

PRELIMINARY GEOLOGICAL REPORT

AND

SOIL GEO - CHEMICAL SURVEY REPORT

THE BA MINERAL CLAIMS

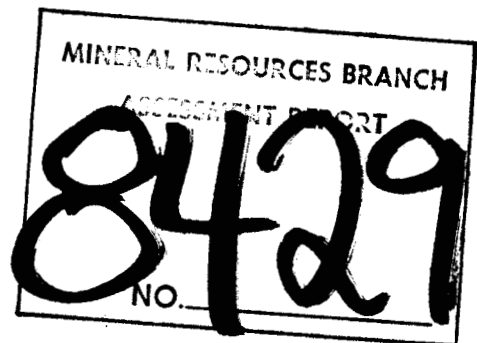
GOLDEN MINING DIVISION, B. C. 82K/8W.

50° 24.5' N.
116° 24' W

FOR

Keith L. Burns

Calgary, Alberta.



BY

A. D. van der Lee P. Geol

12th September, 1980.

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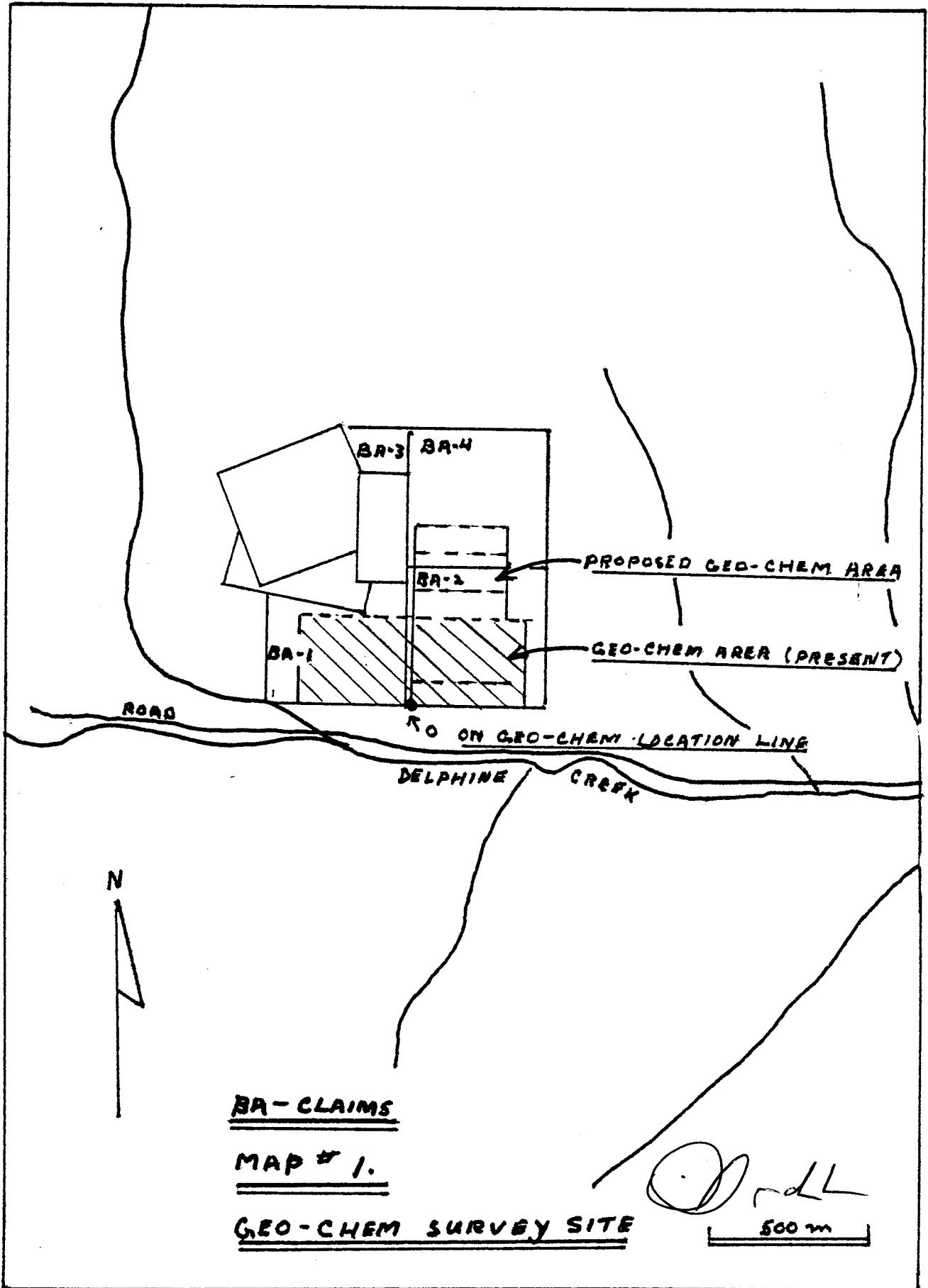
INCLUSIONS

INDEX MAP NO. 1

GEOCHEMICAL SURVEY MAP NO. 2

ASSAY REPORTS

STATEMENT OF COSTS



BA-CLAIMS

MAP # 1.

GEO-CHEM SURVEY SITE

500 m

PROPERTY

The property consists of 4 unpatented mineral claims.

BA-1

EA-2

BA-3

EA-4

The above claims are owned by Keith Burns of Calgary, Alberta.

LOCATION AND ACCESS

The claims are located on the North side of Delphine Creek, approximately 3 miles up from its junction with Toby Creek.

A good all weather road is taken west from the town of Invermere up Toby Creek for approximately 18 miles. Then a trail for 4 wheel drive units branches to the north up the Delphine Creek for about 3 miles to the base of the BA Claims.

GEOLOGY

The area is described by J. F. Walker in 'Geology and Mineral Deposits of Windermere Map Area, B.C.', from the Geological Survey of Canada Report 148 in 1926, and by J. E. Reesor, ' Preliminary Series ', Map 12 of 1957. (Lardeau Half)

The claim area is underlain by rock of the Mount Nelson formation. A major fault immediately to the east of the property appears to have been the source of mineralization. This fault forms part of a series of faults which continue northeast for 12 miles to a granodiorite

intrusive on Horsethief Creek. It also forms the contact between the Mount Nelson formation to the west and the Dutch Creek formation to the east.

