

681417

DRILLING REPORT

on the

BIG ONION PROPERTY

including the

LISA 1, LISA 5 and LISA 7

CLAIM GROUPS

OMINECA MINING DIVISION

NTS 93L/15W

48°48'N, 126°55'W

for

VARITECH RESOURCES LTD.

by

Ed McCrossan, F.G.A.C., P.Geo.

dated

November 29, 1991

Summary

The Big Onion property consists of the Lisa 1, Lisa 5 and Lisa 7 claim groups which are located approximately **16 km east-northeast of Smithers, B.C.** and 50 km southwest of the Noranda Minerals Inc. Bell and Granisle deposits. Year round access to the property is along the well-maintained Babine Lake Road.

The Big Onion deposit, which consists of the Northeast, North and South Zones, is a calcalkaline Cu-Mo porphyry which also contains anomalous quantities of gold and silver. Potential reserves for the deposit, calculated by Canadian Superior Exploration Ltd. in the 1970's, are **80 to 100 million tons grading 0.42% copper and 0.020% molybdenite.**

On the property, Hazelton volcanics and sediments of Jurassic age have been intruded by quartz feldspar and quartz diorite porphyries of late Cretaceous to early Tertiary age. Hypogene mineralization, consisting predominantly of chalcopyrite, is associated with the intrusions that were localized by northeast trending structures. Intense phyllic and propylitic alteration assemblages surround the deposit which has also undergone supergene (chalcocite) enrichment.

The 1991 diamond drilling program carried out on the Big Onion property by Varitech Resources Ltd. consisted of eight vertical holes of HQ diameter core totalling 5,562 ft. (1,696 m). It was successful in outlining supergene development in the North and South Zones, as well as, testing the depth of hypogene mineralization.

Supergene intersections were as much as 360 ft. grading 0.55% Cu and 0.02% MoS₂. Other notable intersections included 310 ft. of 0.63% Cu and 120 ft. of 0.69% Cu. The highest supergene assay was 1.57% Cu over 10 ft. and a total of twelve samples (10ft in length) taken from the supergene zone contained greater than 0.9% Cu. Precious metal results for the supergene material averaged 0.064 g/t Au and 1.0 g/t Ag. The best assay for gold was 0.305 g/t and for silver was 2.9 g/t over 10 ft. sample intervals.

Hypogene intersections were up to 480 ft. grading 0.27% Cu. Other notable intersections included 350 ft. of 0.27% Cu and 443 ft. of 0.23% Cu. Two holes were terminated within hypogene mineralization at depths of 733 and 750 ft.

Reserves of approximately 2 million tons grading 0.32% Cu and 0.013% MoS₂ (0.25% Cu cut-off grade) were added to the known reserves of the Big Onion deposit by the 1991 drilling program. A supergene reserve estimate of 35 million tons grading 0.34% Cu was also made using both historical and current drill log data.

Further exploration work, including diamond drilling, is recommended for the Big Onion property to:

- i) assess the SX-EW potential of the Big Onion supergene mineralization,
- ii) increase the ore reserves of the known mineralized zones,
- iii) test for a fault displaced southern continuation of the deposit, and
- iv) explore for other mineralized zones in the southwestern portion of the claims.

There are three excellent targets adjacent to the main orebody, indicated by rock geochemistry and alteration anomalies, which should be drilled. These include the Northeast Zone, the area between the North and South Zones, and the Southwest target.

Another three areas of interest associated with significant structures and indicated by IP, aeromagnetic, rock geochemistry and/or rock alteration anomalies are located south of the main deposit in the southern half of the claim group. These anomalies should also be drill tested.

Finally, the entire southwestern portion of the claim block requires further exploration for the southern continuation of the orebody and other mineralized zones.

Preliminary metallurgical testing of the Big Onion supergene copper mineralization indicates that bacterial oxidation coupled with weak sulfuric acid leaching returns significant copper recoveries.