REPORT ON THE GEOLOGY OF THE BREMNER - FALCONBRIDGE GRIDS OF THE OBA PROPERTY 1984

Read this file

D.F. Bosowec
Falconbridge Limited
Winnipeg, Manitoba
April 25, 1985

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FIGURES

MAPS

1.0 INTRODUCTION

A detailed grid mapping program on the Bremner-Falconbridge claims was completed in the summer of 1984. The mapping project, which was started on June 20 and completed on September 4, covered approximately 134 km of grid line. A 100 meter grid line spacing was used.

The purpose of the detailed mapping program was to follow-up on a previous summer reconnaissance mapping program. Particular attention was paid to locating and determining the extent of the felsic metavolcanic/ mafic metavolcanic (amphibolite) contact as well as mapping and sampling felsic metavolcanic interbeds within the mafic metavolcanics (amphibolite). The main intention of the program was to determine if the felsic metavolcanics are host to stratabound gold occurrences.

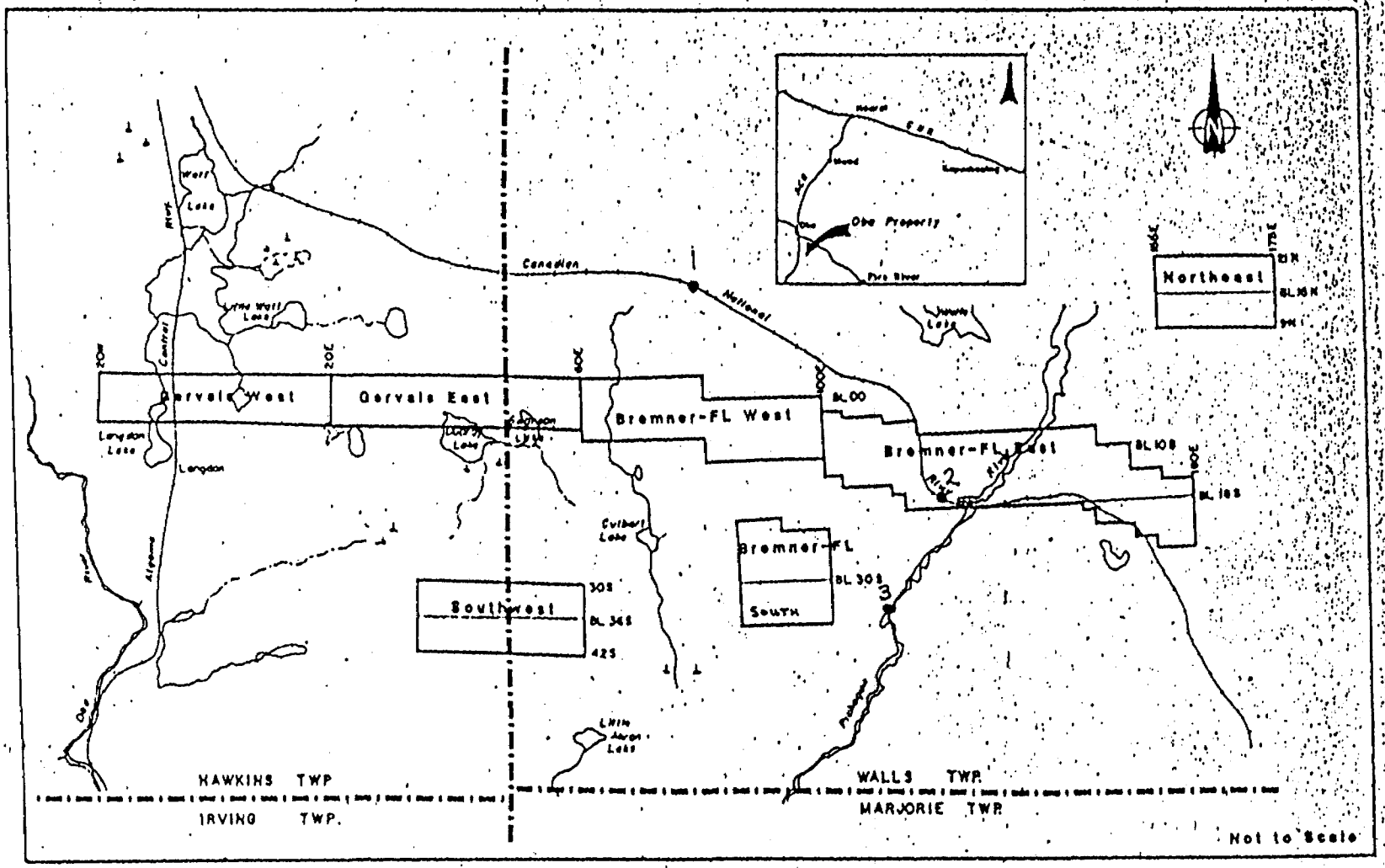
Geochemical and assay rock sampling together with selective humus sampling and Phoenix VLF-EM accompanied the mapping. Phoenix VLF-EM was done to locate cross-structures and anomalous mineralization.

2.0 LOCATION AND ACCESS

Oba is situated in Northwestern Ontario and is approximately 100 km south of the town of Hearst (Figure 1). Access to Oba is provided by either railway (Canadian National or Algoma Central) or by an all weather private gravel road accessible from Highway 583.

The Bremner-Falconbridge properties are located approximately 7 km southeast of Oba in Walls Township (figure 1).

Three different camp locations were used to cover the Bremner-Falconbridge properties. Two camps were constructed along the CN rail line, one by the west Neswabin mile switch and the other near the Pichogen River trestle. These locations were chosen because of their accessibility to the Bremner-Falconbridge grid. The third camp which was set up near the South Bremner-Falconbridge grid was located along the Pichogen River and helicopter assisted (Figure 1).



• CAMP LOCATION

GRID AND CAMP LOCATIONS

FIGURE 1

3.0 PREVIOUS WORK

In 1923 G. Taylor discovered gold in Hawkins Township of the Oba area. The gold occurred within quartz veins mineralized with sulphides.

This generated interest within the adjacent Walls Township which resulted in the finding of the Culbert-Dubroy occurrence. Here the gold is confined to auriferous quartz veins. However, follow-up trenching and drilling by various individuals and interests failed to produce an economic discovery.

Several remnant trenches were encountered during the summer mapping program. The trenches usually followed felsic metavolcanic units or quartz veins. The odd one was found within granite.

Following is a summary of the work history of Walls Township.[1]

It is interesting to note that the Shenango Prospect (Hawkins Township) produced a total of 67 oz. of Au and 37 oz. of Ag in 1936, 1937 and 1945.

3.1 Culbert-Dubroy Occurrence

Location	Metals	Remarks
Walls Township, approx. 1½ miles south from a point on the CNR, 1 mile west of Neswabin. Claim SSM687. (Culbert-Peterson-Dubroy Occurrence)	Au	Migmatite encloses a system of parallel veins, strike E12°S, dip 85°N, total mineralized zone is approx. 400 ft. wide. Native gold is visible in some of the veins.