There is a Syncline running through the west side of the BA group which at the lower elevations is hard to define. It would appear that it is this feature in which the Delphine Mine workings a half mile to the north are located.

The Mount Nelson formation consists of purple, grey and black argillite and slate; buff weathering grey and purple dolomite, and dolomite limestone; and green quartzite.

The Dutch Creek formation to the east is made up of green, grey, and black argillite and slate; a buff dolomitic slate; a buff weathering dolomite and a green argillaceous quartzite.

It is of interest that it was in the Mount Nelson formation that the mineral King Mine, 3 miles to the south west, and the Paradise Mine, 8 miles to the East produced lead and zinc from commercial ore bodies.

SAMPLING PROCEDURE

The location line on the geo-chem map enclosed with this report runs South to North for 1500 feet. The laterals were run at 200' and 300' intervals as shown, to the east and west of the location line as indicated

to form a grid. The grid was positioned on BA-1 and BA-2 as shown on Index Map No. 1.

Samples were taken at 25foot intervals along the laterals as shown on the grid map No. 2. Samples were taken from the B zone at a depth of 8 to 12 inches. Loring Laboratories in Calgary assayed all samples using an 80 mesh screen, hot acid digestion, and atomic absorption spectroscopy.

The sampling was done by James Adamson and Keith Burns of Calgary. Standard geo-chem bags were supplied by Loring Laboratories of Calgary. All bags were marked and tied at the sample location. All assays were paid for by Keith Burns, of Calgary.

The sampling was done on October 18 - 1979, and June 6 - 1980, for a total of two working days for two men. Assays were done for copper lead, and zinc on line 1000N, and lead and zinc on the other lines.

CONCLUSIONS AND RECOMMENDATIONS

The geo - chem grid to the east of the south to north location line shows some interesting highs on the 1000N line over a 300 foot width, beginning 575 feet east of the location line. The 200 foot line shows much weaker highs, but does indicate a continuity of a mineralized trend in a north - south direction. None of these readings are exceptionally

high but the increase in ppm readings to the north would seem warrant some additional lines in a northerly direction to determine the source of this mineralization.

I would recommend the grid east of the location line be extended north at 300 foot intervals for an additional 1000 feet. Should an anomaly be indicated I would recommend this work be followed up by a reasonable amount of trenching.

