BRITISH COLUMBIA

PROSPECTORS ASSISTANCE PROGRAM

MINISTRY OF ENERGY AND MINES

GEOLOGICAL SURVEY BRANCH

PROGRAM YEAR:	1995/1996
REPORT #:	PAP 95-55
NAME:	ROBERT KOMARECHKA

THE DOLLY MARBLE PROPERTY

- GEOLOGICAL REPORT

THE DOLLY MARBLE PROPERTY

** GEOLOGICAL REPORT **

Prepared by
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January 13, 1995

BRITISH COLUMBIA
PROSPECTORS ASSISTANCE PROGRAM
PROSPECTING REPORT FORM (continued)

RECEIVED
148
JAN 30 1996
PROSPECTOR

B. TECHNICAL REPORT

- One technical report to be completed for each project area.
- **Refer to Program Requirements/Regulations, section 15, 16 and 17.**
- If work was performed on claims a copy of the applicable assessment report may be submitted in lieu of the supporting data (*see* section 16) required with this TECHNICAL REPORT.

Name ROBERT KOHARECHKA Reference Number 95/96 P148

LOCATION/COMMODITIES

Project Area (as listed in Part A) DOLLY MARBLE MINFILE No. if applicable ?

Location of Project Area NTS 82M/10 Lat 51° 40' Long 118° 35'

Description of Location and Access 100km NORTH OF REVELSTOKE, 4km E OF CONFLUENCE OF GOLDSTREAM & COLUMBIA RIVERS, ACCESS VIA HWY 23, 100km N OF REVELSTOKE, THEN TURN ON GOLDSTREAM MINE ROAD FOR 5Km, THEN TURN LEFT ON CANOE TAKE OUT ROAD 4.1 km THEN TURN [redacted] LEFT UP HILLSIDE ON TO PROPERTY.

Main Commodities Searched For WHITE MARBLE & DIMENSION STONE.

Known Mineral Occurrences in Project Area GOLDSTREAM MINE, TALC, PLACER GOLD, GOLD IN QTZ (OLE BULL - STANMACK)

WORK PERFORMED

1. Conventional Prospecting (area) 5.5 km
2. Geological Mapping (hectares/scale) [redacted] 275 Ha @ 1:5,000 SCALE.
3. Geochemical (type and no. of samples) 15 [redacted] ROCK SAMPLES + 3 MISC ROCK SAMPLES
4. Geophysical (type and line km) N/A
5. Physical Work (type and amount) STRIPPING, WASHING, TRAIL BUILDING, DRILLING, BLASTING, PLUGGER
6. Drilling (no,. holes, size, depth in m, total m) 10 HOLES, 1¾" Ø, [redacted] dp, 260 m dp total, BULK SAMPLING 1-5m
7. Other (specify) SEE RPT.

SIGNIFICANT RESULTS

Commodities WHITE DOLOMITIC MARBLE. Claim Name

Location (show on map) Lat 51°40' Long 118°35' Elevation 2,500'

Best assay/sample type PUREST DOLOMITE - .3% SiO_2, .05% Al_2O_3, .14% Fe_2O_3, 21.75% MgO, 30.27% CaO, .04% Na_2O, <.04% K_2O, <.01% TiO_2, .06% P_2O_5, .01% MnO, .003% Cr_2O_3 46.38% CO

Description of mineralization, host rocks, anomalies

ABUNDANT WHITE DOLOMITIC MARBLE + 1 MILLION TONNES

FRACTURING CONDUCIVE TO SCALING ALONG PARALLEL JOINTING

ANOMALOUS +67% BaO NOTED.

- SEE ATTACHED REPORT.

Supporting data must be submitted with this TECHNICAL REPORT

THE DOLLY MARBLE PROPERTY
GEOLOGICAL REPORT

CONTENTS

GEOLOGICAL REPORT
on the
DOLLY MARBLE PROPERTY

INTRODUCTION

In the fall of 1993, a significant extension of a tectonically thickened, folded, dolomitic marble segment, of the lower Cambrian age, Badshot Formation was encountered. Due to its immense size and brilliant white colour the area was staked. Two years later, this fall, a program was undertaken to ascertain the extent, dimension stone quality and other high value product potential of this marble. This program involved reconnaissance mapping on the Dolly Claims and surrounding area as well as the preparation of a face and removal of a bulk sample . This report outlines this work and the results obtained.

Acknowledgment is given to the British Columbia Government and the Ministry of Energy, Mines and Petroleum Resources for their financial assistance of PAP funding which made this report possible.

TARGET

High brightness and chemically pure **white marble** suitable for higher end market uses. This material has been found to occur within covered by the **Dolly Claim Group.**

PROPERTY NAME

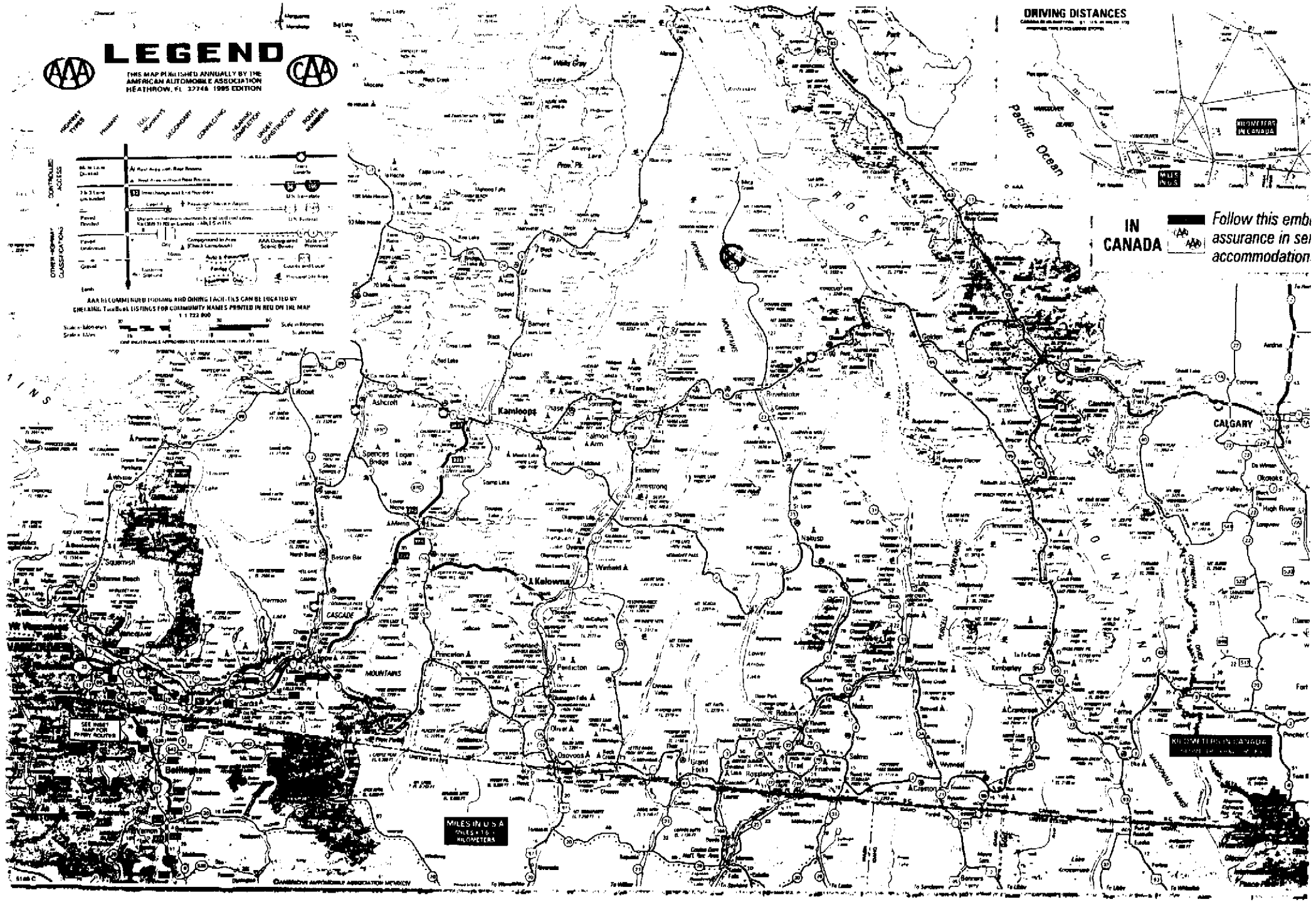
The 11 claims comprising this study area have been grouped under the name **The Dolly Claims.** The name the Dolly Marble Property refers to this same area.

LOCATION

The Dolly Marble Property is located about 100 road kilometers north of the city of Revelstoke, B.C. or more exactly, 4 kilometers east of the confluence of the Goldstream and Columbia Rivers. It is located within the Revelstoke Mining Division and is found within the Hoskins Creek map - NTS 82M/10.

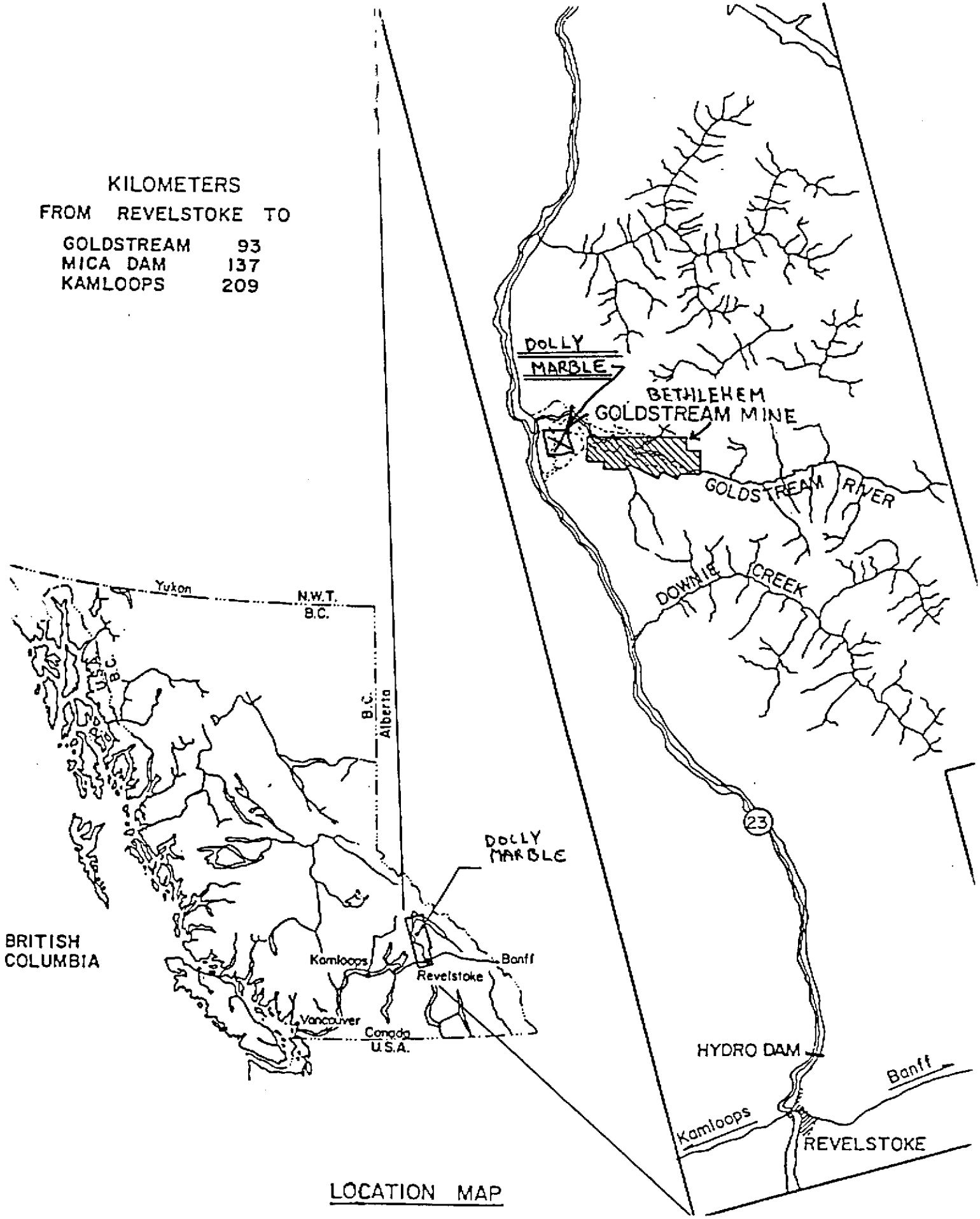
ACCESS

Two wheel drive road access to the property is obtained by driving 90 kilometers northward on Highway #23 from the intersection of the Trans Canada highway in Revelstoke, then, turning right on to Bethlehem's



MAP 1 - INDEX ROAD MAP

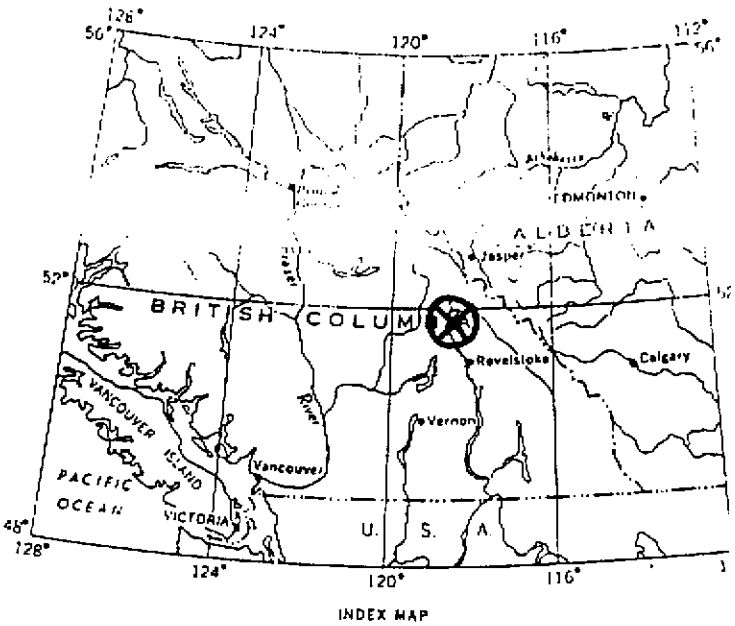
⊗ DOLLY MARBLE PROPERTY



LOCATION MAP

FIGURE #1

Map 2
LOCAL
Index Map



Scale

I——————I——————I
0 1 2 miles

I——————I——————I
0 1000 2000 metres

Reproduced from Hoskins Creek topographical map 82M/10

Map 2
LOCAL
Index Map

Goldstream mine road for about 5 kilometers then turning left along the canoe take out road for 4.1 kilometers where a recently constructed good logging road branches to the left, up the side of the hill, to the property. See attached maps 1, 2, 4 and figure 1.

CLAIM OWNERSHIP & STATUS

This property consists of 11 - 2 post mineral claims recorded in the name of Robert Gerald Komarechka, FMC#114456, of Apt. #1 537 Haig Street, Sudbury, Ontario, P3C 1E2. An unregistered 1/3 interest is held by each of Gord Hurlburt of #43 1815 Varsity Estates Dr. N.W., Calgary, Alberta, T3B 3Y7, Kory Koke of 2612 13th Ave., N.W., Calgary, Alberta, T2N 1L9 and the recorded holder. Adequate assessment work has been carried out on this property to hold all 11 claims into the year 2000. The claims comprising this property are listed below:

Tag #	Tenure #	Claim Name	Units & Type
640701	322588	DOLLY 1	1 unit 2 post mineral claim
640702	322589	DOLLY 2	1 unit 2 post mineral claim
664203	340473	DOLLY 3a	1 unit 2 post mineral claim
640708	322591	DOLLY 4	1 unit 2 post mineral claim
651299	322597	DOLLY 10	1 unit 2 post mineral claim
651300	322598	DOLLY 11	1 unit 2 post mineral claim
651301	322599	DOLLY 12	1 unit 2 post mineral claim
651302	322600	DOLLY 13	1 unit 2 post mineral claim
651303	322601	DOLLY 14	1 unit 2 post mineral claim
651304	322602	DOLLY 15	1 unit 2 post mineral claim
651305	322603	DOLLY 16	1 unit 2 post mineral claim

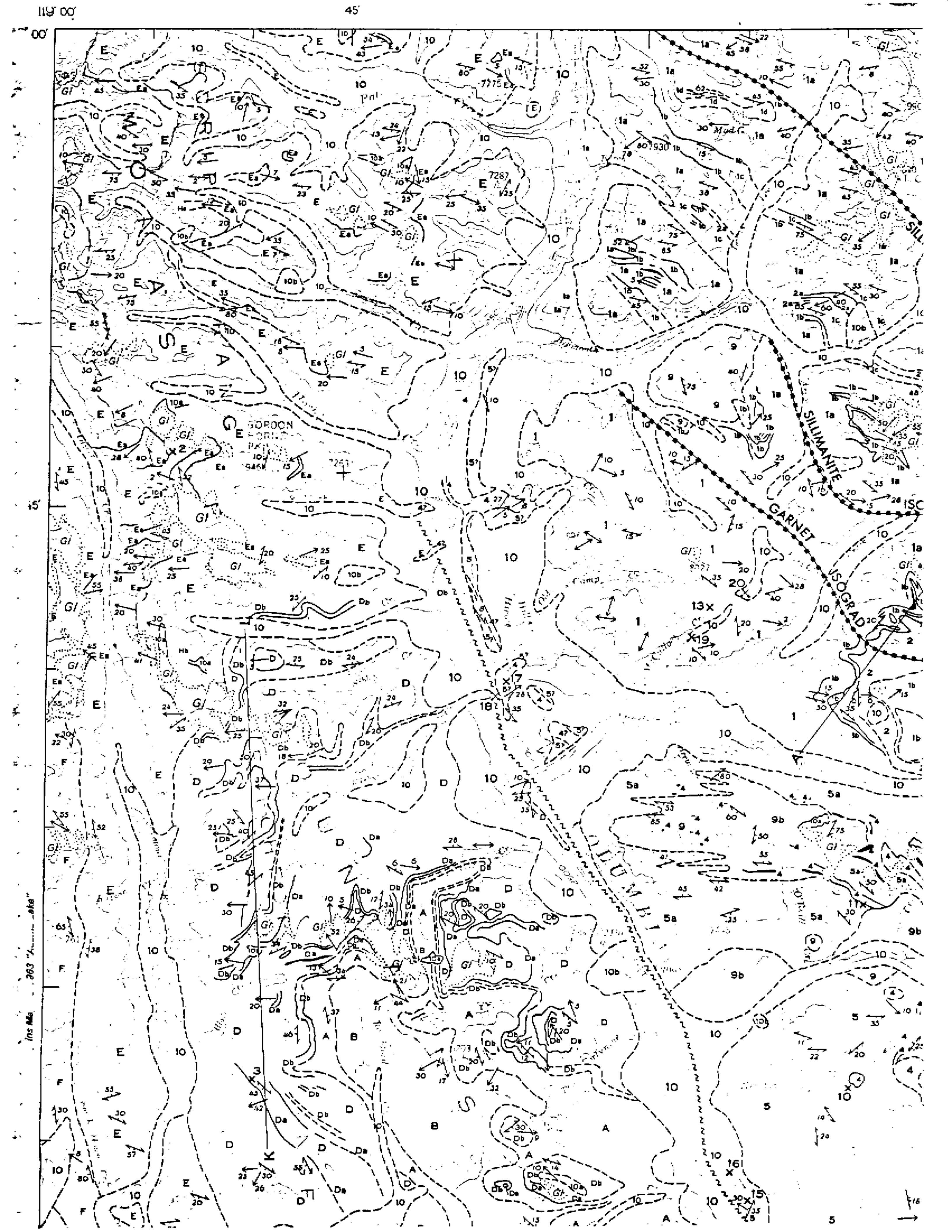
OPTIONS or CONTRACTUAL OBLIGATIONS

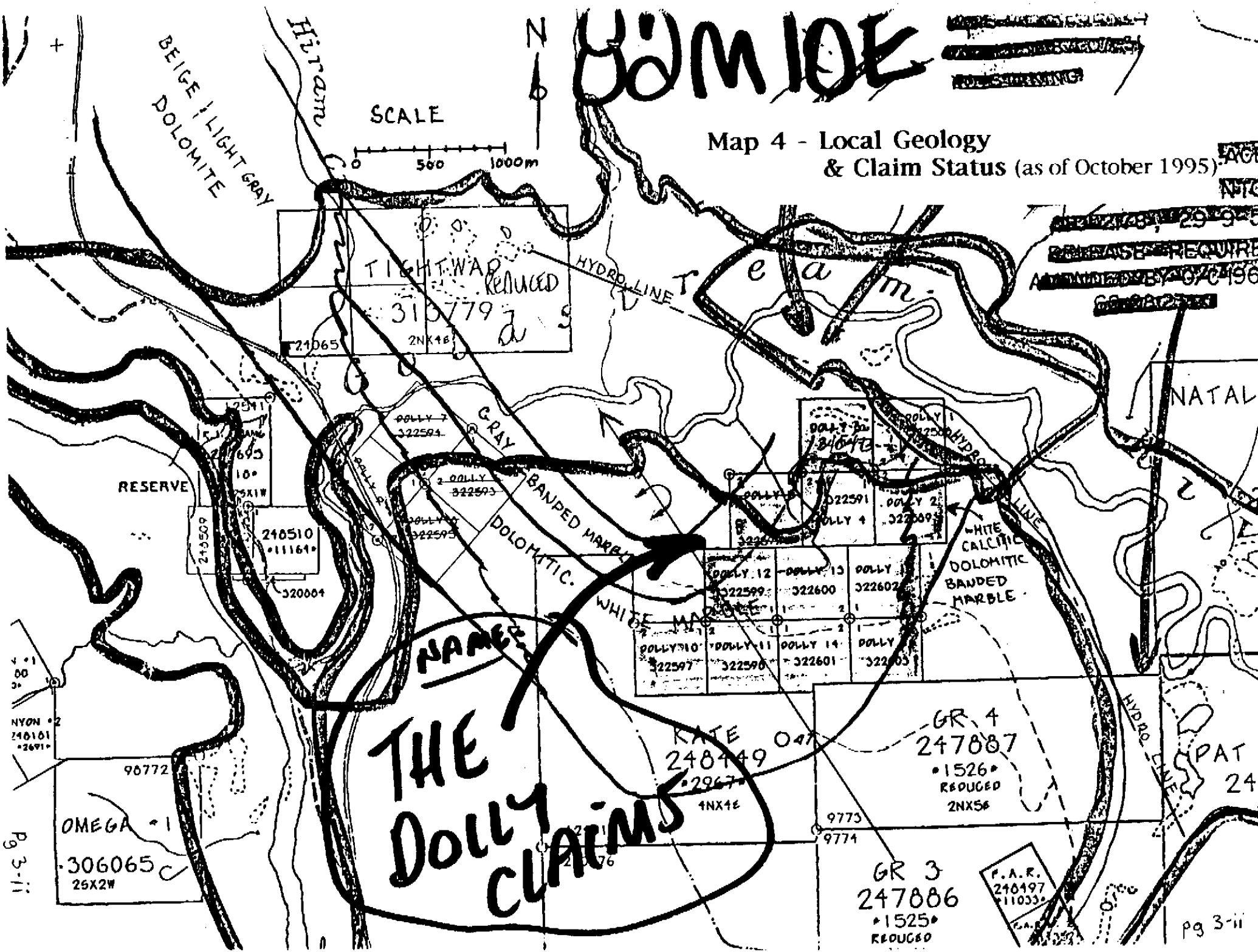
No contractual obligations exist on these claims at this time.