Date	Operator	Type of Work	Results
CULBERT DUBROY SHOWING			
1934	Newswaba Gold Mine Syndicate	13 DDH on quartz veins	2 intersections of interest: 4.00 DWT?/1.0 ft.; 13.2 DWT?/? width (Bottom of hole in "Paymaster Vein")

[1]FERGUSON, S.A., et al: 1971, Gold Deposits of Ontario, Part 1

Date	Operator	Type of Work	Results
1973	Metalhawk Mining (M. Hibbard)	Stripping Trenching Ground Mag Geol. mapping	7 parallel Q.V. exposed, Vein #1 - 15 samples aver. 1.0 oz/t over 10"; Vein #3 - 7 samples aver. 0.85 oz/ 3', incl. 1 sample 5.0 oz over 4 ft. Resampled, results disappointing
1981	Louis Armstrong	Trenching on 3 E-W Q.V.	No report

4.0 GENERAL GEOLOGY

The rocks within the map area consist of early Precambrian (Archean) metavolcanics and felsic intrusives with minor later Precambrian diabase dikes.

The majority (60-70%) of the exposure consists of mafic metavolcanics, metamorphosed under amphibolite facies conditions. Narrow, northwest striking bands of felsic metavolcanics are interbedded within the mafic metavolcanics (amphibolite).

Towards the south central and east part of the map area felsic metavolcanics (felsic tuff and massive felsic volcanics) become predominant units. A sharp, northwest trending contact separates the mafic metavolcanics with the south central felsic metavolcanic units. As the distance from the sharp contact increases, the felsic tuffs grade into gneiss. The east felsic metavolcanic unit is separated from the mafic metavolcanics by topographic lows and by a shear contact.

The felsic intrusives consist of foliated granitoid, massive to foliated granite, aplite and pegmatite. The felsic intrusives flank as well as intrude the metavolcanics.

Throughout the map area various north trending diabase dikes cross-cut the metavolcanics and felsic intrusives.

The foliation trend within the area is northwest-southeast which subparallels to parallels the stratigraphy.

The rocks are steeply dipping northeast to vertically dipping.

The map area has been subject to strike slip faulting and complexly folded. Strike slip faulting is suggested by the offset of felsic metavolcanic units to the north, east of the Pichogen River. Shearing is also predominant in the map area. Often associated with the shearing are slickensides and gossan zones. Sometimes the shear zones occur at felsic-mafic metavolcanic contacts. Since the map area has been regionally folded, these shear contacts may represent bedding plane thrusts which are related to flexural-slip folding.

Minor metasomatism is exhibited between the amphibolite and foliated granitoid intrusive. The metasomatism is characterized by granitization and sausseritization.

Xenoliths are often found within the felsic intrusives and diabase dikes.

5.0 LITHOLOGICAL DESCRIPTIONS

5.1 Mafic Metavolcanics (Amphibolite)

Though amphibolite facies metamorphism has resulted in complete obliteration of original mafic metavolcanic features, previous work recognized three morphological units: 1) fine grained layered amphibolite indentified as mafic tuffs and/or tuffaceous volcanogenic sediments; 2) fine to medium grained, massive amphibolite; and 3) gabbroic amphibolite. These amphibolite units weather dark green to black.

Metamorphism of the mafic tuffs resulted in the formation of thin alternating bands of dark hornblende-rich and light plagioclase (with minor qtz) rich units averaging 2-4 cm and 2-5 mm in width, respectively. In spots where shearing is evident, chlorite and actinolite are predominant and a schistose texture is exhibited.

Often found within the mafic metavolcanic tuffs are narrow interbeds of felsic metavolcanics ranging in thickness from less than 2mm - 3 meters, but generally between less than 2mm - 20 cm. The felsic bands consists of tuffs, cherty volcanogenic tuffs and quartz eye porphyry tuffs. The felsic tuffs are fine grained to massive in texture and weather light to dark pink. The cherty volcanogenic units are greenish to grey pink, very fine grained to fine grained and hard. Some interbeds were porphyritic due to the presence of ellipsoidal quartz inclusions up to 3mm in size. Compositionally the felsic metavolcanics consist of quartz with variable biotite, sericite and altered feldspars.

The ratio of felsic to mafic bands is usually 1:20, but could be as high as 1:1. The interbeds are either laterally continuous or distorted and pinch off abruptly. In some exposures tensional forces resulted in the felsic metavolcanics forming boudinage and pull apart structures. The interbeds that were affected were less than 3 cm in size.

The fine to medium grained massive amphibolite probably represents metamorphosed mafic flows. In one exposure, lense shaped structures had selvage-like rims 0.5 - 1 cm in size possibly representing remnant pillows. No felsic metavolcanic interbeds are encountered within the mafic flows.

The coarse grained gabbroic amphibolite may represent the metamorphosed inner part of thick lava flows. Also the gabbroic amphibolite is often associated with pod or lense shaped structures which may be up to 30 cm wide with the long axis up to 70 cm. Since these gabbroic pods are usually associated with massive amphibolite, they may represent rafted coarse grained flow inclusions which have been stretched by tensional forces.

5.2 Felsic Metavolcanics

The felsic metavolcanics are similar to the felsic interbeds

within the mafic metavolcanics except that these volcanic units are larger in both thickness and lateral extent. These felsic units are massive to medium grained and consist of quartz with variable biotite, sericite and K/Na-feldspar.

Three felsic metavolcanic units are encountered in the map areas. Two are defined by a sharp stratigraphic northwest trending contact separating the felsic metavolcanics from the mafic metavolcanics. The third horizon is defined by shear contacts between the mafic metavolcanics and felsic metavolcanics.

The two felsic metavolcanic units defined by the sharp contacts are located in the south central part of the map area. One is located in the southern part of the Bremner-Falconbridge grid and the other is located in the northern extremity of the South Bremner-Falconbridge grid. Both consist of fine-grained to medium-grained tuffs, however the unit confined to the Bremner-Falconbridge grid is tens of meters thicker than the South Bremner-Falconbridge grid felsic tuff unit.

Mapping reveals that the two felsic tuff units become coarser grained and K-feldspar which as one approaches the foliated granitoid intrusive rocks which flanks the units to the south and north. Also the texture of the felsic units transforms from tuffaceous to microgneiss to gneissic, indicated by the mineral segregation of the quartz-k-feldspar and biotite, towards the foliated granitoid intrusive.

Various literature has indicated that at some igneous contacts wide zones of metamorphosed host rocks (quartz arenites) have been converted to gneissic granite. At high temperatures and pressures feldspathic or quartzofeldspathic material is introduced as a granitic fluid if the host rock is porous and permeable. Movement of these materials is easiest parallel to the foliation, therefore when the quartzofeldspathic material

crystalizes they form a gneissic impression (texture). If one assumes the epizonal granitoid intrusive is syntectonic (though it is possibly pre-tectonic) with the regional metamorphism and one recognizes the fact that the granitoid intrusives flank the felsic tuffs, the above may be a possible explanation for the observed compositional and textural changes within the felsic tuffs towards the foliated granitoid rocks.