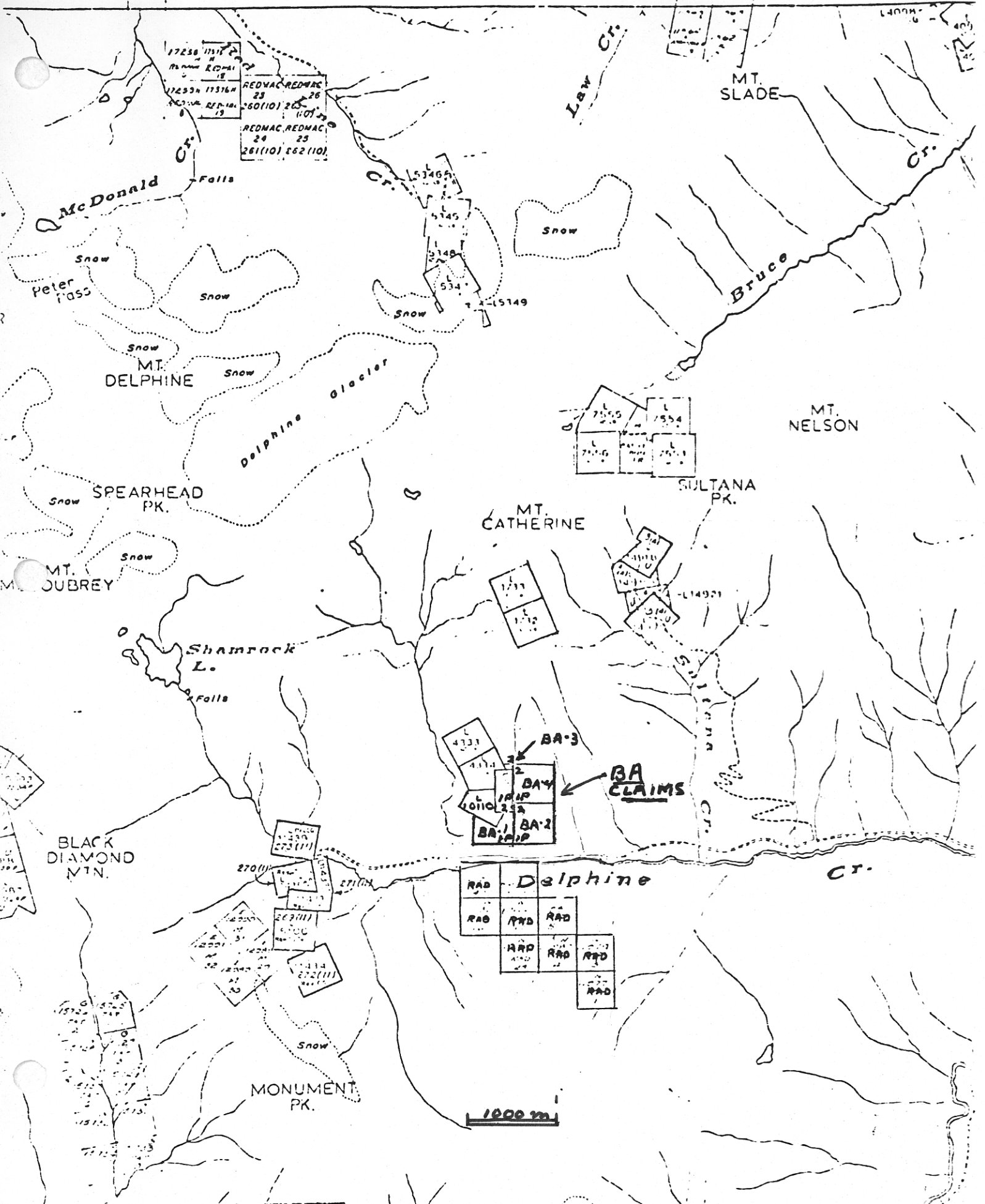
C E R T I F I C A T E

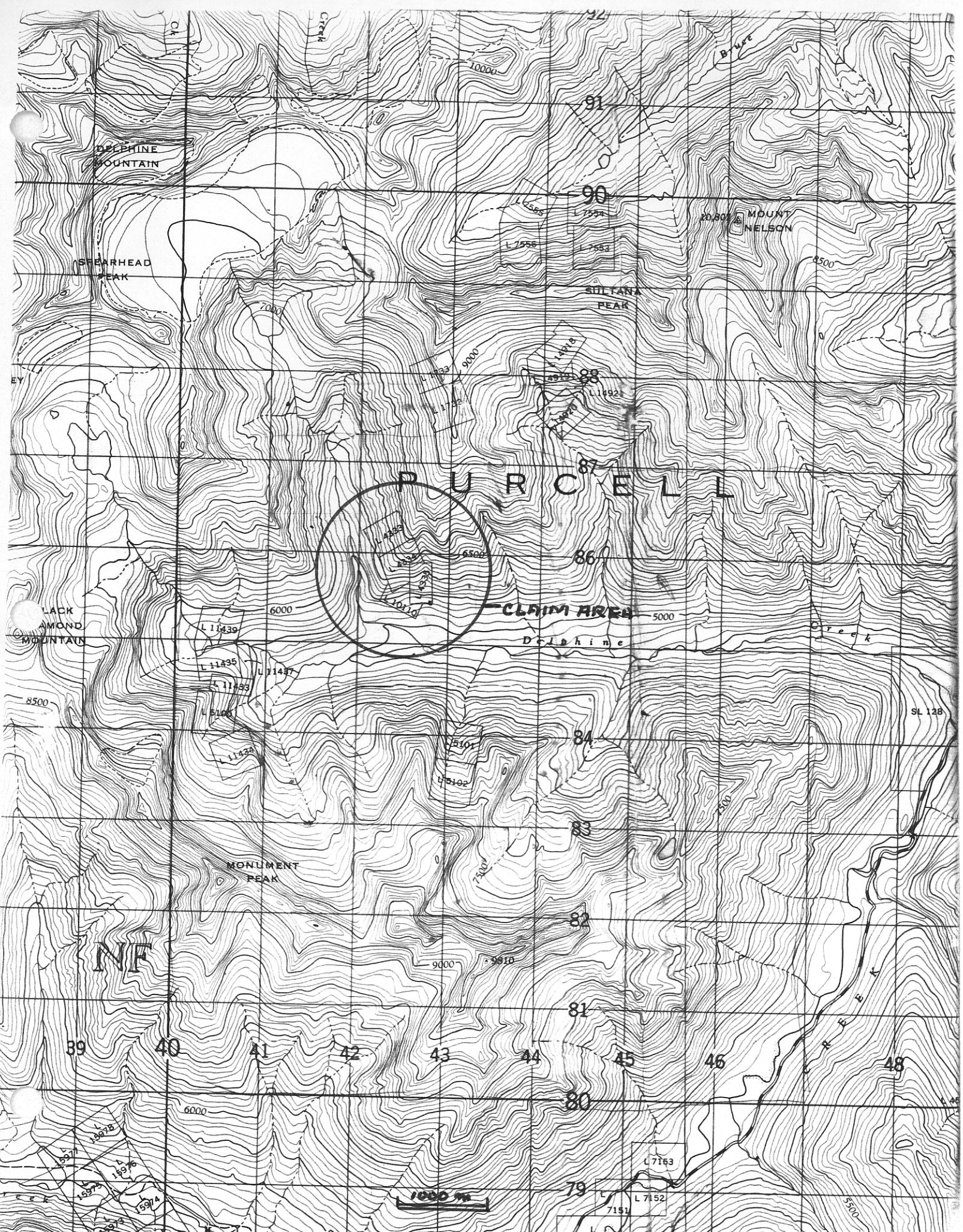
This is to certify that I, A. D. van der Lee :

1. Am a resident of Calgary, Alberta, and live at 8212 10th St. S.W.
2. Am a graduate of the University of Calgary, B. Sc. 1971, and have spent one year in Graduate Studies in 1972 at the University of Calgary.
3. Am a member of the Professional Eng. Geologists and Geophysicists of Alberta.
4. Have no interest direct or indirect in the properties known as the BA Claims.
5. Have written this report on a personal examination of the property and the G.S.C. reports pertaining to this area.

A. D. van der Lee, P. Geol.

A handwritten signature in black ink, appearing to read 'A. D. van der Lee', written in a cursive style.





DELPHINE MOUNTAIN

SEERHEAD PEAK

MOUNT NELSON

SILFANA PEAK

LACK ALMOND MOUNTAIN

MONUMENT PEAK

CLAIM AREA

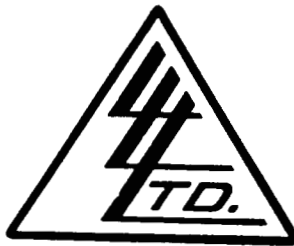
Delphine Creek

NF

1000 FT

SL 128

To: Mr. Keith Burns
 3617 Blackburn Road S.E.
 Calgary, Alberta
 T2G 2R2



File No. 18058
 Date October 24, 1979
 Samples Soil

Certificate of
ASSAY
LORING LABORATORIES LTD.

Page #1

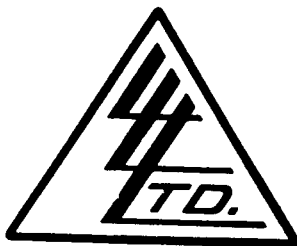
SAMPLE No.	PPM Cu	PPM Pb	PPM Zn
1000N			
<u>"SOIL SAMPLES"</u>			
OW	19	64	164
1W-25	28	43	80
2W-50	23	44	87
3W-75	27	51	104
4W-100	31	56	95
5W-125	29	59	100
6W-150	43	87	220
7W-175	24	29	41
8W-200	26	67	97
9W-225	29	60	146
10W-250	30	87	260
11W-275	21	35	120
12W-300	22	74	76
13W-325	19	46	71
14W-350	21	61	107
15W-375	26	59	74
16W-400	30	55	53
17W-425	12	32	63
18W-450	16	40	57
19W-475	18	105	104
20W-500	20	64	84
21W-525	23	30	55
22W-550	43	80	87
23W-575	19	73	55
24W-600	22	58	45
25W-625	16	53	55
26W-650	33	29	44

I **Hereby Certify** THAT THE ABOVE RESULTS ARE THOSE
 ASSAYS MADE BY ME UPON THE HEREIN DESCRIBED SAMPLES

Rejects Retained one month.
 Pulp Retained one month
 unless specific arrangements
 made in advance.

