

## **Public Comment on Proposed Amendments – Lynn Lake Gold Project (CIAR #80140)**

My observations focus on hydrological, ecological, and monitoring implications of the pit-dewatering discharge modification from Farley Lake/Farley Creek to the Hughes River.

### **1. Hydrological and Water-Quality Implications**

The proponent's modelling anticipates a 1–2 % increase in Hughes River flow and concludes that water-quality effects will be negligible. While this change falls well below the 10 % DFO threshold, I recommend IAAC explicitly require multi-season flow verification in the follow-up program to account for interannual hydrological variability. As Environment and Climate Change Canada (ECCC) noted, reliance on a single year of baseline data introduces uncertainty in establishing background variability. A statistically robust dataset covering spring freshet, summer low flow, and fall turnover periods should therefore be incorporated before, during, and after the three-month dewatering period.

### **2. Sediment and Metal Mobilization**

The draft report acknowledges residual concern from Marcel Colomb First Nation (MCFN) regarding sediment resuspension and trace-metal release during dewatering. Although the proponent has proposed sediment curtains and elevated intake pipes, these controls are operational rather than predictive. IAAC should require quantitative turbidity and total suspended solids (TSS) thresholds, linked to automatic shut-off triggers, consistent with *Fisheries and Oceans Canada's* Measures to Protect Fish and Fish Habitat (2022). This would move the condition from a procedural to an outcome-based safeguard.

### **3. Monitoring Program Integration and Indigenous Participation**

IAAC's recommendation to include new condition 3.12.3 for dewatering monitoring and to cross-reference condition 2.9 (Indigenous participation) is appropriate. To ensure transparency and credibility, I suggest that:

- MCFN representatives be engaged as community monitors with real-time access to field data;
- the proponent be required to publish quarterly water-quality results (including dissolved metals, pH, temperature, and dissolved oxygen) on the CIAR portal; and

- capacity funding for Indigenous technical participation be formalized under the amended conditions (as implied in MCFN's request for partnership monitoring).

These measures would operationalize section 2.9 of the amended Decision Statement and strengthen compliance verification.

#### **4. Adaptive Management and Reporting**

Given the accelerated three-month dewatering schedule, any exceedance of modeled parameters (flow, TSS, or metal concentrations) could occur rapidly. The amended Decision Statement should therefore clarify that:

- exceedances must be reported to IAAC within 48 hours, consistent with condition 2.8.4; and
- mitigation responses must be verified through post-event sampling within seven days.

This aligns with the precautionary principle expressed in condition 2.1 of the Decision Statement.

#### **5. Cumulative Effects and Long-Term Monitoring**

Although the draft concludes no new significant adverse effects, cumulative hydrological impacts from ongoing northern Manitoba mining projects (e.g., tailings expansion at other gold properties within the Nelson River Basin) should be acknowledged in the final analysis. Extending surface-water and benthic-community monitoring under condition 3.14 beyond the initial dewatering phase would provide the data continuity needed for future regional assessments.

#### **My Final Position**

The proposed discharge relocation appears environmentally preferable provided that baseline data, Indigenous participation, and adaptive-monitoring mechanisms are strengthened. I support IAAC's conclusion that a new impact assessment is not warranted, but urge incorporation of measurable performance thresholds, seasonal monitoring, and transparent public reporting into the final Decision Statement amendments.