol used on the map contains a dashed line. These two symbols need to be consistent to prevent confusion.
- 21. Drawing C-2, Existing and Approved Facilities. The response is adequate.
- 22. Drawing C-2b, Existing Utilities. The response is incomplete.
  - Relocated substation at the intersection of Squaw Gulch & Shelf Road: The response requires additional clarification. The substation is still shown on the revised Drawing C-2b, but no clarification of the substations relocation was provided in the response. Please confirm the substation was relocated to this site, or remove it from the Existing Utilities map;
  - 2) The VLF2 underdrain ponds ... The response is adequate.
- 23. <u>Drawing C-3</u>. The response requires additional information. Please describe and discuss the Booster Station which will be expanded with two additional booster pumps to support the Phase 3 expansion.

## 6.4.4 EXHIBIT D - Mining Plan

- 24. <u>Section 1.1, page 1, last paragraph</u>. The Division accepts CC&V's commitment to "In advance of using spent leach material off-liner, CC&V commits to providing a future technical revision detailing the process to sample and verify ore intended to be re-used off of lined areas contains less than 0.2 mg/l WAD CN". The response is adequate.
- 25. <u>Section 2.1, page 3, third paragraph</u>. The response is adequate.
- 26. <u>Table D-1</u>. The response requires additional clarification. The response corrected the 6-yr timeframe, but the revised schedule has VLF1 reclamation finished 5 years prior to the pad neutralization. Neutralization was to start in 2024, but now not till 2031, which is the same year the pad reclamation starts. Please update Table D-1 to correlate the reclamation sequence.
- 27. <u>Table D-2</u>. The response requires additional clarification. Please describe the mining sequence and discuss the planned layback.
- 28. Growth Medium. The response is incomplete:
  - a. Table D-4, Growth Medium Storage Areas Stockpile 1: The response is adequate.
  - b. Table D-4, Growth Medium Storage Areas Stockpile 33-34: The response is adequate.
  - c. Table D-4: Growth Medium Storage Areas Stockpile 15: The response is adequate.
  - d. Comparing AM-13 Table D-4: The response is adequate.

- e. Discrepancies between AM-11 Table 5-4 Growth Medium Storage Areas and AM-13 Table D-4: The response requires additional clarification. CC&V has adequately provided a demonstration on how the volume has been determined and/or verified for Stockpile 34. Please provide diagrams, figures, profiles, surveys, etc. for the remaining 13 stockpiles to demonstrate how their volume was determined and/or verified.
- f. If the Applicant proposes to construct new stockpiles... The response is adequate.
- 29. Section 3.7.3 Deposition of Overburden into Mine Areas. The response is adequate.
- 30. <u>Page 22, Section 6, Precious Metals Recovery Facility</u>. The response requires additional information. The narrative in the first paragraph was updated to reference Drawing C-3, but Drawing C-3 does not show the extent of liner system as requested. Please provide a revised Drawing C-3 depicting the proposed VLF liner system limits.
- 31. <u>Section 7.4 Security and Signs</u>. The response requires additional information. The updated Section 7.4 contains a bulleted list of three items which need to be included on the permit signs. The list does not contain the operation name as required by Rule 3.1.12(1)(a). Please update this section to reflect the requirements of the Rules.
- 32. <u>Section 7.4 Security and Signs</u>. The response is incomplete. In accordance with a prior commitment, please revise the revised statement within Section 1.5.1 of the Exhibit E Reclamation Plan to reflect the installation of a fence around the crest of all highwalls which are not reduced or backfilled. The Applicant's prior commitment is regardless of highwall height as it was previously determined vertical highwalls less than 100 feet were still a hazard.

## 6.4.5 EXHIBIT E - Reclamation Plan

- 33. <u>Exhibit E, p. 4</u>. The response requires additional information. The discussion of method and success of tree planting was submitted as part of the Amendment 13 application, Exhibit E, page 4. According to Rule 1.10(5), it is subject to review and must meet the requirements of the Rules. And, according to Rule 1.10(2), it is the applicant's responsibility to <u>clearly</u> describe where in the application or supporting documents the information not included in the application may be found. Please describe in detail where the information regarding the methods and success of tree planting can be found to address the issues raised.
- 34. <u>Rule 3.1.10(1)</u>. The response requires additional information. The discussion of method and success of tree planting was submitted as part of the Amendment 13 application, Exhibit E, page 4. According to Rule 1.10(5), it is subject to review and must meet the requirements of the Rules. And, according to Rule 1.10(2), it is the applicant's responsibility to <u>clearly</u> describe where in the application or supporting documents the information not included in

the application may be found. Please describe in detail where the information regarding the methods and success of tree planting can be found to address the issues raised.