Edm. Isaac
 Licensed Assayer of British Columbia

To: Mr. Keith Burns
 3617 Blackburn Road S.E.
 Calgary, Alberta
 T2G 2R2



File No. 18058
 Date October 24, 1979
 Samples Soil

Certificate of
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LORING LABORATORIES LTD.

Page #1

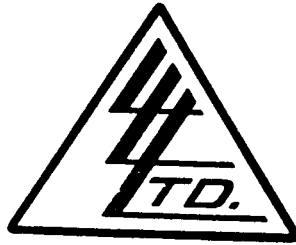
SAMPLE No.	PPM Cu	PPM Pb	PPM Zn
1000N			
<u>"SOIL SAMPLES"</u>			
OW	19	64	164
1W-25	28	43	80
2W-50	23	44	87
3W-75	27	51	104
4W-100	31	56	95
5W-125	29	59	100
6W-150	43	87	220
7W-175	24	29	41
8W-200	26	67	97
9W-225	29	60	146
10W-250	30	87	260
11W-275	21	35	120
12W-300	22	74	76
13W-325	19	46	71
14W-350	21	61	107
15W-375	26	59	74
16W-400	30	55	53
17W-425	12	32	63
18W-450	16	40	57
19W-475	18	105	104
20W-500	20	64	84
21W-525	23	30	55
22W-550	43	80	87
23W-575	19	73	55
24W-600	22	58	45
25W-625	16	53	55
26W-650	33	29	44

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Edmond J. Mac
 Licensed Assayer of British Columbia

To: A & B RESOURCES LIMITED,
 3617 Blackburn Rd. S.E.,
 Calgary, Alberta T2G 2R2



File No. 19336
 Date June 10, 1980
 Samples Soil

ATTN: Mr. Keith Burns

Certificate of
ASSAY of
LORING LABORATORIES LTD.

Page # 1

SAMPLE No.	PPM Cu	PPM Pb	PPM Zn
<u>"Soil Samples"</u>			
1000N 25E	30	96	125
50E	51	61	66
75E	24	70	86
100E	22	39	57
125E	21	48	66
150E	24	49	48
175E	20	38	41
200E	20	52	75
225E	13	47	108
250E	17	39	66
275E	33	43	39
300E	19	54	78
325E	17	54	67
350E	37	46	58
375E	28	66	86
400E	25	55	84
425E	19	51	87
450E	23	62	79
475E	53	44	68
500E	24	81	90
525E	29	80	115
550E	32	84	73
575E	14	320	450
600E	21	150	260
625E	17	87	151
650E	16	80	400
675E	14	66	183
700E	15	130	390
725E	24	105	300

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 Pulp Retained one month
 unless specific arrangements
 made in advance.

Ed McFarlane

Licensed Assayer of British Columbia

To: A. & B. RESOURCES LIMITED,
 3617 Blackburn Rd. S.E.,
 Calgary, Alberta T2G 2R2



File No. 19336
 Date June 10, 1980
 Samples Soil

ATTN: Mr. Keith Burns

Certificate of
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LORING LABORATORIES LTD.

Page # 2

SAMPLE No.	PPM Cu	PPM Pb	PPM Zn
750E	25	98	270
775E	18	100	220
800E	23	84	162
825E	16	104	240
850E	31	152	250
875E	23	104	138
900E	27	54	44
925E	32	50	78
950E	23	22	44
975E	14	29	50
1000E	27	40	55
1025E	34	64	85
1050E	49	48	34
1075E	28	47	60
1100E	26	48	57
1125E	25	49	76
1150E	23	44	80
1175E	22	90	250
1200E	18	46	126
1225E	29	53	109
1250E	46	54	130
1275E	37	50	117
1325E	30	32	100
1350E	37	39	129

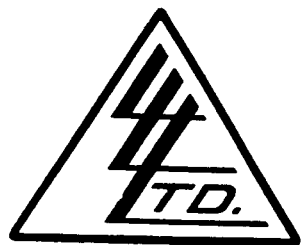
I **Hereby Certify** THAT THE ABOVE RESULTS ARE THOSE
 ASSAYS MADE BY ME UPON THE HEREIN DESCRIBED SAMPLES

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 Pulps Retained one month
 unless specific arrangements
 made in advance.

E. L. M. J. ...

Licensed Assayer of British Columbia

To: A & B RESOURCES LIMITED,
 3617 Blackburn Rd. S.E.,
 Calgary, Alberta T2G 2R2



File No. 19337
 Date June 10, 1980
 Samples Soil

ATTN: Mr. Keith Burns

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Page # 1

SAMPLE No.	PPM Cu	PPM Pb	PPM Zn
<u>"Soil Samples"</u>			
200N-150E	36	94	360
175E	21	31	78
200E	16	49	84
225E	19	50	157
250E	16	44	250
275E	21	52	175
300E	14	22	88
325E	17	16	21
350E			
Stage Area	17	7	10
375E	18	13	18
400E	19	6	9
425E	21	13	16
450E	17	54	93
475E	18	55	95
500E	20	84	167
525E	15	75	118
550E	38	63	72
575E	38	47	61
600E	9	39	68
625E	17	44	70
650E	16	45	92
675E	30	39	120
700E	16	24	69
725E	34	65	81
750E	17	35	60
775E	13	40	117
800E	18	36	106
825E	23	44	96
35' N of Rock			

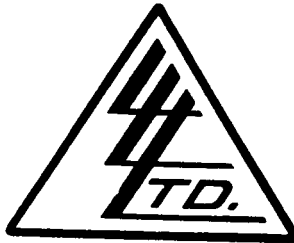
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 unless specific arrangements
 made in advance.

Ed M. J. J. J. J.

Licensed Assayer of British Columbia

To: A & B RESOURCES LIMITED,
3617 Blackburn Rd. S.E.,
Edmonton, Alberta T2G 2R2



File No. 19337
 Date June 10, 1980
 Samples Soil

ATTN: Mr. Keith Burns

Certificate of
ASSAY OF
LORING LABORATORIES LTD.

