

PRODUCT MAGNESIUM
PRODUIT

PROVINCE OR PROVINCE OU British Columbia
TERRITORY TERRITOIRE

N.T.S. AREA 82 J/13
RÉGION DU S.N.R.C.

REF. MG 1
RÉF.

NAME OF PROPERTY
NOM DE LA PROPRIÉTÉ EON MOUNTAIN, ROK

OBJECT LOCATED— Main Mt. Eon magnesite outcrop.
OBJET LOCALISÉ

UNCERTAINTY 500 m Lat. 50°48'50" Long. 115°39'15"
FACTEUR D'INCERTITUDE Lat. Long.

Mining Division Golden
Division minière

District
District

Kootenay

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

Baymag Mines Co. Limited

DESCRIPTION OF DEPOSIT/DESCRIPTION DU GISEMENT

Macrocrystalline magnesite, with dolomite, pyrite, and minor aluminium and silicon oxides, occurs in the Cathedral Formation of Middle Cambrian age. The deposit strikes northwest, dips to the west at about 45 degrees, and has an average of 3 metres of overburden. The drilled portion of the Mt Eon deposit has an approximate size of 600 by 150 by 120 metres.

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

The Mt Eon deposit outcrops just above the valley floor along the lower west flank of Mt Eon, some 26 miles northeast of Invermere. Other occurrences are located several miles to the south, on the ridge between Mitchell River and Assiniboine Creek, and on the west flank of Mt Brussilof about 2 miles north of the junction of Cross and Metcchell Rivers; the latter occurrence was sampled by the Geological Survey of Canada in 1965 and this led to the staking of a substantial number of claims in the area.

The occurrences were in part staked by R. Swainson and optioned to New Jersey Zinc Exploration Company (Canada) Ltd. Work on the 70 claims held by the company during the period 1966-1968 included geological mapping, sampling, and 1,017 feet of diamond drilling in 8 holes. The residual claims of this group were acquired by Baykal Minerals Ltd. Under the agreement, royalties to a total of \$2.00 per ton were payable to Mr. Swainson and New Jersey Zinc. Other occurrences were apparently staked for Brussilof Resources Ltd., which was incorporated in November 1969.

Baykal Minerals carried out 4,200 feet of diamond drilling on the Mt Eon deposit in 1970. An additional 3,900 feet of drilling in 1971 was part fill in and part further exploration. In July 1970 Acres Western Limited was retained to undertake a feasibility study. Laboratory tests were carried out by the University of British Columbia, Mines Branch, Ottawa, and Lakefield Research.

By agreements of December 1970 and May 1971, Mineral Resources International Limited purchased a 10.7% interest in the property. In November 1971 Baykal Minerals and Brussilof Resources were amalgamated to form Baymag Mines Co. Limited; the combined properties totalled about 340 claims. Canadian Exploration, Limited optioned the property in January 1972; the company name was changed in October 1972 to Canex Placer Limited. Work by Canex during 1972 included geological mapping on portions of the Rok, Joe, Mag, and Don claim groups, 10,557 feet of surface diamond drilling in 39 holes on the Rok and Vano groups, and bulk sampling. The Canex option expired in September 1974.

Mineral Resources International Limited in 1975 purchased 1,600,000 shares of Baymag Mines from Mr. O. Bakyl, of
see Card 2

Reports of Minister of Mines, British Columbia:
1966, p. 270; 1967, p. 310; 1968, p. 323.

Geology, Exploration and Mining; British Columbia
Dept. of Mines: 1970, p. 503; 1972, p. 603;
1973, p. 551; 1975, p. 201; 1976, p. E 205+;
1977, p. E 252.

Leech, G.B.; Kananaskis Lakes Area; Report of Activities,
May to October 1965; Paper 66-1, p. 65, Geol. Surv. of
Canada, 1966.

Mines Branch, Ottawa; Investigations in Ore Dressing and
Metallurgy; 1973, Repts. IR 71-17 and 71-31.

Mineral Policy
Mineral Sector; Corporation Files: "Minerals Resources
International Limited".

Magnesite has long-term potential in Canada; Western
Miner, November 1977, p. 24.

Oilweek, October 25, 1982, p. 41.

The Vancouver Province, October 15, 1982.

The Northern Miner, March 3, 1983, p. B 20.

Canadian Mines Handbook 1981-82, pp. 48-49.

MAP REFERENCES/RÉFÉRENCES CARTOGRAPHIQUES

#Baymag magnesite project, picture of main magnesite outcrop -
in Mineral Resources International Limited, 1975 Annual
Report.

*Map 82 J/13, Mount Assiniboine, (Topo.), Sc. 1:50,000.

REMARKS/REMARQUES

Comp./Rev. By Comp./rév. par	DMacR	DMacR					
Date Date	10-80	06-83					

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EON MOUNTAIN, ROK

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

Calgary, to give the company a 51.0% interest. Work during 1975, carried out by Elco Mining Limited, included trenching and 160 metres of diamond drilling in 8 holes. Tonnage and grade of the drilled portion of the Mt Eon deposit is reported as follows (all grades are expressed on a burned basis):

	<u>Tons</u>	<u>MgO grade range</u>
low grade	6,517,000	90-95%
medium grade	7,084,000	95-97%
high grade	7,664,000	97% +

(Mineral Resources International, 1975 Annual Report).

Baymag in 1976 completed a feasibility study on the basis of a 30,000 tonne per year caustic burn magnesite operation. A 200 tonne bulk sample was shipped to Europe in 1977 for further testing. Mineral Resources International in 1978 sold its interest in Baymag to a German refractory company, Refratechnik GmbH; by 1980 the company held a 90% interest in Baymag; a minor interest in Baymag was held by New Jersey Zinc Exploration Company (Canada) Ltd, a wholly owned subsidiary of the natural resources group Gulf and Western Industries Inc. Work during 1980-81 included 17,000' of diamond drilling and bulk sampling. The deposits were estimated to contain some 50,000,000 tonnes of the purest crystalline magnesite known in the world (97% MgO) (Oilweek, 25/10/82, p. 41).

Baymag Plant Partnership, of Edmonton, was formed as an operating consortium by Refratechnik and three private investors. They obtained a long-term lease on natural gas fired kilns no longer in use at the Canada Cement Le Farge plant at Exshaw Alberta, 50 miles west of Calgary. The facility has a capacity of 100,000 tonnes of magnesia annually. The magnesite is partially crushed at the mine-site and trucked to the Exshaw plant. The plant, Canada's first commercial magnesium oxide producer, commenced production in May 1982.