- 35. Section 1.3 Growth Medium Materials. The response is adequate.
- 36. <u>Section 1.4.1 Grading and Ripping</u>. The response requires additional information. Although the revision to Section 1.4.1, regarding a future revision should rock plating be proposed, is not within the rock plating paragraph, the Division deems this portion of the response adequate. Please revise the language within 1.5.2 Overburden Storage Areas SGOSA regarding the prior commitment on rock plated slopes.
- 37. Section 1.4.2 Growth Medium Replacement. The response is adequate.
- 38. Section 1.4.2 Growth Medium Replacement. The response is adequate.
- 39. Section 1.4.3 Revegetation. The response is adequate.
- 40. <u>1.5.2 Overburden Storage Areas Surface Mine Backfill Areas</u>. The response is adequate.

### 6.4.6 EXHIBIT F - Reclamation Plan Map

- 41. Exhibit F Contours. The response is adequate.
- 42. Drawing F-1 legend. The response is adequate.
- 43. <u>Drawing F-1 Topography</u>. The response is adequate.
- 44. <u>Main Cresson final topography</u>. The response requires additional information. Please describe the small lift on the pit floor which will support underground exploration operations. Please also address if this lift of backfilled material will be sufficient to allow precipitation and any runoff that enters the pit from becoming standing water prior to infiltrating into the diatreme.
- 45. Facilities at Final Reclamation. The response is adequate.
- 6.4.7 EXHIBIT G Water Information
  - 46. Page 4, Section 2.1.5 Poverty Gulch. The response is adequate.

#### 6.4.10 EXHIBIT J - Vegetation Information

47. <u>Baseline Vegetation Data</u>. The area in question is only 3 acres in size and has been heavily disturbed by mining activities that pre-date the current mining permit. The vegetation community of this area is aspen and conifer forests which have been documented in previous amendments. Although this specific 3 acres has not been surveyed for inclusion into the baseline data, no significant data is expected to be learned from a baseline survey. No further response is necessary.

#### 6.4.12 EXHIBIT L - Reclamation Costs

- 48. <u>Section 8</u>. The Division accepts the Applicant's commitment to provide an updated financial warranty calculation at the end of each October for the following years planned disturbance. The Division agrees this provides an opportunity with the Applicant to collaborate and refine the financial warranty calculation. Please note, a financial warranty can only be reduced following the approval of a request for Surety Reduction and not through an Amendment process. Following the approval of AM-13, the bond required will remain in the same amount currently held. Please also note, the Division will continue to plan a thorough internal review of the finical warranty and conduct a comparison between CIRCES and SRCE. This internal review and comparison will be conducted prior to any future Surety Reductions. No further response is necessary.
- 49. Liability Percentage. The response requires the following additional information:
  - a. Please explain and justify each liability percentage. The Division requests more details (acreages, volumes, etc.) then simply stating 77.81% of leach pads will be constructed at the end of 2020 versus design, therefore 77.81% of tasks associated with reclaiming the leach pads life of mine build out calculated in SRCE.
  - b. Please discuss if the liability percentage is appropriate to be applied to the overall task or if each task needs to be broken down into subtasks and determined if the liability percentage correlates to percent of construction.
  - c. The Division understands this approach with direct costs within the reclamation cost estimate, but 100% of indirect costs should be utilized. Please submit a revised summary table without percent liability on any line with the Indirect Costs section.
  - d. Please commit to providing a similar explanation and justification within the annual financial warranty calculation whenever liability percentages are tied to reclamation tasks.
- 50. Post Closure Monitoring. The response is adequate.

#### 6.4.20 <u>EXHIBIT T</u> - Permanent Man-made Structures

51. Domestic Well. The response is adequate.

## 6.4.21 EXHIBIT U - DMO Environmental Protection Plan

- 52. Exhibit U, Page 1. The response is adequate.
- 53. Exhibit U Section 2. The response is adequate.
- 54. <u>Section 4.1</u>. The response is adequate.
- 55. <u>Section 6</u>. The response is adequate.

