# GEOLOGY AND MINERAL POTENTIAL OF THE TESLIN TLINGIT COUNCIL TRADITIONAL TERRITORY

A Case Study of the Role of the Yukon Geological Survey in the Yukon Land Use Planning Process

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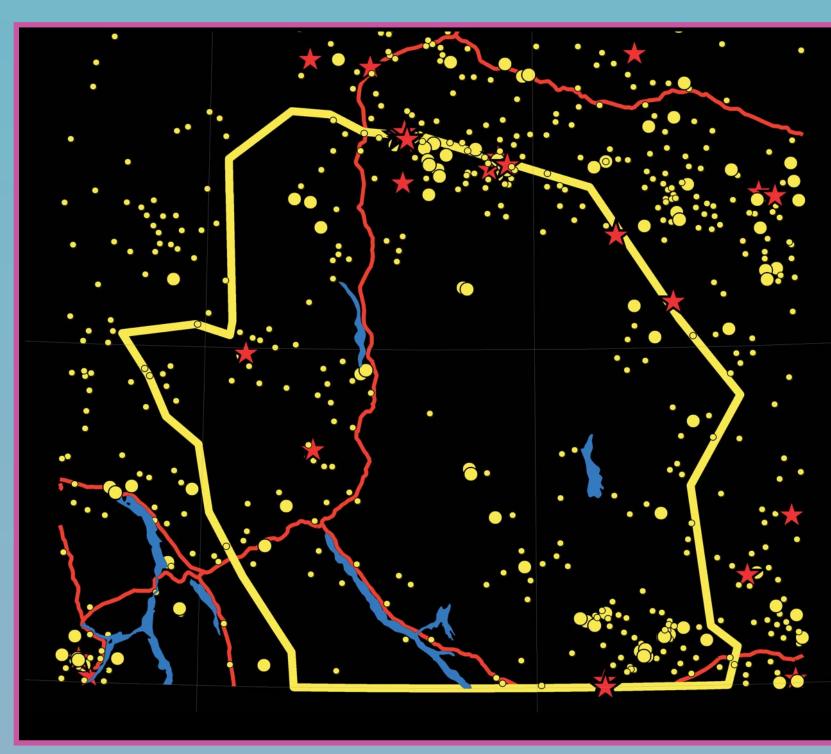
Yukon Geological Survey



*Introduction*: The land use planning process has begun for the Teslin Tlingit Traditional Territory, as outlined in Chapter 11 of their Final Agreement. The Yukon Geological Survey is playing an active role by providing the technical information required to make land use decisions that bring maximum benefit to the First Nations and all Yukon residents.



GEOLOGICAL



## MINFILE

- ★ Deposits (7)
- Drilled prospects(39)
- Showings and anomalies (177)