LOGISTICAL CONSIDERATIONS

The Dolly Marble Property is strategically positioned for ease of development. It lies on a well drained gentle slope drained by several small creeks. A good two wheel drive road and numerous 4wd trails provide easy access over most of the property. The majority of the property has also been recently logged facilitating further evaluation of this ground. A power line servicing the nearby Goldstream copper mine crosses the northeast corner of the property just as the road enters the claim group and could supply power to equipment on the site.

The Dolly Claims are located within an Integrated Management Land Use Zone. Such areas, with appropriate approvals, can accommodate intense resource development. As of this year approval for removal of a bulk sampling from this property has been given by the Land Management and


119°00'
45'
00'
15'
SILLIMANITE
GARNET ISOGRAD
GORDON HORN PARK
COLUMBIA


Map 4 - Local Geology
& Claim Status (as of October 1995)
SCALE
0 500 1000m
N
Hiram
BEIGE / LIGHT GRAY DOLOMITE
TIGHT WAP
Reduced
310779
2NX4E
21065
HYDRO LINE
Tea
RESERVE
240510
•11164•
320001
GRAY BANDED MARBLE DOLOMITIC
WHITE MARBLE
DOLLY 12
322599
DOLLY 13
322600
DOLLY 14
322601
DOLLY 10
322597
DOLLY 11
322598
WHITE CALCITIC DOLOMITIC BANDED MARBLE
NAME?
THE Dolly CLAIMS
KATE 04
248449
•2967•
4NX4E
GR 4
247887
•1526•
REDUCED
2NX5E
GR 3
247886
•1525•
REDUCED
OMEGA •1
306065
25X2W
96772
9773
9774
P.A.R.
240497
•11033•
HYDRO LINE
NATAL
PAT
Pg 3-11
Pg 3-11

Policy Branch of the Ministry of Energy, Mines & Petroleum Resources in Kamloops. A cash reclamation security deposit for this work has also been accepted on this property by the Land Management Branch.

The recent announcement of the closure of the Goldstream mine may provide an opportune moment for the acquisition of equipment and logistic facilities for the development of this property now.

REGIONAL, LOCAL & PROPERTY GEOLOGY

Regionally, the Dolly Claims are located within the western portion of the Selkirk Mountains near the contact with the Shuswap Metamorphic Complex. A fault in the bed of the Columbia River divides the Selkirks to the east from the Monashee Mountains in the Shuswap Complex to the west. The rocks in the vicinity of the claims are moderately metamorphosed (greenschist facies) with the metamorphic grade increasing in intensity to the northwest (Wheeler, 1965). Regionally, foliation tends to strike from about 270-360°. Dips vary widely depending on fault block orientation and folding. The original strike of most beds was likely from the northwest to southeast, but up to three phases of deformation (Hoy, 1979) complicates the situation.

The oldest rocks in this area are the Proterozoic and/or Lower Cambrian rocks of the Horsethief Creek Group. Lithology includes dark gray to dark brown slates and phyllites with scattered bands of quartz-mica schist, quartzite and impure marble. Limy and arenaceous bands are common near the top where the contact with the overlying Hamill Group is probably transitional. The recessive nature of this formation and the presence of rotated blocks makes identification and the determination of structural relationships difficult.

Of Lower Cambrian age and overlying the Hamill Group is the Badshot Formation. This is a persistent carbonate unit that parallels the Columbia River for several hundred kilometers as far as the south Kootenays (Wheeler, 1965). In the immediate vicinity of the Dolly Claims it is composed of snow-white to buff dolomitic marble with banded gray-white calcitic marble near its base.

Above the Badshot Formation lies the dark gray, frequently graphitic, slates and phyllites of the Lardeau Group. Schist, quartzite and thin marble stringers are known from this group but are not dominant in the map area. Within the Lardeau Group and near the contact of the Badshot lies a talc magnesite trend of pods associated with minor sulphides.

Locally the major rock type consists of a white dolomitic marble of the Badshot Formation. To the north of the local area, the Badshot narrows to an 800 meter band of darker buff to tan microcrystalline dolomite. In the vicinity of the Dolly Claims the dolomite turns to marble becoming whiter and more dense.

No trace of the southern strike continuation was found for the Badshot more than 1 kilometer to the south of the Dolly Claims. This information,

combined with strike and dip measurements, suggest a fold structure, with the Dolly Claims being staked along the eastern tectonically thickened arm of the Badshot. The western arm of this fold structure occurs along the high tension hydro line and the apex of this folded Badshot Marble lies just to the north of the Dolly Claims. It has also been suggested that this area may represent an allochthon slice of inverted stratigraphy (Read & Brown 1981). The result of these two observations suggest an inverted anticlinal structure. From field measurements it is suggested that the axis of this fold structure plunges to the north (see attached map 4).

From outcrop exposures and ripped up bedrock, made apparent by the recent logging activities in this area, it appears that almost all of the area underlain by the Dolly Claims is white dolomitic marble. This wide width (apparently 1200 meters), and the occasional presence of recrystallized coarse grained marble may suggest a tectonic thickening of the Badshot. There appears to be a variation of marble from east to west across this eastern arm. In the cleared area along the east-west claim boundary of Dolly 1 and Dolly 2 it was found that the more eastern exposures of white marble exhibited discontinuous calcitic bands with a faint fuzzy light gray veiling, while the marble exposures west of this area were an even homogeneous bright white colour exhibiting a very fine grained to microcrystalline texture. Going further westward, along the east-west claim boundary between Dolly 3a and Dolly 4, we find an area of white recrystallized medium grained brecciated dolomitic marble. Finally, westward toward the south claim boundary of Dolly 5 we find banded white and gray calcareous marble. It should be noted that these observations are based on some widely spaced outcrops as overburden cover is extensive and of variable thickness. Numerous angular rocks in the disturbed overburden confirm these general observations along other logged areas, southward up the hill, along strike.

CURRENT EXPLORATION STATUS

The current holders of the Dolly Claims, namely, Gord Hurlburt, Robert Komarechka and Kory Koke, have carried out exploration on the Badshot white dolomitic marbles in this area since 1986 and have held claims off and on along the western flank of the fold structure and northward. Assessment work on these claims (the Or Viejo Group) undertaken in the summer of 1987 and 1988 in the form of geological mapping, line cutting of a grid and geochemical analysis indicated an immense reserve in excess of 25 million tonnes of $^{+}$98% pure dolomite (Meyer, B. H., 1988). Several samples were also cut and took a high gloss when polished. An initial attempt was made to promote this occurrence but problems (with regard to title of these resources since some land had surface rights previously allocated with old timber grants, the high voltage power line right of ways and confusion regarding the staking of dolomite resources at this time of revision of the act) deterred promotion and further development, with the result these earlier claims were allowed to lapse.

As a result of the above assessment mapping, the existence of a possible fold structure with an eastern limb of white dolomitic marble was anticipated but never verified. In November of 1993 as a result of several

claims lapsing in this area, and the recent interest in dimension stone, this area was examined and found to contain extensive unmapped white dolomitic marble. The observation of this marble was made apparent primarily due to the result of clear cutting in this area. Initially a total of 12 claims were staked in this area to cover the majority of this eastern limb occurring on untitled crown land as confirmed in conversations with Phil Wellock, acting Gold Commissioner in Revelstoke and others. One of these claims, Dolly 5 was subsequently dropped in the fall of 1994 due to the marginal grades of marble occurring in the area. Dolly 3 was also dropped but subsequently staked as Dolly 3a in the fall of 1995.

Surface grab samples collected from the proposed area of bulk testing, shown on Map 5, were given to several carvers for their comments. Work continued during the 1995 field season as described on the next page to further evaluate the dimension stone and other uses of this white high grade dolomitic marble.

1995 PAP GRANT WORK PROGRAM 95/96 P148

Fieldwork in 1995 was conducted on this area during the period from September 20, 1995 to October 20, 1995.

Initially work consisted of field observations of outcrop exposures of the area which, despite examination elsewhere, occurred primarily along roads, trails and draws.

A diamond drill program that had originally been proposed had to be canceled as a result of the drill company not having any personnel available to operate a diamond drill located nearby. Expensive mob and demob charges and a limited budget prevented other drills from being brought in.

It soon became apparent from field observations of the limited rock exposures observed, that there were no obvious sites where fracture density would allow extensive surface quarrying for the production of large sound blocks. It was at this time that the original program was modified, following consent of PAP officials, to exclude surface quarrying of a sound block and to include instead the removal of a bulk sample. The purpose of this work was to produce a face about 12' high to ascertain variations in colour, texture and the fracture density at depth.

On approval of this change a 4wd backhoe was hired to strip the site which was then washed by the author. A local drilling and blasting contractor was then hired to carry out drilling with a plugger supplied by the author and other equipment and blasting supplies obtained from the nearby Goldstream mine.

About ten tonnes of blasted material was extracted, loaded into an end dump with a track excavator and transported to a cement manufacturer in Revelstoke. The market potential of this material is currently being studied for the production of precast panels, landscape stone, stucco and various

miscellaneous aggregate uses as well as various dimension stone and filler applications.

Representative grab samples collected during mapping were also sent out for analysis in November. The results of these analysis are shown in appendix #1.

The market analysis and the results of the bulk sampling are still being evaluated.

GEOLOGICAL OBSERVATIONS

A local geological map of the study area has been prepared (Map 4) showing the extent of the marble and the claim status. Variations in the marble, fracture density and orientation, sample locations and the location of the bulk sample site are shown on the Reconnaissance Geology Map (Map 5).

From these maps, despite limited exposures of outcrop (especially within forested regions), it appears that the Dolly claims are primarily underlain by part of the axis and eastern limb of a fold of the Badshot Formation. This was confirmed not only by surface outcrop observations but by numerous angular rocks of solely marble composition being contained within the soil and exposed by both road building and logging operations. Discussions of soil borings undertaken by Silvatech crews in the southern portion of the Dolly Claims also confirmed the presence of this marble in overburden areas.

To the south of this fold the Badshot formation lies on the steeply northward dipping phyllitic and carbonaceous argillitic Lardeau Formation, while to the north of the northern plunging fold and lying above its synformal (actually an overturned anticline) plunge, is the Horseshoe Formation (minor remnants of rusty brown quartzite, possibly Hamill Formation were also encountered along the Badshot-Horseshoe contact outside the map area). Both of these adjacent formations weather recessively relative to the Badshot.

The contact with the later Lardeau Formation was not observed in outcrop within the study area but appears to be rather abrupt. In some areas here is a tendency for the Badshot to develop a yellow to brown weathered iron carbonate near the contact. One spring occurring along this contact was found to be precipitating copious quantities of some reddish brown iron precipitate (possibly FeOH).

The lower Badshot Formation towards the contact with the earlier Horseshoe Formation becomes a banded gray and white calcitic marble with frequent inclusions of schistose and phyllitic rocks. This rock tends to weather recessively and generally appears to be unsuitable for most higher valued dimension stone and aggregate purposes due to presence of phyllitic and quartzite rich bands.

The Upper Badshot Formation on the Dolly Claims, which is the object of this study, is for the most part, a white dolomitic marble, however the following variations exist.

Adjacent to the banded gray calcitic lower Badshot on claim Dolly 3a we have a highly brecciated mottled grayish white dolomitic marble. This brecciation was highly fragmented with fragments ranging in size from 1/4" to several inches in size. On tracing its extent southward it would appear that this breccia zone may represent a structure parallel to the apex of the fold structure. In several locations a trace of a dull dark gray acicular submetallic mineral was found interstitial to the dolomitic breccia fragments. On weathering this mineral developed a sulphur yellow colour.

Going eastward from this location across the eastern limb of the fold we encounter a very fine grained, massive, brilliantly white, dolomitic marble. It is this rock type that is perhaps the most intriguing and was the object of the bulk sample. This marble variety is also the most common variety found throughout the Dolly Claims, apparently representing more than 75% of the land area of these claims.

Generally in the areas of exposed outcrop there appeared to be limited areas of unfractured areas suitable for the production of large dimension stone blocks, however the fractures that did exist were frequently well defined along specific local directions. Two major orientation of steeply dipping conjugate fractures were noted within this area. In some areas one set was prominent while the other predominated in other locations. The direction of draws and their major direction changes correspond to the predominance of one fracture set over the other in different areas.

Also found within the above zone are some local areas of brecciation. These lensoid areas of brecciation (generally only a few meters wide and possibly tens of meters long) appear to run more or less parallel to the axis of the assumed fold structure. This brecciation consists of fragments about 1 cm in size and smaller and in appearance resembles a white terrazzo. Compositionally both matrix and fragments are dolomitic with some areas of the matrix being more calcitic. This breccia generally weathers recessively and was easily eroded just by the washing. Occasionally a bright orange hematitic stain was found infilling some fractures less than 1/16" thick. Unusual high barium contents (up to 6.3%) has been noted in some samples found in the vicinity of these areas.

The last unit along the eastern side of the limb consists of intercalated irregular wispy bands of calcite and dolomite. This unit becomes progressively calcitic going eastward until the contact is reached where substantial thick bands of white calcitic marble are found. Frequently this mixed calcitic-dolomitic unit contains faint gray veiling more or less parallel to the strike of the formation. The presence of calcite was determined in the field by its strong effervescent reaction to a 10% HCl solution, its coarser crystalline structure and its unique recessive rhombohedral weathering pattern on exposed surfaces. This unit appears to be the soundest for the production of large blocks, however extensive overburden, compositional and textural variations prevented adequate evaluation.

A general observation was that while the dolomitic marble deformed in a brittle manner along preferred planes in response to strain, the calcitic marbles deformed plastically with only minor fracturing.

Representative sample types of the above rocks were collected and described in appendix 2 their assay results are shown in appendix 1. It should be noted that these samples are representative of type not content. The majority of rocks on this property were of the white uniform nondescript dolomitic marble with MgO contents in the 20-21% range.

RESULTS OF BULK SAMPLING

As a result of the preparation of a face about 3m high and 5.5m wide and the production of 220 tonnes of fragments from a blast, the following was observed:

1) On the face of the blast a minor group of faint light gray diffuse bands up to 20 centimeters wide were observed. These bands were noted on surface at this site and did not appear to be observed elsewhere in the bright white unit. It is believed these darker bands may be related to the presence of minor carbon in the form of graphite. Despite the presence of these occasional off-white bands the blasted dolomite aggregate still retained a bright white colour.

2) Two sets of conjugate fractures were observed at this location. The prominent fractures in this area strike at 33° and dip at 70°E while the secondary set of fractures were relatively obscure striking at 158° and dipping 80°W. Fractures observed on surface were reduced in number with depth, those still present at depth exhibiting the same orientation as on surface. For example for the first 5' down open fractures were parallel at 2-6" apart. From a 5'-10' depth fractures were less frequent. While below 10' fractures were hairline and occurred at an average 1' 6" apart. Often these hairline fractures were sealed with orange calcite (hematitic stained). It is interesting to note that the fracture planes are generally hairline cracks exhibiting smooth planar faces varying from 0.1 meter apart in some areas on surface to over 1 meter apart. These smooth fracture surfaces could facilitate the production of ashlar, lintels, patio stones etc. (see photos).

3) Some brecciated samples taken from a nearby zone at this site (see appendix #1) indicate an anomalous high concentration of barium (over 6%).

The technical and procedural details of the drilling and blasting are outlined in the technical blasting report in appendix 3. Photos of the site preparation, stripping and blast and results are shown in the photo album in the back pocket.

CONCLUSION

Although limited outcrop exposure did not reveal any extensive areas of sound material suitable for the production of large blocks of dimension stone this does not preclude the possibility that such sites may exist in overburden covered areas.

From the work conducted to date, a substantial area (covering approximately 175 Ha on the Dolly Claims) of bright white dolomitic, exists, to consider the viability of production of some forms of dimension stone, fillers and possibly aggregate. The predominance of smooth parallel planar fracture planes in the brilliantly white dolomitic marble would facilitate the economic removal of this material which could have application for exterior building cladding such as ashlar, flagstone and lintels. Landscape stone and patio blocks are some other dimension stone applications. The production of a white aggregate for terrazzo, stucco, agglomerated tiles, split concrete blocks and precast concrete are other possibilities.

Other high value markets to be investigated for the whitest material found in this area could include fillers for plastics, and cultured marble.

The high concentration of magnesium in this marble and its great extent, as well as recent Japanese patents in the extraction of MgO and CaO from Dolomite (see the Industrial Mineral Magazine article in appendix 4, and the availability of relatively cheap hydroelectricity generated nearby, may offer advantages for the production of magnesium metal and chemically precipitated $CaCO_3$.

Agricultural and acid mine waste neutralization are some other uses for lower grades of dolomite (see article in appendix 4).

The existence of barite anomalies associated with several highly brecciated areas on this property may suggest the possibility of Mississippian Valley Type Mineralization nearby.

Further evaluation of this property is recommended in the form of diamond drilling with infill percussion drilling and chip analysis to confirm uniformity, fracture density, brightness, chemical purity and tonnage at depth. Additional bulk sampling and further testing for specific end uses would also be required.

REFERENCES

British Columbia Ministry of Energy, Mines and Petroleum Resources, Focus on Industrial Minerals, Issue 2, Vol. 2, Summer 1995.

Business Week Magazine, September 9, 1988, Burning Question: How to Clean Up Coal's Act.

Carr, Donald D., 1994. Industrial Minerals and Rocks 6th Edition, Society for Mining, Metallurgy and Exploration Inc., Littleton, Colorado.

Fischl, Peter S., 1991, Limestone & Dolomite Resources of British Columbia, B. C. Ministry of Energy, Mines and Petroleum Resources, Open File Report.

Harben, Peter, W., 1995, The Industrial Minerals HandyBook 2nd Edition, Industrial Minerals Division, Metal Bulletin PLC, London, United Kingdom.

Hoy, T, 1979. Geology of the Goldstream Area. British Columbia Ministry of Energy, Mines And Petroleum Resources, Bulletin #71.

Hurlburt, G. C., Koke, K., R., Meyer, B., H., 1988. The Oro Viejo Group, Revelstoke Mining Division. Assessment Report submitted to the British Columbia Ministry of Energy Mines and Petroleum Resources, November 15, 1988.

Industrial Minerals Magazine, December 1994, Patent Abstracts, Recovering Magnesium From Dolomite.

Keevil, Gordon A., 1977. Exploration Report of the Big Bend Claims, British Columbia assessment files, reference #06176.

Komarechka, Robert G., 1987. Geological Report of The Oro Viejo Claims, Revelstoke Mining Division. Assessment Report submitted to the British Columbia Ministry of Energy, Mines and Petroleum Resources, Nov. 30, 1987.

Lane, L. Brown, R. L. and Hoy, T., 1977., Geology of the Goldstream River - Downie Creek Area, Southeastern British Columbia. Preliminary Map #25, British Columbia Ministry of Energy Mines and Petroleum Resources.

Read, P. B., and Brown, R. L., 1981. Columbia River Fault Zone: Southeastern Margin of the Shuswap and Monashee Complexes, Southern British Columbia, Canadian Journal of Earth Science Vol. 18, 1981.

United States Bureau of Mines, 1975, Mineral Facts and Problems, 1975 edition by the Staff bureau of Mines United States Department of the Interior.

Wheeler, J. O., 1965, Big Bend Map Area, British Columbia. Geological Survey of Canada, Paper #64-32.

CERTIFICATE

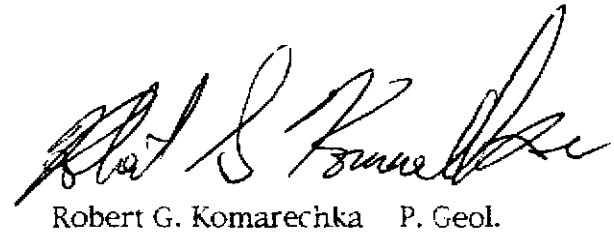
I, Robert G. Komarechka, of the City of Sudbury, in the Province of Ontario hereby certify as follows:

1. That I am a consulting geologist currently residing in Sudbury.

2. That I am a graduate, B.Sc.. Geology major, of Laurentian University of Sudbury, Ontario, a registered professional geologist in the Province of Alberta affiliated with the Canadian Council of Professional Engineers, and that I have been practicing my profession for thirteen years.

3. That I have an interest in the properties.

4. That this report is based on a personal review of provincial, federal and some assessment reports as well as interpretation of field observations undertaken over the fall of 1995.



Robert G. Komarechka P. Geol.

Dated at Sudbury, Ontario, this 13th day of January, 1996.

