INSPECTION REPORT: KENSINGTON GOLD MINE

Tongass National Forest Minerals Group
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Date of Inspection: Thursday, May 18, 2016
Date of Report: Friday June 10, 2016
USDA Forest Service Inspector: Richard Dudek

Ranger District: Juneau Ranger District
Weather Conditions: Sunny. Temperature: Low 60's ◦F.

Exploration in accordance with operating plan	Not Applicable
Timber removal following timber sale contract	Not Applicable
BMPs for erosion control	Satisfactory
Water Quality BMPs	Satisfactory
Public safety & fire prevention	Satisfactory
Reclamation work adequate and timely	Satisfactory
Roads maintenance adequate and current	Satisfactory
Tails placement in accordance with plan	Satisfactory
Waste Rock placement in compliance	Satisfactory
Company supervision of operation	Satisfactory
Operating in a clean and orderly manner	Satisfactory

Any conditions noted as UNSATISFACTORY will require follow up action by the Mine Inspector and a written memorandum to the operator, outlining the necessary work.

NEW REMARKS

Ward Air provided a De Havilland Beaver floatplane for transportation to and from the site.

Kevin Eppers (Environmental Manager, Coeur Alaska) accompanied Dave Wilfong (Alaska DNR), Edward Gazzetti (Hydrogeologist, US Forest Service), Curtis Caton (Geologist, US Forest Service), and Richard Dudek (Geologist, US Forest Service) on this inspection.

This inspection included access roads, Comet Development Pile, Comet Water Treatment Plant, Comet Beach, Sherman Creek Outfall, Pit 4, Mud Dump, Pit 7, and the Tailings Treatment Facility (TTF).

ACTION ITEMS

- **Mud Dump: Small tear in GP liner.**
- **Sherman Creek Outfall: Leaky hose needs to be replaced at the outfall.**
- **Comet Water Treatment Plant: Diversion ditch needs to be reconstructed.**

ACCESS ROADS

The access roads are in adequate condition and comply with Coeur's Plan of Operations for road maintenance (Pages 66 & 67 Figure 10). During the inspection, Coeur Personnel were in the process of grading the access roads.

COMET DEVELOPMENT PILE
Coeur began expanding the south-west section of the Comet Development Pile in early 2016. During the site visit, it was observed that additional development (waste) rock had been added to the toe expansion (Photos 1-2).

COMET WATER TREATMENT PLANT
The Comet Water Treatment Plant's storage containers were clean and all chemicals and petroleum products were properly stored within secondary containment (Photo 3).

The empty totes (Photo 4) stored at the Comet water treatment plant are triple rinsed and used for backup in the event that a full tote is punctured. In the event of a puncture, the chemicals from the damaged tote are pumped into the backup tote.

All underground mine water and storm water is diverted to the Comet water treatment Plant. The Environmental manager for Coeur Alaska briefed the USFS that the Comet Water Treatment Plant was currently treating 1600 gallons of water per minute. During the site visit, Coeur personnel were in the process of suction dredging (Photo 5) settling Pond-1 (Pond-2 inactive) sediments to a series of dewatering bags (Photo 6). These dewatering bags are designed to allow water to flow through the pore space of the bag and retain the sediments inside the bag. After the dewatering process, the dewatered sediment will be used as backfill for the underground stopes.

Just down gradient from the water treatment plant, sediments had reached the forest duff near the Sherman Creek Outfall walkway (Photo 7). The cause was due to a diversion ditch behind the Comet water treatment plant became overwhelmed during a high storm event (Photo 8). Coeur has plans to make the diversion ditch larger thereby increasing its effectiveness, and will continue to perform regular maintenance.

SHERMAN CREEK OUTFALL
A leak in one of the outfall hoses (Photo 9) was documented in April 2016, and was still present. Coeur is aware of this problem and ordered eight new hoses to replace the older hoses. This repair should made as soon as possible. Below the leaking hose, white material appeared to be settling onto the ground (Photo 10). The presence of white material suggests that white material is still present and not completely removed at the Comet Water Treatment Plant.

To reduce backpressure concerns at the treatment plant, Coeur Alaska has replaced one of the existing corrugated water lines in the outfall with a collapsible water line (Photo 11) in order to increase the outflow of water, and reducing backpressure from the plant.

The White material in Sherman Creek has been observed and interpreted as having come from mucking an underground sump. During this inspection, little to no white material was observed either in the streambed (Photo 12-13) or at the mouth of the Sherman Creek at Comet Beach (Photo 14). The lack of white material may be a result of the high discharge from recent storm events.

