

November 28th, 2014

Ms Diane Howe,
Deputy Chief Inspector, Reclamation and Permitting
Ministry of Energy and Mines
Victoria BC

CC: George Warnock & Heather Narynski

RE: Response to Chief Inspectors' Orders – Emergency Preparedness Plan and Testing

Ms Howe,
Please find below a summary of the test completed for the Kemess Tailings Facility (TSF) **Emergency Preparedness Plan (EPP)**.

The Tailings EPP has been developed in line, and reviewed for consistency with the Canadian Dam Associations, Dam Guidelines 2007.

On the 20th November, 2014, AuRico undertook a review of the EPP for the Kemess tailings facility. This included a presentation of the overall structure of the AuRico Emergency Management Plan and how the Kemess EPP forms part of the overall company Emergency Management System.

This review also comprised of a test of the EPP by undertaking a mock emergency simulation.

Involved in the review and test were:

Damien Bilsborow – Director, Corporate Sustainability AuRico Gold.
Andrew Witte – AMEC, Senior Geotechnical Engineer
Gord Coyle – Site Superintendent, Kemess Care & Maintenance, Red Crew
Bruce Grau – Site Superintendent, Kemess Care & Maintenance, Blue Crew
Gord Shepherd - Site Foreman, Kemess
James Falkins – Site Electrician, Kemess
Mike Abbott – Reclamation Operations, TSF - Kemess
Tsakawlee Koryluk – Site Maintenance - Kemess

Mock Emergency Test - Overview:

The mock emergency test was based on a hypothetical unprecedented rain event that had occurred over the previous week. The results of the increase in water flow meant a build-up of trees and materials at the entrance of the spillway, and in turn increased the water level contained within the dam.

The site personnel were required to work through the site EPP and incident classification matrix to ensure the correct response and notifications were undertaken.

The incident was escalated twice over the course of the mock scenario. The escalating factors were: An additional significant rain event; and Difficulty with clearing the blockage located in the spillway.

In each case, the site was required to refer back to the incident classification matrix and the EPP to check the required response.

Discussion was held after each escalating factor regarding the suitability of the response plan and the actions undertaken by the site personnel.

Also discussed was the manner in which site resources, such as pumps and earthmoving equipment could be utilized, along with the supporting functions of the corporate management team.

The list of external agencies and resources, contained in the EPP was reviewed to ensure the EPP contained the right external agencies.

The numbers listed in the EPP for the External agencies, such as **Emergency Management BC**, have also been checked to ensure they are correct.

Identified Gaps:

During the course of the mock scenario, the following items were identified for review.

Identified Improvement	Status
Move the contact details for the Mining Inspector up in the external agency list.	Action Completed
Add into the EPP, a list of available earthmoving equipment on site.	Action Completed
Revise the table for the response to the dam monitoring equipment such as piezometers to ensure it is harmonized with the incident	Action completed

classification matrix.	
Include in the response for freeboard control, a prompt for site personnel to undertake an inspection of the dam crest and overall embankment	Action completed
Include in the response for freeboard control, a prompt for site personnel to undertake a read on the dam piezometers	Action completed
The instrument threshold (green, yellow, red) system and the emergency level system (alert, 1, 2, 3). Are not aligned. It is recommended that the next revision of the OMS manual should include revision to the threshold system to coincide with the emergency response system levels.	The Emergency Preparedness Plan has been modified to ensure alignment with the AuRico Incident classification matrix. The OMS manual is due for a review in 2015. This alignment will also be made in the OMS at this time.
The mock scenario included mobilizing equipment to the TSF. There is currently no means to haul an excavator or dozer to the dam. They would have to be walked; a process which could take up to two hours. Consideration should be given to having a truck and low-bed available to expedite the movement of equipment to the dam if needed.	This action has been noted and the site will consider this at the appropriate time.
Consideration is to be given for the Incident commander role and where they would physically be onsite to communicate with the crisis management team. Include details on the use of a satellite phone if they needed to leave the admin building and head to the dam.	Action completed: The EPP now indicates that the site is to establish an incident control point that has a phone for communications. The EPP also states that if the incident controller wishes to move from the incident control point, then they are to take the site Satellite phone with them. The Satellite phone number has been included in the EPP.
Consider the use of a duty card system for site personnel.	Currently duty cards are used for the corporate response team. Consideration will be given to include the use of duty cards for site purposes.
The AuRico incident reporting standard should be referenced clearly in the EPP and rolled out to site staff.	Action Completed: The Incident Reporting and Investigation documentation and training package has been sent to the site, and is included as a reference in the EPP.

The EPP is aligned with the AuRico Corporate Emergency Management System.

Kind Regards,

A handwritten signature in black ink, appearing to read "Damien Bilborow". The signature is fluid and cursive, with the first name "Damien" and last name "Bilborow" clearly distinguishable.

Damien Bilborow
Director, Sustainability
AuRico Gold Inc.