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SUPPLEMENTARY REPORT (PHASE I EXPLORATION)

on

THE BRUSSELS GROUP OF MINERAL CLAIMS

of

GOLDSTONE EXPLORATIONS LIMITED

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KAMLOOPS LAKE REGION

KAMLOOPS MINING DIVISION

BRITISH COLUMBIA

by

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*5/20/77*

GOLDSTONE EXPLORATION LTD. (GSNV)

Favorable results have been obtained from initial surface sampling of carbonate alteration zones on the company's **33**-unit Brussels property located 27 km west of Kamloops, B.C. Company engineers suggest that the carbonate alteration zones, cross-cutting Nicola volcanic rocks, represent the upper horizons of strong, fault-controlled, epithermal systems. Such epithermal alteration zones were noted historically for their mercury mineralization in the district, and have more recently gained the attention of Inco, Placer, Asarco, Stelco, Newmont and other major exploration companies which have recognized the gold potential of these zones. In theory, arsenic, gold and silver should underlie the mercury horizon of a typical epithermal system. Some of the alteration zones on the Brussels property measure 50 by 200 metres, indicating the potential for large, low-grade gold orebodies.

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Preliminary sampling of 28 carbonate alteration zones on the Brussels property yielded 4 zones with distinctly anomalous gold or silver and arsenic values. (The best sample contained 1775 parts per billion gold (2400 ppb on check assay), 2.5 parts per million silver, and 385 parts per million arsenic). The results of the sampling clearly indicate that at least some of the carbonate alteration zones are auriferous, and a program of percussion drilling is planned to test the four best anomalies on the property at depth. Arrangements are presently being made to commence a drilling program.

SUMMARY

The Phase I Exploration Program recommended for the Kamloops Lake Area Brussels property of Goldstone Explorations Limited in a June 1984 Engineer's Report has been completed. Lithogeochemical sampling has been carried out and anomalies have been identified and evaluated.

Four Reverse Circulation Percussion drill holes, totalling 400 metres of drilling, are recommended immediately to test the lithogeochemical anomalies for economic gold mineralization to a depth of at least 90 metres.

Diamond drilling could follow the percussion drilling as outlined under Phase III of the original June Engineer's Report.

## INTRODUCTION

Phase I of an exploration program on the Kamloops Lake Brussels property of Goldstone Explorations Limited has been carried out as recommended in a June Engineer's Report entitled "Report on The Brussels Group of Mineral Claims of Goldstone Explorations Limited." The program, carried out in September, 1984, involved the collecting of 44 lithochemical samples from several widely separated carbonate alteration zones on the property. The sample sites are shown on Figure B-84-8 accompanying this supplementary report, while the values of the chemical analyses for each sample are listed on geochemical lab report sheets appended to this report.

## SEPTEMBER 1984 SAMPLING PROGRAM

The September 1984 sampling program involved the testing of all notable carbonate alteration zones on the Brussels property. The zones range in size from 1 by 3 metres up to zones that are up to 200 metres long and 50 metres wide. The larger zones were sampled at 2, or more, locations. Each sample weighed approximately 2.5 kg and was made up of several 2 cm chips of rock collected over the face of the carbonate alteration zones. These samples were submitted to the Kamloops Research and Assay Laboratory, where they were analyzed for gold, silver, arsenic, mercury, antimony, copper and zinc.

## GEOLOGY AS NOTED DURING SAMPLING PROGRAM

Much of the Brussels property is underlain by Nicola Group (Triassic) greenstone derived from andesitic and basaltic flow rocks with occasional interbeds of contemporaneous conglomerates.

Continued...