The third felsic metavolcanic horizon is located east of the Pichogen River in the central part of the Bremner-Falconbridge grid. It is characterized by a very fine-grained to fine-grained grain size and by a massive to poorly foliated texture.

As indicated earlier, the east felsic horizon is defined by shear contacts between the mafic metavolcanics and felsic metavolcanics. Exposure shows the shear zones paralleling the strike of the contact between the felsic and mafic metavolcanic units. Also, a set of felsic and mafic volcanic outcrops are separated by narrow topographic lows, again parallel to the strike of the units. The "topographic" contacts possibly indicate the weathering and glacial erosion of the shear contacts (see figures 2 and 3).

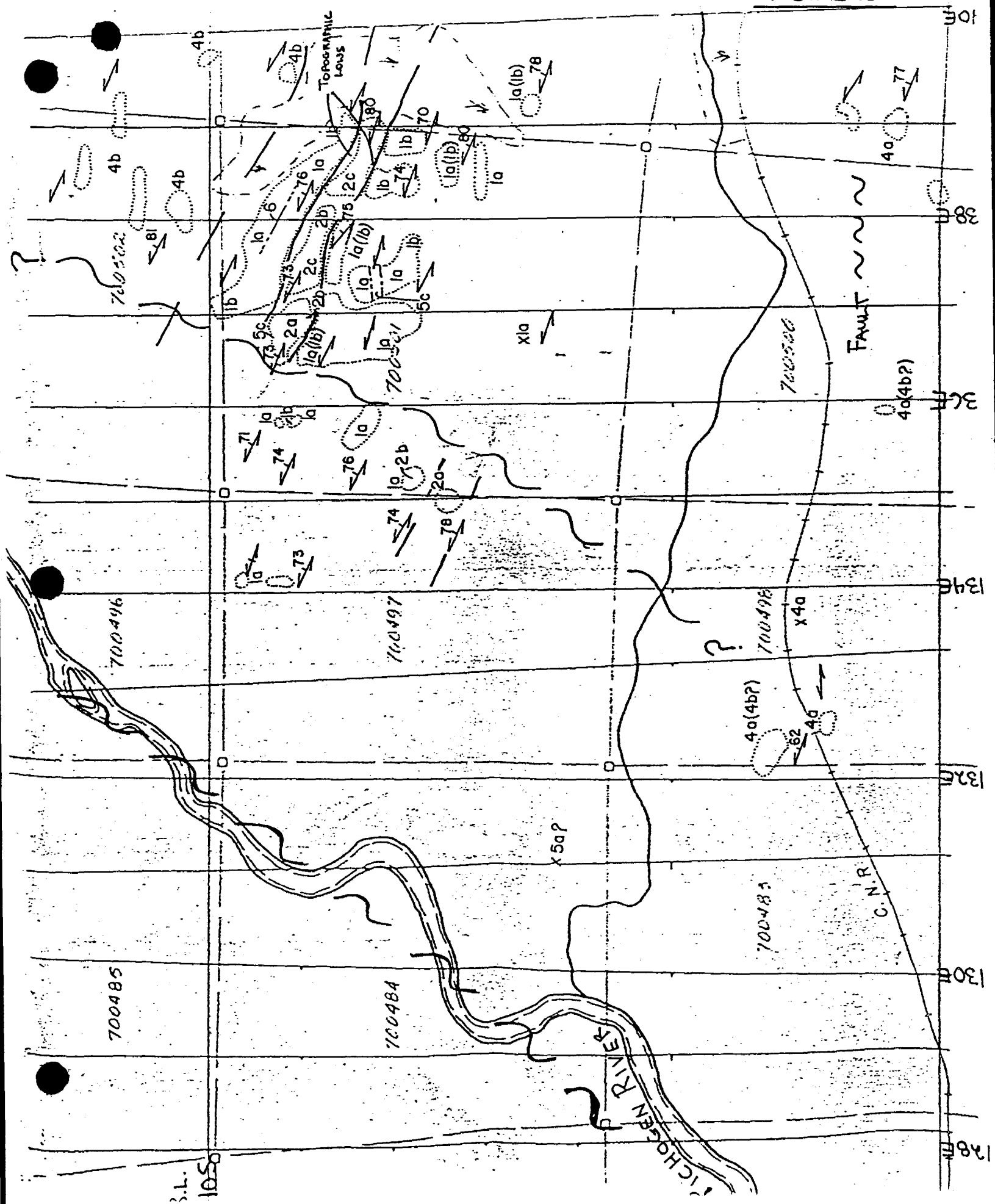
The presence of shear zones at the contacts of the two metavolcanic units as well as shear movement parallel to the strike of the contacts possibly suggests flexural slip folding in which the shear zones represent bedding plane thrusts.

5.3 Foliated Granitoid Rocks

The foliated granitoid rocks weather pinkish to reddish pink and are medium grained to coarse grained. The foliation is defined by biotite and minor sericite. The presence of a well defined foliation suggests that the granitoid rocks are pretectonic or possibly syntectonic

FAULT AND TOPOGRAPHIC LOW LOCATIONS

FIGURE 2



700426
700429
700422
700427
700428
758442
758443
SHEARED CONTACT BETWEEN 1a(1b) AND 2c
SHEAR CONTACT AND MYLONITE LOCATION
MYLONITIZED DRAG FOLD
T.L. 15S
T.L. 18S
T.L. 22S
NGOOSE LAKE
148E
150E
152E
154E
156E
158E
160E

FIGURE 3

with the regional metamorphism. Also, since the foliated granitoid intrusives flank the gneisses, this suggests that they are possible fluid and heat sources for the gneisses.

5.4 Felsic Intrusives

The felsic intrusives consist of the rock types: granite, pegmatite and aplite. All three rock types weather dark pink and contain K-feldspar.

The majority of the granite exposures are medium grained - coarse grained, non-foliated (massive) and contain between 30-45% quartz with minor biotite. However, one set of outcrops reveals foliated biotite. Previous regional mapping indicates that the granite intrusives are post tectonic, therefore the foliation may represent a type of flow structure.

The late stage magmatic intrusives of pegmatite and aplite form dikes and sills which intrude the metavolcanics. Both are K-feldspar rich with the coarse grained intrusives represented by pegmatite and the aphanatic intrusives represented by aplite.

5.5 Diabase Dikes

The fact that the diabase dikes intrude all the major rock types within the map area indicates that it is the youngest of the Precambrian rock units. Characterized by a massive texture and a reddish brown weathering surface. The width of the diabase dikes varies from several to tens of meters while the length varies from tens to hundreds of meters. Generally, the diabase dikes trend northwest, northeast and north. A majority of the dikes are mineralized with disseminated pyrrhotite giving them a high magnetic expression.

6.0 STRUCTURE

Faulting is indicated by abrupt discontinuities in the felsic metavolcanic

units. One, possibly two, apparent strike slip faults can be recognized. Both have strikes which trend northeast and displacements which range from a few to several 100 meters. One fault plane is defined by the Pichogen River while the other possible fault is east of the Pichogen River (Figure 2).

