




MINERALS PROGRAM INSPECTION REPORT
PHONE: (303) 866-3567

The Division of Reclamation, Mining and Safety has conducted an inspection of the mining operation noted below. This report documents observations concerning compliance with the terms of the permit and applicable rules and regulations of the Mined Land Reclamation Board.

MINE NAME: Keyah Grande Aggregate Mining Oper	MINE/PROSPECTING ID#: M-2011-026	MINERAL: SDG, AGGR	COUNTY: Archuleta
INSPECTION TYPE: Monitoring	INSPECTOR(S): Lucas J. West	INSP. DATE: October 25, 2018	INSP. TIME: 09:29
OPERATOR: Keyah Grande Lodge and Elk Ranch	OPERATOR REPRESENTATIVE: None	TYPE OF OPERATION: 112c - Construction materials	
REASON FOR INSPECTION: Normal I&E Program	BOND CALCULATION TYPE: Complete Bond	BOND AMOUNT: \$21,530.00	
DATE OF COMPLAINT: NA	POST INSP. CONTACTS: None	JOINT INSP. AGENCY: None	
WEATHER: Clear	INSPECTOR'S SIGNATURE: 	SIGNATURE DATE: December 4, 2018	

GENERAL INSPECTION TOPICS

Several of the following inspection topics were identified as having a **Problem (PB)**, which includes correction actions and a deadline whereby the Operator must demonstrate compliance with the conditions of the Permit and the requirements of the Act and Rules. Failure to address the corrective actions by the deadline may cause the Division to escalate the Problem to a **Possible Violation (PV)** and schedule the issue for formal hearing before the Mined Land Reclamation Board (Board). If a Possible Violation is indicated you will be notified under separate cover as to the date and location of the formal Board hearing.

(AR) RECORDS----- <u>N</u>	(FN) FINANCIAL WARRANTY----- <u>Y</u>	(RD) ROADS----- <u>N</u>
(HB) HYDROLOGIC BALANCE----- <u>PB</u>	(BG) BACKFILL & GRADING----- <u>N</u>	(EX) EXPLOSIVES----- <u>N</u>
(PW) PROCESSING WASTE/TAILING---- <u>N</u>	(SF) PROCESSING FACILITIES----- <u>N</u>	(TS) TOPSOIL----- <u>N</u>
(MP) GENL MINE PLAN COMPLIANCE- <u>Y</u>	(FW) FISH & WILDLIFE----- <u>N</u>	(RV) REVEGETATION---- <u>N</u>
(SM) SIGNS AND MARKERS----- <u>Y</u>	(SP) STORM WATER MGT PLAN---- <u>N</u>	(RS) RECL PLAN/COMP-- <u>PB</u>
(ES) OVERBURDEN/DEV. WASTE----- <u>N</u>	(SC) EROSION/SEDIMENTATION--- <u>N</u>	(ST) STIPULATIONS----- <u>Y</u>
(AT) ACID OR TOXIC MATERIALS----- <u>NA</u>	(OD) OFF-SITE DAMAGE----- <u>Y</u>	

Y = Inspected / N = Not inspected / NA = Not applicable to this operation / PB = Problem cited / PV = Possible violation cited

INSPECTION TOPIC: Reclamation Plan, compliance with applicable portions of C.R.S. 34-32.5-116(2) and (4), and Rules 3.1, 6.4.5 and 6.4.12

PROBLEM 1: The approved Reclamation Plan does not satisfy the requirements of C.R.S. 34-32.5-116(4)(a), (d), (e), (f), (g), (h), (k) and (p), and Rules 3.1.5(1), (10) and (11), 3.1.6, 3.1.9, 3.1.10, 6.4.5, and must be modified through the Technical Revision and/or Amendment process to address these requirements. The modification must provide sufficient information to describe how the operator intends to conduct reclamation including all information necessary to conduct an accurate reclamation cost estimate and must also include an updated Exhibit L, Reclamation Costs as required by Rule 6.4.12.

CORRECTIVE ACTIONS: The operator shall within 90 days from the signature date of this inspection report, file a Technical Revision or Amendment with the Division to update and clarify the reclamation plan to reflect existing and proposed activities as well as update Exhibit L.