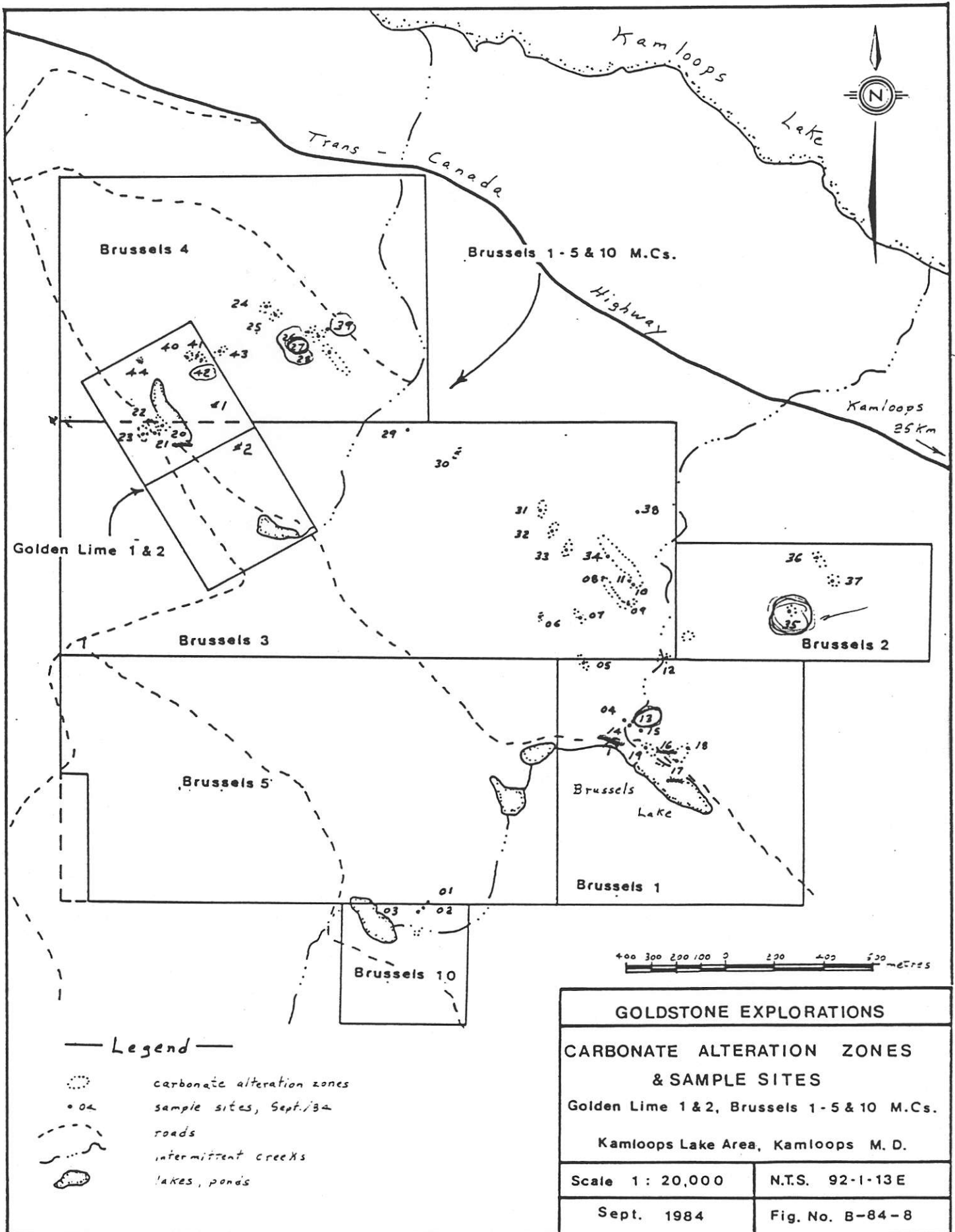
GEOLOGY AS NOTED DURING SAMPLING PROGRAM - Continued

