Resources Regulator

FORM EAMS generic v1.1

Our ref: MAAG0004265
LETT0002991

Attn: Philip Nevill
Department of Planning and Environment
GPO Box 39
Sydney NSW 2001

Dear Philip Nevill

Cadia Valley Operations – MOD 13 Cadia Hill Tailings (PA 06_0295): Adequacy of the Environmental Assessment (EA)

I refer to the email dated 19 September 2019 inviting the Resources Regulator to provide advice regarding the adequacy of the Environmental Assessment (EA) for Project **Cadia Valley Operations**.

Development Details

The Cadia Valley Operations is an underground mine located approximately 25 kilometres from Orange, NSW. The Cadia Valley Operations proposes to:

- increase the tailings level from 560 mAHD (consolidated tailings level) to 713 mAHD (pre-consolidation tailings level);
- an additional 177 million tonnes (Mt) of capacity, equivalent to approximately seven years of additional deposition to this storage facility;
- decommissioning and closure of the existing ventilation adit VR101, located in the Cadia Hill open pit, which would be inundated by tailings;
- installation of a new ventilation adit within the currently approved disturbance footprint of Cadia East (outside of the Cadia Hill open pit);
- construction of additional buttressing of the STSF embankment; and
- a pit lake (i.e. a “wet cover”) as the final landform of the Cadia Hill open pit, consistent with the approved final landform

Environment and Rehabilitation

Compliance Operations within the Resources Regulator has responsibility for providing strategic advice for environmental issues pertaining to the proposed project in so far as they relate to or affect rehabilitation.

The Resources Regulator advises the Department of Planning, Industry & Environment – Resources Assessments that the Environmental Assessment does not adequately address Rehabilitation of the Cadia Hill Pit tailings. As such, the additional information is required to address the uncertainty of how long a pit lake will take to develop over the consolidated tailings and how the tailings will be managed in the interim period of time. The assessment indicates that the pit will become a 'sink' within 6-7 years when tails subside to below 700mAHD. However given the low permeability of the surrounding geology, a period of time of >150 years for groundwater levels to stabilise at 687-699mAHD has been modelled.

Based on this uncertainty, the proponent is required to describe how exposed tailings will be managed in the interim period following closure until the the development of a water cover within the pit. For example, will this require the construction of an interim cover/cap over the tailings? If so, what will be the options and associated strategy for construction for tailings cover / cap.

If you require additional information, please contact the Resources Regulator on 1300 814 609 (Option 2, then 5), or via email at nswresourcesregulator@service-now.com.

Yours sincerely,

Christine Fawcett
Manager Environmental Operations
Compliance Operations
Resources Regulator
NSW Department of Planning, Industry & Environment