CORRECTIVE ACTION DUE DATE: Monday March 4, 2018

INSPECTION TOPIC: Hydrologic Balance, Water Quality, compliance with C.R.S. 34-32.5-116(4)(c), (d), (e) and (h) as well as Rules 3.1.5(5), (10) and (11), 3.1.6(1)(b), and 3.1.13

PROBLEM 2: Several containers, ranging from full to empty and ranging in capacity from 55 gallon drums to 5 gallon buckets, were present and assumed to contain hydraulic oil, motor oil and other potentially hazardous materials. The operation is located within an alluvial valley with groundwater elevations near surface. The containers were stored in a haphazard manner not protective of hydrologic resources.

CORRECTIVE ACTIONS: All fuel, oils, lubricants and other hazardous materials stored on site shall have appropriate secondary containment. Please supply photo documentation that any fuel or hazardous materials containers are stored properly - including applicable secondary containment structures by the corrective action date. Note that secondary containment structures shall consist of an impermeable containment which could contain all contents of the tanks and various containers (when full) plus 10% of the total capacity. The operator may also provide photo documentation that all containers have been removed from the site within 90 days of the date of this report.

CORRECTIVE ACTION DUE DATE: Monday, March 4, 2018

INSPECTION TOPIC: Hydrologic Balance, Water Quantity, compliance with C.R.S. 34-32.5-116(4)(h) and Rule 3.1.6(1)(a)

PROBLEM 3: Comments from the Division of Water Resources (DWR), dated June 13, 2011, directed the Operator to obtain a gravel pit or other type of well permit which operates under the plan for augmentation decreed by the Division 7 Water Court in Case No. 04CW64 prior to use of groundwater. The Operator committed to complying with DWR requirements in a correspondence dated July 19, 2011. However, permit records do not verify whether the Operator obtained the appropriate well permit from the DWR.

CORRECTIVE ACTION: Pursuant to C.R.S. 34-32.5-116(4)(h) and Rule 3.1.6(1)(a), please submit appropriate documentation which demonstrates the Operator has complied with DWR requirements.

CORRECTIVE ACTION DUE DATE: Monday, March 4, 2018

OBSERVATIONS

This inspection was conducted as part of the normal monitoring program established by the Colorado Division of Reclamation, Mining and Safety (Division). The Operator was informed of the inspection but did not participate or otherwise accompany the Division during the inspection. The Keyah Grande Aggregate Mining Operation is an active 112(c) permit located within the Keyah Grande Ranch, located approximately 16 miles west of Pagosa Springs. The site consists of 34.55 permitted acres, which will be reclaimed to support wildlife

habitat post-mining land use. The Division holds \$21,530.00 in financial warranty to ensure the successful completion of reclamation in the event of permit revocation and forfeiture of the warranties. This inspection report is accompanied by six photographs taken by the Division during the inspection.

Unauthorized access to the site is controlled by a locked gate at the ranch entrance on Highway 160. Mining and reclamation activities were dormant during the inspection. Equipment, parked on site, included front end loaders, excavators and various other mining related equipment. Affected lands were currently confined to the area referred to as "Pond /Pit A". As illustrated in Photo One and Two, this area is being excavated to create a pond, approximately 4.5 acres in size. Side slopes of the pond approximated the 3H:1V configuration required under Rule 3.1.5(7). As noted in Photo Two, erosion control blankets had been installed and vegetative cover established along portions of the south shoreline. Backfilled and graded areas appeared stable; evidence of settling, slumping, or excessive erosion was not observed. A series of large boulders were installed along the crest of the pond slopes immediately adjacent to the access road. Water level in Pond A appeared low and consistent with seasonal variation of groundwater elevations. A second pond, Pond B, is proposed in the plan. However, mining activities have not yet affected the Pond B area.

A large work and stockpile area is located just north of the scale and scale house. In that area are several stockpiles of various sized materials. All of the stockpiles appear to be in good condition and stable, and no significant signs of erosion or noxious weed were noted on the piles or the surrounding area. The condition of the stockpile area are further documented in Photos Three and Four.