Page # 2

SAMPLE No.	PPM Cu	PPM Pb	PPM Zn
200N- 850E	27	52	118
875E	19	42	116
900E	13	48	160
925E	35	41	68
950E	20	34	94
975E	28	36	95
1000E	22	41	110

**I Hereby Certify THAT THE ABOVE RESULTS ARE THOSE
 ASSAYS MADE BY ME UPON THE HEREIN DESCRIBED SAMPLES**

Rejects Retained one month.
 Pulps Retained one month
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 made in advance.

[Signature]

Licensed Assayer of British Columbia

STATEMENT OF COSTS FOR BA CLAIM GROUP 1 TO 4 , FOR 1979 - 80.

<u>Claims</u>	BA-1	BA-2	BA-3	BA-4
<u>Map No.</u>	82K/8W	82K/8W	82K/8W	82K/8W
<u>Mining Receipt</u>	132650E	132650E	132650E	132650E
<u>Rec. No.</u>	487	488	489	490

All the above claims were recorded at Golden, B.C. October 15/79.

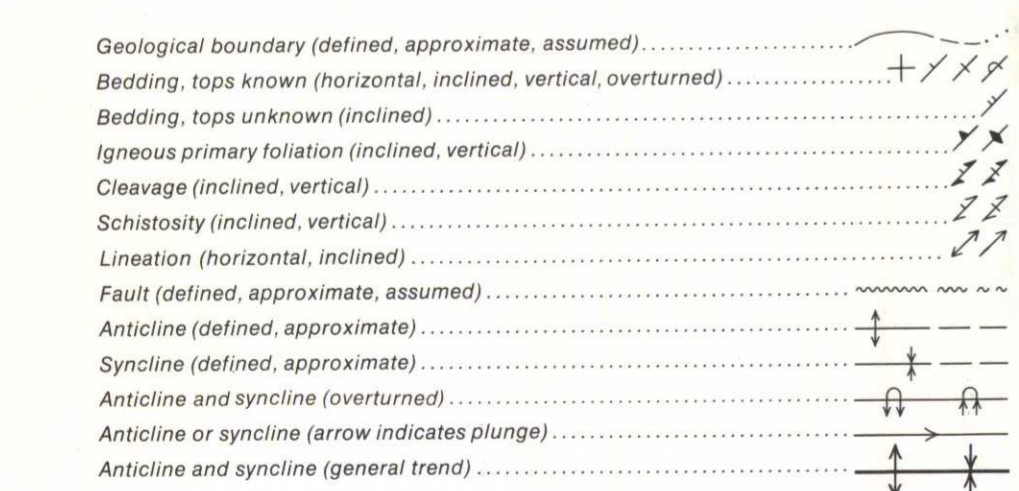
Geo - chem assays 109- cu., pb., zn.	\$280.15
Geo - chem assays 35- pb., zn.	\$ 96.25
Labour 2 men 16 hrs. @ 7.00 per hr.	\$224.00
4 X 4 25.00 per day - 2 days	\$ 50.00
Chain Saw 8.00 per day - 2 days	\$ 16.00
Board 10.00 per day - 2 men, - 2 days	\$ 40.00
Geologist 200.00 per day, - 1 day	\$200.00
(Saturday August 16/80)	
<u>Total costs</u>	\$906.40

LEGEND

- CENOZOIC**
- QUATERNARY**
UNCONSOLIDATED SEDIMENTS: silt, sand, gravel
- CRETACEOUS**
Kgm Quartz monzonite
Kgd Granodiorite
- JURASSIC**
Jgd Granodiorite
- MESOZOIC**
- WESTERN PURCELL AND SELKIRK MOUNTAINS**
- TRIASSIC**
TK Volcanic rocks
- CARBONIFEROUS AND PERMIAN**
MILFORD GROUP
uPm Slate and silty slate; limestone and chert
- PRE-MISSISSIPPIAN**
LARDEAU GROUP
Chlorite-muscovite-quartz schist, biotite-muscovite schist, micaceous quartzite, and tremolite marble; chlorite-feldspar green schists; much garnet, staurolite and rare kyanite in some pelitic schists
- BRISCO RANGE**
- DEVONIAN MIDDLE**
HARROGATE FORMATION: nodular grey limestone and grey calcareous shale
- DEVONIAN**
CEDARED FORMATION: red quartz sandstone, quartz-bearing limestone; dolomite and quartzite
- DEVONIAN**
CEDARED and HARROGATE FORMATIONS: undivided
- MT. FORSTER**
- DEVONIAN UPPER DEVONIAN**
STARBIRD FORMATION: grey limestone and gritty limestone
- DEVONIAN**
MOUNT FORSTER FORMATION: bright red and green argillite; brown weathering limestone

- EASTERN PURCELL, BRISCO, AND VERMILION RANGES**
- ORDOVICIAN AND SILURIAN**
BEAVERFOOT FORMATION: massive, light grey weathering dolomite and dolomitic limestone
- ORDOVICIAN**
MOUNT WILSON (WONAH) QUARTZITE: white orthoquartzite; brown weathering, crumbly quartz sandstone
- GLENOGLE SHALES**: black, fissile shale; brown argillaceous sandstone
- CAMBRIAN AND ORDOVICIAN**
MCKAY GROUP
Blue-grey limestone, argillaceous limestone, dark shale; intraformational limestone conglomerate
- CAMBRIAN UPPER CAMBRIAN**
OLENUS STRATA: blue-grey limestone and grey shale
- MIDDLE AND/OR UPPER CAMBRIAN**
JUBILEE (OTTERTAIL) FORMATION: thinly laminated and massive dolomite; in Vermilion Range massive limestone and dolomitic limestone
- MIDDLE CAMBRIAN**
CHANCELLOR GROUP
Reddish brown and grey shale, grey limestone
- LOWER CAMBRIAN**
EAGER (DONALD) FORMATION: buff weathering, gritty limestone, purple and green argillite; minor black limestone
- CRANBROOK (GOG) FORMATION**: crossbedded white and purple quartzite and grit; minor pebbly quartzite, arenaceous purple shale
- LOWER CAMBRIAN**
BADSHOT-MOHICAN FORMATION: marble, phyllite, muscovite-quartz schist
- HAMILL GROUP**
White, pure green, and grey quartzite and micaceous quartzite; dark slate, phyllite, and mica schist; some pebbly and feldspathic quartzite; 1Ca, amphibolite