PIT 4
Pit 4 is an active site where reject rock is stockpiled from the Jualin mill processing (Photo 15). The reject rock is sent through an x-ray sorter for rock economic potential. The reject rock that has gone through

the x-ray sorter and is considered non-economic rock is designated as “x-ray sorter reject rock”. This rock is stockpiled at pits 1-3, and will eventually be used as road base material or shipped off site and used as construction aggregates. The graphitic phyllite (GP) material (Photo 17) stockpiled at Pit 4 will be sent to the Pug Plant (Photo 16) where it will be mixed with cement and used as backfill in the underground mine stopes.

The Pug Plant is still not operational; Coeur is still waiting for electrical components needed for operating the plant. The timeline for the Pug Plant to be operational is sometime in June.

MUD DUMP

During an USFS inspection in February 2016, a tear was observed in a liner used for covering GP material. This observation was documented in the report as an “ACTION ITEM”. Since the last report, the tear has been repaired (Photo 18) however, during the most recent inspection a small puncture (Photo 19) was observed and reported to Coeur Alaska’s Environmental Manager.

Prior to this inspection, there was a discussion as to whether or not an X-ray sorter reject rock stockpile was slumping into Forest Service lands (Photo 20). However, after further investigation, it was determined that this stockpile was still within the private land boundaries.

PIT 7

Currently inactive and in order, Pit 7 has a large amount of GP (graphitic phyllite) material stockpiled there (Photo 21). Coeur Alaska eventually plans to use the stockpiles as underground backfill. The GP rock will be mixed in cement at the Pug Plant, and used as backfill in the underground mine stopes.

TTF

There were no tailings observed above the water in the TTF during the inspection (Photo 22. The water level for the TTF was 697.1 feet and below the allowable limit. Water in the TTF has been steadily dropping over the days prior to this inspection.

The TTF dam plunge pool’s water level (Photo 23) was high during the site visit. Coeur Alaska’s Environmental manager stated this is not a significant concern. The reason why the water level was high in the dam’s plunge pool was due to the sump’s float level was raised four inches. This was done to prevent ice cover from disrupting the intake pipe in the plunge pool. Overall, this is a good idea to ensure that the intake pipe is properly working during the winter months.

Photos (More images available upon request)

Photo 1. Comet Development Pile's toe expansion.

Photo 2. The base of the Comet Development Pile's toe expansion.

Photo 3. Comet Water Treatment Plant storage container.

Photo 4. Emergency backup totes stacked on palletized media sand.

Photo 5. Suction dredging process underway at Pond-1 of the Comet Water Treatment Plant.

Photo 6. Dewatering bags used for removing sediments from water.

Photo 7. Sediments deposited onto the forest duff due to a washed out diversion ditch.

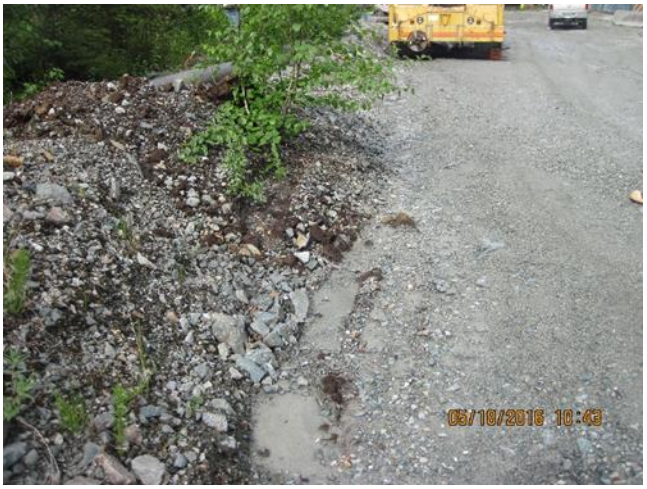

Photo 8. Image of the washed out diversion ditch behind the Comet Water Treatment Plant.

Photo 9. Sherman Creek Outfall gravity fed water lines.

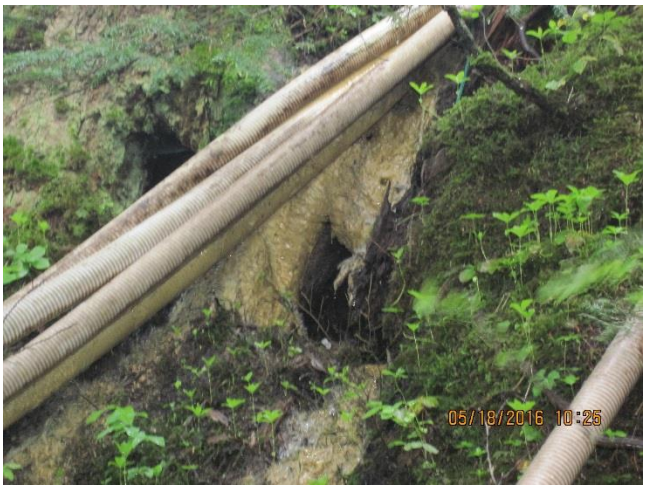

Photo 10. White material was present below the leaking outfall hose.