On the regional scale, the map area has been subject to complex folding. Therefore, the east felsic-mafic metavolcanic shear contacts may indicate flexural slip folding in which the felsic metavolcanics contact surfaces slipped over the mafic metavolcanic contact surfaces. Furthermore, tension fissures within the felsic metavolcanics, tension fissures deformed by bedding plane slip in the layered amphibolite, slickensides parallel to the strike of the shear contacts and drag folds associated with a mylonitized zone, point towards flexural slip folding.

In one outcrop exposure a gneiss has a migmatitic fabric suggesting partial melting and mixing of felsic metavolcanics and foliated granitoid intrusive. The migmatic fabric is defined by ptygmatic folding.

Minor, small scale monocline folds occur in a few outcrop exposures.

As indicated earlier, the narrow felsic metavolcanic bands within the mafic metavolcanics often show boudinage - pull apart structures. This suggests that there was extension in the plane of banding with the more competent felsic metavolcanic bands pinching and swelling, as well as breaking apart.

7.0 QUARTZ VEINING AND GOSSAN ZONES

Zones of intense silicification or veining as well as shear zones are often associated with severe gossan type alteration characterized by hematite and geothite staining.

Throughout the map area, quartz veining is relatively minor. Generally,

the quartz veins range from 5 to 50 cm and the zones of silicification are up to 20 cm wide. Only two quartz veins were of any significance. One is near Culbert Creek and the other is located on a ridge, west of the Pichogen River. These two quartz veins are intensely hematized and associated with shear zones indicated by slickensides on the host wall rock. Also associated with the veins is sulphide mineralization characterized by pyrite, chalcopyrite and galena, 10-30% sericite (probably altered felsic inclusions) and minor carbonate. The quartz vein west of the Pichogen River also contains minor tremolite which is Ca-rich hydrothermal amphibolite (see figures 4 and 5).

Gossan zones are usually most intense along sheared contacts between felsic and mafic metavolcanics. This intense alteration probably can be attributed to the fact that the shear zones represent an excellent plumbing system for migrating fluids. One such gossan zone, located in the South Bremner-Falconbridge grid, (eastern extremity of the grid) contained up to 5% hexagonal flakes of molybdenite (see figure 6).

8.0 MINERALIZATION

8.1 Pyrite

Generally occurs as disseminated cubes between less than 1 - 4mm in size. It is found in both the mafic and felsic metavolcanics as well as quartz veins and silicified zones. Pyrite content varies from much less than 1 - 15%, but usually is much less than 1%.

8.2 Pyrrhotite

Usually found within the diabase dikes, but minor pyrrhotite is also found within the mafic and felsic metavolcanics. Occurs as disseminated cubes between less than 1 - 2 mm in size and varies from less than 1 - 5%.

West Pichogen River Quartz Vein

Figure 4

Cu - Chalcopyrite Showing
Pb - Galena Showing

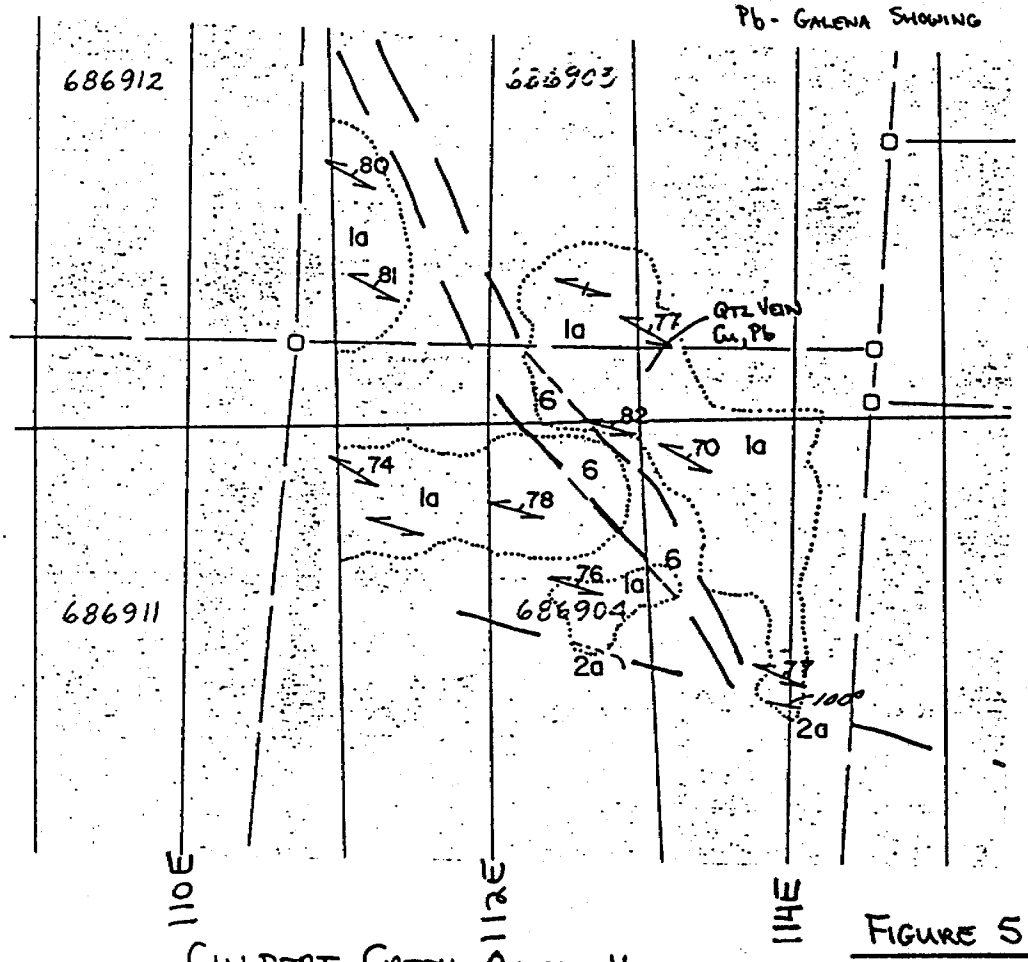
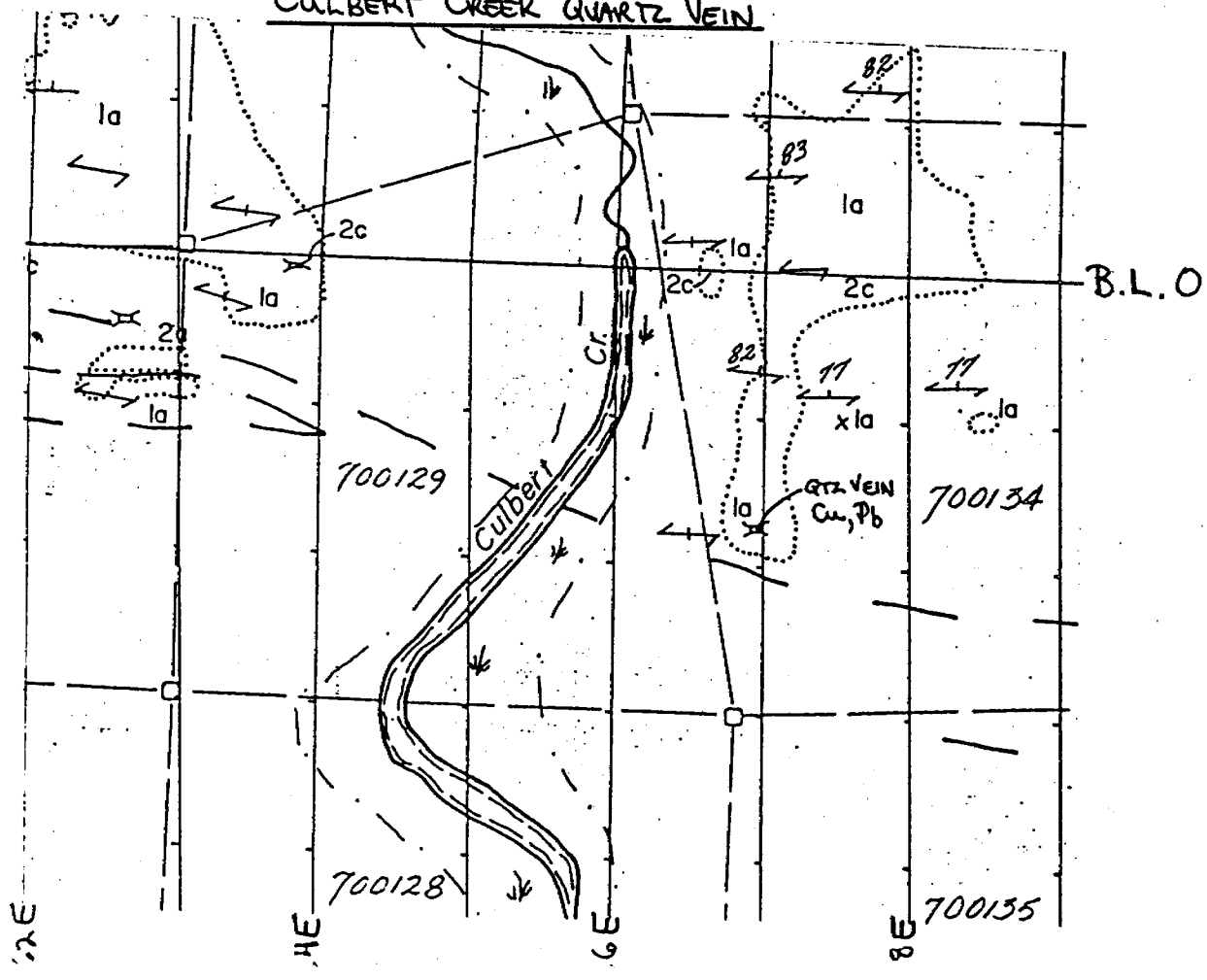