APPENDICES

APPENDIX 1

Assay Results

[illegible] 852 E. HASTINGS ST. VANCOUVER BC V6A 1R6 PHONE (604) 253-3158 FAX (604) 253-1716

WHOLE ROCK ICP ANALYSIS

Robert Komarechka File # 95-4216

Apt. #1 - 537 Haig St., Sudbury ON P3C 1E2

SAMPLE#	SiO2 %	Al2O3 %	Fe2O3 %	MgO %	CaO %	Na2O %	K2O %	TiO2 %	P2O5 %	MnO %	Cr2O3 %	Ba ppm	Ni ppm	Sr ppm	Zr ppm	Y ppm	Nb ppm	Sc ppm	LOI %	SUM %
D1	.62	.15	.14	21.24	29.94	.06	<.04	<.01	.07	.02	.004	10	10	72	<10	<10	<10	<10	46.4	98.69
D2	.30	.05	.14	21.75	30.27	.04	<.04	<.01	.06	.01	.003	154	<10	159	<10	<10	<10	<10	46.3	98.99
D3	2.21	.63	.35	20.28	28.80	.06	.17	.01	.13	.02	.009	119	<10	80	<10	<10	<10	<10	45.3	98.00
D4	2.14	.61	.27	8.79	43.12	.14	.06	.03	.07	<.01	.005	30	<10	174	22	<10	<10	<10	43.3	98.57
D5	.79	.21	.11	2.24	52.67	.05	<.04	<.01	.04	.01	.004	75	11	1133	<10	<10	<10	<10	43.2	99.50
D6	.36	.09	.17	20.74	31.31	.06	<.04	<.01	.09	.01	.008	9	21	149	<10	<10	<10	<10	46.4	99.28
D7B	.98	.23	.30	19.99	31.03	.11	.04	.01	.08	.01	.005	715	<10	131	<10	<10	<10	<10	45.7	98.62
D7G	.38	.08	.14	21.52	30.78	.07	<.04	<.01	.10	.01	.006	98	<10	79	<10	<10	<10	<10	46.5	99.63
D7W	.34	.07	.12	18.86	30.75	.06	<.04	<.01	.08	.01	.007	17777	15	164	<10	<10	<10	<10	45.3	98.66
D7X	.42	.09	.08	12.57	34.74	.08	<.04	<.01	.01	.01	.008	62863	<10	387	<10	<10	<10	<10	40.8	99.57
D7VG	1.02	.25	.22	18.45	32.89	.12	.04	<.01	.09	.01	.006	8694	10	131	<10	<10	<10	<10	45.0	99.59
D8	.51	.11	.16	21.67	30.37	.08	<.04	<.01	.11	.01	.008	2495	<10	262	<10	<10	<10	<10	46.1	99.62
D9	.54	.09	.15	21.25	29.85	.09	<.04	<.01	.11	.01	.005	812	11	135	<10	<10	<10	<10	46.4	98.68
D10	.45	.08	.20	21.21	30.46	.09	<.04	<.01	.09	.02	.005	1401	<10	121	<10	<10	<10	<10	46.3	99.18
D11	.28	.04	.25	21.55	30.11	.10	<.04	<.01	.08	.03	.005	426	<10	59	<10	<10	<10	<10	46.7	99.25
RE D11	.28	.05	.25	21.42	29.91	.09	<.04	<.01	.09	.03	.005	425	<10	59	13	<10	<10	<10	46.7	98.93
RRE D11	.28	.05	.23	20.65	29.91	.10	<.04	<.01	.10	.03	.006	4536	<10	84	<10	<10	<10	<10	46.5	98.67
~~D4wd~~	~~2.33~~	~~.15~~	~~.08~~	~~8.86~~	~~43.78~~	~~.09~~	~~.04~~	~~.01~~	~~.07~~	~~<.01~~	~~.004~~	~~95~~	~~22~~	~~228~~	~~<10~~	~~<10~~	~~<10~~	~~<10~~	~~43.6~~	~~98.98~~
STANDARD SO-15	48.37	12.71	7.18	7.20	5.85	2.39	2.16	1.60	2.87	1.38	1.046	2193	94	385	763	18	17	<10	5.9	99.20

.200 GRAM SAMPLES ARE FUSED WITH 1.2 GRAM OF LIBO2 AND ARE DISSOLVED IN 100 MLS 5% HNO3. Ba IS SUM AS BaSO4 AND OTHER METALS ARE SUM AS OXIDES.
- SAMPLE TYPE: ROCK Samples beginning 'RE' are Reruns and 'RRE' are Reject Reruns.

DATE RECEIVED: OCT 20 1995 DATE REPORT MAILED: Nov 16/95 SIGNED BY. . . . . D.TOYE, C.LEONG, J.WANG; CERTIFIED B.C. ASSAYERS

ACME LYTTE LAB. ...TORIES LTD. 852 E. HASTINGS ST. VANCOUVER BC V6A 1R6 PHONE(604)253-3158 FAX(604)253-1716

GEOCHEMICAL ANALYSIS CERTIFICATE

Robert Komarechka File # 95-4216R

Apt. #1 - 537 Haig St., Sudbury ON P3C 1E2

SAMPLE#	Mo ppm	Cu ppm	Pb ppm	Zn ppm	Ag ppm	Ni ppm	Co ppm	Mn ppm	Fe %	As ppm	U ppm	Au ppm	Th ppm	Sr ppm	Cd ppm	Sb ppm	Bi ppm	V ppm	Ca %	P %	La ppm	Cr ppm	Mg %	Ba ppm	Ti %	Al %	Na %	K %	W ppm	Zr ppm	Sn ppm	Y ppm	Nb ppm	Be ppm	Sc ppm
D1	<2	2	<5	3	<.5	<2	<2	137	.10	<5	20	<4	<2	63	<.4	<5	<5	9	21.10	.005	2	3	11.13	5	<.01	.05	.02	<.01	<4	<2	2	<2	2	<1	<1
D2	<2	<2	<5	2	<.5	<2	<2	89	.07	<5	16	<4	2	140	<.4	<5	<5	2	21.37	.010	<2	<2	11.44	150	<.01	.01	.01	<.01	<4	<2	2	<2	<2	<1	<1
D3	<2	5	6	5	<.5	<2	<2	132	.24	5	14	<4	<2	72	<.4	<5	<5	3	20.88	.024	<2	9	11.01	118	<.01	.30	.02	.13	<4	<2	<2	2	<2	<1	<1
D4	<2	4	<5	4	.5	3	<2	31	.11	<5	16	<4	<2	147	<.4	<5	<5	2	32.32	.013	4	3	4.58	17	<.01	.26	.07	.03	<4	<2	<2	3	<2	<1	<1
D5	<2	2	<5	5	<.5	<2	<2	66	.04	<5	14	<4	<2	907	<.4	<5	<5	2	38.23	.007	4	<2	1.05	67	<.01	.08	.01	.02	<4	<2	<2	3	<2	<1	<1
D6	<2	<2	<5	6	<.5	<2	<2	71	.09	<5	22	<4	2	126	<.4	<5	<5	2	21.20	.009	<2	<2	10.58	8	<.01	.03	<.01	<.01	<4	<2	<2	<2	<2	<1	<1
D7B	<2	9	<5	6	<.5	<2	<2	65	.11	<5	18	<4	2	111	<.4	<5	<5	2	20.90	.010	<2	<2	10.36	228	<.01	.04	.01	<.01	<4	<2	<2	<2	<2	<1	<1
D7G	<2	2	<5	8	<.5	3	<2	68	.06	<5	19	<4	2	65	<.4	<5	<5	<2	20.27	.013	<2	<2	10.81	55	<.01	.02	.01	<.01	<4	<2	2	<2	<2	<1	<1
D7M	<2	3	<5	5	<.5	<2	<2	49	.08	<5	20	<4	<2	131	<.4	6	<5	<2	20.51	.008	<2	<2	9.78	6513	<.01	.03	<.01	.01	<4	<2	<2	<2	<2	<1	<1
D7X	<2	3	<5	2	<.5	<2	<2	42	.04	<5	21	<4	<2	253	<.4	8	<5	<2	23.14	.006	<2	<2	6.47	7571	<.01	.03	<.01	.01	<4	<2	<2	2	<2	<1	<1
D7VG	<2	13	<5	6	<.5	<2	<2	67	.13	<5	16	<4	2	104	<.4	<5	<5	2	21.45	.016	2	3	9.46	5447	<.01	.11	.03	.02	<4	<2	<2	2	<2	<1	<1
D8	<2	4	8	29	<.5	<2	<2	92	.09	<5	12	<4	<2	224	<.4	<5	<5	<2	20.25	.010	<2	<2	10.96	2266	<.01	.04	.01	.01	<4	<2	<2	<2	<2	<1	<1
D9	<2	7	13	25	<.5	<2	<2	71	.09	<5	15	<4	2	123	<.4	<5	<5	<2	20.10	.008	<2	<2	10.92	851	<.01	.04	.01	<.01	<4	<2	<2	<2	<2	<1	<1
D10	<2	5	8	13	<.5	<2	<2	141	.10	<5	15	<4	<2	97	<.4	<5	<5	<2	19.96	.008	<2	2	10.72	711	<.01	.03	.01	.01	<4	<2	2	<2	<2	<1	<1
D11	<2	8	<5	9	<.5	<2	<2	203	.14	<5	15	<4	<2	50	<.4	<5	<5	4	19.40	.008	<2	2	10.71	381	<.01	.01	.01	<.01	<4	<2	2	<2	<2	<1	<1
RE D11	<2	8	<5	11	<.5	<2	<2	202	.14	<5	14	<4	<2	51	<.4	<5	<5	3	19.54	.008	<2	2	10.81	379	<.01	.01	.01	<.01	<4	<2	2	<2	<2	<1	<1
RRE D11	<2	4	<5	9	<.5	<2	<2	173	.12	<5	16	<4	<2	72	<.4	<5	<5	3	19.81	.008	<2	<2	10.56	4118	<.01	.02	.01	<.01	<4	<2	<2	<2	<2	<1	<1
~~DU-1~~	~~<2~~	~~2~~	~~<5~~	~~<2~~	~~<.5~~	~~<2~~	~~<2~~	~~24~~	~~.04~~	~~<5~~	~~13~~	~~<4~~	~~<2~~	~~181~~	~~<.4~~	~~8~~	~~<5~~	~~2~~	~~30.06~~	~~.002~~	~~4~~	~~<2~~	~~4.38~~	~~75~~	~~<.01~~	~~.06~~	~~.02~~	~~.03~~	~~<4~~	~~<2~~	~~<2~~	~~2~~	~~<2~~	~~<1~~	~~<1~~
STANDARD CT	21	54	37	128	5.7	75	31	1128	4.41	29	27	5	43	234	16.8	15	14	106	1.21	.115	39	102	1.22	909	.33	7.03	1.63	1.93	22	54	17	11	11	1	15

ICP - .250 GRAM SAMPLE IS DIGESTED WITH 10ML HCLO4-HNO3-HCL-HF AT 200 DEG. C TO FUMING AND IS DILUTED TO 10 ML WITH DILUTED AQUA REGIA. THIS LEACH IS PARTIAL FOR MAGNETITE, CHROMITE, BARITE, OXIDES OF AL, ZR & MN AND MASSIVE SULFIDE SAMPLES. AS, CR, SB, AU SUBJECT TO LOSS BY VOLATILIZATION DURING HCLO4 FUMING.

- SAMPLE TYPE: ROCK PULP Samples beginning 'RE' are Reruns and 'RRE' are Reject Reruns.

DATE RECEIVED: JAN 9 1996 **DATE REPORT MAILED:** Jan 12/96 **SIGNED BY.** C. Leong .D.TOYE, C.LEONG, J.WANG; CERTIFIED B.C. ASSAYERS

APPENDIX 2

Sample Descriptions

SAMPLE DESCRIPTIONS

D1 - **Dolomitic Marble** - cream tan white, very finely crystalline, massive.

D2 - **Dolomitic Marble** - cream white, very finely crystalline, massive, as above but with whiter colour, also some white calcite veining nearby.

D3 - **Dolomitic Marble** - light grayish white with white, mixed very finely crystalline and medium crystalline, massive, trace muscovite, arcuate surfaces on medium sized crystal cleavage surfaces, trace hemitite.

D4 - **Calcitic Marble mixed with some Dolomitic Marble** - white, with faint light grey streaks, very fine crystalline, massive.

D5 - **Calcitic Marble** - white, medium crystalline, massive.

D6 - **Dolomitic Marble** - cream white, very finely crystalline, massive.

D7B - **Breccia** - terrazzo-like, cream white, fragments, up to 1/2" in size, composed of very finely cystalline, angular, massive, **dolomitic marble**, cemented in part with calcite, very crumbly, minor orange hematitic stained veinlets. Assay shows anomalous barite.

D7G - **Dolomitic Marble** - slightly grey, very finely crystalline, massive.

D7VG - **Dolomitic Marble** - medium gray, very finely crystalline, massive. This was the darkest gray sample found within one of the diffuse gray bands found within the bulk sample.

D7W - **Dolomitic Marble** - very white, very finely crystalline, massive, trace hemitite, assay shows 1.8% BaO.

D7X - **Dolomitic Marble** - as in D5 & D6 but with numerous coarsely crystalline, calcite veins and pin point, very soft, caramel brown crystals, possibly barite, assay shows 6.3% BaO..

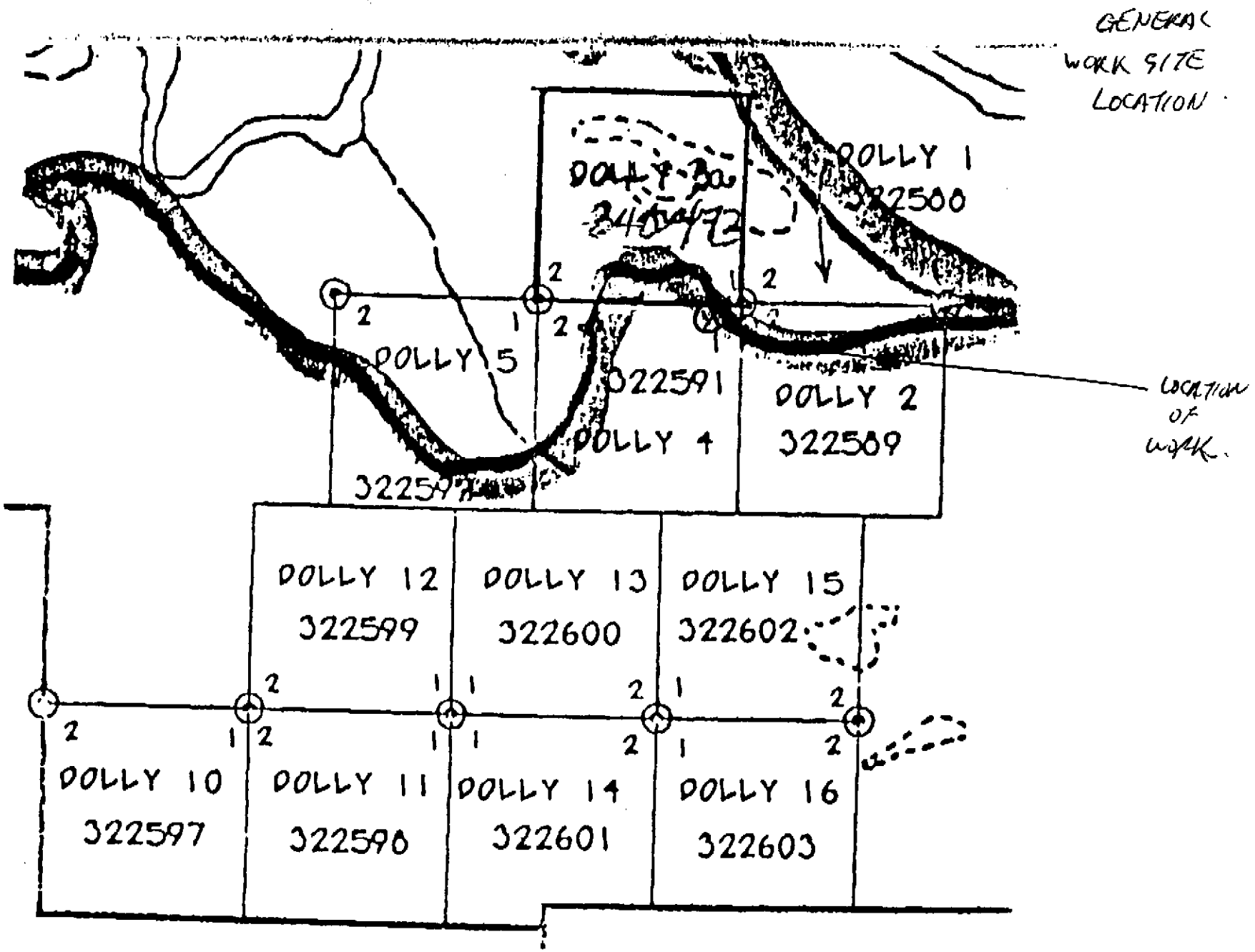
D8 - **Dolomitic Marble** - slightly cream white, very finely crystalline, massive, trace hemitite, assay shows 0.2% BaO.

D9 - **Brecciated Dolomitic Marble** - terrazzo brecciation as in 7B but more competant possible cemented with dolomite.

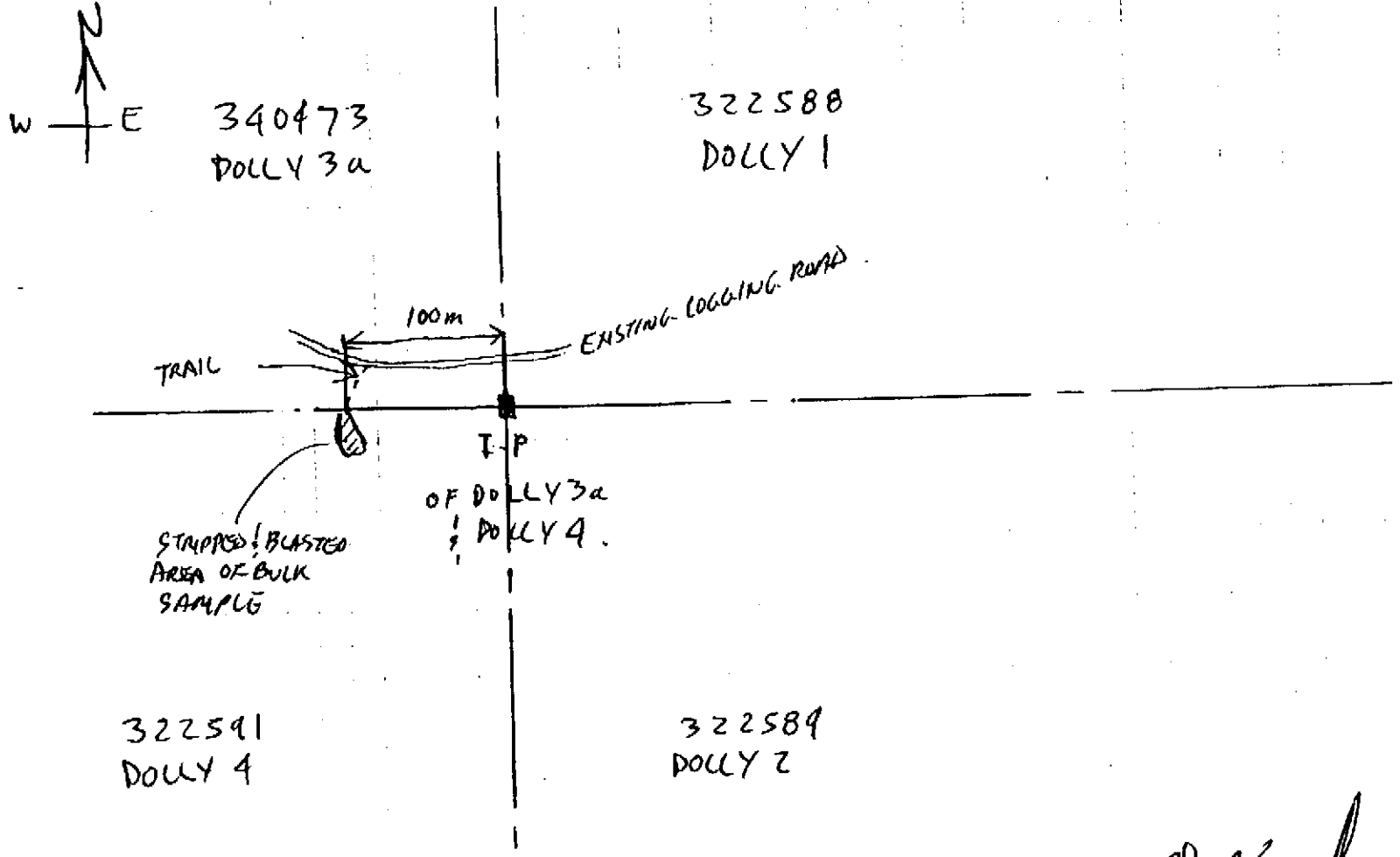
D10 - **Dolomitic Marble** - white, with very fine crystalline to medium crystalline, with arcuate surfaces have numerous irregular brown veinlets, assays show 0.1% dolomite.

D11 - **Dolomitic Marble** - cream white with fuzzy light gray mottling, occasionaly with medium crystalline arcuate crystal cleavage surface.

~~DW-1 - **Dolomitic Marble** - medium gray, graphitic, calcitic marble, with undulous boudinaged bedding, dark grey on fresh surfaces.~~


GENERAL
WORK SITE
LOCATION
DOLLY 1
322500
DOLLY 3a
344472
DOLLY 5
322591
DOLLY 4
DOLLY 2
322589
LOCATION
OF
WORK
DOLLY 12
322599
DOLLY 13
322600
DOLLY 15
322602
DOLLY 10
322597
DOLLY 11
322598
DOLLY 14
322601
DOLLY 16
322603

WORK SITE LOCATION

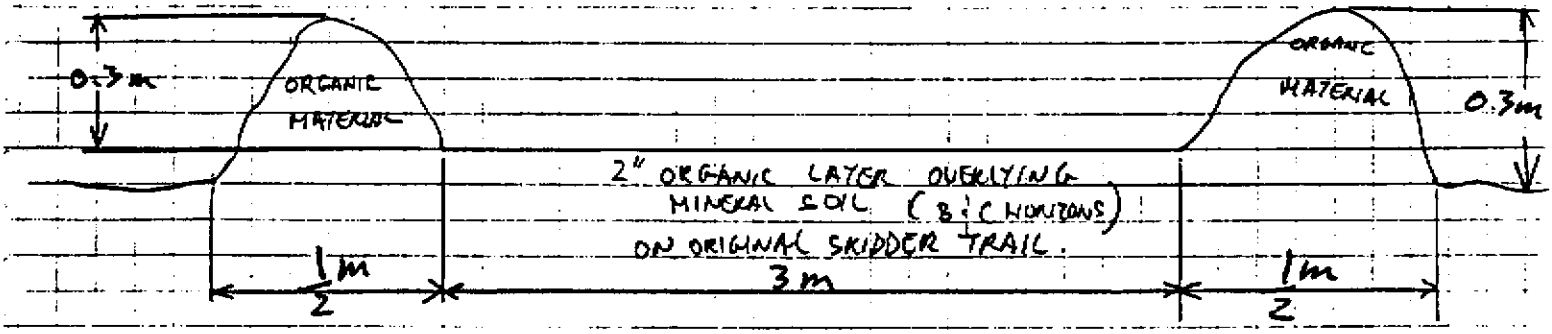


K.S. Konuk P.Geol.

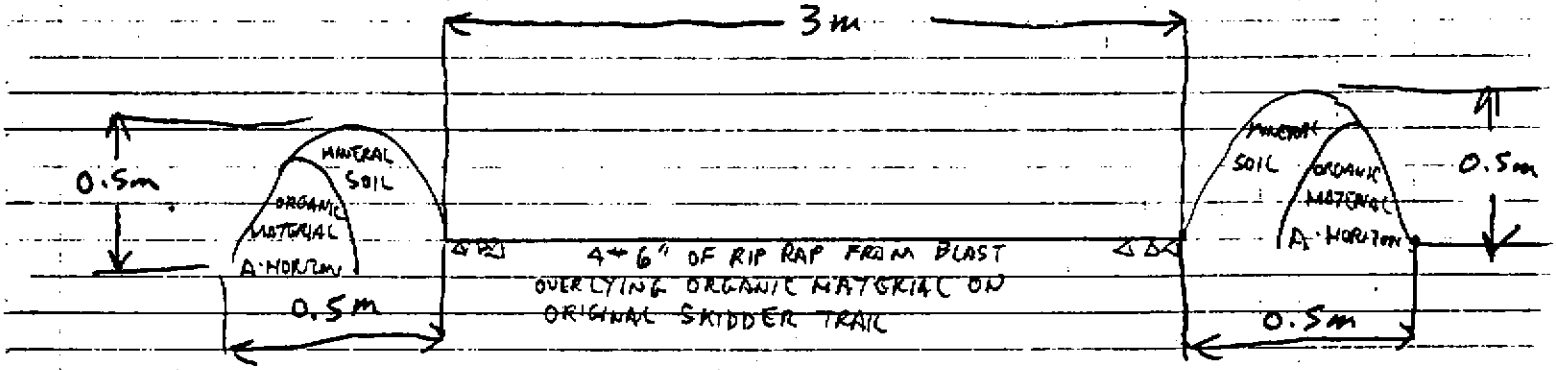
OCT 19, 1995.

