



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: Kauffman Pit | MINE/PROSPECTING ID#: M-1978-327 | MINERAL: Sand and gravel | COUNTY: Larimer |
| INSPECTION TYPE: Monitoring | INSPECTOR(S): Amy Eschberger | INSP. DATE: July 11, 2019 | INSP. TIME: 11:30 |
| OPERATOR: Jake Kauffman & Son, Inc. | OPERATOR REPRESENTATIVE: Troy Kauffman, Dan Giroux | TYPE OF OPERATION: 112c - Construction Regular Operation | |

| | | |
|---|---------------------------------------|--|
| REASON FOR INSPECTION: Normal I&E Program | BOND CALCULATION TYPE: None | BOND AMOUNT: \$14,727.00 |
| DATE OF COMPLAINT: NA | POST INSP. CONTACTS: None | JOINT INSP. AGENCY: None |
| WEATHER: Clear | INSPECTOR'S SIGNATURE: | SIGNATURE DATE: August 9, 2019 |

GENERAL INSPECTION TOPICS

This list identifies the environmental and permit parameters inspected and gives a categorical evaluation of each. No problems or possible violations were noted during the inspection. The mine operation was found to be in full compliance with Mineral Rules and Regulations of the Colorado Mined Land Reclamation Board for the Extraction of Construction Materials and/or for Hard Rock, Metal and Designated Mining Operations. Any person engaged in any mining operation shall notify the office of any failure or imminent failure, as soon as reasonably practicable after such person has knowledge of such condition or of any impoundment, embankment, or slope that poses a reasonable potential for danger to any persons or property or to the environment; or any environmental protection facility designed to contain or control chemicals or waste which are acid or toxic-forming, as identified in the permit.

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

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

OBSERVATIONS

This inspection of the Kauffman Pit (Permit No. M-1978-327) was conducted by Amy Eschberger of the Division of Reclamation, Mining and Safety (Division) while on site to inspect the operator's adjacent permitted site, the Wagner/Kauffman Pit #3 (Permit No. M-1999-069). The operator was represented by Mr. Troy Kauffman and Mr. Dan Giroux during the inspection. The site is located approximately 2 miles east of Loveland, CO in Larimer County. The site can be accessed from the west off Co Rd 9E, and passing through the operator's commercial yard. The affected lands are owned by the operator. **Photos 1-6** taken during the inspection are included with this report.

This is a 112c operation permitted for 75.1 acres to mine sand and gravel just north of the Big Thompson River (see enclosed Google Earth image). The operation dewatered areas prior to excavation. The maximum mining depth was approximately 15 acres. Mined material was processed on site. The site was mined generally from south to north, leaving a series of unlined ponds. According to the approved Substitute Water Supply Plan (SWSP) for this site, a total of 36.2 acres of groundwater surface was exposed on site prior to 1981, and thus, does not require augmentation. There are currently two unlined ponds included in the permit area, with an estimated total surface area of 34.4 acres. A small unlined pond located just west and outside of the permit area is approximately 1.3 acres in size. The total surface area of exposed groundwater on site is 35.7 acres, which is less than the pre-1981 amount of 36.2 acres. Additionally, the existing pond locations appear to be within the boundaries of the pre-1981 areas of exposure. Therefore, the site appears to be in compliance with the Division of Water Resources (DWR) with regard to the amount of exposed groundwater on site. Under its approved SWSP, the operator is authorized to continue discharging water to the northern pond from the adjacent pit located in the Wagner/Kauffman Pit #3 permit area.

The approved post-mining land use for the site is a combination of dryland grass pasture and industrial/commercial. The approved reclamation plan for the site, last revised in 2012 with Technical Revision No. 6, includes leaving unlined ponds with shoreline slope gradients ranging from 2.5H:1V to 5H:1V. Two outdoor storage areas will remain for industrial/commercial use by the operator. One of the storage areas is located just south of the larger northern pond, and the other is located just east of the southern pond. The two storage areas consist of approximately 12.5 acres, but may increase in size as the operation continues backfilling the eastern edge of the southern pond. The reclamation plan also calls for leaving a recycled materials plant in the eastern portion of the permit area. This plant area currently covers approximately 8.3 acres. According to the revised reclamation plan map submitted with TR-6, a total of 16.9 acres (including pond shorelines and areas around the perimeter of the ponds) will be revegetated to dryland grass pasture. All access roads will remain after reclamation. The Division approved the release of 9.1 acres of dryland grass pasture located east of the recycled materials plant in 2017, through Acreage Reduction No. 2.

The recycled materials plant was in operation during the inspection. Several material stockpiles and processing equipment are stored in this area. According to the operator, this plant also creates the riprap to line the shorelines of the nearby East Reservoir (released from the Kauffman Pit in 2018), which is owned by the City of Loveland. The two ponds have been reclaimed in accordance with the approved reclamation plan, as their shorelines have been graded to the approved final slope configuration and are stable with vegetative cover. The north pond was reclaimed many years ago, and its shorelines have very good vegetative cover, including several mature trees. The south pond has good vegetative cover around all but the eastern shoreline, which the operator will continue to backfill. The operator is not required by the reclamation plan or by DWR to continue backfilling the pond. However, the operator wants to continue expanding the adjacent outdoor storage area. The operator is currently leasing out the two storage areas for industrial/commercial use, and these areas were active during the inspection.

Mining was completed at the site many years ago. The site has been reclaimed in accordance with the approved reclamation plan and post-mining land use, and is considered releasable at this time. However, if any portion of the reclaimed areas were to be re-disturbed (e.g., by flooding), the Division would have to increase the required financial warranty to cover costs for repairing the damage and redoing any damaged reclamation work. Also, if the operator were to accidentally disturb land outside the approved permit boundary, this would be considered "offsite damage". Therefore, the Division believes it would be in the operator's best interest to request a full release of the permit in the near future.

This concludes the report.

Any questions or comments regarding this inspection report should be forwarded to Amy Eschberger at the Colorado Division of Reclamation, Mining and Safety, 1313 Sherman Street, Room 215, Denver, CO 80203, via telephone at 303-866-3567, ext. 8129, or via email at amy.eschberger@state.co.us.

PHOTOGRAPHS



Photo 1. View looking west across recycled materials plant which operates in eastern portion of permit area.



Photo 2. View looking north across recycled materials plant which operates in eastern portion of permit area.



Photo 3. View looking east across outdoor storage area located east of southern pond.



Photo 4. View looking northeast across outdoor storage area located east of southern pond, which is currently being leased out for other industrial/commercial purposes.



Photo 5. View looking west across area east of southern pond which, while not required for reclamation or by DWR, the operator continues to slowly backfill over time to expand the outdoor storage area.



Photo 6. View looking west across southern pond from its eastern shoreline.

Inspection Contact Address

Mary Kauffman
Jake Kauffman & Son, Inc.
502 S County Road 9E
Loveland, CO 80537

Encl: Google Earth image of site

CC: Dan Giroux
Terramax, Inc.
4220 Golf Vista Drive
Loveland, CO 80537

Michael Cunningham, DRMS

M-1978-327 / Kauffman Pit / Jake Kauffman & Son, Inc.

Red Outline = 75.1 acres = Approved Permit Area (after AR-2 approval on 6/27/2017)
(Image data from 10/14/2017)



Google Earth

© 2018 Google

Scot Rd 19e



1000 ft