- 56. Table U-2, Environmental Protection Facilities HGM Liner as an EPF. The response requires additional information. The Division has given considerable thought to your request to designate the HGM Liner as an EPF. Given the liner has the capacity to store water (a fact not made clear to the Division when it was approved) and that water may include impacted water and/or process water, the Division is inclined to agree that it should in fact be designated as an EPF. Pursuant to Rule 7.3.1(3) "Such facilities shall be appropriately designed for their intended purpose and shall consider site specific conditions and on or off-site impacts to human health, property and the environment." And Rule 7.4.2(2)(b) "... embankment construction for facilities designed to hold or contain toxic or acid-forming materials or designated chemicals used in the extractive metallurgical process or acid mine drainage-forming materials". However, the Division is unaware of any means to verify whether the HGM liner is functioning as an EPF in that there appears to be no way to know if it is intact or leaking. As such, the Division requires the following information to properly understand and characterize the facility:
  - a. As-Constructed drawings showing the layout and topography of the lined surface. This should show the storage volume, floor and sill elevations, and how it ties into adjacent lined areas,
  - b. As-Constructed drawings showing how the sump system is integrated into the HGM liner,
  - c. As-Constructed drawings showing the spatial relationship of the HGM liner and the fire suppression system water lines around in the mill area,
  - d. Water quality data (consistent with the full suite of parameters sampled elsewhere on site) for water stored on the liner,
  - e. A description of how water contained on the HGM liner is managed, including how the volume is determined and the ultimate disposition of water contained stored on the liner,
  - f. Does CC&V have a water balance method for the contained/stored water volume?

Once the Division has reviewed this information, it can be determined what if any actions are necessary to designate the HGM liner as an EPF. Please be aware additional actions may include additional subgrade water management procedures and an updated reclamation plan to show how water will not be stored on the HGM liner after mine closure.

- 57. <u>Table U-2</u>, p. 10, <u>Environmental Protection Facilities</u>. The response requires additional clarification. (*Division rationale in blue italics*):
  - a. Carlton Adsorption/Desorption Recovery (ADR1) CC&V and the Division agree this is an EPF separate from the AGVLF/VLF1,
  - b. Squaw Gulch ADR (ADR2) the Division concurs ADR2 was constructed over the VLF2/SGVLF liner and is not a separate EPF,
  - c. Enrichment Circuit (Carlton) & Assay Laboratory CC&V and the Division agree,

- d. High Grade Mill (not the liner) *the distinction between the HGM or the liner being the EPF is the subject of Comment #56 above*,
- e. Process Solution Enhancement (PSE) <u>Liner</u>, *CC*&V and the Division agree this is an EPF separate from the AGVLF/VLF1,
- f. AGVLF/VLF1 (including the leak detection system and <u>lined toe berms</u>) CC&V and the Division agree,
- g. AGVLF Underdrain/Pumpback System the Division stipulates as is discussed in Comment #12 above the pumpback system is an EPF,
- h. External Storage Pond (ESP) CC&V and the Division agree,
- i. Off liner pregnant and barren solution pipelines CC&V and the Division agree,
- j. SGVLF/VLF2 (including the leak detection system and <u>ADR2</u>) *CC&V* and the *Division agree*,
- k. VLF2 Underdrain Pond *the Division stipulates this is an EPF as it is periodically sampled for water quality*,
- 1. Buckley Annex/Bulk Emulsion Facility the Division has reviewed this facility and determined it does not involve designated chemicals and another agency (ATF) is responsible for chemical oversight/control.

Please include all 10 of these facilities in Table U-2 (excepting the distinction between the HGM and the HGM liner.

- 58. <u>Section 8.1</u>. The response is adequate.
- 59. <u>Section 10</u>. The Division acknowledges that CC&V and ITSCA believe the results of the Phase I and Phase II testing are sufficient to characterize the overall behavior of waste rock. Since the study was not formally submitted as part of the permit file the Division was not able to provide any comments. No response is necessary.
- 60. <u>Section 10, Groundwater/Wells</u>. The response is adequate. Please see comments related to #7 and #12.
- 61. Section 14, Page 17. The response is adequate.
- 62. <u>Section 14 Specification Changes</u>. The response is incomplete. The revised 02200 Earthworks specification still indicates the maximum size for DCF is 1-1/2 inch minus (see 117th page of 231 in AM13 PAR Resp\_Att13-Part2Appendices.pdf, p. 4 Section 6 table -, Rev 1 7/24/20). If CC&V does not wish to submit a technical revision in the future to change this as previously discussed, please resubmit a corrected specification.
- 63. <u>Section 14</u>. The response is adequate in light of responses provided for #73 and #75.
- 64. Exhibit U Section 16 Wildlife Protection. The response is adequate.
- 65. Exhibit U Section 18.1. The response is adequate.

