PRODUCT *PRODUIT*	PROVINCE OR TERRITORY *PROVINCE OU TERRITOIRE*	N.T.S. AREA *RÉGION DU S.N.R.C.*	REF. *RÉF.*
BERYLLIUM	British Columbia	104 P/4	BE 1

NAME OF PROPERTY *NOM DE LA PROPRIÉTÉ*: LOW GRADE

OBJECT LOCATED *OBJET LOCALISÉ*

UNCERTAINTY *FACTEUR D'INCERTITUDE*

Lat. *Lat.* 59°08'15" Long. *Long.* 129°46'

Mining Division *Division minière*: Liard

District *District*: Cassiar

County *Comté*:

Township or Parish *Canton ou paroisse*:

Lot *Lot*:

Concession or Range *Concession ou rang*:

Sec *Sect.*: Tp. *Ct.*: R. *R.*:

OWNER OR OPERATOR/*PROPRIÉTAIRE OU EXPLOITANT*

DESCRIPTION OF DEPOSIT/*DESCRIPTION DU GISEMENT*

"Helvite-danalite is present in a magnetite-rich skarn in impure limestone near its contact with granitic rock of the Cassiar batholith.

"A lenticular body of black skarn about 300 feet long and 35 feet in maximum width lies within a thin lens of impure crystalline limestone. It extends southeastward from the contact of the latter with granite in a creek gully, becoming narrower and passing beneath overburden. A small granite tongue lies above the skarn and parallel with it. A limestone lens is overlain chiefly by argillite and underlain chiefly by blue-gray quartzites containing numerous quartz veins, all apparently dipping steeply to the northeast. Some patches of red and yellow gossan occur along the argillites, which are much contorted and faulted. There is however, no evidence of a major fault along the creek bottom, which marks the contact.

"The skarn is mostly black but in part banded. The massive black material is heavy and strongly magnetic, and is apparently composed largely of magnetite, with minor amounts of chlorite, garnet, and, locally, small irregular areas of fluorite and quartz. The beryllium mineral, classed as

p.t.o. ....

Associated minerals or products *Minéraux ou produits associés* – Tin, fluorspar .

HISTORY OF EXPLORATION AND DEVELOPMENT
HISTORIQUE DE L'EXPLORATION ET DE LA MISE EN VALEUR

The property is located at about 4,800 feet elevation on the south side of Needlepoint Mountain, 10 miles south-southeast of Cassiar.

The discovery was made by Gerald Davis of McDame Lake and Christina Lake. The beryllium content of the rock was discovered by the British Columbia Dept. of Mines as a result of a routine spectrographic analysis of a specimen submitted by Mr. Davis for a tin assay.

Three claims, Low Grade Nos. 2, 3, & 4, were located in June 1954 by J.J. McDougall for St. Eugene Mining Corporation, Limited. Some geological work was reported on the claims. Spectrographic analysis gave a range of .01-.1% tin.

Mineral Policy Sector, Department of Energy, Mines and Resources, Ottawa
Secteur de la politique minérale, ministère de l'Énergie, des Mines et des Ressources, Ottawa
502299 *

DESCRIPTION OF DEPOSIT/DESCRIPTION DU GISEMENT (continued)

danalite by Thompson, is a sulphide-silicate of the helvite group containing about 14 per cent BeO. It is red to reddish brown and similar to garnet in appearance; it occurs as individual grains generally less than a mm and clusters or stringers occasionally 20 mm long.

"According to Holland, 'clusters of grains are as much as ½ inch across, ... it is accompanied by a few small grains of native bismuth, ... it appears to be localized in a massive magnetite-rich core in the centre of the widest part of the skarn lens at its northwest and ... a visual examination of the skarn indicates that the beryllium content is low, considerably less than 1 per cent'.

Composite samples of material collected by the writer, but not including pieces containing visible helvite, were reported from spectrographic analysis to contain .02 and .015 per cent Be. A specimen of the carbonate-rich phase contained 0.004 per cent. Samples of slightly mineralized hornfels from three localities above the skarn showed Be in a concentration of less than 0.01 per cent. Three others showed none. A sample of the granite in the vicinity showed no Be." (Mulligan, R., 1968).

MAP REFERENCES/*RÉFÉRENCES CARTOGRAPHIQUES*

Map 104 P/4, Needlepoint Mountain, (Topo.), Sc. 1:50,000.

Map 1110 A, McDame, (Geol.), Sc. 1":4 miles - accomp. Memoir 319.

REMARKS/*REMARQUES*

Comp./Rev. By *Comp./rév. par*							
Date *Date*							

REFERENCES/*BIBLIOGRAPHIE*

Mulligan, R.; Geology of Canadian Beryllium Deposits; Economic Geology Report No. 23, p. 55, Geol. Surv. of Canada, 1968.

Gabrielse, H.; McDame Map Area, Cassiar District, British Columbia; Memoir 319, p. 122, Geol. Surv. of Canada, 1963.

Reports of Minister of Mines, British Columbia: 1955, p. 11.

Mulligan, R .; Geology of Canadian Tin Occurrences; Paper 64-54, p. 15, Geol. Surv. of Canada.

Thompson, R.M.; Canadian Mineralogist; Vol. 6, Pt. 1, 1957.