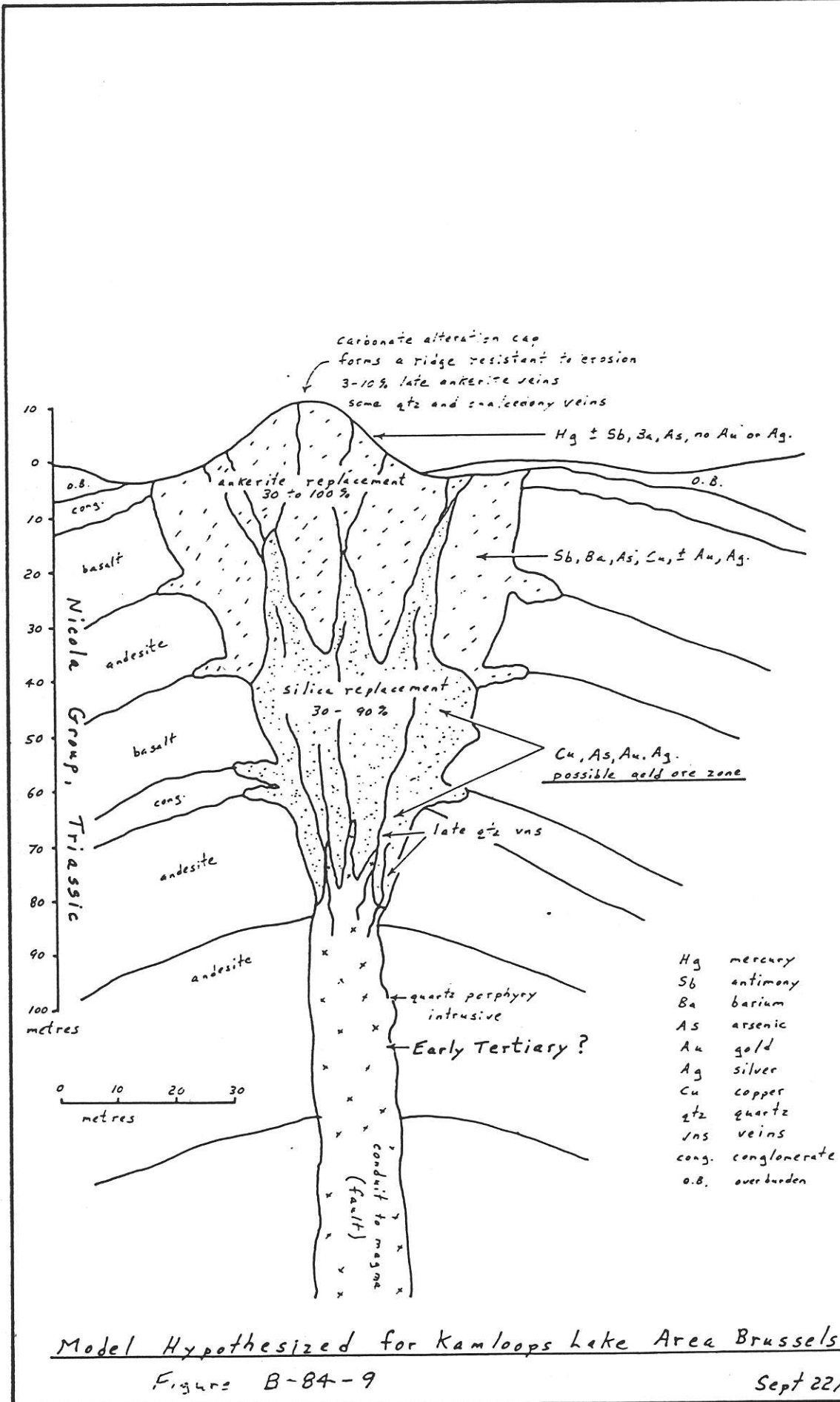
The carbonate alteration that is widespread on the property affects both the volcanic and sedimentary rocks, and it is represented by the pervasive replacement of the rock minerals by ankerite. Ankerite equals from 10% to 100% of the rock, and averages 30% in most alteration zones sampled. Minor quartz or chalcedony veining is also present locally.

The strong carbonate alteration of the Nicola rocks is thought to have been brought about by the passing of large amounts of hydrothermal solutions through the rocks in areas fractured by faulting. The hydrothermal solutions are believed to have emanated from a Tertiary quartz porphyry intrusive.