TRAIL CONSTRUCTION DETAILS

LOWER PART OF TRAIL - LEVEL GROUND - CROSS SECTION



UPPER PART OF TRAIL ≈ 15° ANGLE SLOPE - CROSS SECTION.



NOTE: THE ABOVE TRAIL WAS CONSTRUCTED ON AN EXISTING SKIDDER TRAIL. SOFT ORGANIC MATERIAL WAS PUSHED ASIDE ALONG THE TRAIL FOR LATER REHAB OF THE SURFACE AND ALSO TO PERMIT A SOLID BASE FOR BULK SAMPLE REMOVAL.

ON THE STEEPER UPPER SECTION (15°) RIP RAP FROM THE BULK SAMPLE BLAST WAS SPREAD OVER THE ORGANIC MATERIAL TO PREVENT EROSION AND TO ALLOW A SOLID BASE FOR BULK SAMPLE REMOVAL. THE MATERIAL ALONGSIDE THIS UPPER SECTION CAME FROM THE BULK SAMPLE AREA AND WAS PILED TO FACILITATE REHABILITATION

CROSS DRAINAGE DITCHING WAS ALSO UNDERTAKEN WHEN WATER FLOW WAS ENCOUNTERED. (NOTE: 11cm OF RAIN OCCURRED THE NIGHT BEFORE).

AS THIS AREA WAS LOGGED IN 1992 (3 YEARS AGO) NO TREES NEEDED TO BE CUT.

APPENDIX 4

Selected Recent References

costs and an easily and quickly adjusted discharge opening. The crushers can be used in either open or closed circuits, and are suitable for both wet and dry processes. At present, there are two Rhodax models available: the Rhodax 300, with a cone diameter of 300mm, and the Rhodax 1000, with a cone diameter of 1,000mm. FCB plans to make larger models available in the future.

The shape of the crushing chamber, means that by altering the setting on the Rhodax 1000, it is possible to choose between either granulated or relatively fine products. This gives a setting range of 20-40mm at a power rating of 200kW. Overall capacity is 200 tph, with a maximum feed size of 210-250mm.

Krupp kiln for Alsen-Breitenburg

Krupp Polysius AG of Beckum, Germany, has been commissioned by Alsen- Breitenburg-und Kalkwerke GmbH of Lägerdorf, to build a 4,500 tpd kiln line for its cement production operation. Construction is expected to commence at the start of 1995, with an anticipated commission date early in 1996. The new system replaces the less cost efficient and less environmentally compatible Lepol kiln, which has been in operation at the company for over 20 years.

The main feature of the new installation is the recently developed Polro two-roller-stand kiln, which is 65 metres long and 4.8 metres in diameter. The new design kiln is driven directly by the self-aligning rollers upon which it is supported. This does away with the need for pinion and girth gear and saves on operating and maintenance costs as well as improving operating behaviour.

Other aspects of the kiln line include a Dopol '90 three stage cyclone preheater and a Prepol calciner and emission-reducing MSC multi-stage combustion system, through which the ground, dried and dedusted raw material is fed. As an environmental benefit, residual materials from other production processes can be used to replace some of the natural raw materials and fuels consumed.

Patent Abstracts

Recovering magnesium from dolomite

Magnesium oxide is recovered from dolomite in a process developed by Musashi Institute of Technology (Tokyo). The process yields MgO with a purity of 96-97% and is scheduled to be piloted next year at a dolomite mine in Kuzuu, Tochigi Prefecture.

Dolomite ($CaMg(CO_3)_2$) is first calcined at 1,000°C to give CaO and MgO. The resulting chunks are then fed into a reactor filled with water whereby the CaO is slaked to calcium hydroxide. This exothermic reaction breaks up the chunks of calcined dolomite, and most of the $Ca(OH)_2$ dissolves, leaving a fine dispersion of MgO suspended in the solution. A strongly acidic cation-exchange resin (a sulphonate) is then added to the tank where it preferentially adsorbs the calcium ions. The MgO powder, comprising particles with diameters of 20-30nm, can then be separated from the Ca-containing resin beads, with typical diameters of 0.5mm, using a sieve. In tests, 15kg of resin are needed to treat 800 grammes of dolomite.

The ion-exchange resin can be regenerated around 450-500 times, using 10% hydrochloric or sulphuric acid. The resulting calcium is recovered from solution as a fine powder via evaporation. Although cost analyses have yet to be carried out, the new route is expected to be much cheaper because dolomite typically contains 20% MgO, compared with 0.2% in seawater from which MgO is commonly recovered. IM

ENERGY

BURNING QUESTION: HOW TO CLEAN UP COAL'S ACT

At stake is who will get $525 million in federal R&D funds

Most years, the Energy Dept. doles out support for energy research—a few million dollars here and several million there—and hardly anyone ever squawks. But this year the agency will need the wisdom of Solomon to avert a barrage of criticism.

Perhaps as soon as this month, Energy will announce how it plans to divvy up the kitty for research on ways to clean up coal's act. Up for grabs is a staggering $525 million, the first big dip into the five-year, $2.5 billion clean-coal program created by the Reagan Administration last year to placate Canada, which blames emissions from Midwest power plants for an alarming increase in acid rain.

No one disputes the critical need to find ways to render coal gentler on the environment. But the various parties disagree vehemently over priorities. The utility and coal industries want to plow most of the money into so-called repowering technologies: new methods of generating power from coal that would not only reduce air pollution but also boost power-plant efficiency. The hitch is that they won't be ready for a decade or so.

That's too long for environmentalists and some members of Congress. They demand quicker action on acid rain. And concerns over the greenhouse effect and its threat to the global climate can only compound their sense of urgency. New combustion techniques are important for the long term, admits Representative Philip R. Sharp (D-Ind.), chairman of the House energy & power subcommittee, "but we want to make sure they are doing something with retrofit technologies, too."

TICKED OFF. The environmentalist agenda calls for major funding of new pollution-control equipment that could be installed on existing generators. Within just three years, proponents assert, such retrofit hardware could be curbing the sulfur and nitrogen emissions that contribute to acid rain. For example, one approach injects sulfur-absorbing limestone into furnaces. It promises to trim sulfur dioxide by up to 60%. The concept is being tested by McDermott Inc.'s Babcock & Wilcox Co. and the Environmental Protection Agency.

Although Energy is supporting that work with an $8 million grant, environmentalists are ticked off that most of last year's initial round of contracts went to repowering projects. To John L. McCormick of Greenpeace, focusing on new power-generation methods at the expense of pollution-abatement research subverts the intent of the clean-coal program. "Suddenly," he says, "repowering is the tail that's wagging the dog."

To reduce sulfur and nitrogen emissions over the past decade, the utilities have already spent more than $60 billion on scrubbers, which clean combustion gases before they are vented. Perversely, because scrubbers cause an 8% to 17% dip in efficiency, utilities must burn more coal to produce the same output—and that spews out more carbon dioxide. Before this, utilities haven't even thought about limiting carbon dioxide emissions. "The idea of scrubbing for carbon dioxide is a new one," says W. S. "Pete" White, chairman of American Electric Power Co. in Columbus, Ohio.

The utilities and coal companies successfully fended off recent calls for more stringent controls, but once President Reagan departs and Senator Robert C. Byrd (D-W. Va.) steps down as majority leader, the likelihood of expensive new regulations will increase. But utilities will point to an Energy Dept. study last year. It concluded that repowering technologies could, by 2010, reduce acid-rain-related emissions further and at substantially less cost than better smokestack controls.

One front-running candidate is the prototype plant operated by Southern California Edison Co. It converts coal into a synthetic gas that is then used to fuel a gas-fired steam turbine. Energy researchers estimate the process could slash sulfur-dioxide emissions by 95% to 99% and nitrogen oxide by up to 40%.

American Electric Power is pioneering an approach based on a new "fluidized-bed" furnace. A hot bed of limestone or dolomite is suspended on a cushion of pressurized air, and the coal is injected onto this fluidized bed. Because limestone and dolomite combine readily with sulfur, less sulfur dioxide is formed. AEP maintains that the technology could reduce sulfur emissions by as much as 95%—vs. 90% with scrubbers—and do it more cheaply.

When it comes time to hand out the money, Energy may figure the expedient decision is to slice it down the middle. But unless the greenhouse issue cools off before the next round of funding comes along, things could get dicier. And carbon dioxide emissions may pose the toughest challenge yet.

By Dennis Melamed in Washington

TURNING COAL INTO GAS: GASIFICATION MAY LET UTILITIES CUT SULFUR-DIOXIDE EMISSIONS BY 95%

APPENDIX 5

Photo Descriptions

PHOTO DESCRIPTIONS

Cover Page	View of white dolomtic marble remaining near the face after removal of the bulk sample
Frontpiece	View from the face looking towards the access road with blasted white dolomtic marble in the foreground. Picture was taken after the removal of the 10 ton bulk sample.
Photo 1	View from proposed work site looking toward the access road showing existing skidder trail.
Photo 2	View from proposed work site looking further along access road. Note turnaround for large trucks.
Photo 3	View from proposed work site looking east, showing logged area on hillside. All this area is underlain by white dolomitic marble. Note numerous skidder trails.
Photo 4	View from road up towards proposed work site.
Photo 5 & 6	4WD CAT 426 removing organic layer on skidder trail.
Photo 7 8 & 9	Removal of organic soil begins on bulk sample site outlined by red flagging.
Photo 10	Removal of mineral soil and loose rock.
Photo 11	Looking uphill at site after stripping.
Photo 12	Looking towards access road from site after washing outcrop.
Photo 13	Looking from road at site after washing outcrop.
Photo 14	Loading of holes prior to blasting.
Photo 15	The blast.
Photo 16	Results of blast, good fragmentation, throw of material maintained on skidder road and stripped area.
Photo 17	Close-up view of blasted material after being washed by rain.
Photo 18	Secondary blast at the face of bootleg hole, over sized material on right due to misfire of hole, Note parallel jointing on face.
Photo 19	Face after bulk sample removal & scaling of face showing remaining material on site.

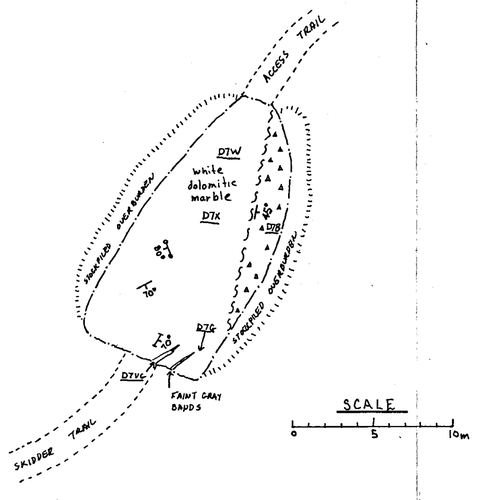
Photo 20 Photo of site after completion of work showing white aggregate on trail & cross ditching.

Photo 21 Photo from face towards road showing white dolomitic marble in foreground.

Photo 22 View on top of hill about 1.5km south of bulk sample site, showing white dolomitic marble in foreground & the Goldstream Mine Tailings Pond in the distance.

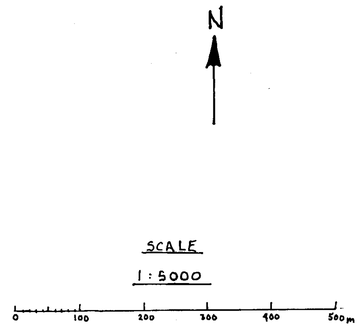
Photo 23 Looking down access road towards NE corner of Dolly 1 claim, white calcitic banded marble in the foreground. Note powerlines barely visible in the trees at the base of hill.

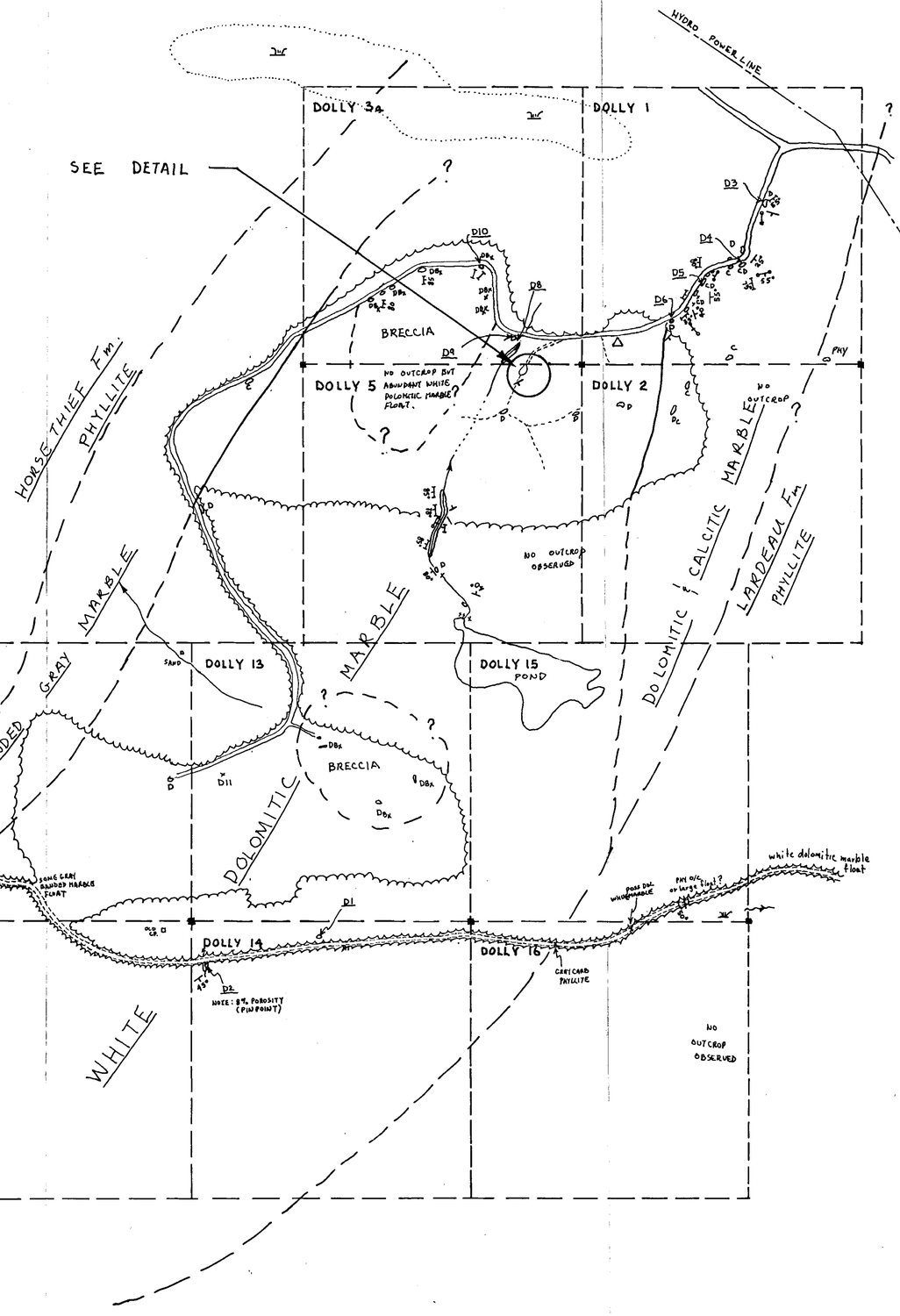
Photo 24 Another view from the face looking north with white dolomitic marble in the foreground.



DETAIL OF BULK SAMPLE AREA
AFTER STRIPPING

SCALE 1:200





LEGEND

ROCK TYPES
- D - WHITE DOLOMITIC MARBLE
- C - CALCITIC MARBLE
- DC - WHITE DOLOMITIC ¦ CALCITIC MARBLE
- DB_X - BRECCIATED MARBLE
- PHY - PHYLLITE

SYMBOLS
- D7W - SAMPLE NUMBER
- ⅄ - BEDDING
- ⅄ - PRINCIPAL JOINTING
- ⅄ - SECONDARY JOINTING
- ⩔ - SWAMP
- × - SMALL OUTCROP OR LARGE BOULDER
- ■, □ - CLAIM POST CURRENT, OLD
- △ - TREE FARM ID. POST

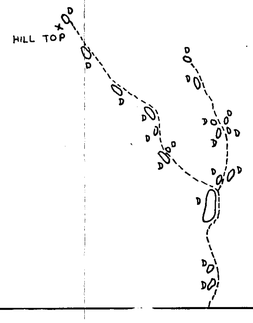
ROADS
- ‖ - 2WD ROAD
- ⁜ - 4WD ROAD
- \ - TRAIL

OTHER
- ⁂ - EDGE OF FOREST
- ⁂ - GEOLOGIC CONTACT KNOWN, INFERRED

MAP 5 - DOLLY CLAIMS

RECON. GEOLOGY, SAMPLE ¦ BULK SAMPLE LOCATIONS

Prepared by: Bob Komarechka of
BEDROCK CONSULTING
January 14, 1995



95-55

Area #2 The Scrip Ck. Dunite Occurrence

CONTENTS

The Scrip Ck Dunite Occurrence

INTRODUCTION

This report outlines the work performed on an alleged occurrence of dunite occurring in marble (shown as map unit Ha on enclosed index map - G.S.C. map #12-1964, accompanying G.S.C. paper 64-32). Unfortunately no dunite was found in this area, however a report of the geology encountered is presented.

LOCATION & ACCESS

The area of investigation is located in the northwest corner of NTS sheet 82M E in the general area of the Big Bend of the Columbia River (Seymour Arm, East Half). The area is found at a longitude of 118° 53' and latitude of 51° 54'. Geographically it is located in mountainous terrain of the Script range of the Monashee Mountains at the headwaters of the north arm of Script Creek at an elevation of 6,000'. (see attached map 2-1

This area is approximately 72 air miles NW of the town of Revelstoke. Access to the site was obtained by traveling by road north of Revelstoke for 113 kilometers to an airstrip at the mouth of the Bigmouth River. A helicopter from Revelstoke was boarded at this site and conveyed the author and his assistant (Erich Unterberger of SS1, Site 9, Comp23, Revelstoke British Columbia, V0E 2S0) 19 kilometers WNW to an elevation of 6,500' at the headwaters of the north arm of Script Creek.

DESCRIPTION OF ACTIVITIES

The flight to, and examination of, this site occurred on October 5, 1995. The author and his assistant Erich, an amateur prospector and experienced high alpine guide for both the Selkirk and the Purcell Mountains, inspected the surrounding terrain en route to this site and noted what appeared to be a large dark layer of mafic rock at the dunite location described by the G.S.C. After being dropped off at a nearby level area we proceeded to the site of the dark rock. Due to negative observation the evaluation of this site consisted of only a

PRELIMINARY SERIES

MAP 2-1

one day sojourn and was curtailed. The helicopter was radioed and pickup occurred at the end of the day.

GEOLOGICAL OBSERVATIONS

Observations of the dark rock band revealed it was an amphibolitic band within surrounding paragneiss. The strike of this dark band was followed to the west until it reached the height of land from where it disappeared down a steep slope covered with snow. Nowhere along its length was it in direct contact with any marble. Compositionally this rock consisted of primarily of a black to dark olive green amphibolite with minor plagioclase and some quartz. At its contact with the surrounding paragneiss there occurred some minor red subhedral <1/8" diameter garnets *(probably almandine).*

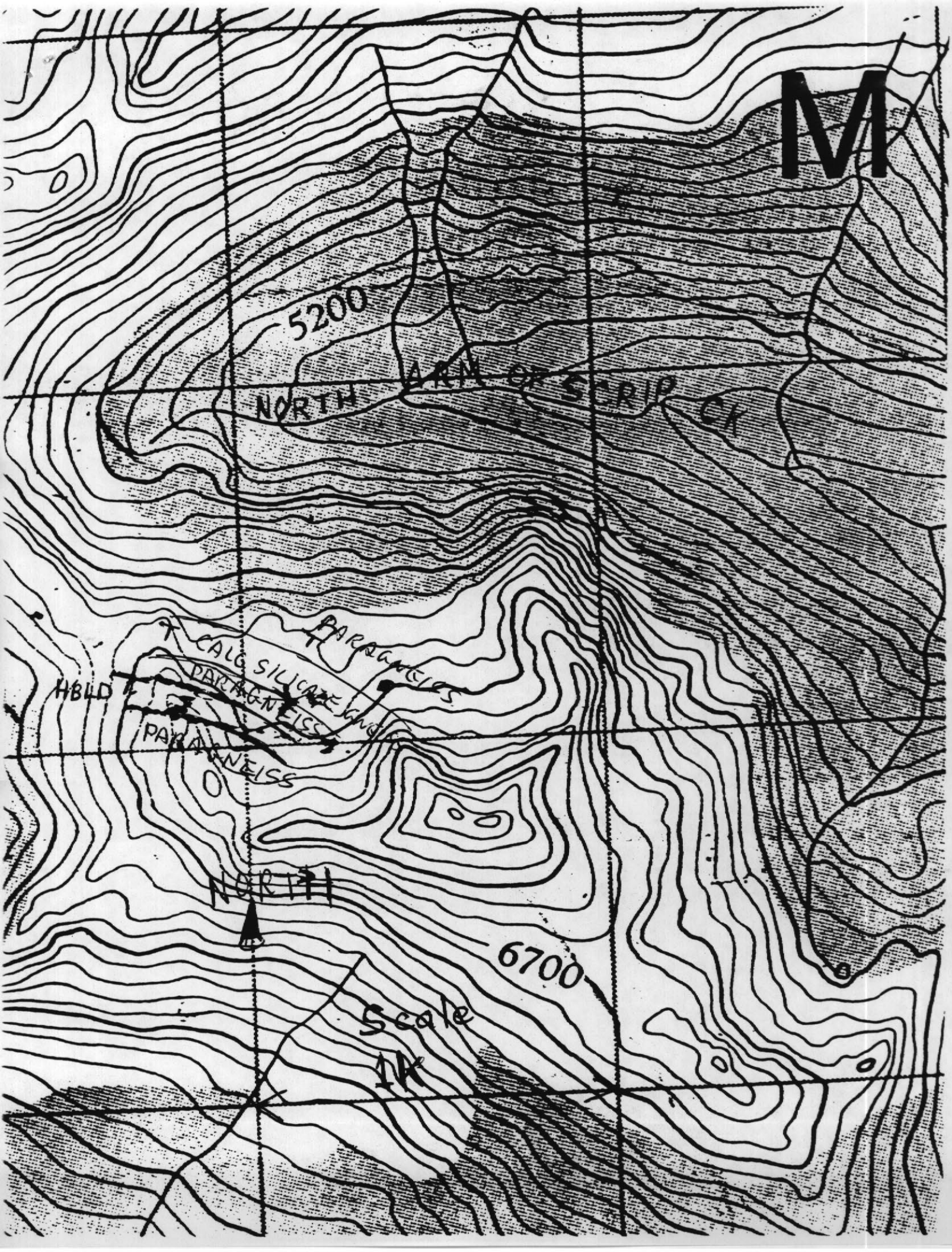
The surrounding paragneiss consisted of quartz with biotite bands and some lenticular pegmatoidal sweats. These pegmatites were of a simple type consisting of coarsely crystalline quartz, plagioclase and muscovite.

