



Occurrence Details

Occurrence Number: 105I 041

Occurrence Name: Ness

Occurrence Type: Hard-rock

Status: Anomaly

Date printed: 4/30/2025 10:00:19 AM

General Information

Secondary Commodities: lead, nickel, zinc

Deposit Type(s): Unknown

Location(s): 62°29'30" N - -129°21'56" W

NTS Mapsheet(s): 105I06

Location Comments: .5 Kilometres

Hand Samples Available: No

Last Reviewed:

Capsule

Work History

Staked as Ness cl 1-12 (Y70723) and cl 19-44 (Y70735) in Nov/72 by Noranda Exploration Company Ltd, which also staked Kay cl 1-16 (Y70707) 3.5 km to the northwest at the same time. The company conducted geochemical sampling and geological mapping in 1973 and transferred the claims to Cream Silver Mines Ltd in Jun/76.

The Lea cl 1-15 (Y71124) were staked 4.5 km to the northwest, late in 1972, and acquired from the locator by Makao Development Company Ltd, which carried out geochemical soil sampling and geological mapping in 1973.

In June/94 NDU Resources Ltd staked the Nod cl 1-66 (YB49365) 1 km north of the occurrence over much of the same ground that Noranda originally staked. The company carried out a preliminary silt sampling program later in the summer. In 1996 the Nod claims were sold to United Keno Mines Ltd. Expatriate purchased a 100% interest in the claims from United Keno Hill in 1998. In 1999 Expatriate carried out further silt and soil sampling.

Capsule Geology

The occurrence area lies within the Selwyn Basin, a northwest trending belt of deep water off-shelf sedimentation that formed from Lower Ordovician to Lower Devonian time. Selwyn Basin stratigraphy overlies a basement of Upper Proterozoic to Lower Cambrian shale, siltstone and sandstone (Vampire Formation) which were derived primarily from igneous and metamorphic sources on the North American Craton. This unit is conformably overlain in the Howards Pass District by massive to wavy banded limestone of the Upper Cambrian to Lower Ordovician Rabbitkettle Formation. The limestone is, in turn, overlain by the Ordovician to Silurian Road River Group which is divided into the Duo Lake Formation and Steel Formation. Duo Lake Formation stratigraphy consists of carbonaceous to siliceous shale, cherty mudstone, limestone and chert while the overlying Steel Formation comprises resistant bioturbated mudstone. From Lower Devonian to Middle Mississippian time, Earn Group turbiditic chert rich, clastic rocks were deposited from uplifted portions of west and central Selwyn Basin. Middle to Late Cretaceous intrusions of the Selwyn Plutonic Suite intrude all lithologies.

Four stratigraphic units underlain the immediate area surrounding the occurrence. They are: Rabbitkettle Formation, Duo Lake Formation, Portrait Lake Formation and the Prevost Formation. The Duo Lake Formation is the most important unit economically as it contains the Active Member which is the host unit of the surrounding zinc and lead deposits. There are eight different lithological facies within the Active Member but their thickness, position within the sequence and number of repetitions within the sequence are highly variable. Stratigraphy comprises primarily intercalated mudstone, limestone and chert with a general trend toward increasing silica and decreasing carbonate upstream. Sulphide mineralization consists of fine grained sphalerite, galena and minor pyrite.

The occurrence area straddles a syncline which hosts the XY deposit (Minfile Occurrence #105I 012) 3 km to the southeast and the Anniv Deposit (Minfile Occurrence #105I 037) 7 km to the northeast. Although the area contains favourable stratigraphy, it has received relatively little work in the past. Sampling by Noranda on the Ness claims returned sediment values of up to 1 100 ppm Pb and 1 300 ppm Zn while sampling on the Kay claims failed to return anomalous results. Follow-up prospecting failed to locate mineralization on either claim block.

Silt sampling by NDU Resources returned values up to 5 210 ppm zinc. Follow-up soil and silt sampling by Expatriate Resources outlined two main anomalies and six smaller areas of anomalous soil and silt values. The Northwest anomaly (located approximately 6 km northwest of occurrence), measures 300 by 200 m and includes up to 4 630 ppm lead and 8 550 ppm zinc in soil and 1 710 ppm lead and 1 505 ppm zinc in silt. This anomaly corresponds with the projected trace of the Active member within the northern limb of the syncline.

The central anomaly, located approximately 4.5 km northwest of the occurrence, measures 88 by 600 m, of weak to strong lead, zinc and nickel geochem response. Peak soil values are 186 ppm lead, 2 550 ppm zinc and 202 ppm nickel while peak silt values are 42 ppm lead, 2 560 ppm zinc and 370 ppm nickel. This anomaly may reflect the presence of the Active Member within the southern limb of the syncline. The remaining anomalies are generally single or double point anomalies that correspond with the projected trace of favourable stratigraphy.

References

EXPATRIATE RESOURCES LTD, Mar/2000. Assessment Report #094092 by R.F. Gish.

MAKAO DEVELOPMENT COMPANY LTD, Mar/74. Assessment Report #060923 by D.P. Taylor.

MINERAL INDUSTRY REPORT 1973, p. 96-97, 108.

NDU RESOURCES LTD, Jul/95. Assessment Report #093314 by R.Carne.

NORANDA EXPLORATION CO. LTD, Dec/73. Assessment Report #060138 by P.M. Mcandless, J.D. Knauer and G.E. Dirom.

NORANDA EXPLORATION CO. LTD, Dec/73. Assessment Report #060139 by P.M. Mcandless, J.D. Knauer and G.E. Dirom.

YUKON EXPLORATION AND GEOLOGY 1999, p. 20, 29.

Work History

Date	Work Type	Comment

12/31/1999	Geochemistry	Detailed program.
12/31/1999	Geochemistry	Detailed program.
12/31/1994	Geochemistry	Preliminary silt sampling.
12/31/1973	Geology	
12/31/1973	Other	

Assessment Reports that overlap occurrence

Report Number	Year	Title	Worktypes	Holes Drilled	Meters Drilled
061275	1973	Report on the Geology and Mineralization Summit Lake Area, Y.T.-N.W.T.	Silt - Geochemistry, Soil - Geochemistry, Regional Bedrock Mapping - Geology		
060139	1973	Combined Geological and Geochemical Report	Silt - Geochemistry, Regional Bedrock Mapping - Geology		
060138	1973	Combined Geological and Geochemical Report Ness Group	Silt - Geochemistry, Regional Bedrock Mapping - Geology		