As shown in Photos Five and Six, debris and hazardous materials, including motor oil and hydraulic fluids, were stored in a haphazard manner. Given the proximity of the operation to sensitive hydrologic resources, all petroleum products and hazardous materials stored on site shall have appropriate secondary containment. Please supply photo documentation that any fuel or hazardous materials containers are stored properly - including applicable secondary containment structures or that the items have been removed from the site completely. Please also include photo documentation that a general site cleanup has taken place to remove all trash and debris. Note that secondary containment structures shall consist of an impermeable containment which could contain all contents of the tanks and various containers (when full) plus 10% of the total capacity. Evidence of completion of these corrective actions should be received by the Division within **90 days** of the date of this report, no later than **Monday March 4, 2018**.

As part of the normal review of permitted sites the Office is mandated to calculate the current cost of reclamation to ensure the financial warranty is sufficient to complete reclamation of the affected lands. Unfortunately, the approved Reclamation Plan does not provide the minimum information required under the Act and Rules, whereby the Office calculates the current cost of reclamation. Absent are critical details regarding earthmoving and material quantities to be backfilled and graded to achieve final topography, topsoil replacement depths, locations and quantities where reclamation materials (overburden and topsoil) are stockpiled and safeguarded for reclamation purposes, revegetation seed mix, seed bed preparation, seed application method, whether fertilizer or mulch will be utilized in revegetation efforts and a weed management plan to manage noxious weeds during Mining and Reclamation activities. As such, there is insufficient information for staff to calculate the current cost of reclamation. The Reclamation Plan must be modified through the Technical Revision and/or Amendment process to address these requirements. The modification must provide sufficient information to describe how the operator intends to conduct reclamation including all information necessary to conduct an accurate reclamation cost estimate and must also include an

updated Exhibit L, Reclamation Costs as required by Rule 6.4.12. The requirements of this corrective action must be received within **90 days** of the date of this report, no later than **Monday March 4, 2018**.

Also, in conducting the review of the Reclamation Plan and permit file, Division Staff discovered that during the original permitting process, compliance with Division of Water Resources regulations was not documented in the file. Comments from the Division of Water Resources (DWR), dated June 13, 2011, directed the Operator to obtain a gravel pit or other type of well permit which operates under the plan for augmentation decreed by the Division 7 Water Court in Case No. 04CW64 prior to use of groundwater. The Operator committed to complying with DWR requirements in a correspondence dated July 19, 2011. However, the appropriate well permit from the DWR was never provided to the Division. Please submit a copy of the well permit that was obtained for both Pond A and B.

Photo documentation and responses to these corrective actions as well as all responses to this report should be directed to Lucas West at the Colorado Division of Reclamation, Mining and Safety at 1313 Sherman Street, Room 215, Denver CO, 80203, by phone at (970)-243-6368 or by email at lucas.west@state.co.us.

CERTIFICATE OF SERVICE

I, Lucas J. West, hereby certify that on this 4th day of December, 2018, I deposited a true copy of the above inspection report for the Keyah Grande Lodge and Elk Ranch, Permit No. M-2011-026, signed December 4, 2018 and generated from the October 25, 2018 inspection, in the US Mail with first class postage affixed, addressed to the following:

Michael Iguchi
Keyah Grande Lodge and Elk Ranch
13211 Highway 160 West
Pagosa Springs, CO 81147