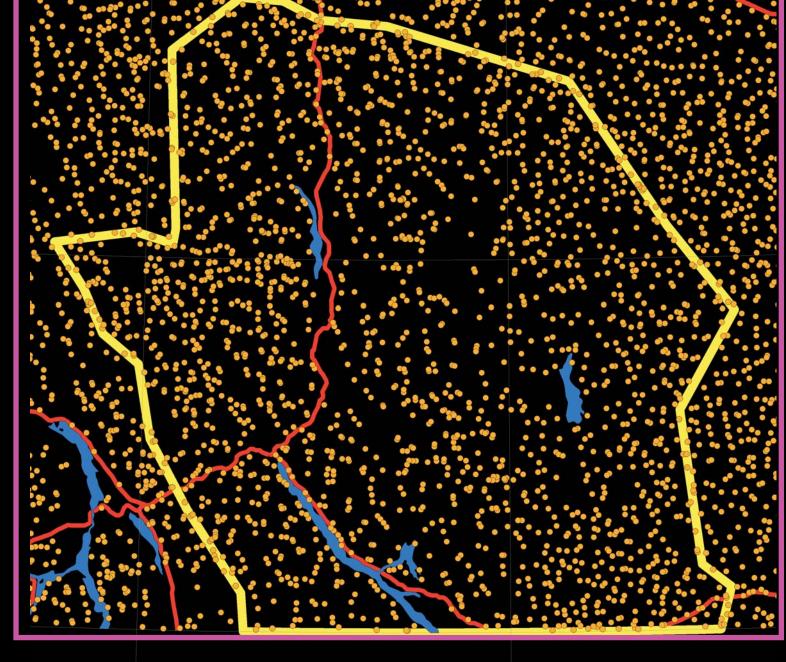
### **Known Deposits:**

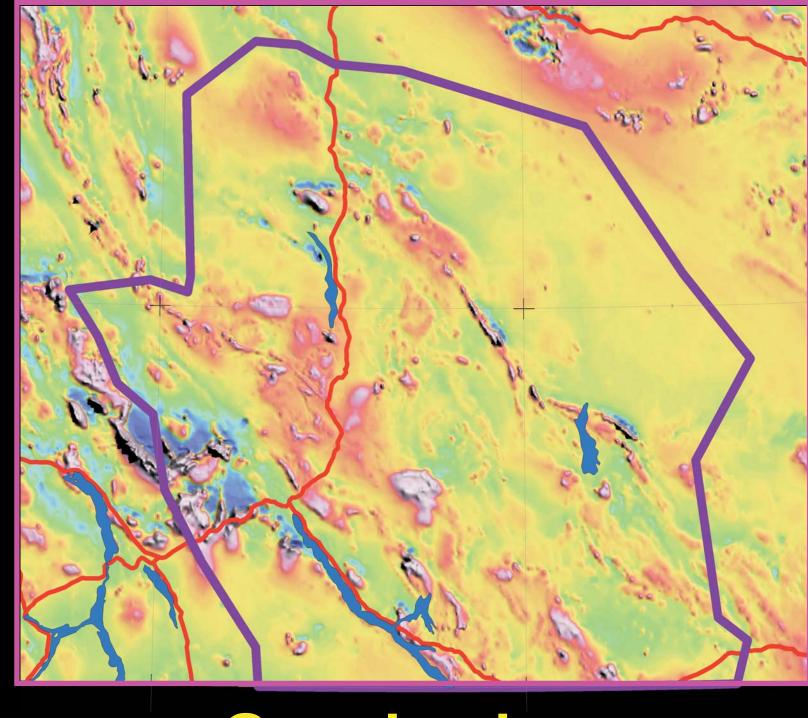
Logtung: W (Mo) porphyry
Logjam: Ag-Au-Zn-Pb veins
Red Mountain: Mo porphyry
Marlin: Rhodonite skarn
JC: W-Sn-Cu-Zn skarn
Groundhog: Ag-Pb-Zn veins
Stormy: Mo-W skarn

#### **Recent Exploration:**

Tay/LP: Au-Cu veins Hidden: W skarn Obvious: W skarn Mor: Cu-Zn-Ag-Au VMS MM: Zn-Pb-Ba VMS







## Geology

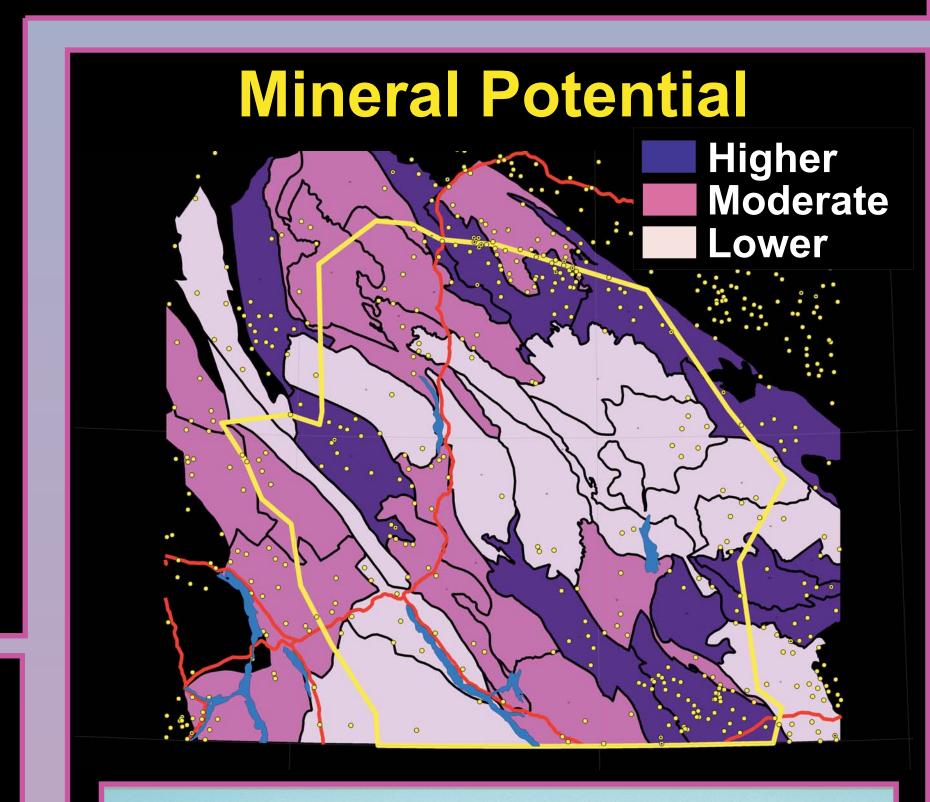
The region is underlain by parts of 5 different terranes: Stikinia, Cache Creek, Quesnellia, Yukon Tanana and Cassiar. They are intruded by the Cretaceous Cassiar and Teslin suites.