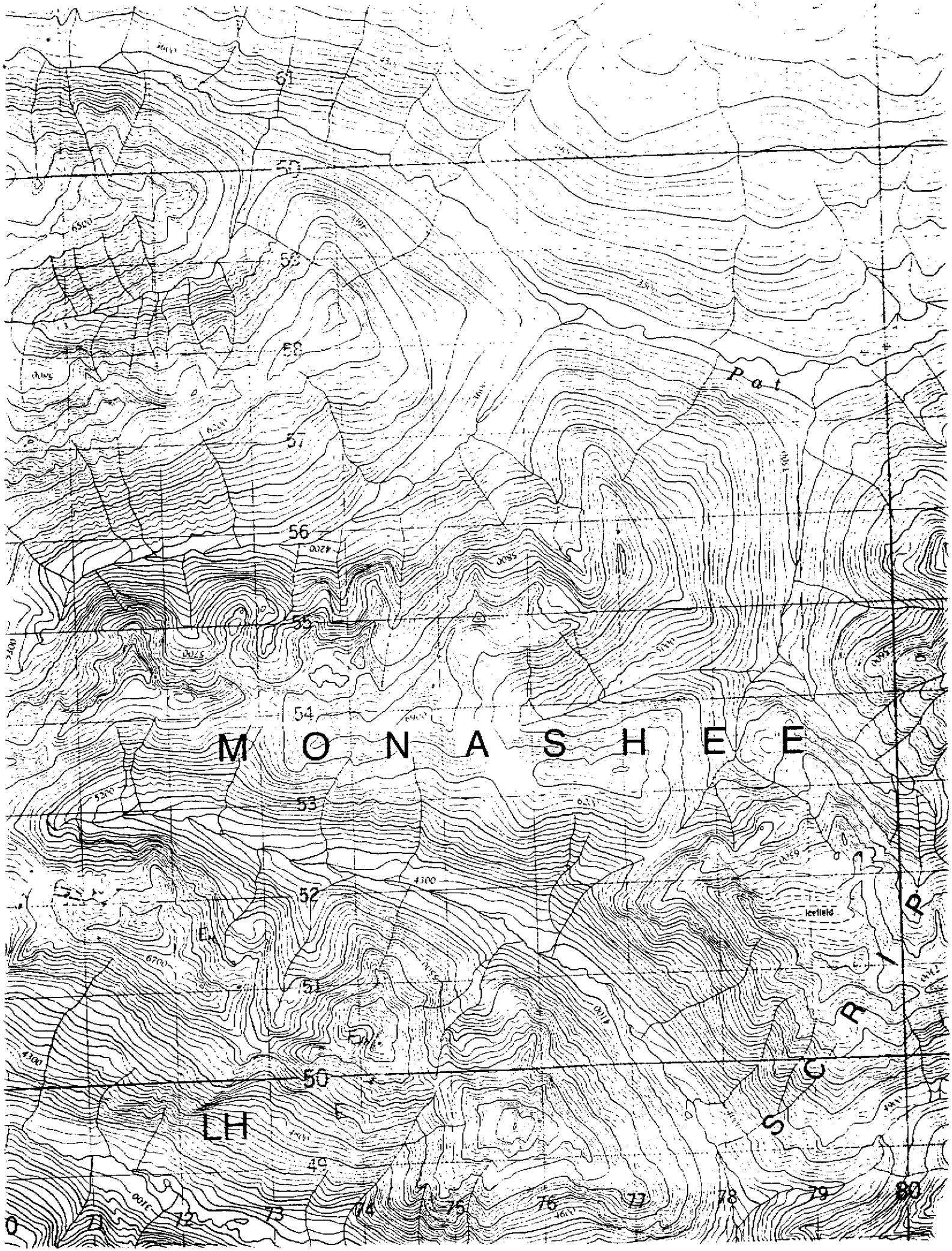
About 300 meters north of the contact of the paragneiss with the amphibolite band there occurred a calcsilicate gneiss. This gneiss *consisted of several cream white very coarsely crystalline bands of* marble within paragneiss. In some of the more coarsely crystalline bands closer to the amphibolite band, tiny pinhead sized green and yellow crystal of diopside and chondrodite were observed.

No economic minerals or gemstones were observed in the study area.

CONCLUSION

No dunite was observed at the site labeled as map unit Ha on G.S.C. map #12-1964. Nor was any chrome grossularites (tsvarites) or skarn Mineralization observed. The area of study consisted of paragneiss, containing calcsilicates and a prominent amphibolite band. It would appear that this amphibolite band was incorrectly mapped as dunite.


M
5200
NORTH ARM OF SCRUB CK
PARAGNEISS
CALC SILICATE band
PARAGNEISS
HBLD
PARAGNEISS
NORTH
6700
Scale
1"


MONASHEE
Pat
Icefield
SCRIP
LH
67
50
56
55
54
53
52
51
50
71
72
73
74
75
76
77
78
79
80

BRITISH COLUMBIA
PROSPECTORS ASSISTANCE PROGRAM
PROSPECTING REPORT FORM (continued)

B. TECHNICAL REPORT

- One technical report to be completed for each project area.
- **Refer to Program Requirements/Regulations, section 15, 16 and 17.**
- If work was performed on claims a copy of the applicable assessment report may be submitted in lieu of the supporting data (*see* section 16) required with this TECHNICAL REPORT.

Name ROBERT KOMARECHKA Reference Number 95/96 P148

LOCATION/COMMODITIES

Project Area (as listed in Part A) DOWNIE CREEK MINFILE No. if applicable ?

Location of Project Area NTS E½ 82M8 Lat 51°25' Long 118°05'

Description of Location and Access ABOUT 25km UP DOWNIE CK FROM ITS MOUTH. 58 km ON HWY 23 NORTH OF REVELSTOKE THEN TURN RIGHT ALONG THE DOWNIE CREEK LOGGING ROAD 21km AN EXTENSIVE MARBLE BAND ABOUT 10 km LONG X 1km WIDE IS FOUND.

Main Commodities Searched For MARBLE

Known Mineral Occurrences in Project Area DOLLY MARBLE, MONTGOMERY (COPPER), KEYSTONE (Pb Zn) STANDARD (Cu), A & E (Pb, Zn), ROSEBERRY (Au), MASTODON (Pb Zn), J & L (Pb Zn)

WORK PERFORMED

1. Conventional Prospecting (area) ABOUT 20 km² ALONG ROAD & TRAILS & SHORT TREKS
2. Geological Mapping (hectares/scale) _____
3. Geochemical (type and no. of samples) 10 ROCK SAMPLES.
4. Geophysical (type and line km) N/A
5. Physical Work (type and amount) LOTS OF STEEP HIKING.
6. Drilling (no,. holes, size, depth in m, total m) N/L
7. Other (specify) _____

SIGNIFICANT RESULTS Cu, DOLOMITIC AMBER COLOURED CALCITIC

Commodities WHITE, GRAY, YELLOW & CALCITIC MARBLE, ONYX Claim Name N/A.

Location (show on map) Lat 51°-25' Long 118° 05' Elevation 3,000 - 6,000'

Best assay/sample type [redacted] 0.56% Cu, MARBLE NOT EVALUATED BUT SOME FLOAT OF BRIGHT WHITE CALCITIC MARBLE PROD +99% $CaCO_3$

Description of mineralization, host rocks, anomalies SIGNIFICANT AZURITE STN, MALACHITE & CHALCOPYRITE IN QUARTZ BOULDER, CARAMEL COLORED ONYX & MULTI-COLOURED MARBLES BOTH CALCITIC & DOLOMITIC IN HUGE QUANTITY + 1 BILLION TONNES. INSUFFICIENT TIME TO EVALUATE.

Supporting data must be submitted with this TECHNICAL REPORT

Area #3 - Downie Creek Area

CONTENTS

INTRODUCTION

As a result of discussions with a SilvaTech crew regarding the presence of marble near a recently constructed road in the Downie Creek area and confirmation on geological maps of the presence of the Badshot formation in this area, a request was made and approved by PAP officials to include in this grant a preliminary reconnaissance of this area to ascertain the potential for the production of large blocks of dimension stone. This report discusses the results of this examination and other mineralisation encountered.

LOCATION & ACCESS

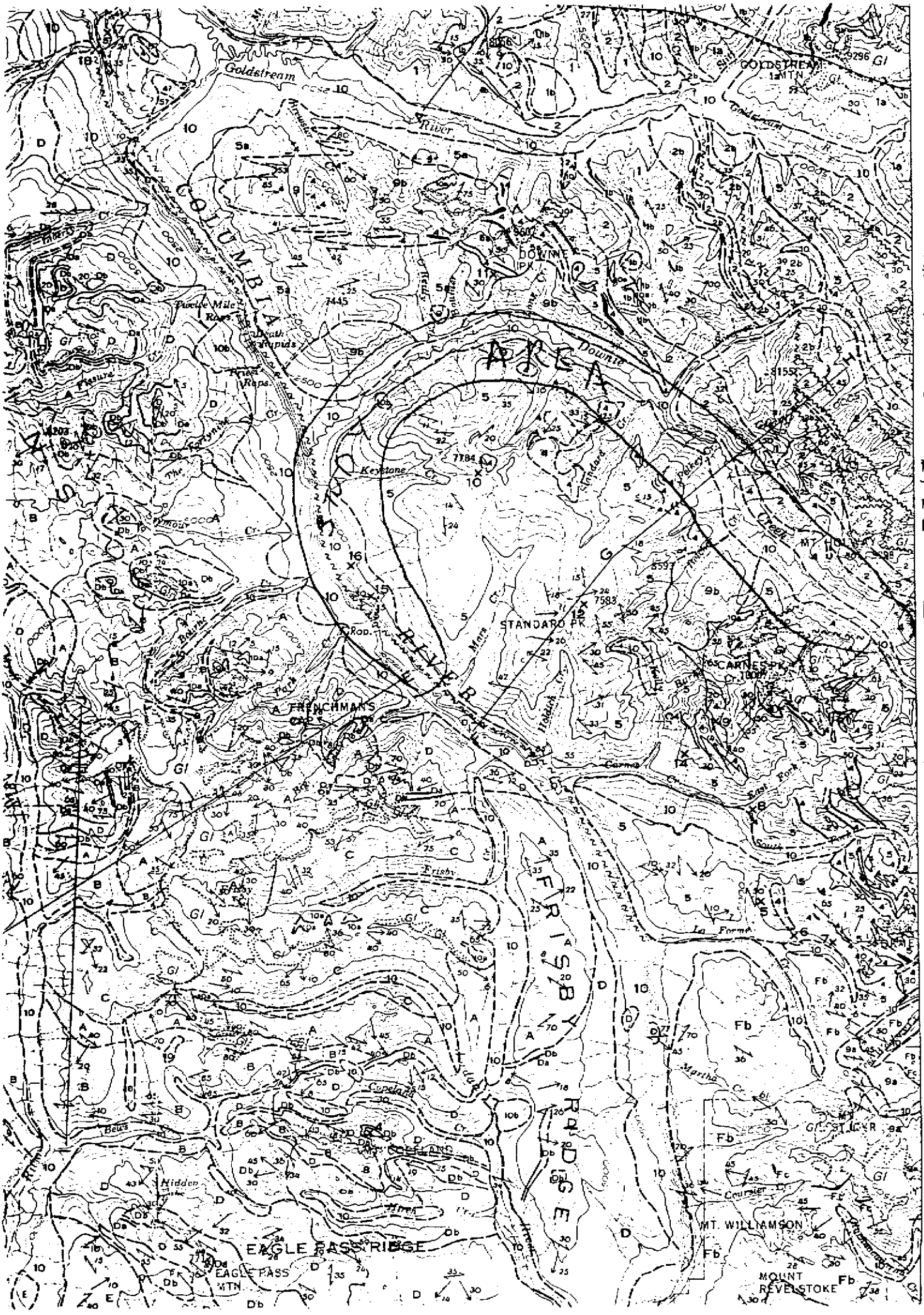
The area of study is a general area located along Downie Creek as shown in location map 3-1. Access to the area can be obtained by driving northward from Revelstoke about 58 km. along highway 23 then eastward along the Downie Creek logging road about 22 km. upstream along Downie Creek. An extensive marble band continues eastward from this area to the end of this road at 30 kilometers and beyond for several kilometers.

DESCRIPTION OF ACTIVITIES

Two days were spent examining the Downie Creek area. The first day consisted of prospecting outcrops along the Downie Creek logging road with several short hiking excursions noting the occurrence and description of any marble or other unusual mineralisation. This iformation is shown on map 3-2. The second day rained heavily and was optimised with an examination of several gossans and malachite stains along highway 23 south of the mouth of Downie Creek. Several samples were collected from this area and sent for assaying. See map #3-3 for these locations and the appendix for the sample analysis.

GEOLOGICAL OBSERVATIONS

As a result of the first days examination of the rocks along the Downie creek road it was observed that extensive quantities of both calcitic and dolomitic marble exist within the uper reaches of this creek. In some cases these marbles are very white. Other colours



MAP 3-1

N

NOTE: MAP TAKEN FROM GSC MAP 12-1966

SCALE 1:253,440

1" = 4 MILES

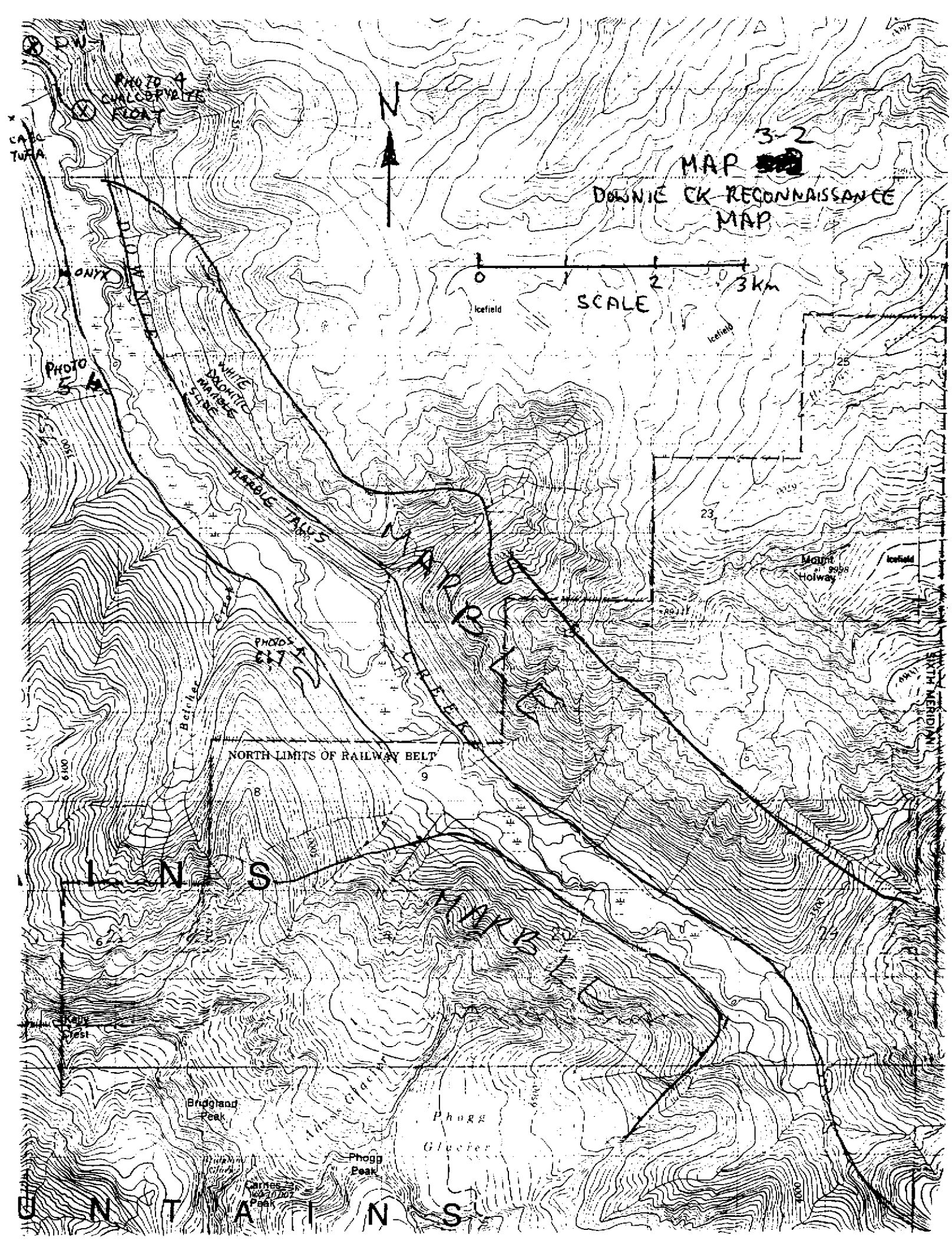
SEE DOLLY MARBLE REPORT FOR INDEX TO THIS MAP

include very dark gray (frequently graphitic), medium to light gray, banded gray and white and also some tan to gold veiled varieties. Also encountered were calc tufa and a honey coloured calcitic onyx. The locations of these varieties are shown on the attached map #3-2.

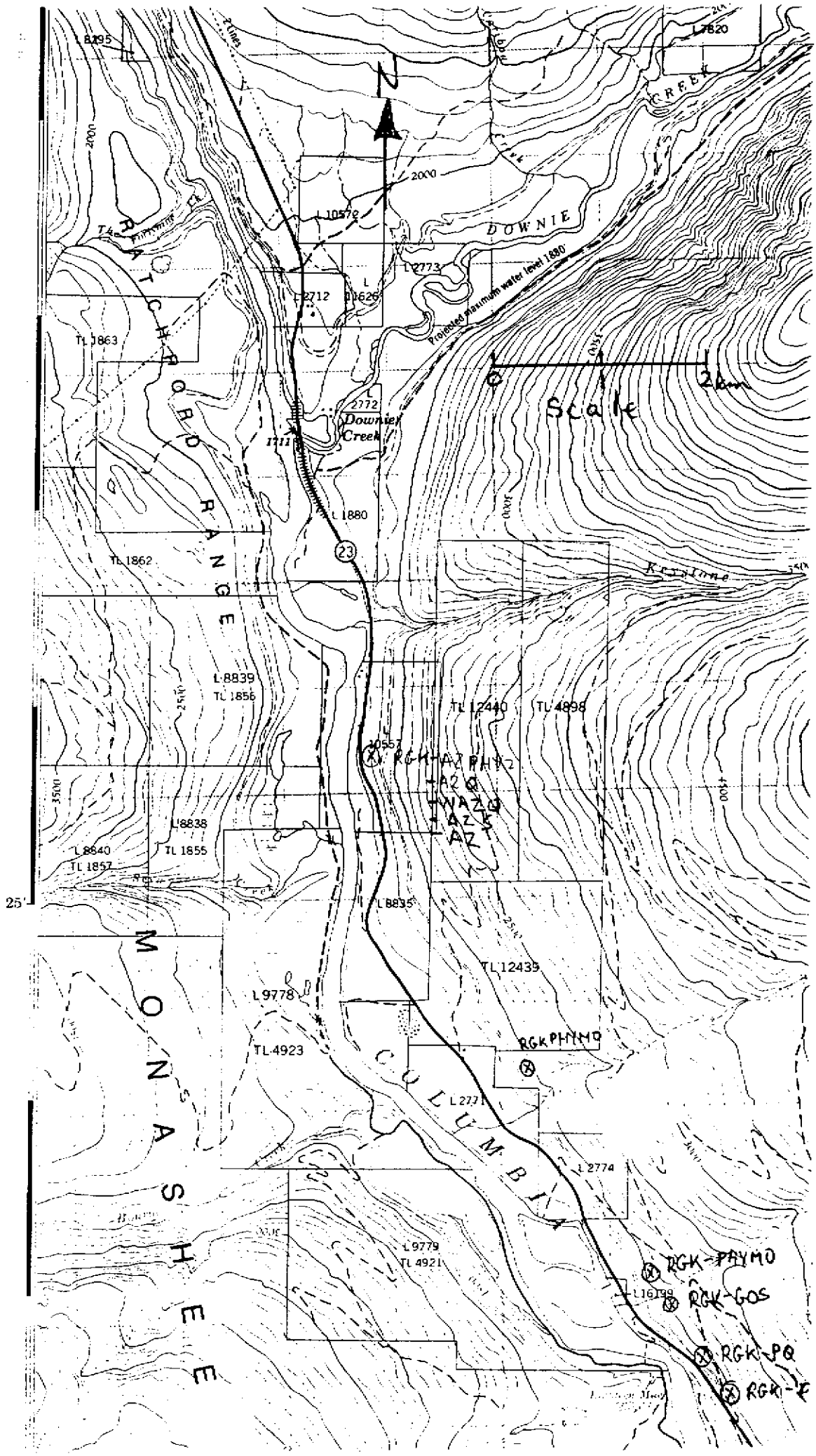
The first occurrence of marble occurred on the south side of Downie Creek just before the bridge crossing @ 22 km. The marble here was an impure medium to dark gray graphitic calcitic variety with numerous phyllitic bands. Crossing the bridge to the north, the Hamil Fm. quartzites were encountered with the marble not reappearing until one kilometers eastward thereafter. The marble at this area (float) appeared as large (6'+ diameter) boulders along a small creek and consisted of highly graphitic dark gray marble with undulose layers of lighter gray marble. This marble was so graphitic as to leave black smudges of graphite on your hands when handled. For the next 700 meters eastward along the road, primarily from observations of the float, it appeared that the underlying rock was primarily silver gray phyllites. For the next 600 meters beyond this 1/2" to 6" layers of cream white marble within the phyllite were evident. At 24.5 km from highway #23 the road ended with no bedrock apparent. A high prominent scarp on a steep slope about one mile north of the road in this area may have been marble. A boulder of about 1 ft^3 consisting of milky quartz with about 15% chalcopyrite and malachite was found at this site. A subsequent search of this area failed to reveal its source or any outcrop. Photo #4 shows this float.