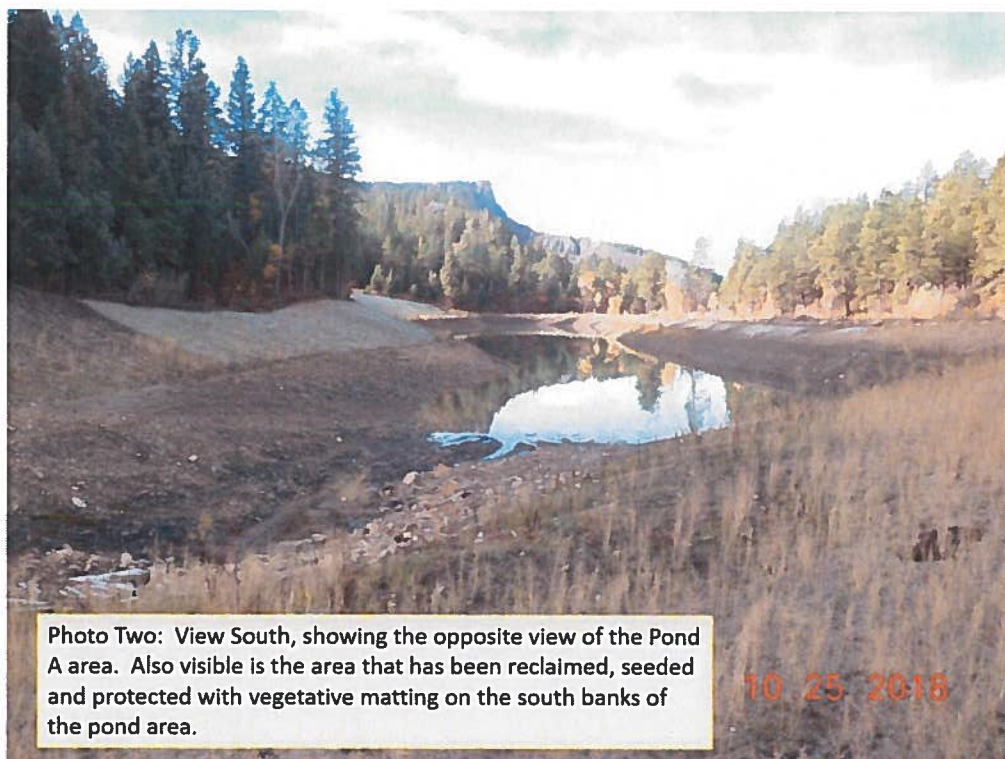
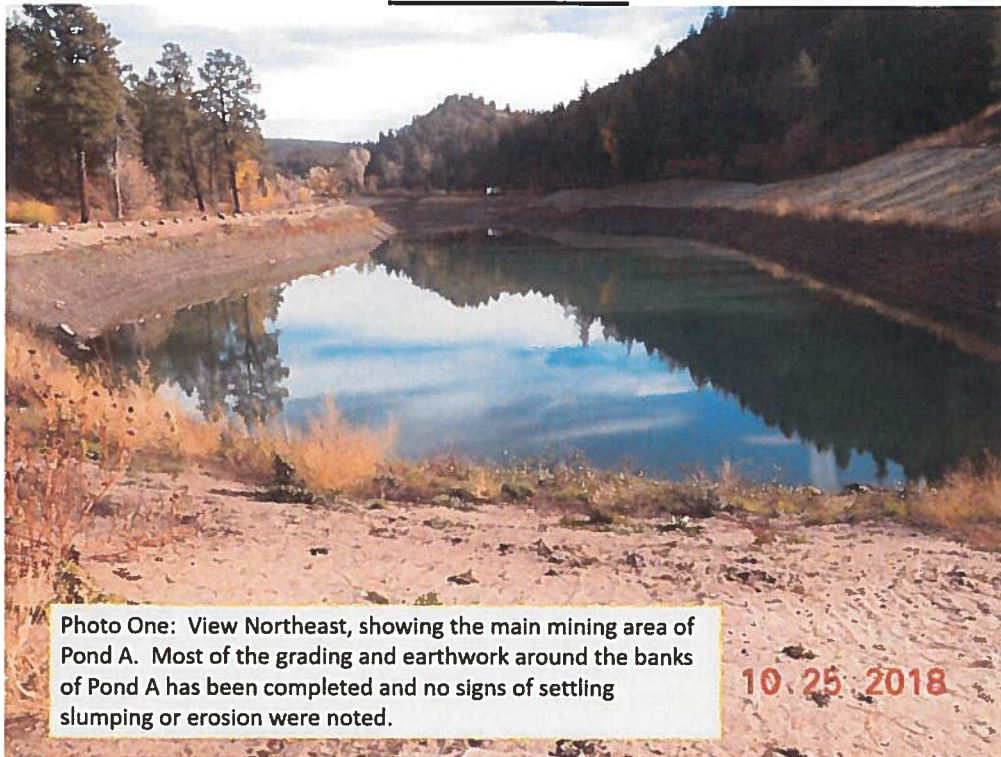
And electronically by e-mail to the following:

gooch@keyahgrande.com



Lucas J. West

PHOTOGRAPHS



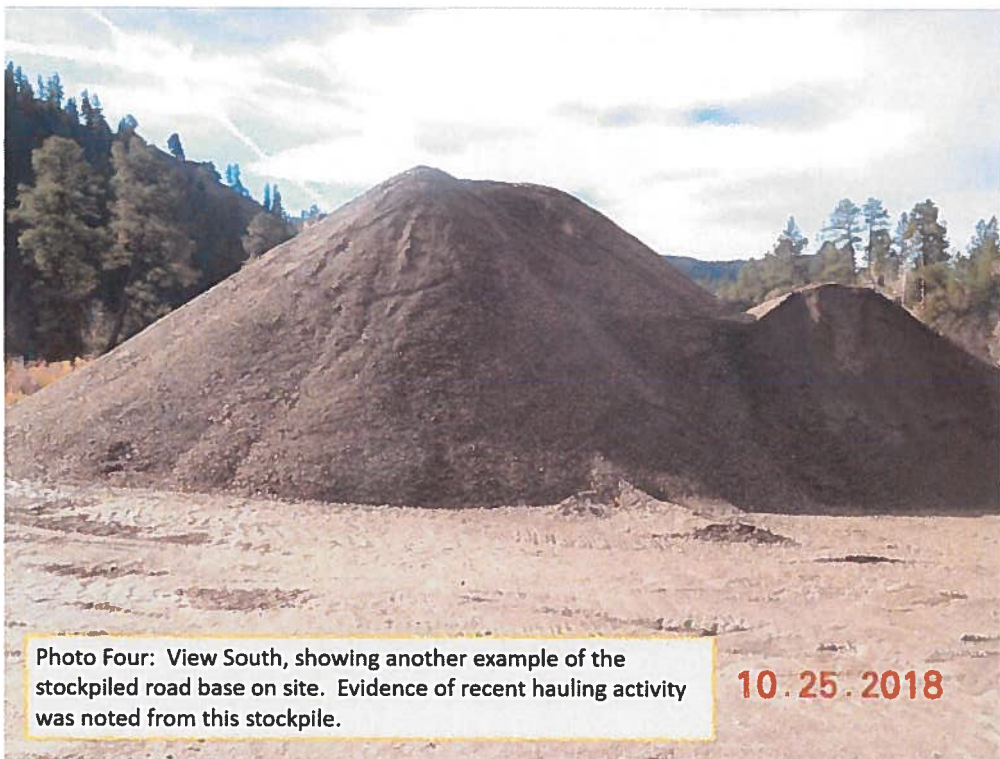
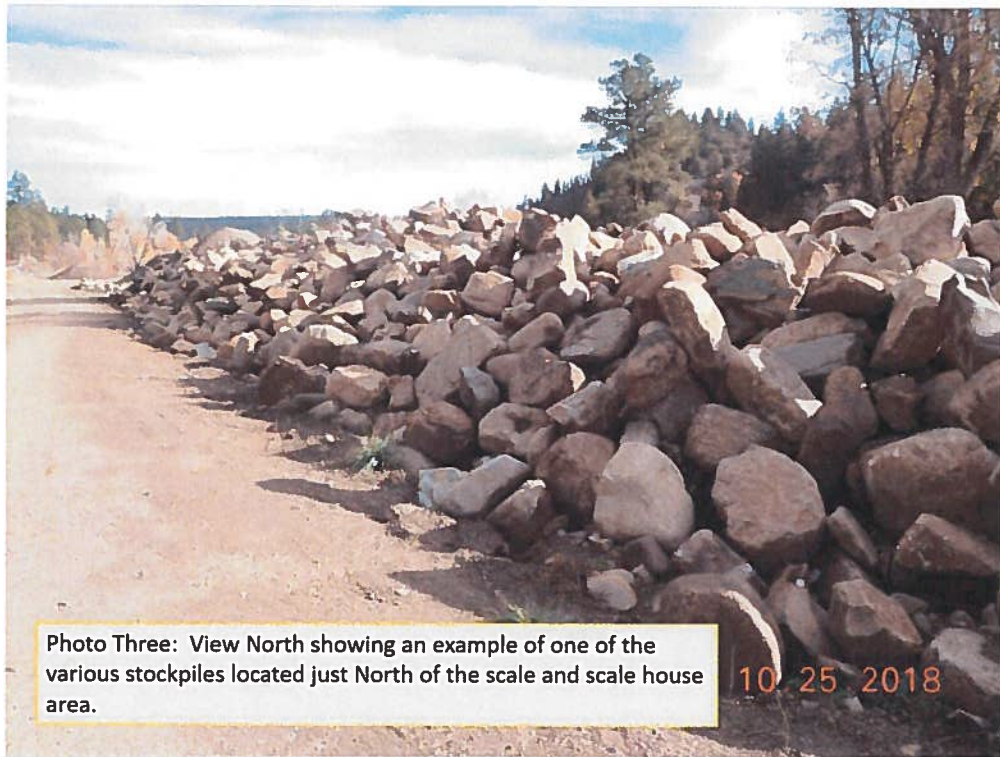