Figure 5



8.3 Galena and Chalcopyrite

Trace galena and chalcopyrite are found within two severely hematized quartz veins. Chalcopyrite occurs as random blebs less than 3 mm in size. Galena occurs as cubes less than 2 mm in size (see figures 4 and 5).

8.4 Molybdenite

Two locations in the South Bremner-Falconbridge grid contain molybdenite. The molybdenite is confined to a laterally continuous gossan zone found between a cherty-volcanogenic felsic unit and an amphibolite unit. It occurs as radiating euhedral hexagonal flakes less than 4 mm in size and is present up to 5% (see figure 6).

8.5 Gold

No visible free gold occurrences were encountered within the felsic metavolcanics or the quartz veins.

9.0 CONCLUSIONS AND RECOMMENDATIONS

9.1 Bremner-Falconbridge Grid

Though the lateral extent of the felsic metavolcanic units and felsic metavolcanic interbeds within the amphibolite is extensive, geochemical analysis indicated sparse and random gold anomalies. Therefore, based on geological information, it is recommended that no further work be done on the grids.

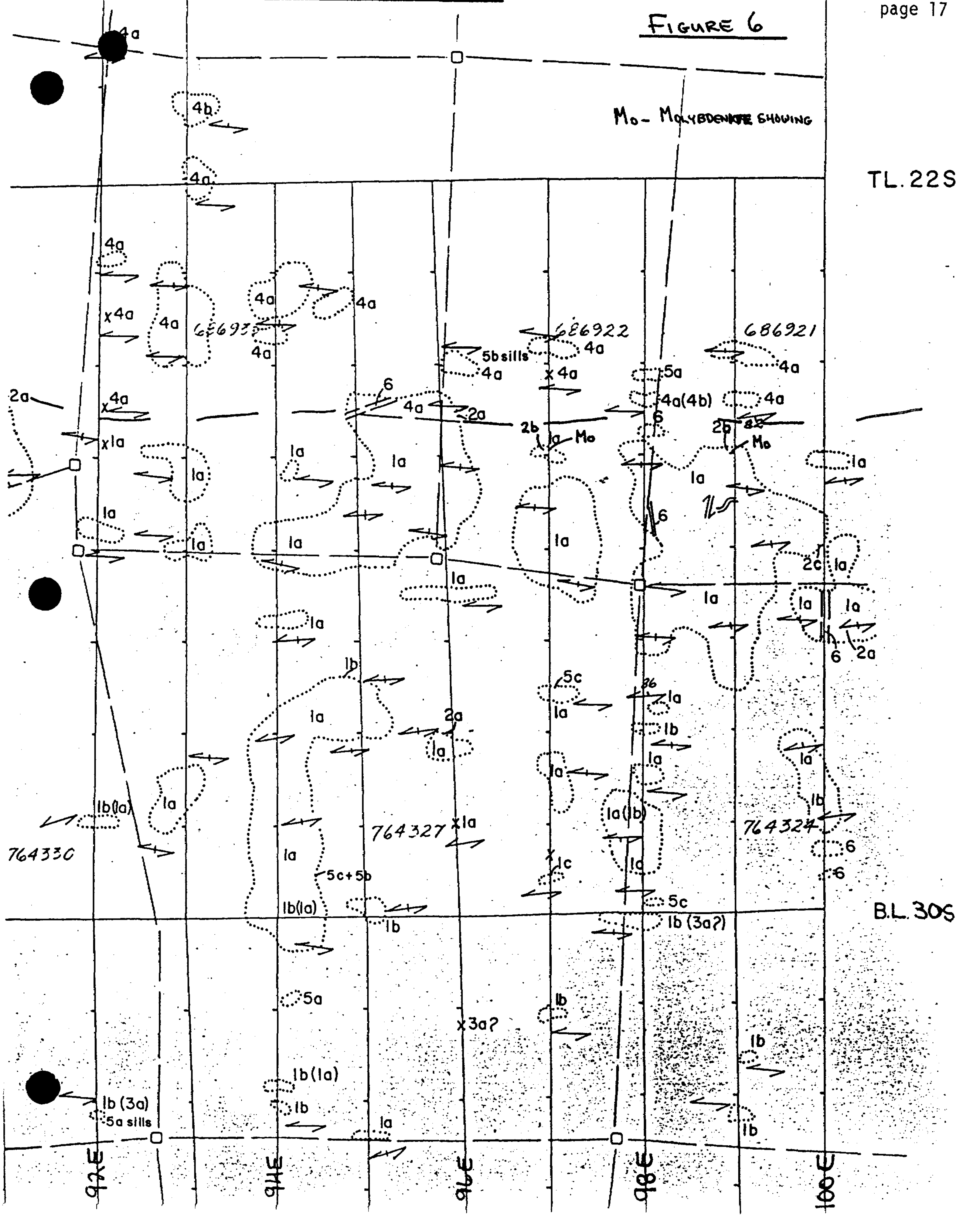
9.2 South Bremner-Falconbridge Grid

The felsic metavolcanic unit is extensive laterally but narrow. Also no appreciable gold anomalies were encountered through sampling. Therefore, based on geological information, it is also recommended that no further work be done on the grid for gold exploration.