This complex geology has the potential to host many different styles of mineral deposits.

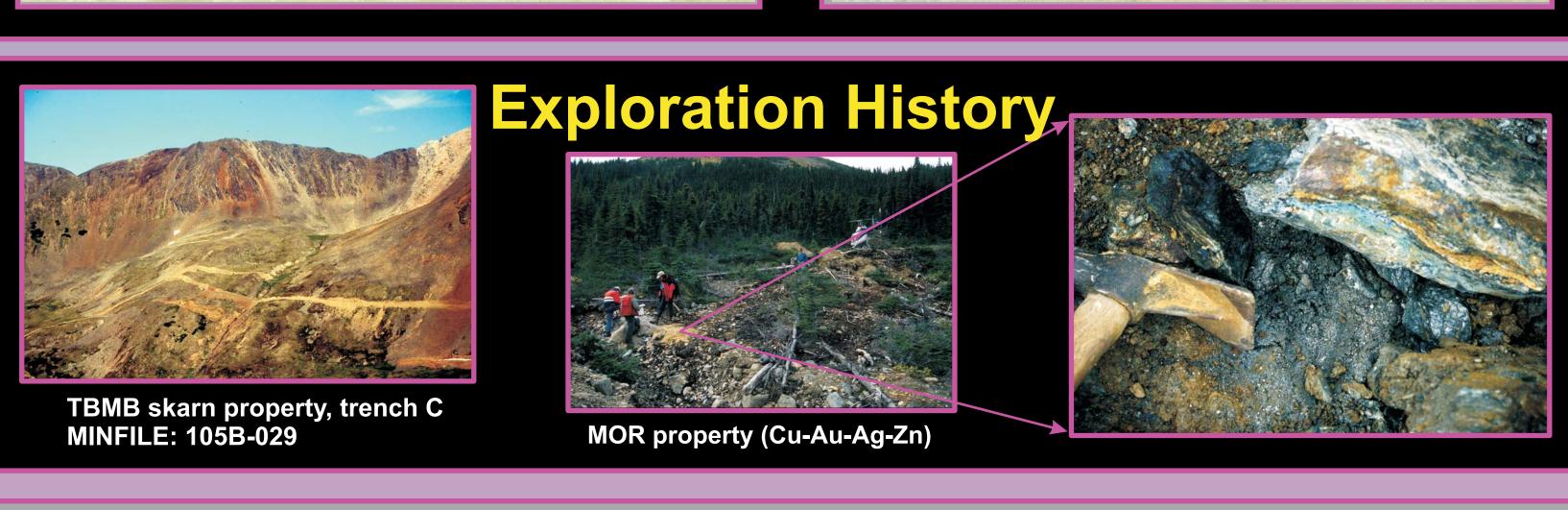
Geochemistry



Geophysics



Data and tracts from the regional mineral assessments (phases 2 and 4) were used to re-rank tracts within the traditional territory.



**Conclusions:** The ongoing relationship between the Teslin Tlingit Council and the YGS will be beneficial to both First Nations and the general public. Future detailed mineral assessments would assist land use planners by identifying areas of higher potential for undiscovered deposits.