- PURCELL MOUNTAINS**
- WINDERMERE (HADRYNIAN)**
- Hh** HORSETHIEF CREEK GROUP
Grey, black, and green slate and argillite, quartz pebble conglomerate, quartzite, feldspathic quartzite and grit; red slate and arenaceous slate; minor blue-grey and black limestone; equivalent mica schist, schistose quartzite and grit, as well as marble in the more metamorphosed zones in the southwest part of the map-area; Hh1, slates dominant; Hh2, pebble conglomerate, grit, and quartzite are dominant; Hh3, limestone and slate
- Ht** TOBY FORMATION: pebble, cobble, and boulder polymictic conglomerate and breccia (matrix variously of quartzite, argillite, and limestone)
- PURCELL (HELIKIAN)**
- Hm** MOYIE INTRUSIONS: meta-quartz diorite and diorite
- Hmn** MOUNT NELSON FORMATION: buff weathering grey, cream and purple dolomite and dolomitic limestone, purple, grey and black argillite and slate; white quartzite
- Hd** DUTCH CREEK FORMATION: grey, green and black argillite and slate, buff dolomitic slate; thin-bedded, buff weathering dolomite, green, argillaceous quartzite
- Hk** KITCHENER-SIYEH FORMATION: laminated, buff weathering, dolomitic and calcareous argillite and quartzite, green and black argillite; grey and pink quartzite; minor purple argillite
- Hc** CRESTON FORMATION: massive and laminated, green and grey weathering, green and grey argillaceous quartzite and quartzite, green argillite
- ALDRIDGE FORMATION**
Upper Division: grey quartzite with partings of black argillite; thin-bedded, argillaceous quartzite and argillite
- Hla** Lower Division: thin-bedded, rusty weathering, light grey quartzite and argillaceous quartzite



Geology by J.E. Reesor 1953-1956 and part of 1957
(part of Windermere from published report of J.F. Walker, 1926;
part of southwest corner of map-area from published report of J.T. Fyles, 1964)

To accompany Memoir 369 by J.E. Reesor

Geological cartography by the Geological Survey of Canada
Any revisions or additional geological information known to
the user would be welcomed by the Geological Survey of Canada

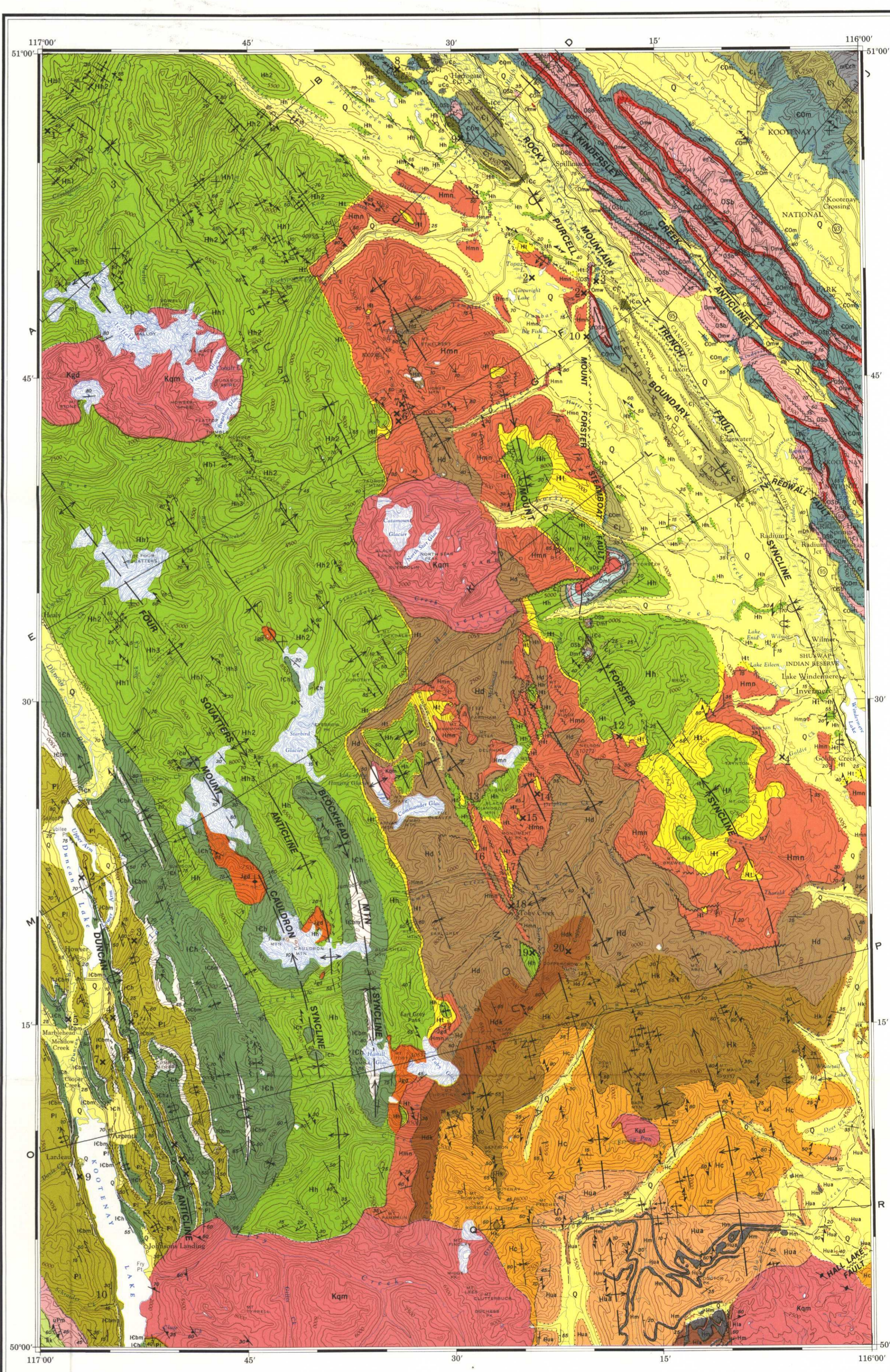
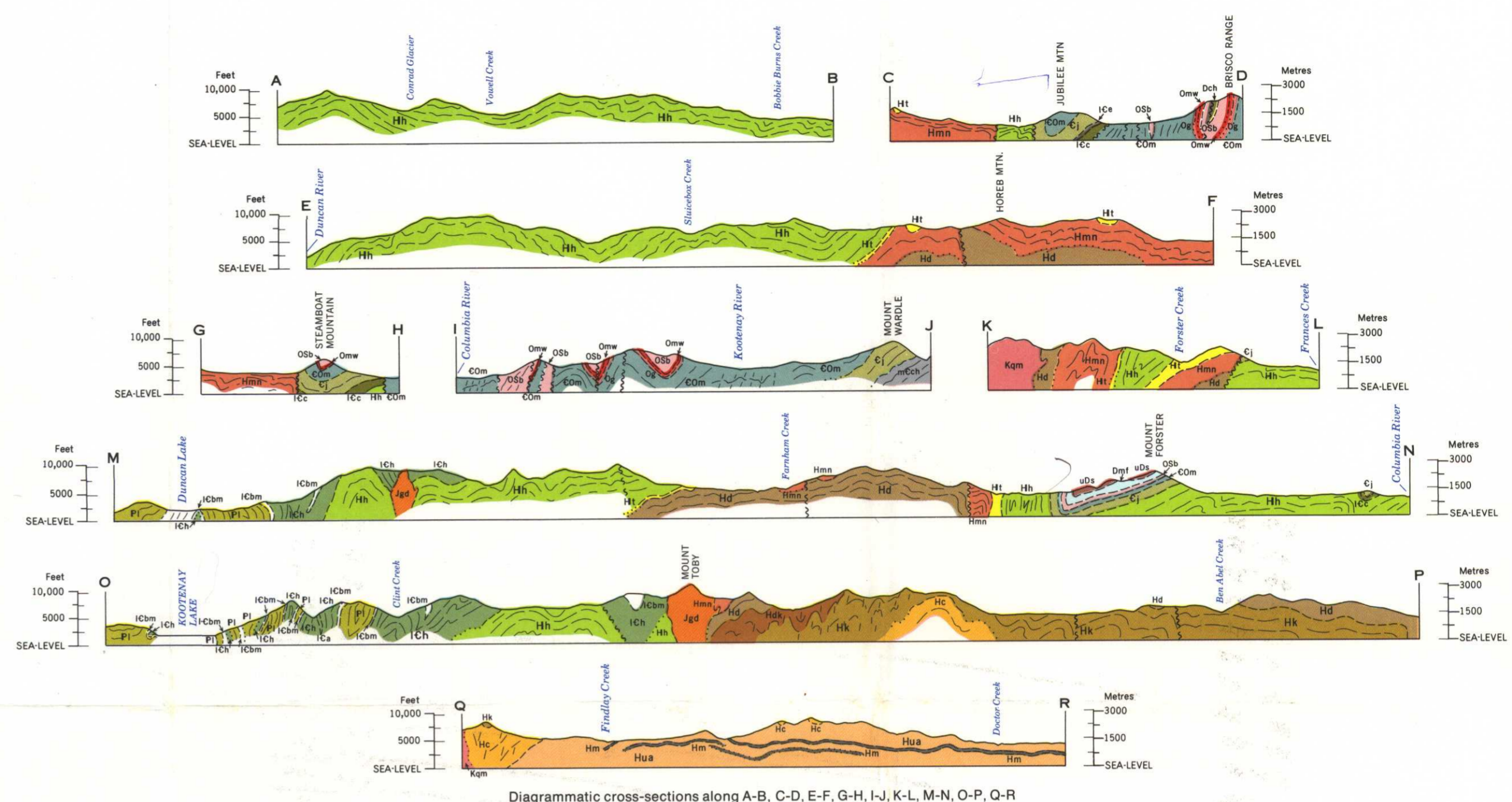
Base-map at the same scale published by the Surveys
and Mapping Branch in 1959