The presence of up to 5% molybdenite along a 200 meter strike is of significance since Climax-type molybdenite deposits contain between 0.1 - 1.0% MoS_2. It is recommended that a small scale molybdenite sampling

Molybdenum Showing

Figure 6



program be done concentrating on the mineralized gossan zone and near by alkali intrusives to determine the economic potential of the showing.

Respectfully submitted.....

D.F. Bosowec

APPENDIX I

Ministry of Natural Resources
Ontario

Report of Work
(Geophysical, Geological, Geochemical and Expenditures)

Mining Act

19

Instructions: – Please type or print.
– If number of mining claims traversed exceeds space on this form, attach a list.
Note: – Only days credits calculated in the "Expenditures" section may be entered in the "Expend. Days Cr." columns.
– Do not use shaded areas below.

Type of Survey(s)	Township or Area
GEOLOGICAL	WALLS TWP.

Claim Holder(s)	Prospector's Licence No.
FALCONBRIDGE LTD.	A-21647

Address: P.O. BOX 40, COMMERCE COURT WEST, TORONTO, ONTARIO, M5L 1B4

Survey Company	Date of Survey (from & to)	Total Miles of line Cut
FALCONBRIDGE LTD.	20 06 84 (Day / Mo. / Yr.) 06 09 84	EXISTING GRID

Name and Address of Author (of Geo-Technical report): D. BOSOWEC, 100 - 3074 PORTAGE AVE., WINNIPEG, MANITOBA, R3K 0Y2

Credits Requested per Each Claim in Columns at right

Special Provisions		Days per Claim
For first survey: Enter 40 days. (This includes line cutting)	Geophysical	
	· Electromagnetic	
	· Magnetometer	
For each additional survey: using the same grid: Enter 20 days (for each)	· Radiometric	
	· Other	
	Geological	20
	Geochemical	

Man Days		Days per Claim
Complete reverse side and enter total(s) here	Geophysical	
	· Electromagnetic	
	· Magnetometer	
	· Radiometric	
	· Other	
	Geological	
	Geochemical	

Airborne Credits		Days per Claim
Note: Special provisions credits do not apply to Airborne Surveys.	Electromagnetic	
	Magnetometer	
	Radiometric	

Mining Claims Traversed (List in numerical sequence)

Mining Claim Prefix	Mining Claim Number	Expend. Days Cr.
P	686903	
	686904	
	686905	
	686910	
	686911	
	686912	
	686917	
	686918	
	686922	
	686926	
	686927	
	686930	
	686931	
	686935	
	686936	
	686939	
	686940	
	686941	
	700125	
	700126	
	700127	
	700128	
	700129	

Mining Claim Prefix	Mining Claim Number	Expend. Days Cr.
	700130	
	700133	
	700134	
	700135	
	700136	
	700137	
	700142	
	700143	
	700144	
	700145	
	700150	
	700151	
	700152	
	700153	
	700412	
	700413	
	700414	
	700415	
	700416	
	700420	
	700421	
	700422	
	700423	

Total number of mining claims covered by this report of work: 81

Expenditures (excludes power stripping)

Type of Work Performed:

Performed on Claim(s):

Calculation of Expenditure Days Credits

Total Expenditures: $ ÷ 15 = Total Days Credits

Instructions
Total Days Credits may be apportioned at the claim holder's choice. Enter number of days credits per claim selected in columns at right.

Date	Recorded Holder or Agent (Signature)

For Office Use Only

Total Days Cr. Recorded	Date Recorded	Mining Recorder
	Date Approved as Recorded	Branch Director

Certification Verifying Report of Work

I hereby certify that I have a personal and intimate knowledge of the facts set forth in the Report of Work annexed hereto, having performed the work or witnessed same during and/or after its completion and the annexed report is true.

Addendum to Report of Work filed by Falconbridge Ltd. covering a geological survey in Walls Twp.

Additional claims covered by the survey:

P -	700427	700501
	700428	700502
	700460	764324
	700461	764325
	700462	764326
	700465	764327
	700466	764328
	700467	764329
	700478	764330
	700479	764331
	700480	764332
	700483	764333
	700484	764334
	700485	764335
	700496	764337
	700497	764338
	700498	764339
	700500	

APPENDIX II

STATEMENT OF QUALIFICATIONS

I, DANIEL FREDERICK BOSOWEC, of the City of Winnipeg, Province of Manitoba,

DO SOLEMNLY DECLARE THAT:

1. I have obtained a B.Sc. Honors in Geology (1984) from the University of Manitoba, Winnipeg, Manitoba and have practised my profession prior to and since graduation in 1984, a period of nearly two years; and

2. I am responsible for the writing of this report.

Dated at Winnipeg this 13th day of May, 1985.

WITNESS: L Berard

D F Bosowec

D.F. Bosowec
Falconbridge Limited
Winnipeg, Manitoba

900

Mining Lands Section

File No 2.8133

Control Sheet

TYPE OF SURVEY

____ GEOPHYSICAL

__✓__ GEOLOGICAL

____ GEOCHEMICAL

____ EXPENDITURE

MINING LANDS COMMENTS:

L.D.

J. Hurst

Signature of Assessor

85-05-23

Date

1985 06 26

Your File: 103/85
Our File: 2.8133

Mining Recorder
Ministry of Natural Resources
60 Wilson Avenue
Timmins, Ontario
P4N 2S7

Dear Sir:

RE: Notice of Intent dated June 4, 1985
Geological Survey on Mining Claims
P 686903, et al, in Walls Township

The assessment work credits, as listed with the above-mentioned Notice of Intent, have been approved as of the above date.

Please inform the recorded holder of these mining claims and so indicate on your records.

Yours sincerely,

S.E. Yundt
Director
Land Management Branch

Whitney Block, Room 6643
Queen's Park
Toronto, Ontario
M7A 1W3
Phone:(416)965-4888

S. Hurst:mc

cc: Falconbridge Ltd
P.O. Box 40
Commerce Court West
Toronto, Ontario
M5L 1B4

cc: I.R. Morrison
1687 Wilson Avenue
Timmins, Ontario
P4N 2T2

cc: D. Bosowec
Suite 100
3074 Portage Avenue
Winnipeg, Manitoba
R3K 0Y2

cc: Mr. G.H. Ferguson
Mining & Lands Commissioner
Toronto, Ontario

cc: Resident Geologist
Timmins, Ontario

Encl.