Photo Five: Showing an example of the hazardous material as well as trash and debris that was found throughout the site that must be addressed through the corrective actions.

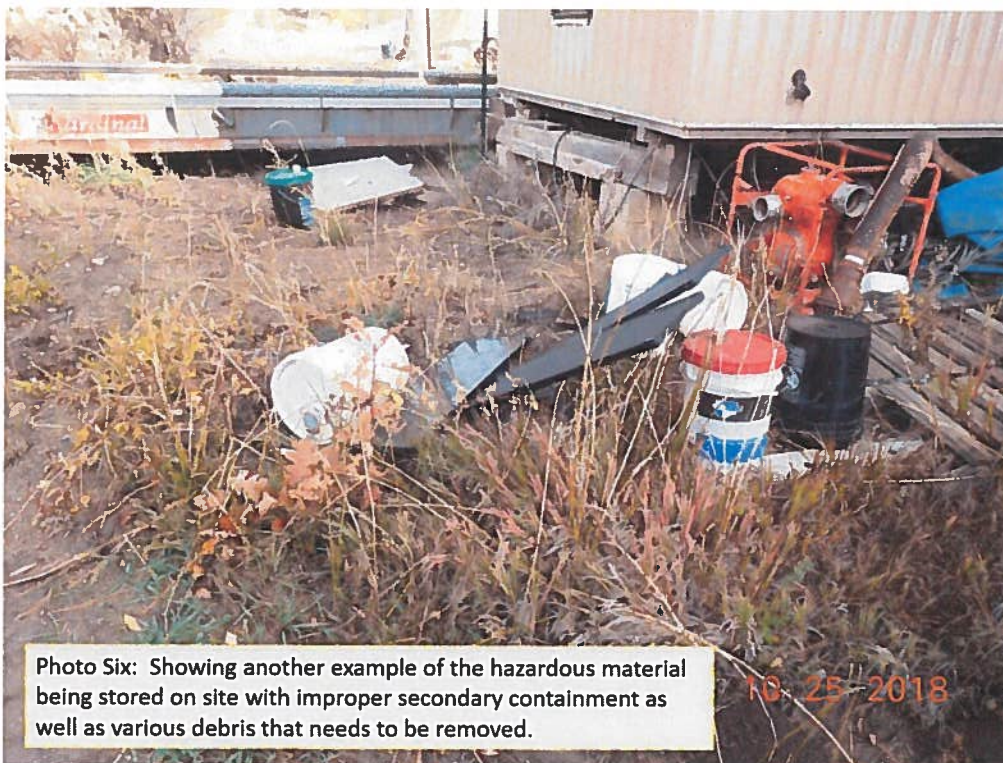


Photo Six: Showing another example of the hazardous material being stored on site with improper secondary containment as well as various debris that needs to be removed.

PERMIT #: M-2011-026
INSPECTOR'S INITIALS: LJW
INSPECTION DATE: October 25, 2018