Further eastward about 1 kilometer beyond the road and north of Downie Creek, several white scree slopes along a monumental cliff both consisting of marble were observed and extended for at least another 6 kilometers eastward. The prominence (2,300' elevation) of this resistant ridge in this glaciated terrain suggests that the marble present in this area could be very competant and suitable for the production of large blocks. Photos 5,6 & 7 in appendix 2 show this area. Limited time for access prevented further examination of this intriguing occurrence.

Heading back westward, along the road at mileage 22.3 kilometers, a recently constructed north trending logging road up the mountain was investigated for outcrop. The only rock encountered were occassional outcrops of phyllite.


PW-1
PHOTO 4
CHALCOPYRITE
FLOAT
CALC
TUFA
N
3-2
MAP
DOWNIE CK RECONNAISSANCE
MAP
0
1
2
3 km
SCALE
ONYX
DOWNIE
PHOTO 5
WHITE DOLOMITIC MARBLE SLIDE
MARBLE TALUS
MARBLE CREEK
PHOTOS 6,7
Icefield
Mount Holway
NORTH LIMITS OF RAILWAY BELT
NORTH MERIDIAN
Kelly Crest
Bridgland Peak
Phogg Glacier
Phogg Peak
Carnes Peak
UNTIA INS

MAP 3-3


N
Scale
2km
RATCHFORD RANGE
MONASHEE
COLUMBIA
DOWNIE CREEK
Downie Creek
Proposed maximum water level 1680'
RGK-PHYMO
RGK-GOS
RGK-PQ
RGK-E
L 8295
L 7820
L 10570
L 2773
L 2712
L 1626
TL 1863
L 2772
L 1880
TL 1862
L 8839
TL 1856
TL 12440
TL 4898
L 8838
L 8840
TL 1857
TL 1855
L 8835
TL 12439
L 9778
TL 4923
L 2771
L 2774
L 9779
TL 4921
L 16198

At the bridge at mileage 22 km, the road eastward along the south side of Downie Creek was examined for outcrop. Near the bridge, along the south side, abundant float of gray graphitc calcitic marble occurred as well as some banded outcrops (gray calcitic marble bands less than 1 meter wide) within a phyllite. Marble in bands of various widths (becoming progressively less graphitic going eastward) were encountered until 23.5 kilometrs. At 24.5 kilometers the rock became primarily a phyllite. Minor calc tufa was noted at 22.5 along a small stream. An occurrence of honey colored botroidal marl was observed cementing surficial rocks at 23.4 km. Limited exposure was available only along the roadway where it cut into the side of a small knoll. At 28.3 km numerous float of white calcitic marble were encountered although no outcrop was located. The road ended at 29.7 km near the base of a slide about 1 kilometer ahead. Numerous white marble fragments were observed in this slide. Oncoming darkness prevented further examination of the marbles further up the mountain.

The following day, October 8, 1995, in heavy rain, an examination was made of some gossans and azurite stains noted along highway 23 south of the turnoff for the Downie Creek. This area had been previously observed, while travelling en route to Revelstoke for equipment rental, but was not studied. It seemed that the azurite staining had been much more prominent just a few days earlier but was hardly noticeable now.

On examination of the azurite stain it was observed that the azurite had leached out of a quartzite bed and that it was being washed away by the rain. Apparently, in addition to azurite, anhydrite was also being precipitated and because anhydrite was soluable, the azurite never had a chance to build up. Attached photos #1,2 & 3 in appendix 2 show this particular site. Samples from this site are noted as AZ on the attached sample location map 3-3.

Several other areas of pyrite, molybdenite and chalcopyrite were also encountered in this general area. These areas were sampled by the author, crushed at the Goldstream Mine, and sent for assay to Eco-Tech Laboratories Ltd. The results of these assays are attached in appendix 1, while the description of these samples are shown in appendix 3.

CONCLUSION

Substantial amounts of several marble varieties, both calcitic and dolomitic, were encountered in the upper reaches of Downie Creek, some of these appear to be of high chemical purity. The degree of competence of this material for the production of large blocks has not been determined due to the great extent of this marble and the time available for its examination, however the prominence of some of these outcrops (especially the calcitic varieties) suggests this area could have potential for the production of large blocks. The relatively large areas of bare rock exposed by recent glaciation would greatly facilitate the evaluation of fractures in these marbles.

The occurrence of copper in this area has been identified both in outcrop (along highway 23) and in significant quantity in float (along the north side of Downie Creek). Both these areas should be followed up for further evaluation.

APPENDIX 1

Assay Results

19-Oct-95

ECO-TECH LABORATORIES LTD.
10041 East Trans Canada Highway
KAMLOOPS, B.C.
V2C 6T4

Phone: 604-573-5700
Fax : 604-573-4557

FEED FAX THIS END

FAX
To: Don receipt please
Department: Geol
Fax No.: Kamloops
No. of Pages: Sandy
From: Jan 20/96
Date:
Company:
Fax No.:
Comments:
Telephone:

BETHLEHEM RESOURCES CORP. AK 95-966
P.O. BOX 2970
REVELSTOKE, BC
V0E 2S0

ATTENTION: STEVE ROBERTSON

12 Rock samples received Oct. 16, 1995
PROJECT #: RGK
SHIPMENT #: None given
Samples submitted by: Steve Robertson

Values in ppm unless otherwise reported

	Et #.	Tag #	Au(ppb)	Ag	Al %	As	Ba	Bi	Ca %	Cd	Co	Cr	Cu	Fe %	La	Mg %	Mn	Mo	Na %	Ni	P	Pb	Sb	Sn	Sr	Ti %	U	V	W	Y	Zn
RGK A2	1	109528	5	0.6	0.51	<5	35	<5	0.08	<1	10	158	507	1.30	10	0.47	344	13	0.03	12	110	18	<5	<20	5	<.01	<10	4	<10	6	31
AZS	2	109529	10	2.8	0.69	<5	90	15	0.10	1	206	79	743	> 15	<10	0.41	119	24	<.01	58	230	20	<5	<20	6	<.01	<10	9	<10	<1	45
AZQ	3	109530	5	<.2	1.03	<5	40	<5	0.44	2	16	152	529	3.03	<10	1.17	250	8	0.04	15	730	80	5	<20	18	0.05	<10	23	<10	<1	322
AZPHY	24	109531	10	0.8	0.44	<5	45	<5	0.19	<1	14	255	1629	1.85	30	0.28	673	30	0.03	16	80	44	<5	<20	8	<.01	<10	3	<10	13	50
PHY	5	109532	5	2.6	1.77	<5	75	<5	0.10	<1	14	176	5646	4.62	<10	1.12	338	13	0.01	38	80	24	<5	<20	7	<.01	<10	18	<10	<1	109
PYM	6	109533	5	2.0	0.23	<5	40	<5	1.41	<1	50	238	316	6.02	<10	0.61	519	2685	0.05	51	180	70	<5	<20	91	<.01	<10	4	<10	<1	46
GOS-1	7	109534	5	11.4	0.19	<5	125	<5	0.19	6	51	54	1350	> 15	<10	<.01	3	31	<.01	312	810	370	<5	<20	15	<.01	<10	7	<10	<1	201
NAZPHY	8	109535	5	0.4	0.35	<5	45	<5	0.17	<1	7	154	172	1.40	<10	0.26	101	9	0.01	11	50	18	<5	<20	8	<.01	<10	2	<10	<1	23
PQ	9	109536	5	7.2	0.25	275	80	40	0.41	<1	20	176	103	> 15	<10	0.05	128	23	<.01	58	490	240	<5	<20	16	<.01	<10	5	<10	6	106
GOS-2	10	109537	5	0.4	0.29	<5	50	<5	13.10	1	24	49	182	4.58	<10	1.10	340	5	<.01	43	900	22	<5	<20	343	<.01	<10	31	<10	7	94
SERPH	11	109538	5	0.4	3.99	<5	80	<5	1.78	<1	18	146	106	4.81	<10	1.74	139	7	0.14	39	1140	64	10	<20	118	0.06	<10	21	<10	<1	79
SERP	12	109539	5	0.4	1.53	<5	55	<5	0.29	<1	26	311	105	5.69	<10	1.22	224	13	0.02	51	180	32	<5	<20	15	0.03	<10	21	<10	<1	79
QC/DATA:																															
Repeat:																															
	1	109528	5	0.4	0.51	<5	30	<5	0.08	<1	9	149	501	1.29	10	0.47	340	12	0.03	12	110	16	<5	<20	2	<.01	<10	4	<10	6	30
	10	109537	5	0.4	0.30	<5	55	<5	14.20	1	26	54	183	5.00	<10	1.21	372	6	<.01	50	1010	22	<5	<20	373	<.01	<10	5	<10	6	118
Standard:																															
GEO'95			140	1.2	1.61	70	170	<5	1.66	<1	18	58	82	3.96	<10	0.95	624	<1	0.01	24	610	22	5	<20	54	0.08	<10	72	<10	4	72

ECO-TECH LABORATORIES LTD.
Frank J. Pezzotti, A.Sc.T.
B.C. Certified Assayer

d/966
XLS/95Bethlehem

CERTIFICATE OF ANALYSIS AK 95-966

BETHLEHEM RESOURCES CORP.
P.O. Box
REVELSTOKE, B.C.
V0E 2S0

15-Oct-95

ATTENTION: STEVE ROBERTSON

12 ROCK samples received October 16, 1995
PROJECT #: RGK
Samples submitted by: Steve Robertson

ET #.	Tag #		Au (ppb)
1	109528	RGK-AZ	5
2	109529	RGK-AZS	10
3	109530	RGK-AZO	5
4	109531	RGK-AZ PHY2	10
5	109532	RGK-PHY1	5
6	109533	RGK-PYMO	5
7	109534	RGK-GOS-1	5
8	109535	RGK-NAZ PHY	5
9	109536	RGK-PQ	5
10	109537	RGK-CLARB	5
11	109538	RGK-SERNM	5
12	109539	RGK-SERAD	5

QC DATA:

Repeat:

1	109528	5
10	109537	5

Standard:

GEO95	140

FEED FAX THIS END

FAX

To: Steve Robertson
Dept.:
Fax No.:
No. of Pages: 1
From: Sandy
Date: Oct 19
Company:
Fax No.:
Comments:

ECO-TECH LABORATORIES LTD.
per Frank J. Pezzotti, A.Sc.T.
B.C. Certified Assayer

XLS/95Bethlehem

ACME ANALYTICAL LABORATORIES LTD. 852 E. HASTINGS ST. VANCOUVER BC V6A 1R6 PHONE(604)253-3158 FAX(604)253-1716

WHOLE ROCK ICP ANALYSIS

Robert Komarechka File # 95-4216

Apt. #1 - 537 Haig St., Sudbury ON P3C 1E2

SAMPLE#	SiO2 %	Al2O3 %	Fe2O3 %	MgO %	CaO %	Na2O %	K2O %	TiO2 %	P2O5 %	MnO %	Cr2O3 %	Ba ppm	Ni ppm	Sr ppm	Zr ppm	Y ppm	Nb ppm	Sc ppm	LOI %	SUM %
D1	.62	.15	.14	21.24	29.94	.06	<.04	<.01	.07	.02	.004	10	10	72	<10	<10	<10	<10	46.4	98.69
D2	.30	.05	.14	21.75	30.27	.04	<.04	<.01	.06	.01	.003	154	<10	159	<10	<10	<10	<10	46.5	98.99
D3	2.21	.63	.35	20.28	28.80	.06	.17	.01	.13	.02	.009	119	<10	80	<10	<10	<10	<10	45.3	98.00
D4	2.14	.61	.27	8.79	43.12	.14	.06	.03	.07	<.01	.005	30	<10	174	22	<10	<10	<10	43.3	98.57
D5	.79	.21	.11	2.24	52.67	.05	<.04	<.01	.04	.01	.004	75	11	1153	<10	<10	<10	<10	43.2	99.50
D6	.36	.09	.17	20.74	31.31	.06	<.04	<.01	.09	.01	.008	9	21	149	<10	<10	<10	<10	46.4	99.28
D7B	.98	.23	.30	19.99	31.03	.11	.04	.01	.08	.01	.005	715	<10	131	<10	<10	<10	<10	45.7	98.62
D7G	.38	.08	.14	21.52	30.78	.07	<.04	<.01	.10	.01	.006	98	<10	79	<10	<10	<10	<10	46.5	99.63
D7W	.34	.07	.12	18.86	30.75	.06	<.04	<.01	.08	.01	.007	17777	15	164	<10	<10	<10	<10	45.3	98.66
D7X	.42	.09	.08	12.57	34.74	.08	<.04	<.01	.01	.01	.008	62863	<10	387	<10	<10	<10	<10	40.8	99.57
D7VG	1.02	.25	.22	18.45	32.80	.12	.04	<.01	.09	.01	.006	8494	10	131	<10	<10	<10	<10	45.0	99.59
D8	.51	.11	.16	21.67	30.37	.08	<.04	<.01	.11	.01	.008	2495	<10	262	<10	<10	<10	<10	46.1	99.62
D9	.54	.09	.15	21.25	29.85	.09	<.04	<.01	.11	.01	.005	812	11	135	<10	<10	<10	<10	46.4	98.68
D10	.45	.08	.20	21.21	30.46	.09	<.04	<.01	.09	.02	.005	1401	<10	121	<10	<10	<10	<10	46.3	99.18
D11	.26	.04	.25	21.55	30.11	.10	<.04	<.01	.08	.03	.005	426	<10	59	<10	<10	<10	<10	46.7	99.25
RE D11	.28	.05	.25	21.42	29.91	.09	<.04	<.01	.09	.03	.005	425	<10	59	13	<10	<10	<10	46.7	98.93
RRE D11	.28	.05	.23	20.65	29.91	.10	<.04	<.01	.10	.03	.006	4536	<10	84	<10	<10	<10	<10	46.5	98.67
DW-1	2.33	.15	.08	8.86	43.70	.09	.04	.01	.07	<.01	.004	95	22	223	<10	<10	<10	<10	43.6	98.98
STANDARD SO-15	48.37	12.71	7.18	7.20	5.85	2.39	2.16	1.60	2.87	1.38	1.046	2193	94	385	763	18	17	<10	5.9	99.20

.200 GRAM SAMPLES ARE FUSED WITH 1.2 GRAM OF LIBO2 AND ARE DISSOLVED IN 100 MLS 5% HNO3. Ba IS SUM AS BaSO4 AND OTHER METALS ARE SUM AS OXIDES.
- SAMPLE TYPE: ROCK Samples beginning 'RE' are Reruns and 'RRE' are Reject Reruns.

DATE RECEIVED: OCT 20 1995 DATE REPORT MAILED: Nov 16/95 SIGNED BY. . . . . D.TOYE, C.LEONG, J.WANG; CERTIFIED B.C. ASSAYERS

ACME ANALYTICAL LABORATORIES LTD. 852 E. HASTINGS ST. VANCOUVER BC V6A 1R6 PHONE(604)253-3158 FAX(604)253-1716

GEOCHEMICAL ANALYSIS CERTIFICATE

Robert Komarechka File # 95-4216R

Apt: #1 - 537 Main St., Sudbury ON P3C 1E2

SAMPLE#	Mo ppm	Cu ppm	Pb ppm	Zn ppm	Ag ppm	Ni ppm	Co ppm	Mn ppm	Fe %	As ppm	U ppm	Au ppm	Th ppm	Sr ppm	Cd ppm	Sb ppm	Bi ppm	V ppm	Ca %	P %	La ppm	Cr ppm	Mg %	Ba ppm	Ti %	Al %	Na %	K %	W ppm	Zr ppm	Sn ppm	Y ppm	Nb ppm	Be ppm	Sc ppm
D1	<2	2	<5	3	<.5	<2	<2	137	.10	<5	20	<4	<2	63	<.4	<5	<5	9	21.10	.005	2	3	11.13	5	<.01	.05	.02	<.01	<4	<2	2	<2	2	<1	<1
D2	<2	<2	<5	2	<.5	<2	<2	89	.07	<5	16	<4	2	140	<.4	<5	<5	2	21.37	.010	<2	<2	11.44	150	<.01	.01	.01	<.01	<4	<2	2	<2	2	<1	<1
D3	<2	5	6	5	<.5	<2	<2	132	.24	5	14	<4	<2	72	<.4	<5	<5	3	20.88	.024	<2	9	11.01	118	<.01	.30	.02	.13	<4	<2	<2	2	<2	<1	<1
D4	<2	4	<5	4	.5	3	<2	31	.11	<5	16	<4	<2	147	<.4	<5	<5	2	32.32	.013	4	3	4.58	17	<.01	.26	.07	.03	<4	<2	<2	3	<2	<1	<1
D5	<2	2	<5	5	<.5	<2	<2	66	.04	<5	14	<4	<2	907	<.4	<5	<5	2	38.23	.007	4	<2	1.05	67	<.01	.08	.01	.02	<4	<2	<2	3	<2	<1	<1
D6	<2	<2	<5	6	<.5	<2	<2	71	.09	<5	22	<4	2	126	<.4	<5	<5	2	21.20	.009	<2	<2	10.58	8	<.01	.03	<.01	<.01	<4	<2	<2	<2	<2	<1	<1
D7B	<2	9	<5	6	<.5	<2	<2	65	.11	<5	18	<4	2	111	<.4	<5	<5	2	20.90	.010	<2	<2	10.36	228	<.01	.04	.01	<.01	<4	<2	<2	<2	<2	<1	<1
D7G	<2	2	<5	8	<.5	3	<2	68	.06	<5	19	<4	2	65	<.4	<5	<5	<2	20.27	.013	<2	<2	10.81	55	<.01	.02	.01	<.01	<4	<2	2	<2	<2	<1	<1
D7W	<2	3	<5	5	<.5	<2	<2	49	.08	<5	20	<4	<2	131	<.4	6	<5	<2	20.51	.008	<2	<2	9.78	6513	<.01	.03	<.01	.01	<4	<2	<2	<2	<2	<1	<1
D7X	<2	3	<5	2	<.5	<2	<2	42	.04	<5	21	<4	<2	253	<.4	8	<5	<2	23.14	.006	<2	<2	6.47	7571	<.01	.03	<.01	.01	<4	<2	<2	2	<2	<1	<1
D7VG	<2	13	<5	6	<.5	<2	<2	67	.13	<5	16	<4	2	104	<.4	<5	<5	2	21.45	.016	4	3	9.46	5447	<.01	.11	.03	.02	<4	<2	<2	2	<2	<1	<1
D8	<2	4	8	29	<.5	<2	<2	92	.09	<5	12	<4	<2	224	<.4	<5	<5	<2	20.25	.010	<2	<2	10.96	2266	<.01	.04	.01	.01	<4	<2	<2	<2	<2	<1	<1
D9	<2	7	13	25	<.5	<2	<2	71	.09	<5	15	<4	2	123	<.4	<5	<5	<2	20.10	.008	<2	<2	10.92	851	<.01	.04	.01	<.01	<4	<2	<2	<2	<2	<1	<1
D10	<2	5	8	13	<.5	<2	<2	141	.10	<5	15	<4	<2	97	<.4	<5	<5	<2	19.96	.008	<2	2	10.72	711	<.01	.03	.01	.01	<4	<2	2	<2	<2	<1	<1
D11	<2	8	<5	9	<.5	<2	<2	203	.14	<5	15	<4	<2	50	<.4	<5	<5	4	19.40	.008	<2	2	10.71	381	<.01	.01	.01	<.01	<4	<2	2	<2	<2	<1	<1
RE D11	<2	8	<5	11	<.5	<2	<2	202	.14	<5	14	<4	<2	51	<.4	<5	<5	3	19.54	.008	<2	2	10.81	379	<.01	.01	.01	<.01	<4	<2	2	<2	<2	<1	<1
RRE D11	<2	6	<5	9	<.5	<2	<2	173	.12	<5	16	<4	<2	72	<.4	<5	<5	3	19.81	.008	<2	<2	10.56	4118	<.01	.02	.01	<.01	<4	<2	<2	<2	<2	<1	<1
DU-1	<2	2	<5	<2	<.5	<2	<2	24	.04	<5	12	<4	<2	181	<.4	8	<5	2	30.06	.002	4	<2	4.38	75	<.01	.06	.02	.01	<4	<2	<2	2	<2	<1	<1
STANDARD CT	21	54	37	128	5.7	75	31	1128	4.41	29	27	5	43	234	16.8	15	14	106	1.21	.115	39	102	1.22	909	.33	7.03	1.63	1.93	22	54	17	11	11	1	15

** TOTAL PAGE.002 **

(CP - .250 GRAM SAMPLE IS DIGESTED WITH 10ML HCLO4-HNO3-HCL-HF AT 200 DEG. C TO FUMING AND IS DILUTED TO 10 ML WITH DILUTED AQUA REGIA. THIS LEACH IS PARTIAL FOR MAGNETITE, CHROMITE, BARITE, OXIDES OF AL, ZR & MN AND MASSIVE SULFIDE SAMPLES. AS, CR, SB, AU SUBJECT TO LOSS BY VOLATILIZATION DURING HCLO4 FUMING.

- SAMPLE TYPE: ROCK PULP Samples beginning 'RE' are Reruns and 'RRE' are Reject Reruns.

DATE RECEIVED: JAN 9 1996 DATE REPORT MAILED: Jan 12/96 SIGNED BY: C. Leong .D.TOYE, C.LEONG, J.WANG; CERTIFIED B.C. ASSAYERS

APPENDIX 2

Sample Descriptions

HWY 23- KEYSTONE RIVER LOCATION

In the course of travelling to Revelstoke from the Dolly Claims for equipment rental some azurite staining in the area of the Downie Creek - Keystone River was noted. As this area was not staked samples of these rocks and adjacent sulphide rich rocks were collected, prepared by the Goldstream Mine, and sent for assay to Eco-Tech Laboratories Ltd.

The sample locations are shown on maps 3-2 and 3-3 while the descriptions of each sample is given below.

RGK-AZ	Phyllitic (sericitic) laminated quartzite with interstitial pyrite & chalcopyrite, light green colour. Note washed off samples & blue stain was removed, possible reduction in Cu content?
RGK-AZQ	quartzite/mineral musc., having abundant jarosite staining & 4% pyrite
RGK-NAZQ	Phyllitic (sericitic) laminated quartzite with interstitial pyrite & minor chalcopyrite, light gray colour.- No azurite staining, but jarosite stain.
RGK-AZS	sheared quartz, granite clot/ massive pyrite located at south end of outcrop near bushes.
RGK-PQ	quartzite/abundant 20% pyrite & possible arsenopyrite located at turn off for Nisson Forest Road
RGK-PHYMO	standard Basin turnoff (Keystone Lake Rd)
RGK-AZPHY2	same RGK-AZ but unwashed fines.
RGK-PHY-1	malachite stain on phlyllite - most southern sample located near quartz veins
RGK-GOS	heavy gossan with possible chalcocite & bornite

DOWNIE CREEK SAMPLE

DW-1	graphitic calcitic marble, medium gray to black, with undulose boudinaged bedding, dark gray to black on fresh surfaces.