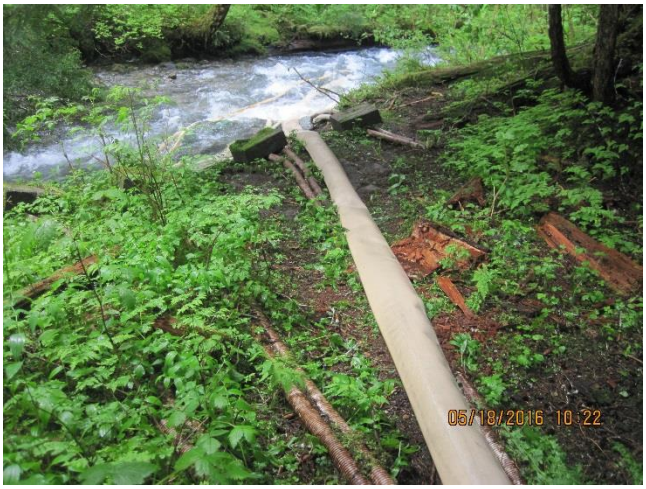

Photo 11. Collapsible water line at the Sherman Creek outfall.

Photo 12. Zoomed in image of Sherman Creek streambed.

Photo 13. Sherman Creek Streambed had trace amounts of white material.

Photo 14. The mouth of Sherman Creek at Comet beach.

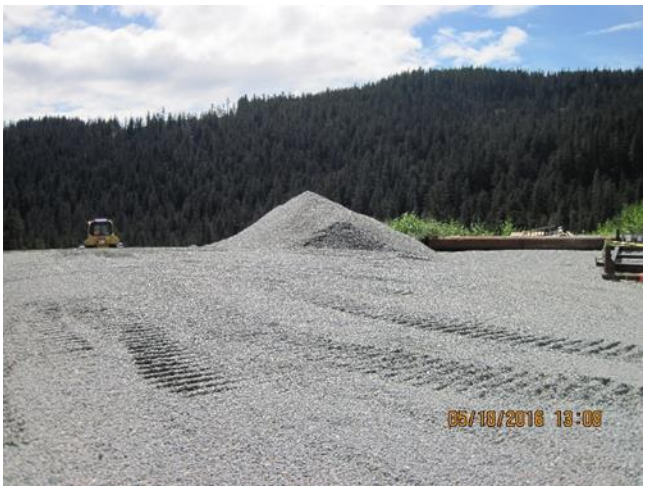

Photo 15. Pit 4 X-ray sorter reject rock stockpile.

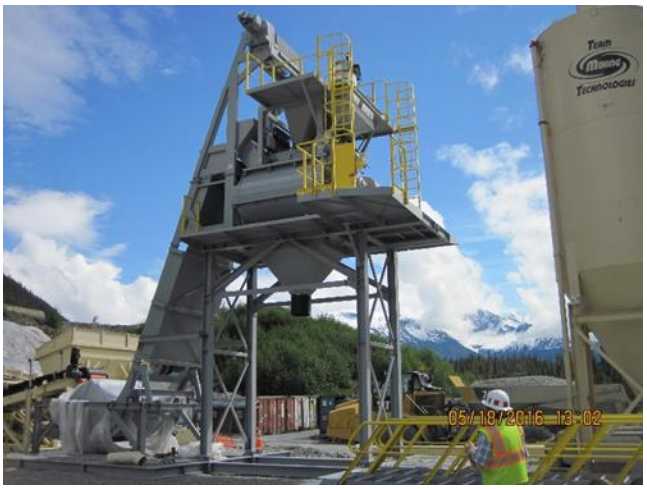

Photo 16. Pug Plant at Pit 4 is not online.

Photo 17. GP material covered with a poly liner at Pit 4.