- 66. <u>Exhibit U Section 18.1</u>. The response is incomplete. CC&V determines the volume of the HVSCS through continual monitoring of the pond level wells in each PSSA except for VLF1 Phase 5 where there is no pond level well, so an average pump level is used. The Division understands the Applicant needs operation flexibility to reduce the pond level during an exceedance of 80% and has further added that sustained manner includes a reasonable timeframe after operational controls fail, or may fail, to reduce the pond level. Please address the following additional adequacy items:
  - a. As the pump level is affected by the drawdown cone of depression, please provide the calculated maximum difference between the Phase 5 pump levels and the actual pond level. Please provide the calculated maximum pond level total capacity percentage when the pump levels reach 80%.
  - b. Please commit to determining the VLF1 Phase 5 pond level by the using the highest pump level instead of calculating an average of the pump levels.
  - c. Please discuss if VLF2 Phase 3 PSSA will contain a pond level well.
  - d. As VLF1 Phases 1, 4, and 5 PSSA drain to a lower PSSA if total capacity is exceeded, a "sustained manner" and "reasonable timeframe" is acceptable at this time. As VLF1 Phase II, VLF2 Phase 1, and the proposed VLF2 Phase 3 PSSAs are the lowest or only PSSAs within the system, the Division will require immediate notification if the pond level well exceeds 80% at any time. Please revise the permit criteria for the HVSCS scenario to reflect this. To reduce confusion, the Applicant may wish to include VLF1 Phases 1, 4, and 5 PSSAs so that all HVSCS have the same permit criteria (with a note regarding the highest pump level of VLF 1 Phase 5 PSSA rather than pond well level).
- 67. <u>Exhibit U Section 18.1</u>. The response requires additional information. Please discuss how the LVSCS level is accurately determined and address if the drawdown cone of depression affects the actual level of the LVSCS. As the LVSCSs are fully contained and are designed to maintain a low hydraulic head on the primary PSSA liner, the Division will require immediate notification if the pond level exceeds two feet at any time. Please remove "in a sustained manner" from the permit criteria for the LVSCS scenario.

#### APPENDIX 1

- 68. <u>Section 1.1, p. 1</u>. The response is adequate.
- 69. <u>Section 1.1, p. 2</u>. The response is adequate.
- 70. Section 2.2 Climate. The response is adequate.
- 71. <u>Section 2.3 Underground Workings</u>. The response requires additional clarification. Please confirm remediation of underground workings encountered at the final buildout of the Schist Island pit will be presented as a section of VLF2 Phase 3 Record of Construction Report(s) similar to previous QA/QC reports of VLF1 and VLF2.

- 72. Section 3.2, p. 5, 5th paragraph. The response is adequate.
- 73. <u>Section 4.1, p. 7, 2nd paragraph</u>. The Division continues to review CC&V's response. Our disposition will be provided as soon as practical.
- 74. Section 4.4, backfill. The response is adequate.
- 75. <u>Section 4.4, method specification</u>. The Division continues to review CC&V's response. Our disposition will be provided as soon as practical.
- 76. <u>Section 4.6 Leak Detection System</u>. The response is adequate.
- 77. <u>Section 4.6 Leak Detection System</u>. The response is adequate.
- 78. <u>Section 4.8 Appurtenant Structures</u>. The response is adequate.
- 79. <u>Section 4.10 Technical Specification</u>. The Division accepts CC&V's commitment to "In advance of using spent leach material off-liner, CC&V commits to providing a future technical revision detailing the process to sample and verify ore intended to be re-used off of lined areas contains less than 0.2 mg/l WAD CN". The response is adequate.
- 80. Section 5.2, SGOSA Settlement. The response is adequate.
- 81. <u>Section 5.2</u>, <u>Schist Island Backfill Settlement</u>. The Division continues to review CC&V's response. Our disposition will be provided as soon as practical.
- 82. <u>Section 5.2.3 Results & Section 5.2.4 Conclusion</u>. The Division continues to review CC&V's response. Our disposition will be provided as soon as practical.
- 83. Figure 5, Phase 3 PSSA Filling Curve. The response is adequate.
- 84. <u>VLF2 Phase 3 Issued for Permitting Drawings</u>. The response is incomplete. Please address items b, and g below:
  - a. **A01**, General Arrangement. The response references Drawing A27. However, based on Comment 84g, the response removed drawings 25 and 26. The new drawing submitted to address this particular comment was numbered Drawing A25 and is adequate. No further response is necessary.
  - b. **A08**, PSSA Layout. The response requires additional clarification. The revised Drawing A08 removed the "Transmittal Trough" note and the darker shading on the drawing makes it unclear as to whether this feature is still in the proposed design. Please clarify if the trough has been removed from the design and if so, why.
  - c. A10, Stage C Grading Plan. The response is adequate.
  - d. A15, Leak Detection and Erosion Control Details. The response is adequate.
  - e. A16, VLF Sections and Details, Sheet 1. The response is adequate.
  - f. A23, LVSC Riser Details. Section U. The response is adequate.