APPENDIX 3

Photo Descriptions

Photo #1- Taken along highway 23 at the AZ sample locations see map 3-3, note azurite staining within recess of crack.

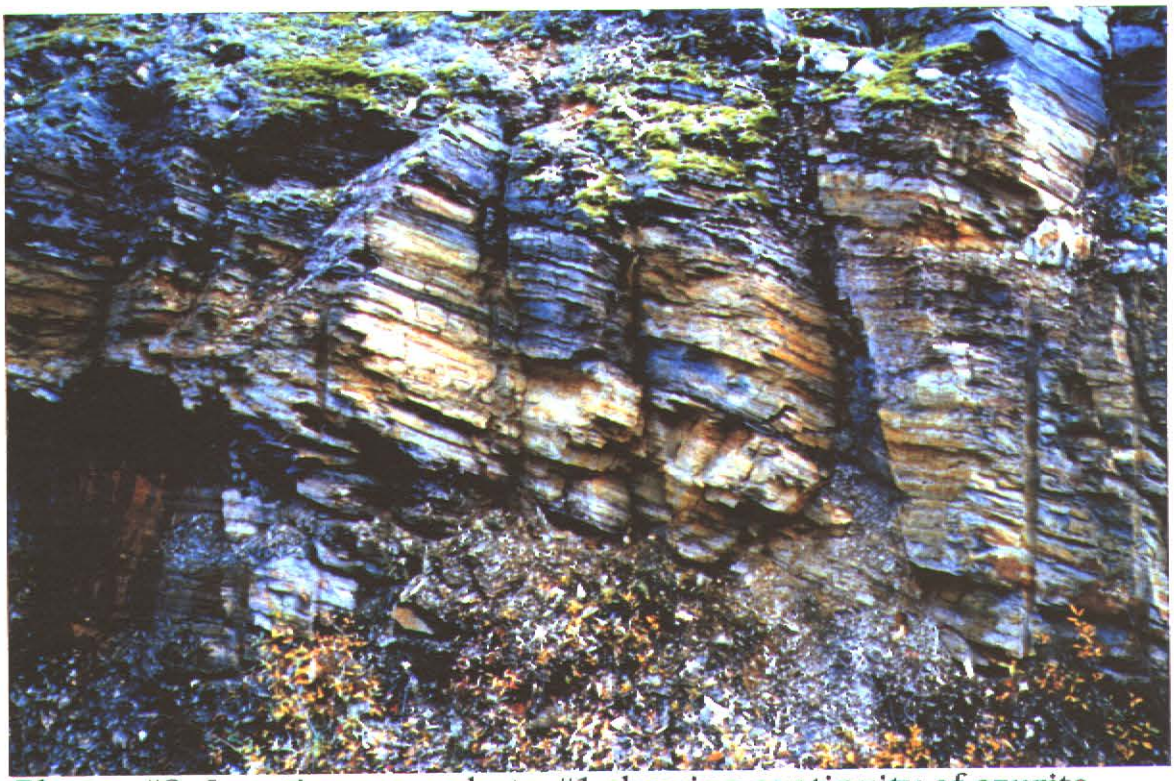


Photo #2- Location near photo #1 showing continuity of azurite leach along jarosite - limonite? stained serictic quartzite

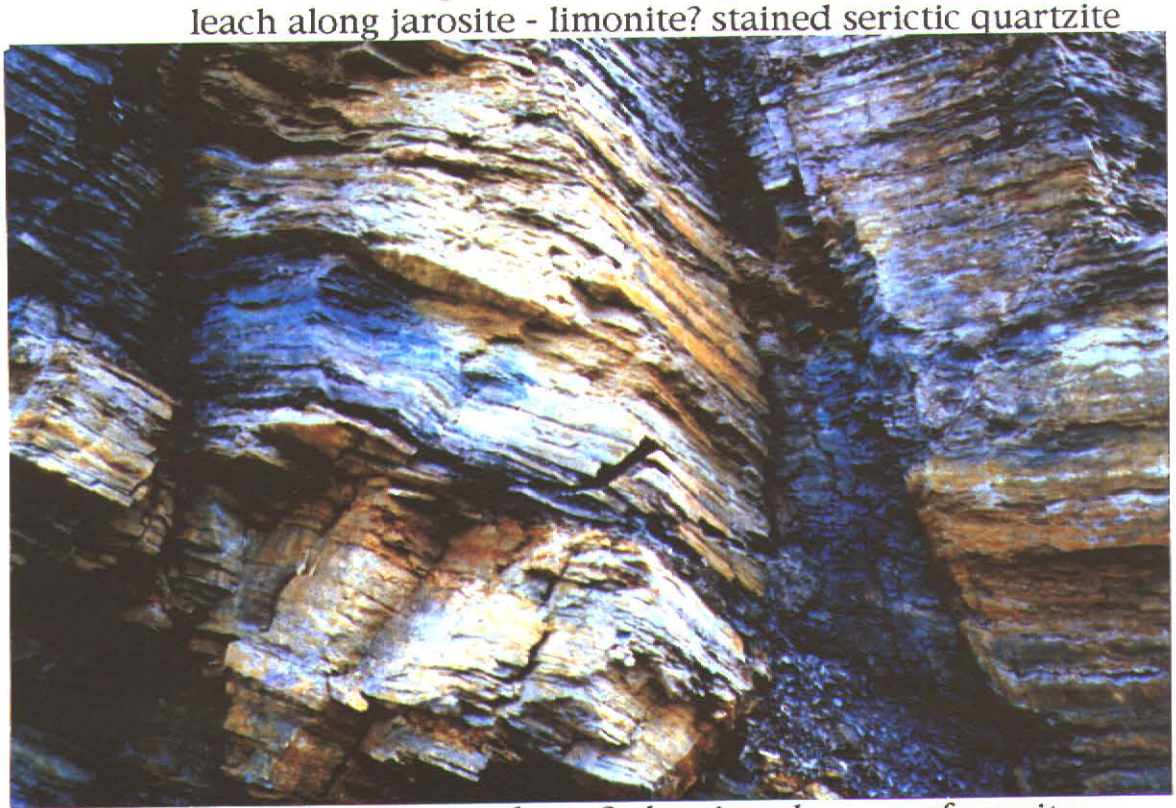


Photo #3- Same location as photo 2 showing close up of azurite staining

Photo #4- Located at east end of logging road on N side of Downie Ck. see map 3-2. Quartz float containing pyrite, chalcopyrite and malachite.

Photo #5- Looking northward across Downie Creek showing slide of apparent white marble. See map 3-2 for location. This site was not accessed.

Photo #6- Prominent cliff face at east end of photo 5, believed to be comprised of marble. This site was not visited.

Photo #7- View of same prominent cliff as shown earlier showing lower section and talus slope

ADDENDUM - Miscellaneous Samples

During the course of undertaking work on the dolly claims while in search of local contractors with equipment nearby (to minimize float charges) several interesting rusty zones along the south side of the Goldstream River near the logging road were encountered which were subsequently sampled and assayed. The results of these samples are attached along with a map showing their location.

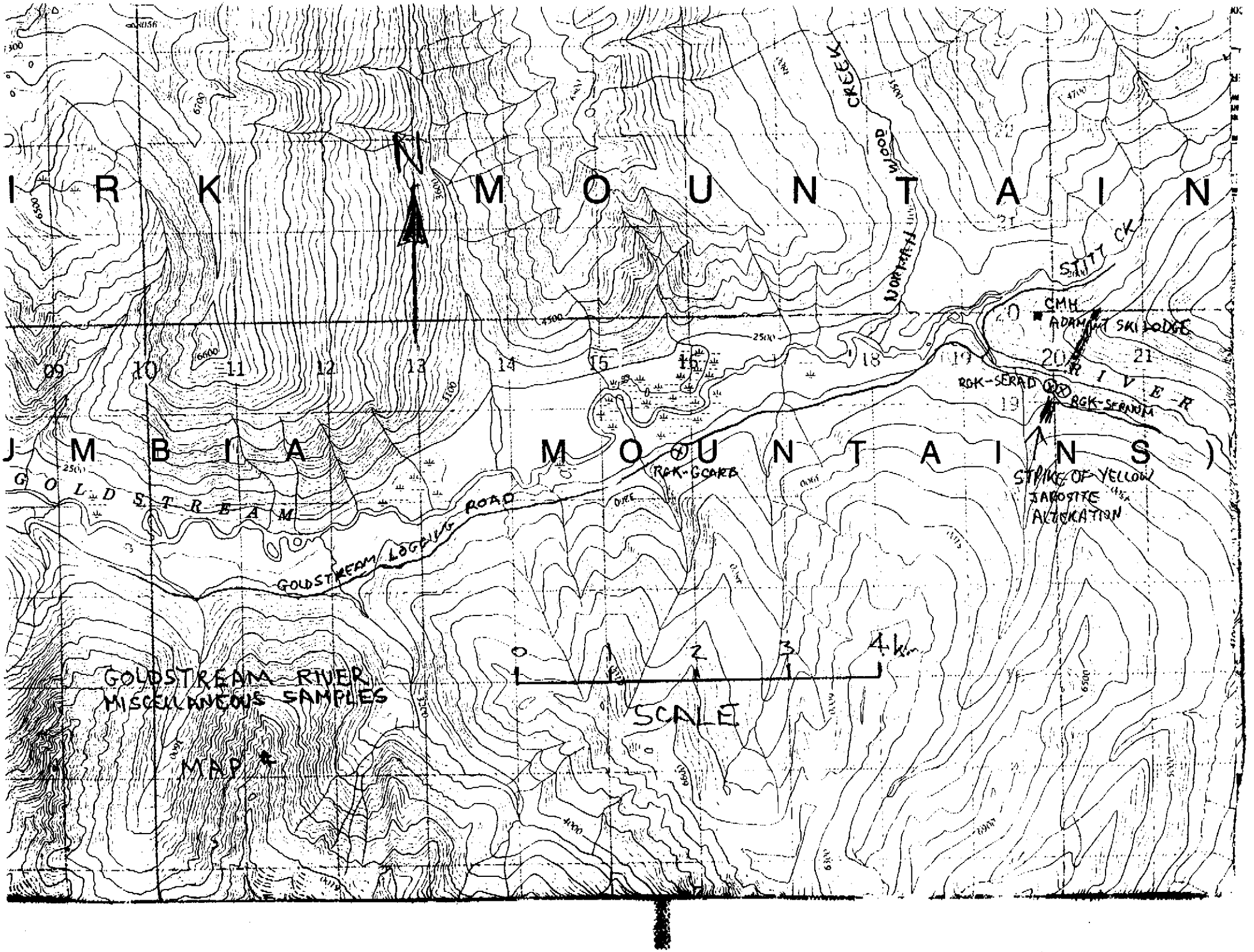
No values of significance were found in any of these samples.

SAMPLE DESCRIPTION

RGK-GCARB - Rusty orange-yellow weathering carbonate matrix with minor pyrite and mariposite.

RGK-SERNUM - Muscovite quartzose schist with abundant yellow jarosite & sericite alteration.

RGK-SERAD - Muscovite quartzite with pyrite


I R K
N
M O U N T A I N
WOOD CREEK
WORTHY
STITT CK
CMH
ADAMANT SKI LODGE
RGK-SERAD
RGK-SERAM
R I V E R
J M B I A
M O U N T A I N S)
RGK-GCARB
GOLDSTREAM
GOLDSTREAM LOGGING ROAD
STRIKE OF YELLOW JAROSITE ALTERATION
09
10
11
12
13
14
15
16
18
19
20
21
0 1 2 3 4 km
SCALE
GOLDSTREAM RIVER
MISCELLANEOUS SAMPLES
MAP

CERTIFICATE OF ANALYSIS AK 95-966

BETHLEHEM RESOURCES CORP.
P.O. Box
REVELSTOKE, B.C.
V0E 2S0

18-Oct-95

ATTENTION: STEVE ROBERTSON

12 ROCK samples received October 16, 1995
PROJECT #: RGK
Samples submitted by: Steve Robertson

ET #.	Tag #		Au (ppb)
1	109528	RGK-AZ	5
2	109529	RGK-AZS	10
3	109530	AGK-AZQ	5
4	109531	RGK-AZPHY2	10
5	109532	RGK-PHY1	5
6	109533	RGK-RYMO	5
7	109534	RGK-GOS-1	5
8	109535	RGK-NAZ PHY	5
9	109536	RGK-PQ	5
10	109537	RGK-GCARB	5
11	109538	RGK-SERNM	5
12	109539	RGK-SERAD	5

QC DATA:

Repeat:

1	109528	5
10	109537	5

Standard:

GEO95	140

FEED FAX THIS END

FAX

To: Steve Robertson
Dept.:
Fax No.:
No. of Pages: 1
From: Sandy
Date: oct 19
Company:
Fax No.:
Comments:

Post-it Fax pad 7600E

ECO-TECH LABORATORIES LTD.
per Frank J. Pezzotti, A.Sc.T.
B.C. Certified Assayer

XLS/95Bethlehem

19-Oct-95

ECO-TECH LABORATORIES LTD.
10041 East Trans Canada Highway
KAMLOOPS, B.C.
V2C 6T4

Phone: 604-573-5700
Fax : 604-573-4557

FEED FAX THIS END

FAX
To: On receipt please
Dept: contact
Fax No.: Bob
No. of Pages: Kamloops
From: Sandy
Date: Jan 26/96
Company:
Fax No.:
Comments:

BETHLEHEM RESOURCES CORP. AK 95-966
P.O. BOX 2970
REVELSTOKE, BC
V0E 2S0

ATTENTION: STEVE ROBERTSON

12 Rock samples received Oct. 16, 1995
PROJECT #: RGK
SHIPMENT #: None given
Samples submitted by: Steve Robertson

Values in ppm unless otherwise reported

Et #.	Tag #	Au(ppb)	Ag	Al %	As	Ba	Bi	Ca %	Cd	Co	Cr	Cu	Fe %	La	Mg %	Mn	Mo	Na %	Ni	P	Pb	Sb	Sn	Sr	Ti %	U	V	W	Y	Zn
RGK-AZ 1	109528	5	0.6	0.51	<5	35	<5	0.08	<1	10	158	507	1.30	10	0.47	344	13	0.03	12	110	18	<5	<20	5	<.01	<10	4	<10	6	31
- AZS 2	109529	10	2.8	0.69	<5	90	15	0.10	1	206	79	743	> 15	<10	0.41	119	24	<.01	58	230	20	<5	<20	8	<.01	<10	9	<10	<1	45
- AZQ 3	109530	5	<.2	1.03	<5	40	<5	0.44	2	16	152	529	3.03	<10	1.17	250	8	0.04	15	730	80	5	<20	18	0.05	<10	23	<10	<1	322
-AZPHY 4	109531	10	0.8	0.44	<5	45	<5	0.19	<1	14	255	1629	1.85	30	0.28	673	30	0.03	15	80	44	<5	<20	8	<.01	<10	3	<10	13	50
- PHY-1 5	109532	5	2.6	1.77	<5	75	<5	0.10	<1	14	176	5846	4.02	<10	1.12	338	13	0.01	38	80	24	<5	<20	7	<.01	<10	18	<10	<1	109
- PYMO 6	109533	5	2.0	0.23	<5	40	<5	1.41	<1	50	238	316	6.02	<10	0.61	619	2685	0.05	51	180	70	<5	<20	91	<.01	<10	4	<10	<1	46
- GOS-1 7	109534	5	11.4	0.19	<5	125	<5	0.19	6	51	54	1350	> 15	<10	<.01	3	31	<.01	312	810	370	<5	<20	15	<.01	<10	7	<10	<1	201
MAZPHY 8	109535	5	0.4	0.35	<5	45	<5	0.17	<1	7	154	172	1.40	<10	0.26	101	9	0.01	11	50	18	<5	<20	8	<.01	<10	2	<10	<1	23
PA 9	109536	5	7.2	0.25	275	80	40	0.41	<1	20	176	103	> 15	<10	0.05	128	23	<.01	58	490	240	<5	<20	16	<.01	<10	10	<10	<1	96
GCMB 10	109537	5	0.4	0.29	<5	50	<5	13.10	1	24	49	182	4.58	<10	1.10	340	5	<.01	43	900	22	<5	<20	343	<.01	<10	5	<10	6	108
SEDIM 11	109538	5	0.4	3.99	<5	80	<5	1.78	<1	18	146	106	4.81	<10	1.74	139	7	0.14	39	1140	84	10	<20	118	0.06	<10	31	<10	7	94
SEDAD 12	109539	5	0.4	1.53	<5	55	<5	0.29	<1	26	311	105	5.69	<10	1.22	224	13	0.02	51	180	32	<5	<20	15	0.03	<10	21	<10	<1	79
QC/DATA:																														
Repeat:																														
1	109528	5	0.4	0.51	<5	30	<5	0.08	<1	9	149	501	1.29	10	0.47	340	12	0.03	12	110	16	<5	<20	2	<.01	<10	4	<10	6	30
10	109537	5	0.4	0.30	<5	55	<5	14.20	1	26	54	183	5.00	<10	1.21	372	6	<.01	50	1010	22	<5	<20	373	<.01	<10	5	<10	6	118
Standard:																														
GEO'95		140	1.2	1.61	70	170	<5	1.66	<1	18	58	82	3.96	<10	0.95	624	<1	0.01	24	610	22	5	<20	54	0.08	<10	72	<10	4	72

ECO-TECH LABORATORIES LTD.
Frank J. Pezzotti, A.Sc.T.
B.C. Certified Assayer

d/966
XLS/95Bethlehem

ATTACHMENT 'A'

SUMMARY REPORT
on the
MARBLE EVALUATION of the DOLLY CLAIMS

TARGET - Carving and dimension stone grade white marble occurring within a tectonically thickened folded metamorphosed high purity dolomitic segment of the lower Cambrian age, Badshot Formation.

PROPERTY NAME - The Dolly Marble Property

LOCATION - The Dolly Marble Property is located about 100 road kilometers north of the city of Revelstoke , B.C. or more exactly, 4 kilometers east of the confluence of the Goldstream and Columbia Rivers. It is located within the Revelstoke Mining Division and is found within the Hoskins Creek map - NTS 82M/10.

ACCESS - Access to the property is obtained by driving 90 kilometers northward on Highway #23 from the intersection of the Trans Canada highway in Revelstoke then turning right on to Bethlehem's Goldstream mine road for about 5 kilometers then turning left along the canoe take out road for 4.1 kilometers where a recently constructed good logging road branches to the left, up the side of the hill, to the property. See attached map of (n).

CLAIM OWNERSHIP - This program will be performed on 12 - 2 post mineral claims recorded in the name of Robert Gerald Komarechka, FMC#114456, of Apt. #1 537 Haig Street, Sudbury, Ontario, P3C 1E2. An unregistered 1/3 interest is held by each of Gord Hurlburt of #43 1815 Varsity Estates Dr. N.W., Calgary, Alberta,T3B 3Y7, Kory Koke of 2612 13th Ave., N.W., Calgary, Alberta, T2N 1L9 and the recorded holder. These claims are listed below:

Claim Number	Claim Name	Units & Type
640701	DOLLY 1	1 unit 2 post minineral claim
640702	DOLLY 2	1 unit 2 post minineral claim
640703	DOLLY 3	1 unit 2 post minineral claim
640704	DOLLY 5	1 unit 2 post minineral claim
640708	DOLLY 4	1 unit 2 post minineral claim
651299	DOLLY 10	1 unit 2 post minineral claim
651300	DOLLY 11	1 unit 2 post minineral claim
651301	DOLLY 12	1 unit 2 post minineral claim
651302	DOLLY 13	1 unit 2 post minineral claim
651303	DOLLY 14	1 unit 2 post minineral claim
651304	DOLLY 15	1 unit 2 post minineral claim
651305	DOLLY 16	1 unit 2 post minineral claim

OPTIONS or CONTRACTUAL OBLIGATIONS - No contractual obligations exist on these claims at this time. Discussions are currently being conducted regarding a potential option agreement on this property with several prospective firms.

REGIONAL, LOCAL & PROPERTY GEOLOGY - Regionally, the Dolly Claims are located within the western portion of the Selkirk Mountains near the contact with the Shuswap Metamorphic Complex. A fault in the bed of the Columbia River divides

the Selkirks to the east from the Monashee Mountains in the Shuswap Complex to the west. The rocks in the vicinity of the claims are moderately metamorphosed (greenschist facies) with the metamorphic grade increasing in intensity to the northwest (Wheeler, 1965). Regionally, foliation tends to strike from about 270-360°. Dips vary widely depending on fault blocks orientation and folding. The original strike of most beds was likely from the northwest to southeast, but up to three phases of deformation (Hoy, 1979) complicates the situation.

The oldest rocks in this area are the Proterozoic and/or Lower Cambrian rocks of the Horsethief Creek Group. Lithology includes dark grey to dark brown slates and phyllites with scattered bands of quartz-mica schist, quartzite and impure marble. Limy and arenaceous bands are common near the top where the contact with the overlying Hamill Group is probably transitional. The recessive nature of this formation and the presence of rotated blocks makes identification and the determination of structural relationships difficult.

Of Lower Cambrian age and overlying the Hamill Group is the Badshot Formation. This is a persistant carbonate unit that parallels the Columbia River for several hundred kilometers as far as the south Kootenays (Wheeler, 1965). In the immediate vicinity of the Dolly Claims it is composed of snow -white to buff dolomitic marble with banded gray-white calcitic marble near its base.

Above the Badshot Formation lies the dark grey frequently graphitic slates and phyllites of the Lardeau Group. Schist, quartzite and thin marble stringers are known from this group but are not dominent in the map area. Within the Lardeau Group and near the contact of the Badshot lies a talc magnesite trend of pods associated with minor sulphides.

Locally the major rock type cosists of a white dolomitic marble of the Badshot Formation. To the north of the local area the Badshot narrows to a 800 meter band of darker buff to tan microcrystalline dolomite. In the vicinity of the Dolly Claims the dolomite turns to marble becoming whiter and more dense.

No trace of the southern strike continuation was found for the Badshot more than 1 kilometer to the south of the Dolly Caims. This information, combined with strike and dip measurements, suggest a fold structure with the Dolly Claims being staked along the eastern tectonically thickened arm of the Badshot. The western arm of this fold structure occurs along the high tension hydro line and the apex of this folded Badshot Marble lies just to the north of the Dolly Claims. It has also been suggested that this area may represent an allochthon slice of inverted stratigraphy (Read & Brown 1981). The result of these two observations suggest an inverted anticlinal structure. From field measurements it is suggested that the axis of this fold structure plunges to the north.