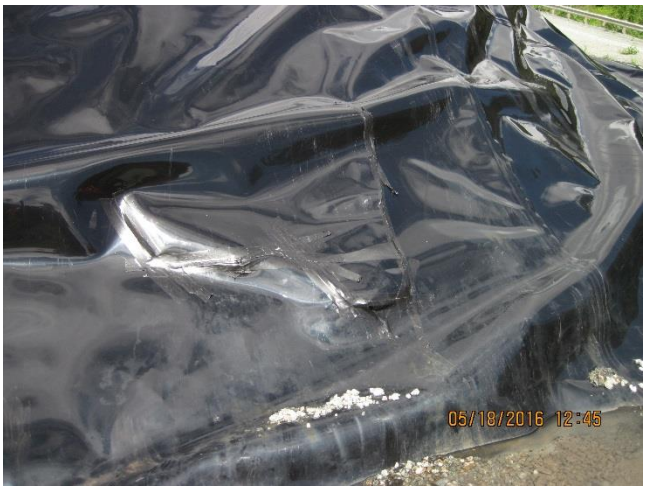

Photo 18. Repaired liner for GP material at the Mud Dump.

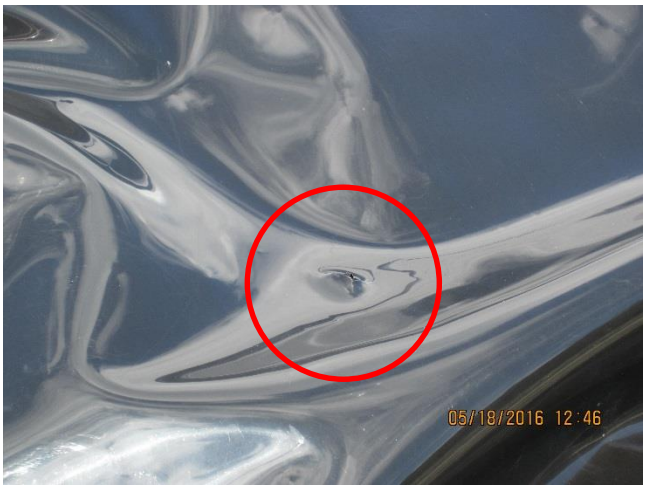

Photo 19. Puncture in a liner used for covering GP material at the Mud Dump.

Photo 20. X-ray sorter reject rock stockpile at the Mud Dump.

Photo 21. GP material stockpiled at Pit 7.

Photo 22. TTF dam and Lower Slate Lake.

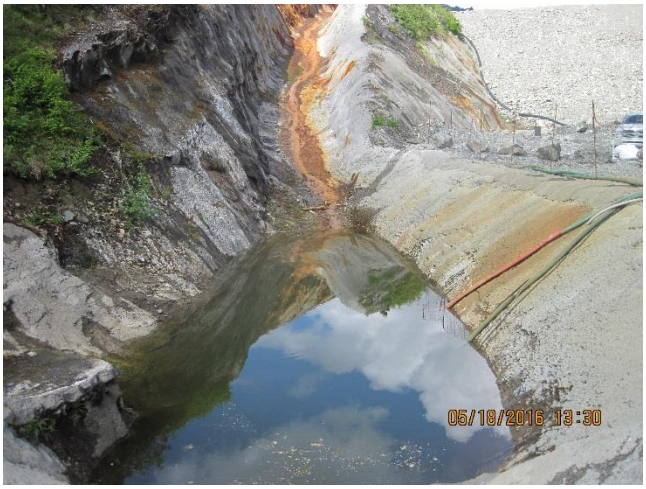

Photo 23. TTF dam spillway and plunge pool.

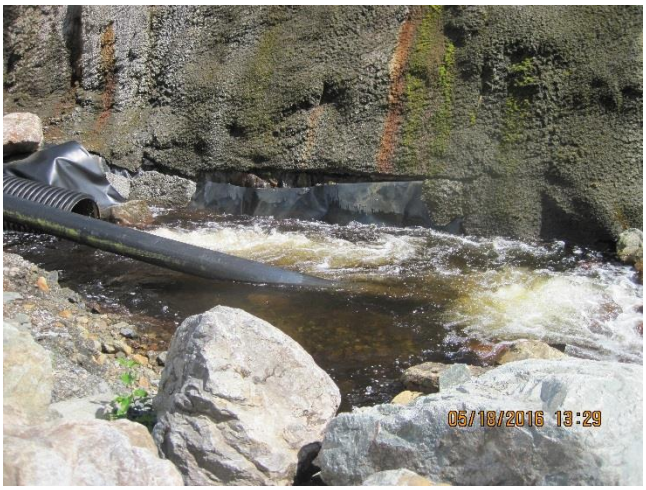

Photo 24. Upper Slate lake bypass and TTF water treatment plant plunge pool.

Thanks to Kensington Mine for a safe visit.
U.S. Forest Service Officer: /s/ Richard Dudek