- g. A25 and A26. These two drawings were eliminated in the revised submittal. However, this is the only reference the Division can find in response to our April 23, 2020 AM-13 Stormwater Preliminary Adequacy Review. Please provide a written commitment to address adequacy issues in the aforementioned letter through a technical revision (TR) and include a schedule for when the Division can expect this TR.
- 85. <u>Appendix E Technical Specifications</u>. The response is incomplete.
  - a. <u>02200 Earthworks</u>. The response is incomplete. See Comment #62 above.
  - b. <u>02210 Underground Working Remediation</u>. The response is incomplete. The revised specifications included: 03300 Cast-in-Place Concrete, 03310 Cemented Rockfill, 03320 Concrete Plug, and 03330 Flowable Fill, but not 02210 Underground Working Remediation. Please include the specification that ties the new Drawing A025 and the newly provided specifications together.
- 86. <u>Appendix F Slope Stability Results</u>. The Division continues to review CC&V's response to Item a. The response to Items b and c are adequate.
  - a. Based on Drawing A10, Stage C Grading Plan... The Division continues to review CC&V's response. Our disposition will be provided as soon as practical.
  - b. The response is adequate.
  - c. The response is adequate.

#### APPENDIX 2

87. List of Technical Revisions. The response is adequate.

#### APPENDIX 3

88. Stormwater Management Plan. See Comment 84g above.

#### APPENDIX 7

89. <u>Quality Assurance Project Plan</u>. The Division accepts CC&V's commitment to updating the text of the QAPP to include, "Water levels at both Arequa Gulch Valley Leach Facility (VLF1) and VLF2 are recorded weekly by site personnel, and are continuously recorded electronically".

#### APPENDIX 8

90. <u>Wildlife Protection Plan</u>. The response is incomplete. CC&V submitted a revised Wildlife Protection Plan (WPP). Please address the following additional adequacy items:

- a. The Division has identified at least the following items which have been removed from the previous approved TR-91 Wildlife Protection Plan:
  - Section 2.1: Bottom of the wildlife fence around lined ponds should be buried a minimum of six inches.
  - Section 2.1: Lined ponds will also have textured lining to aid in egress should wildlife become entrapped.
  - Section 2.2: Specifying areas of standing process solution with a surface area larger than three foot by three foot surface must be corrected as soon as reasonably possible.
  - Section 2.2: In areas where standing process solution cannot be avoided, measures such as fencing, birdballs, and/or netting must be deployed.
  - Appendix A, #6: In the event of a small animal or bird mortality, S&ER personnel, in conference with CPW, will evaluate the potential that the animal or bird may have been exposed to chemical processes. If it is determined that there is a high probability the animal or bird was exposed to harmful chemicals or other processes, the animal will be sent to Colorado State University for necropsy.
  - Appendix A, #7: In the event of an ungulate mortality, S&ER personnel will contact CPW and make arrangements for the transport of the animal to a location recommended by CPW.

Please address if CC&V has intended to revise the WPP with the deleted sections above. There was no discussion, justification, nor concurrence from Colorado Parks & Wildlife regarding these changes. Please present a document which identifies all of the revisions being proposed in the new WPP, provide justification of each change, and submit documentation that CPW was consulted and concurs with each revision. Please note, the Division is aware of formatting changes and minor modifications to the WPP, however, the adequacy item above is regarding the substantive revisions.

- b. It appears Appendix A is not referred to within the WPP. Please revise Sections 5.1, Section 5.2, and other portions of the WPPP as necessary, referencing the use of Appendix A.
- c. As previously requested, the final report following a wildlife mortality incident shall be copied to the Division. Please revise Section 5 or Appendix A, accordingly.
- 91. <u>WPP Evaluation Datasheet for Bats</u>. The response is adequate.

# APPENDIX 12

92. <u>Appendix 12, Emergency Response Plan.</u> The response requires additional clarification. In Appendix 12, page 37 of 38, Company Emergency Contact List, Meg Burt, Environmental Manager, is listed as a company emergency contact. As far as the Division is aware Meg

Burt is no longer working at the mine. Additionally, it has been noted that the date of next review for the document was 25 June 2019, as indicated at the bottom of the page.

If you have any questions or need further information, please contact me at (303)866-3567 x8169.

Sincerely,

him C

Timothy A. Cazier, P.E. Environmental Protection Specialist

ec: Michael Cunningham, DRMS Elliott Russell, DRMS Patick Lennberg, DRMS Brock Bowles, DRMS DRMS file Justin Raglin, CC&V Justin Bills, CC&V Katie Blake, CC&V Wendy Conley, CC&V