Ministry of Natural Resources
Ontario

Technical Assessment Work Credits

File 2.8133

Date 1985 06 04

Mining Recorder's Report of Work No. 103/85

Recorded Holder
FALCONBRIDGE LTD

Township or Area
WALLS TOWNSHIP

Type of survey and number of Assessment days credit per claim	Mining Claims Assessed
Geophysical Electromagnetic _____ days Magnetometer _____ days Radiometric _____ days Induced polarization _____ days Other _____ days Section 77 (19) See "Mining Claims Assessed" column Geological 20 days Geochemical _____ days Man days ☐ Airborne ☐ Special provision ☒ Ground ☒ ☐ Credits have been reduced because of partial coverage of claims. ☐ Credits have been reduced because of corrections to work dates and figures of applicant.	P 686903-04 686910-11-12-17-18-22-26-27-30-31 35-36-39-40-41 700125 to 130 inclusive 700133 to 137 inclusive 700142 to 145 inclusive 700150 to 153 inclusive 700412-15-20-21-22-27-28-60-61 700465-66-67-78-79-80-84-97 700501 764327-28-30-31-33-34-35

Special credits under section 77 (16) for the following mining claims

10 DAYS

P 686905
700413-14-23-62-83-85-96-98
700500-02
764324-25-26-29-32-37-38-39

No credits have been allowed for the following mining claims

☒ not sufficiently covered by the survey ☐ Insufficient technical data filed

P 700416

The Mining Recorder may reduce the above credits if necessary in order that the total number of approved assessment days recorded on each claim does not exceed the maximum allowed as follows: Geophysical — 80; Geological — 40; Geochemical — 40; Section 77(19)—60:

Ministry of Natural Resources

Ontario

June 19/85

1985 06 04

Your File: 103/85
Our File: 2.8133

Mining Recorder
Ministry of Natural Resources
60 Wilson Avenue
Timmins, Ontario
P4N 2S7

Dear Sir:

Enclosed are two copies of a Notice of Intent with statements listing a reduced rate of assessment work credits to be allowed for a technical survey. Please forward one copy to the recorded holder of the claims and retain the other. In approximately fifteen days from the above date, a final letter of approval of these credits will be sent to you. On receipt of the approval letter, you may then change the work entries on the claim record sheets.

For further information, if required, please contact Mr. R.J. Pichette at 416/965-4888.

Yours sincerely,

S.E. Yundt
Director
Land Management Branch

Whitney Block, Room 6643
Queen's Park
Toronto, Ontario
M7A 1W3

/ks. S. Hurst:mc

Encls.

cc: Falconbridge Ltd
P.O. Box 40
Commerce Court West
Toronto, Ontario
M5L 1B4

cc: I.R. Morrison
167 Wilson Avenue
Timmins, Ontario
P4N 2T2

cc: D. Bosowec
Suite 100
3074 Portage Avenue
Winnipeg, Manitoba
R3K 0Y2

cc: Mr. G.H. Ferguson
Mining & Lands Commissioner
Toronto, Ontario

Ministry of Natural Resources

Ontario

Notice of Intent

for Technical Reports

1985 06 04

1.8133/103/85

An examination of your survey report indicates that the requirements of The Ontario Mining Act have not been fully met to warrant maximum assessment work credits. This notice is merely a warning that you will not be allowed the number of assessment work days credits that you expected and also that in approximately 15 days from the above date, the mining recorder will be authorized to change the entries on his record sheets to agree with the enclosed statement. Please note that until such time as the recorder actually changes the entry on the record sheet, the status of the claim remains unchanged.

If you are of the opinion that these changes by the mining recorder will jeopardize your claims, you may during the next fifteen days apply to the Mining and Lands Commissioner for an extension of time. Abstracts should be sent with your application.

If the reduced rate of credits does not jeopardize the status of the claims then you need not seek relief from the Mining and Lands Commissioner and this Notice of Intent may be disregarded.

If your survey was submitted and assessed under the "Special Provision-Performance and Coverage" method and you are of the opinion that a re-appraisal under the "Man-days" method would result in the approval of a greater number of days credit per claim, you may, within the said fifteen day period, submit assessment work breakdowns listing the employees names, addresses and the dates and hours they worked. The new work breakdowns should be submitted direct to the Land Management Branch, Toronto. The report will be re-assessed and a new statement of credits based on actual days worked will be issued.

Ministry of Natural Resources
Ontario

Report of Work
(Geophysical, Geological, Geochemical and Expenditures)

Mining Act

103/85 2.8133

May 18th

Instructions: – Please type or print.
– If number of mining claims traversed exceeds space on this form, attach a list.
Note: – Only days credits calculated in the "Expenditures" section may be entered in the "Expend. Days Cr." columns.
– Do not use shaded areas below.

Type of Survey(s): GEOLOGICAL
Township or Area: WALLS TWP.
Claim Holder(s): FALCONBRIDGE LTD.
Prospector's Licence No.: A-21647
Address: P.O. BOX 40, COMMERCE COURT WEST, TORONTO, ONTARIO, M5L 1B4
Survey Company: FALCONBRIDGE LTD.
Date of Survey (from & to): 20 (Day) 06 (Mo.) 84 (Yr.) | 06 (Day) 09 (Mo.) 84 (Yr.)
Total Miles of line Cut: EXISTING GRID
Name and Address of Author (of Geo-Technical report): D. BOSOWEC, 100 - 3074 PORTAGE AVE., WINNIPEG, MANITOBA, R3K 0Y2

Credits Requested per Each Claim in Columns at right

Special Provisions		Days per Claim
For first survey: Enter 40 days. (This includes line cutting)	Geophysical	
	- Electromagnetic	
	- Magnetometer	
For each additional survey: using the same grid: Enter 20 days (for each)	- Radiometric	
	- Other	
	Geological	20
	Geochemical	

RECEIVED
APR 09 1985
MINING LANDS SECTION

Man Days		Days per Claim
Complete reverse side and enter total(s) here	Geophysical	
	- Electromagnetic	
	- Magnetometer	
	- Radiometric	
	- Other	
	Geological	
	Geochemical	

RECORDED
MAR 29 1985

Airborne Credits		Days per Claim
Note: Special provisions credits do not apply to Airborne Surveys.	Electromagnetic	
	Magnetometer	
	Radiometric	

Expenditures (excludes power stripping)

Type of Work Performed:

Performed on Claim(s):

RECEIVED
MAR 29 1985
A.M. P.M.

Calculation of Expenditure Days Credits

Total Expenditures $ ÷ 15 = Total Days Credits

Instructions
Total Days Credits may be apportioned at the claim holder's choice. Enter number of days credits per claim selected in columns at right.