Quartz porphyry intrusives (quartz monzonites) were noted at sample site B36 and at Brussels Creek near the north-west corner of the Brussels #2 mineral claim. The intrusives and the resultant alteration zones have a clear northwesterly alignment across the property suggesting a northwest fault control. A subordinate northeasterly alignment is also evident.

There is some indication that a siliceous subcap may underlie the ankeritic alteration zones as hypothesized on Figure B-84-9. Siliceous replacement of the volcanic rocks was noted at sample sites B13, B14, and B39. (The junior writer has also had the opportunity to visit a similar property in the district that was being diamond drilled during September. On the property visited a considerable siliceous zone was found to underlie a surface zone composed entirely of carbonate.)





Model Hypothesized for Kamloops Lake Area Brussels Property

Figure B-84-9

Sept 22/84 M.M.



## DISCUSSION OF THE LITHOGEOCHEMICAL RESULTS

The results of the September 1984 lithogeochemical program are given in the appendix of this report. The Threshold values for each element are considered to be as follows:

gold 10 ppb, copper 60 ppm, zinc 80 ppm, silver 0.1 ppm,  
arsenic 10 ppm, mercury 1.0 ppm and antimony 4 ppm.

There is a good correlation between anomalous gold, silver and arsenic values in several samples.

Areas considered to be anomalous are:

- Anomaly A - Sample sites 13 and 14 with anomalous silver and arsenic and with notable siliceous replacement.
- Anomaly B - Sample sites 16, 17 and 18 with anomalous arsenic and mercury.
- Anomaly C - Sample sites 20 and 21 with anomalous gold.
- Anomaly D - Sample sites 25, 26, 27 and 39 with anomalous gold, silver and arsenic.
- Anomaly E - Sample sites 11 and 34 with anomalous silver and arsenic.
- Anomaly F - Sample site 35 with anomalous gold, silver, arsenic, mercury and antimony.

## CONCLUSIONS

The list of lithogeochemical anomalies on the Brussels property includes anomalous arsenic at all but one sample site and anomalous silver at all but two. It may be concluded that gold is erratic on the Brussels property, and that it is dispersed less uniformly than silver and much less uniformly than arsenic. Therefore, on the Brussels property, arsenic can be used as the key lithogeochemical indicator element for gold exploration. All areas with anomalous <sup>arsenic</sup> content should be further evaluated.

## RECOMMENDATIONS

As recommended in the original June Engineer's Report the areas with anomalous lithgeochemical values should be drilled with a Reverse Circulation Percussion drill to test for economic gold concentrations at depth - taking into consideration the vertical zoning of a typical epithermal gold deposit.

One percussion drill hole of at least 90 metres should be drilled at each of Anomalies A and C, and two of similar depth should be drilled at Anomaly B. These holes could be drilled immediately.

Samples should be collected from each 3 metre interval of carbonate altered rock intercepted by the drill, and these samples should be analyzed for gold (fire assay) silver, arsenic, copper and zinc.

Anomalies D and F represent the best lithgeochemical anomalies on the property, but the access road leading to these anomalies has a very steep grade, and the road is only useable during dry summer months.

Drill water can be obtained from Brussels Lake for Phase II drilling.

Phase III of the exploration program has already been outlined in the June Engineer's Report.

SUMMARY OF THE PHASE II EXPLORATION PROGRAM

1. Reverse Circulation Percussion drilling of:

Anomaly A - vertical hole of 90 metres depth at sample site 14.

Anomaly B - vertical hole of 90 metres depth located at sample site 16.

- vertical hole of 90 metres depth located at sample site 17.

Anomaly C - minus 70 degree hole of 90 metres depth drilled at S80°W from sample site 20.

2. Collecting samples from each 3 metre interval of carbonate altered rock intercepted by the drilling and having the samples analyzed for gold (fire assay), silver, arsenic, copper and zinc.