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M E M O

January 25th, 1973.

To: W.R. Bacon

From: J.C. Stephen

Re: AMAX LENNAC LAKE PROPERTY

Summary

The Lennac Lake property is a relatively good prospect for the Babine Lake area. Access is reasonable. The property should be optioned and explored basically with the program suggested in the Amax report. A \$60,000-\$70,000 program should be adequate to test the property rather thoroughly.

The intrusive and mineralization are more similar to French Peak than to Granisle. If an economic body of mineralization is present, however, it is probably of similar size and tenor to Granisle or Bell Copper.

Before examination of the Amax data, I considered this property favourably because it was similar to other local producing properties in the following ways:

- (1) Outcrops of biotite feldspar porphyry show fracturing with copper mineralization.
- (2) Chloritic alteration, fracturing, and pyrite, chalcopyrite, magnetite mineralization occur in volcanics.
- (3) Pyrite occurs in both porphyry and volcanics in areas which might be judged to represent a halo.
- (4) Indicated areas of both intrusive and alteration compare in size to those at Granisle.
- (5) The showings occur off the nose of an air mag high similar to Danak.
- (6) Location and access are relatively simple.

The following features were considered detrimental:

- (1) The porphyry is much coarser grained than Granisle or Bell Copper and may be of different age.
- (2) No intense fracturing and alteration were observed.

- (3) Pyrite occurs as relatively disseminated grains in the porphyry rather than on fractures.
- (4) No ore grade showings were seen.

Examination of Amax data indicates:

- (1) Description of the rock type is more closely allied to French Peak than Granisle (Cretaceous?)
- (2) Fracturing and alteration as mapped are weak.
- (3) Only first separation data for Morrison's IP is presented.
- (4) Geochemical response is weak and anomalous levels contoured are only technically anomalous.
- (5) Magnetometer data is limited in area and rather widely spaced. It generally tends to agree with other data.
- (6) Only a single intrusive event is indicated.
- (7) A north trending mag low indicates a possible fault or shear zone. This is intersected by an east trending zone of low IP response which is very vague. These two intersect near the .8% grade copper float in an area not well defined or covered by any information.
- (8) Considerable assessment work is required for July 27/73. The 1972 Amax program is estimated to have cost them \$17,000-\$20,000.

The proposed drilling program seems adequate except that three more holes should be spotted in the East Zone to test (a) mag low east of #6, (b) float area west of #7 and (c) altered trench area north of #4.

It is estimated the drilling program suggested, plus some trenching, linecutting, magnetometer and IP work would cost \$60,000.