Copies of the topographical edition of this map may be
obtained from the Map Distribution Office, Department of
Energy, Mines and Resources, Ottawa

Magnetic declination 1971 varies from 22°07' easterly at
centre of west edge to 21°50' easterly at centre of
east edge. Mean annual change - 2.6'

Elevations in feet above mean sea-level

- LOCATION OF MINERAL PROPERTIES**
x (Symbol indicates accurate location;
number only, approximate location)
- NORTHEASTERN ZONE (east of Purcell divide)**
- Ruth Vermont (Ag, Pb, Zn)
 - Atlas (Ag, Pb, Zn)
 - FE, HIL, etc. (Au, Ag, Pb, Zn)
 - Rocky Point-Warren Creeks (Cu)
 - Bugaboo Placer (uranium, columbium)
 - Lead Queen (Ag, Pb)
 - Steele Group (Ag, Pb)
 - Lead Mountain (Pb, Zn)
 - Silver Giant (Pb, Zn)
 - Jersey (Cu)
 - Plamagan (Ag)
 - Paradise (Ag, Pb, Zn)
 - Tatler, Great Northern, Copper King (Au, Ag, Pb, Zn, Cu)
 - Delphine (Ag, Pb)
 - Hot Punch (Ag, Pb, Zn)
 - Duncan (Pb, Zn)
 - Lisa A
 - Jumbo
 - Mineral King (Ag, Pb, Zn, Cu, Cd, barite)
 - Red Ledge (Ag, Pb, Zn)
 - Melody (Silver spray) (Ag, Pb, Zn)
- SOUTHWESTERN ZONE (west of Purcell divide)**
- Omo (Pb, Zn)
 - Duncan (Pb, Zn)
 - Surprise (Ag, Cu)
 - Mag (Pb, Zn)
 - Lavina (Ag, Pb)
 - Argenta (Ag, Pb, Cu)
 - St. Patrick (Ag, Pb, Zn)
 - Sal (Pb, Zn)
 - Moonshine (Ag, Pb, Zn)
 - Hi-Lo (Ag, Pb, Zn)
- NON-METALS**
- Baroid of Canada (barite)
 - A.P. Green Fire Brick Co. Ltd. (magnesite)
 - Mountain Minerals, Ltd. (barite)
 - Larrabee (barite)
 - Kootenay Marble Quarry (marble)



Published, 1972
Copies of this map may be obtained from the
Geological Survey of Canada, Ottawa