Date: 28 March 85
Recorded Holder or Agent (Signature): [signature] AGENT

Mining Claims Traversed (List in numerical sequence)

Prefix	Number	Expend. Days Cr.	Prefix	Number	Expend. Days Cr.
P	686903			700130	
	686904			700133	
	686905			700134	
	686910			700135	
	686911			700136	
	686912			700137	
	686917			700142	
	686918			700143	
	686922			700144	
	686926			700145	
	686927			700150	
	686930			700151	
	686931			700152	
	686935			700153	
	686936			700412	
	686939			700413	
	686940			700414	
	686941			700415	
	700125			700416	
	700126			700420	
	700127			700421	
	700128			700422	
	700129			700423	

Total number of mining claims covered by this report of work: 81

For Office Use Only

Total Days Cr. Recorded	Date Recorded	Mining Recorder
1620	Mar. 29/85	[signature]
	Date Approved as Recorded	Branch Director
	As Revised Statement	

Certification Verifying Report of Work

I hereby certify that I have a personal and intimate knowledge of the facts set forth in the Report of Work annexed hereto, having performed the work or witnessed same during and/or after its completion and the annexed report is true.

Name and Postal Address of Person Certifying: I.R. MORRISON, 167 WILSON AVE., TIMMINS, ONTARIO, P4N 2T2

Date Certified: 28 March 85
Certified by (Signature): [signature]

1362 (81/9)

Addendum to Report of Work filed by Falconbridge Ltd.
covering a geological survey in Walls Twp.

Additional claims covered by the survey:

P -	700427	700501
	700428	700502
	700460	764324
	700461	764325
	700462	764326
	700465	764327
	700466	764328
	700467	764329
	700478	764330
	700479	764331
	700480	764332
	700483	764333
	700484	764334
	700485	764335
	700496	764337
	700497	764338
	700498	764339
	700500	

REGISTERED

May 17, 1985

Report of Work #103/85

Falconbridge Ltd
P.O. Box 40
Commerce Court West
Toronto, Ontario
M5L 1B4

Dear Sirs:

RE: Mining Claims P 686903, et al, in Walls Township

I have not received the reports and maps (in duplicate) for the Geological Survey on the above-mentioned claims.

As the assessment "Report of Work" was recorded by the Mining Recorder on March 29, 1985, the 60 day period allowed by Section 77 of the Mining Act for the submission of the technical reports and maps to this office will expire on May 28, 1985.

If the material is not submitted to this office by May 28, 1985, I will have no alternative but to instruct the Mining Recorder to delete the work credits from the claim record sheets.

For further information, please contact Mr. Arthur Barr at (416)965-4888.

Yours sincerely,

S.E. Yundt
Director
Land Management Branch

Whitney Block, Room 6643
Queen's Park
Toronto, Ontario
M7A 1W3
Phone:(416)965-4888

A. Barr:mc

cc: Mining Recorder
Timmins, Ontario

cc: I.R. Morrison
167 Wilson Avenue
Timmins, Ontario P4N 2T2

cc: D. Bosowec
Suite 100
3074 Portage Avenue
Winnipeg, Manitoba
R3K 0Y2

2·8·33

686903	✓			700145	✓						
4	✓			50	✓			700501	✓		
5	1/2			51	✓			2	1/2		
10	✓			52	✓			764324	1/2		
11	✓			53	✓			25	1/2		
12	✓			412	✓			26	1/2		
17	✓			13	1/2			27	✓		
18	✓			14	1/2			28	✓		
22	✓			15	✓			29	1/2		
26	✓			16	NC			30	✓		
27	✓			20	✓			31	✓		
30	✓			21	✓			32	1/2		
31	✓			22	✓			33	✓		
35	✓			23	1/2			34	✓		
36	✓			27	✓			35	✓		
39	✓			28	✓			37	1/2		
40	✓			60	✓			38	1/2		
41	✓			61	✓			39	1/2		
700125	✓			62	1/2						
26	✓			65	✓						
27	✓			66	✓						
28	✓			67	✓						
29	✓			78	✓						
30	✓			79	✓						
33	✓			80	✓						
34	✓			83	1/2						
35	✓			84	✓						
36	✓			85	1/2						
37	✓			96	1/2						
42	✓			97	✓						
43	✓			98	1/2						
44	✓			500	1/2						


BASE LINE 00
BASE LINE 10S
BASE LINE 30S
BL.10S
TL.4N
TL.3N
TL.3S
TL.5S
TL.6S
TL.7S
TL.8S
TL.15S
TL.16S
TL.22S
TL.37S
L 30S
L58E
L59E
L60E
OPEN GROUND
See SouthEast Grid
Bremner 'W' 6
Bremner 'W' 1
LEGEND
1 Mafic Metavolcanics
1a layered amphibolite
1b massive amphibolite
1c gabbroic amphibolite
1d hornfels amphibolite
2 Intermediate - Felsic Metavolcanics
2a felsic tuffs
2b volcanogenic sediments
2c massive felsic volcanics
3 Metasediments
3a arenites
3b argillite
4 Gneissic Complex
4a quartz feldspar biotite gneiss
4b foliated granitoid rocks
4c granodiorite gneiss
5 Felsic Intrusives
5a massive granite
5b aplite
5c pegmatite
6 Diabase
— SYMBOLS —
Outcrops
Foliation (Dip Vertical, Indicated)
Geological Contacts
Fault, Shear
Grid Line
Roads, Trails
RailRoad
Lake/River and Shoreline
Intermittent Stream
Claim Boundary
Claim Post
Swamp
Trenches
28133
PN 506,507
FALCONBRIDGE LIMITED
OBA PROPERTY-WALLS TOWNSHIP
BREMNER-FALCONBRIDGE GRID
WEST SHEET
GEOLOGY
0 100 200 300 400 500M
1:5000
DATE September 24, 1984
DRAWN VCH
NTS REF 42F1
DATA D.Boscwec/C.Roney
200

LEGEND

1 Mafic Metavolcanics
- 1a layered amphibolite
- 1b massive amphibolite
- 1c gabbroic amphibolite
- 1d hornfels amphibolite

2 Intermediate - Felsic Metavolcanics
- 2a felsic tuffs
- 2b volcanogenic sediments
- 2c massive felsic volcanics

3 Metasediments
- 3a arenites
- 3b argillite

4 Gneissic Complex
- 4a quartz feldspar biotite gneiss
- 4b foliated granitoid rocks
- 4c granodiorite gneiss

5 Felsic Intrusives
- 5a massive granite
- 5b aplite
- 5c pegmatite

6 Diabase

28133

— SYMBOLS —

Grid Line
Roads, Trails
Railroad
Lake/River and Shoreline
Intermittent Stream
Claim Boundary
Claim Post
Swamp
Trench

Outcrops
Foliation (Dip Vertical, Indicated)
Geological Contacts
Fault, Shear

PN506,507

FALCONBRIDGE LIMITED

OBA PROPERTY-WALLS TOWNSHIP
BREMNER-FALCONBRIDGE GRID
EAST SHEET

GEOLOGY

0 100 200 300 400 500M
1 : 5000

DATE September 22, 1984	DRAWN VCH
NTS REF 42F1	DATA D Bosowec/C Roney

D. Bosowec

210