



Dr. Kathy Racher
Chair, Giant Mine Oversight Board
5014-50th Avenue
Yellowknife, NT
X1A 2P2

August 27, 2018

RE: Request for IPRP response to the GMRP Project Team's conclusion on the GMRP Implementation Schedule

Dr. Racher,

Please find attached a written response from the Giant Mine Remediation Project Independent Peer Review Panel (IPRP) regarding recommendation 2017-7 from the Giant Mine Oversight Board (GMOB) 2017 Annual Report (April 2017), which states

“GMOB recommends that the Independent Peer Review Panel (IPRP) respond to the Project Team's conclusion that the remediation and stabilization of arsenic dust is progressing at a rate appropriate for the associated risk.”

Please don't hesitate to contact Ms. Natalie Plato at 867-669-2838 or natalie.plato@canada.ca should you have any questions on the attached

Sincerely,

Craig Wells
Director
Giant Mine Remediation Project

Encl.

GIANT MINE INDEPENDENT PEER REVIEW PANEL (IPRP)

Chairman: Andrew Robertson
Robertson GeoConsultants Inc.
900 - 580 Hornby Street
Vancouver, BC V6C 3B6

August 15, 2018

Dr. Kathleen Racher
Chair, Giant Mine Oversight Board
Pox 1602, 5014-50th Avenue
Yellowknife, NT V1A 2P2

RE: GMOB's Request for the IPRP's response to the GMRP Project Team's conclusion on the GMRP Implementation Schedule

Dear Dr. Racher

My sincerest apology for the delay in responding to your letter received almost a month ago. Since our review contract is with CIRNAC, it was appropriate that we enquire about the appropriate protocol in responding to your direct enquiry. We were informed that it is appropriate for GMOB to address their questions to the IPRP through Michael Nahir, Director, Project Technical Office, CIRNAC in future, and that our response would then be provided via CIRNAC to GMOB.

We thank you for the explanation you provided of the role and duties of GMOB as well as the basis for the questions that you raise in your letter.

The IPRP's response to GMOB Recommendation 2017-7, "that the IPRP respond to the Project Team's conclusions that the remediation and stabilization of arsenic dust is progressing at a rate appropriate for the associated risk", is described below.

The IPRP's role is strictly technical and we are responsible for performing independent technical quality assessments and endorsements of the most appropriate technical solutions. In this regard we have, as pointed out by GMOB, expressed concern about the risks associated with the stability of the underground arsenic chambers and the need to expedite the stabilization work, including the freeze program. The Project Team are aware of these risks and have worked diligently to complete studies and implement underground emergency stabilization works to reduce them, ahead of implementing the freeze program.

The IPRP has been diligent in discussing with the Project Team ways in which technical procedures, investigations and studies can be expedited. We are satisfied that Project Team have performed efficiently in deriving and designing the stabilization measures, within the constraints they must honour. Government processes for securing funding,

GIANT MINE INDEPENDENT PEER REVIEW PANEL (IPRP)

bidding and contract terms need to be adhered to and all require enough time. Furthermore, the content of reports submitted for the Water License and Land Use Permit require a very high level of information and certainty with regard to engineering details and constructability in a very complex setting. Gathering adequate data and performing alternative evaluations and designs has also taken time.

The IPRP has indicated in its reports that there are several processes that are expected to lead to loss of stope fill support in the underground workings, potentially resulting in stope and sill pillar failure and release of arsenic to the mine pool. These processes are time dependant and the likelihood of loss of arsenic to the mine pool increases with time. There is an inherent lack of knowledge of the conditions that would trigger loss of stope support fill (such as rotting wood barriers, rusting rock bolts etc.) so it is realistically assumed that such support loss in some areas is likely to occur within tens of years. It should also be noted that the loss of fill from one stope does not necessarily result in stope collapse that would affect the integrity of an arsenic dust chamber.

The IPRP remains of the opinion that it is appropriate to expedite completion of the necessary due processes and implement the freezing program. If GMOB could assist in finding an implementation route that would lessen the time requirements and expedite permit approvals, it may be possible to expedite completion of the freezing program.

We trust that this letter is responsive to your question and would welcome further questions and discussion, subject to such communications being routed through CIRNAC's Project Team.

Sincerely



Andrew M Robertson - Chairman of the IPRP