MAP 1326A
GEOLOGY
LARDEAU
(East Half)
BRITISH COLUMBIA
Scale 1:250,000

MINERAL RESOURCES BRANCH
8429

Published by the Surveys and Mapping Branch

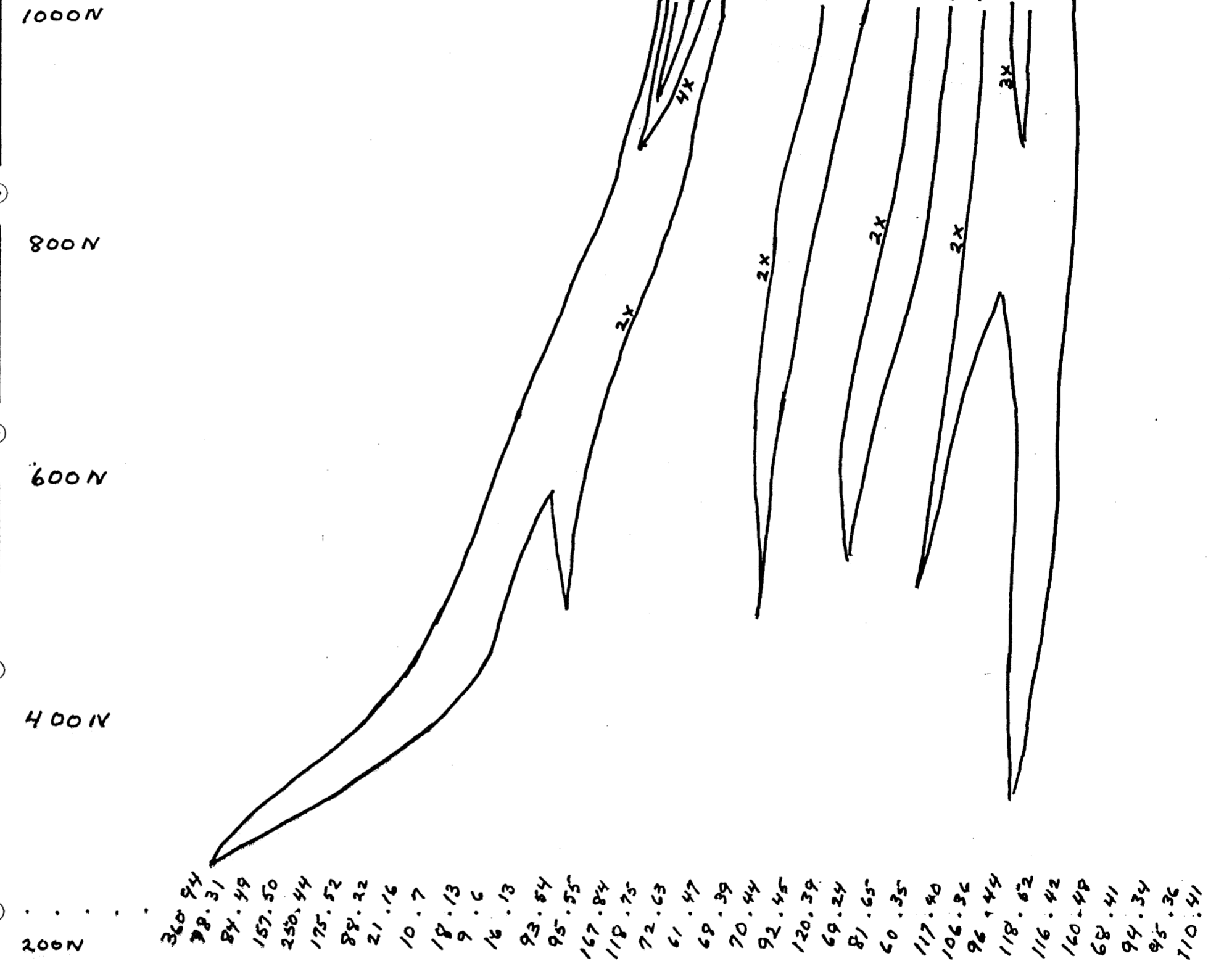
NATIONAL TOPOGRAPHIC SYSTEM REFERENCE AND
INDEX TO GEOLOGICAL SURVEY OF CANADA MAPS

MAP 1326A
LARDEAU
BRITISH COLUMBIA

Miles 0 4 8 12
Kilometres 0 6 12 18

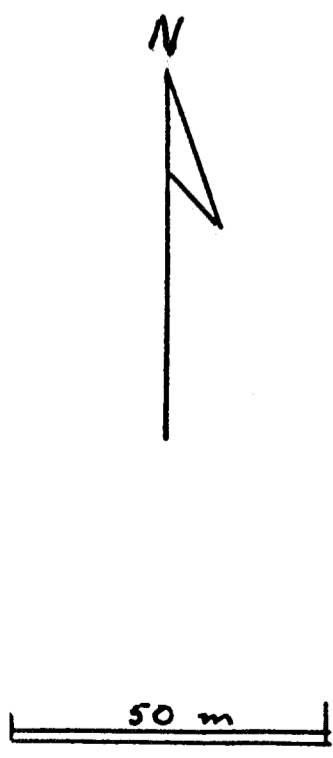
45.58
 55.73
 87.80
 55.30
 84.64
 104.105
 57.40
 63.32
 53.55
 74.54
 107.61
 71.59
 76.74
 129.35
 260.87
 146.60
 97.67
 41.29
 220.87
 100.59
 95.52
 104.51
 87.44
 80.43
 164.64

125.96
 56.61
 86.70
 87.39
 66.48
 48.49
 41.38
 75.52
 108.47
 46.39
 39.43
 78.54
 67.54
 68.46
 86.66
 84.55
 87.57
 79.62
 68.44
 90.81
 115.80
 73.84
 450.320
 240.150
 157.87
 400.80
 183.66
 390.130
 300.105
 270.97
 220.100
 162.84
 240.104
 250.152
 138.104
 44.54
 78.50
 44.22
 60.29
 53.40



360.94
 38.31
 84.49
 157.50
 250.44
 175.52
 88.22
 21.16
 10.7
 18.13
 9.6
 16.13
 93.84
 95.55
 167.84
 118.75
 72.63
 61.47
 69.39
 70.44
 92.45
 120.39
 69.24
 81.65
 60.35
 117.40
 106.36
 96.144
 118.62
 116.42
 160.48
 68.41
 94.34
 95.36
 110.41

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8429
 NO.



BA CLAIMS GEO-CHEM (see INDEX MAP #1) ANOMALIES DRAWN FROM PB READINGS ONLY
 AVERAGE 'NORM' FOR PB - under 80 ppm = 52 ppm.
 MAP # 2

[Handwritten signature]