From outcrop exposures and ripped up bedrock, made apparent by the recent logging activities in this area, it appears that almost all of the area underlain by the Dolly Claims is primarily dolomitic white marble. This wide width (apparently 1200 meters), and the occasional presence of recrystalized coarse grained marble may suggest a tectonic thickening of the Badshot. There appears to be a variation of marble from east to west across this eastern arm. In the cleared area along the east-west claim boundary of Dolly 1 and Dolly 2 it was found that the more eastern exposures of white marble exhibited a faint fuzzy light grey veiling while the marble exposures to the west of this boundary were an even homogeneous white colour exhibiting a very fine grained to microcrystalline texture. Going further westward along the east-west claim boundary between Dolly 3 and Dolly 4 we find a local area of brilliantly white recrystalized medium grained marble. Finally, westward toward the south claim boundary of Dolly 5 we find banded white and gray calcareous marble. It should be noted that these observations are based on some widely spaced outcrops as overburden cover is extensive and of variable thickness.

Numerous angular rocks in the disturbed overburden confirm these general observations along other logged areas, southward up the hill, along strike.

CURRENT EXPLORATION STATUS - The current holders of the Dolly Claims, namely, Gord Hurlburt, Robert Komarechka and Kory Koke, have carried out exploration on the Badshot white dolomitic marbles in this area since 1986 and have held claims off and on along the western flank of the fold structure and northward. Assessment work on these claims (the Oro Viejo Group) undertaken in the summer of 1987 and 1988 in the form of geological mapping, line cutting of a grid and geochemical analysis indicated an immense reserve in excess of 25 million tonnes of +98% pure dolomite (Meyer, B. H., 1988). Several samples were also cut and took a high gloss when polished. An initial attempt was made to promote this occurrence for its mineral filler potential but distance to market proved a deterrent. Problems with regard to title of these resources (some land had surface rights previously allocated, recreational development restrictions, powerline right of ways and confusion regarding the staking of dolomite resources at this time of revison of the act) deterred promotion and further development, with the result the claims were allowed to lapse.

As a result of the above mapping, the existance of a possible fold structure with an eastern limb of white dolomitic marble was anticipated but never verified. In November of 1993 as a result of several claims lapsing in this area, and the recent interest in dimension stone, this area was examined and found to contain extensive unmapped white dolomitic marble. The observation of this marble was made apparent primarily due to the result of clearcutting in this area. A total of 12 claims were staked in this area to cover the majority of this eastern limb occurring on untitled crown land as confirmed in conversations with Phil Wellock, acting Gold Commissioner in Revelstoke and others

Surface grab samples collected from this area were given to several carvers for their comments. Samples were also shown to several marble dimension stone producers who indicated the possibility of some involvement. Communications are curently continuing with these marble producers.

RECOMMENDED WORK PROGRAM - The recommended work program could consist of two phases. Positive results of each phase will justify the next.

Phase #1 - Consisting of linecutting a baseline along strike (more or less north-south) with lines at 90° to the strike 100 meters apart and locating stations 25 meters apart, followed by a gradient magnetometer survey, mapping and locating at least one diamond drill fence across the strike of this marble. The diamond drill program would recover core to be examined to determine the variations in texture across the marble bed and to determine the fracture density and orientation at depth. This information is required to determine the marketability of the stone and to determine the most suitable orientation of a quarry face to maximize block size extraction. It is anticipated that the diamond drill holes would be drilled on a westward bearing dipping about 45°and drilled to a depth of 144 meters. This would require about 12 holes to completely section the width of this bed for each fence giving a total footage of (12 x 144 x 3.28) = 5670 feet. As positive results are recieved from the drill program, phase #2 will be undertaken.

Phase #2 - Will consist of stripping at least one area with the intention of preparing a small quarry face for the production of some blocks for carving, ASTM testing purposes and production of some tiles for market acceptance. No more than 1,000 tonnes would be removed from any claim.

Pending results of phase 2, ASTM testing and market acceptability, a decision may be made as to whether to maintain the quarry strictly as a carving stone

quarry, drill off another fence and evaluate alternate quarry test sites or consider application under the Land Tenure Act for commercial production of dimension stone.

ESTIMATED STARTING DATE OF PROGRAM - Once funding is secured and permits approved it is hoped that work would start at least by August 1994.

ESTIMATED COMPLETION DATE OF PROGRAM - It is intended that the field work for this program will be completed by November 1, 1995. The results from the ASTM tests and market response should be available by January.

REFERENCES -

Hoy, T. 1979. Geology of the Goldstream Area. British Columbia Ministry of Energy, Mines And Petroleum Resources, Bulletin #71.

Hurlburt, G. C., Koke, K., R., Meyer, B., H., 1988. The Oro Viejo Group, Revelstoke Mining Division. Assessment Report submitted to the British Columbia Ministry of Energy Mines and Petroleum Resources, November 15, 1988.

Keevil, Gordon A., 1977. Exploration Report of the Big Bend Claims, British Columbia assessment files, reference #06176.

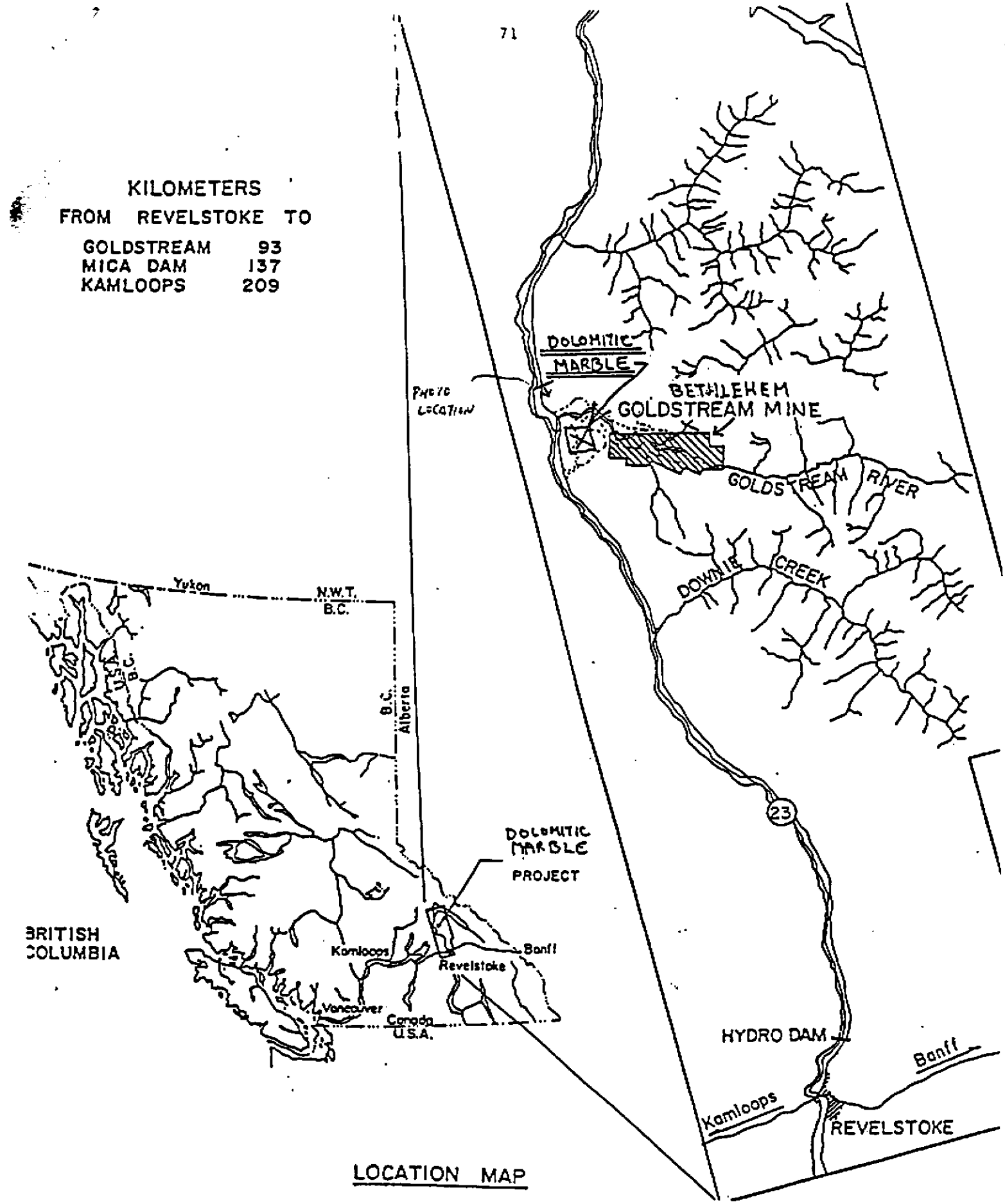
Komarechka, Robert G., 1987. Geological Report of The Oro Viejo Claims, Revelstoke Mining Division. Assessment Report submitted to the British Columbia Ministry of Energy, Mines and Petroleum Resources, November 30, 1987.

Lane, L. Brown, R. L. and Hoy, T., 1977., Geology of the Goldstream River - Downie Creek Area, Southeastern British Columbia. Preliminary Map #25, British Columbia Ministry of Energy Mines and Petroleum Resources.

Read, P. B., and Brown, R. L., 1981. Columbia River Fault Zone: Southeastern Margin of the Shuswap and Monashee Complexes. Southern British Columbia. Canadian Journal of Earth Science Vol. 18, 1981.

United States Bureau of Mines, 1975, Mineral Facts and Problems, 1975 edition by the Staff bureau of Mines United States Department of the Interior.

Wheeler, J. O., 1965, Big Bend Map Area, British Columbia. Geological Survey of Canada, Paper #64-32.

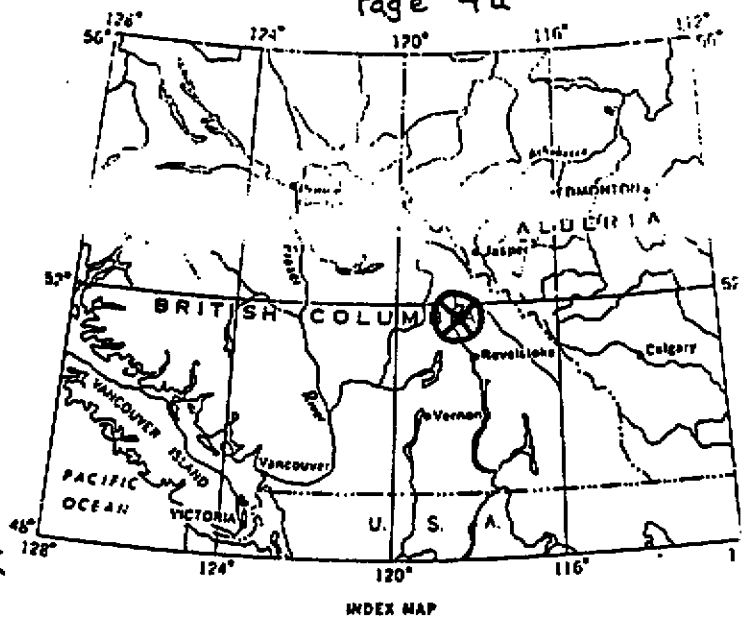


LOCATION MAP

FIGURE #1

Map 1

Index Map



Scale

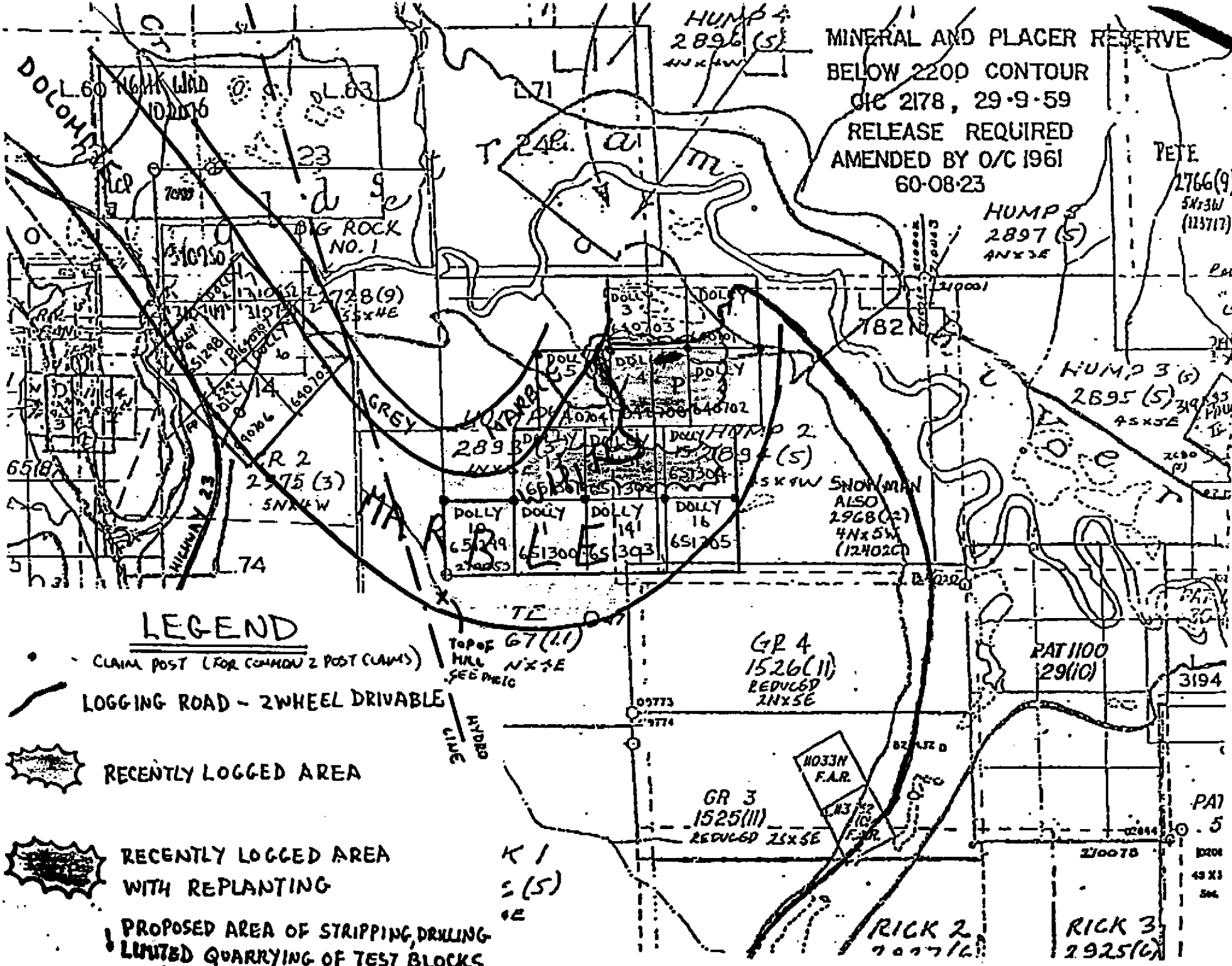
I——————I——————I
0 1 2 miles

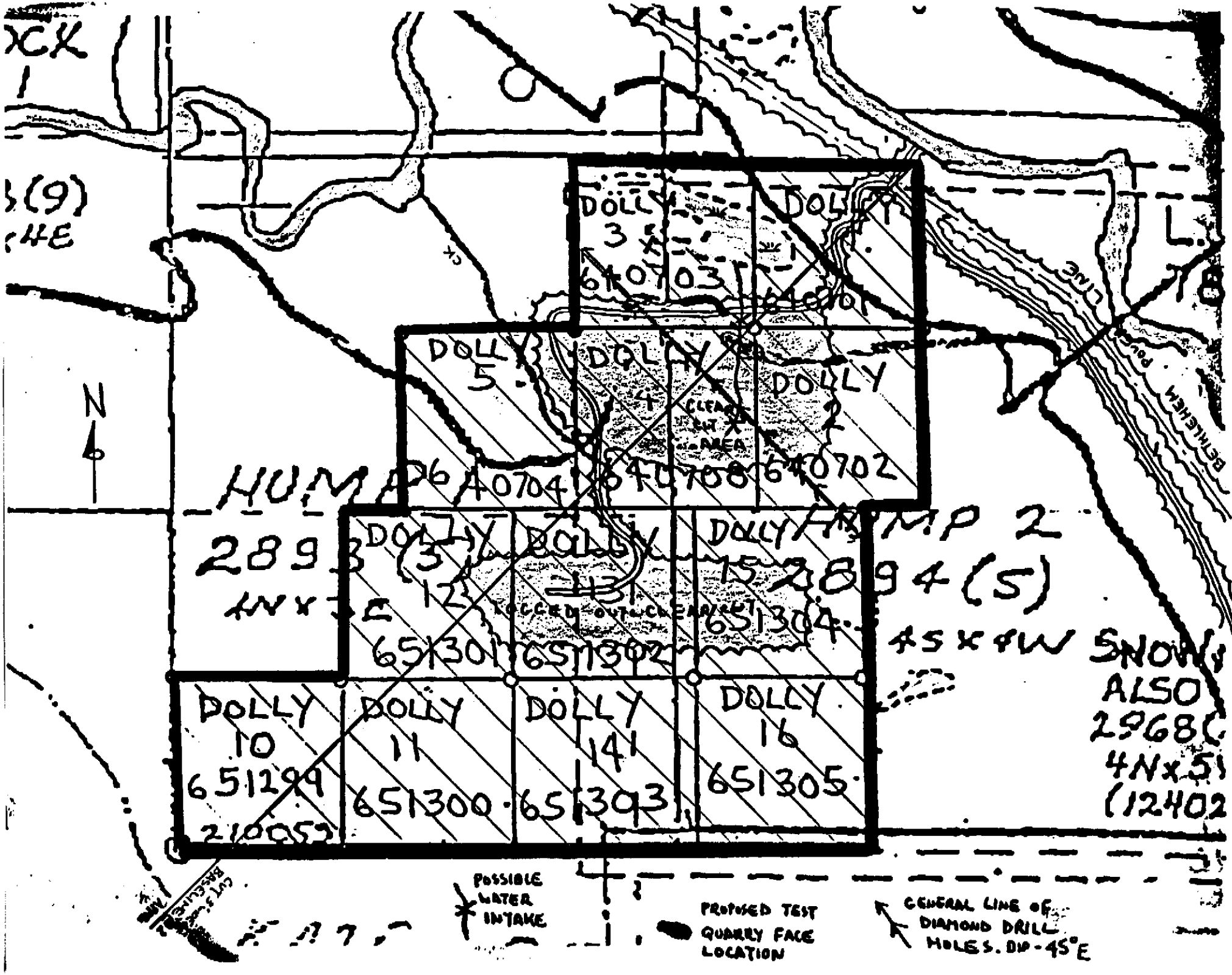
I——————I——————I
0 1000 2000 metres

Reproduced from Hoskins Creek topographical map 82M/10

Map 1

Index Map


MINERAL AND PLACER RESERVE
BELOW 2200 CONTOUR
O/C 2178, 29-9-59
RELEASE REQUIRED
AMENDED BY O/C 1961
60-08-23
HUMP 4
2896 (5)
HUMP 2
2897 (5)
4N x 3E
HUMP 3 (5)
2695 (5)
4S x 3E
PETE
2766 (9)
5N x 3W
(123717)
BIG ROCK NO. 1
DOLLY 3
DOLLY 4
DOLLY 5
DOLLY 10
DOLLY 11
DOLLY 14
DOLLY 16
GREY
MARBLE
TOP OF HILL SEE PHOTO
HYDRO LINE
SNOWMAN ALSO
2968 (2)
4N x 5W
(124020)
GR 4
1526 (11)
REDUCED 2N x 5E
GR 3
1525 (11)
REDUCED 2S x 5E
RICK 2
RICK 3
2925 (6)
PAT 1100
29 (10)
3194
LEGEND
CLAIM POST (FOR COMMON 2 POST CLAIMS)
LOGGING ROAD - 2 WHEEL DRIVABLE
RECENTLY LOGGED AREA
RECENTLY LOGGED AREA WITH REPLANTING
PROPOSED AREA OF STRIPPING, DRILLING & LIMITED QUARRYING OF TEST BLOCKS


DOLLY 3
640703
DOLLY
DOLLY 5
DOLLY 4
CLEAR CUT AREA
DOLLY 2
640704
640708
640702
HUMP 6
HUMP 2
2893 NW SE
DOLLY 12
DOLLY 13
DOLLY 15
2894 (5)
45 x 4W
651301
651302
651304
DOLLY 10
651299
DOLLY 11
651300
DOLLY 14
651303
DOLLY 16
651305
ALSO
POSSIBLE WATER INTAKE
PROPOSED TEST QUARRY FACE LOCATION
GENERAL LINE OF DIAMOND DRILL HOLES. DIP - 45° E

INFO TAKEN FROM:
OPEN FILE REPORT
PREPARED FOR THE
B.C. GEOLOGICAL SURVEY TITLED
LIMESTONE : DOLOMITE RESOURCES OF BRITISH COLUMBIA
BY PETER S FISCHL
APRIL 29, 1991.

0.92 per cent Fe_2O_3 (McCammon 1964). The dolomite is trucked to the company's plant in Sirdar where it is crushed, ground and screened to produce a variety of sized products for use in fillers, for decorative and architectural purposes and for agricultural lime.

A second deposit of dolomite on the east side of the Columbia River, 78 kilometres north-northwest of Revelstoke, was mapped and sampled by R.G. Komarechka in 1987. The dolomite is snow-white, microcrystalline, earthy to chalky and massive. The deposit contains a zone of high-purity dolomite (95-99 per cent dolomite), which strikes north-northwest for 4 kilometres with a width of 500 metres in the north and over 1500 metres in the south. Of 27 samples collected over a 7.3 kilometres strike length 19 contained greater than 21 per cent MgO and seventeen contained less than 0.10 per cent SiO_2 (Komarechka 1987).

The Reeves limestone comprises the basal carbonate member of the Laib Formation, a succession of phyllite, schist, quartzite and limestone exposed in three belts extending northeastward from the U.S. border, south of the Pend d'Oreille River and east of the Salmo River, for lengths of up to 40 kilometres (Figure 2). The more significant limestone occurrences are all in the western most belt, where the Reeves member is 90 to 107 metres in thickness. The limestone is grey and white banded to black and white banded to a more uniform grey or white, fine to medium-grained, with minor quartz and muscovite. The limestone is locally altered to buff-weathering, black to light grey, faintly banded to massive and fine-grained dolomite. Dolomite masses are frequently associated with sulphide mineralization in the western belt.

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Table 1

Dolomite Geochemical Analysis

Job#: 87-260

Sample Number	SiO2 -%-	Al2O3 -%-	CaO -%-	MgO -%-	Na2O -%-	K2O -%-	Fe2O3 -%-	MnO -%-	TiO2 -%-	LOI -%-	Total -%-
1	0.19	0.06	30.08	21.72	0.009	0.004	0.13	0.008	0.02	47.00	99.21
2	0.05	0.02	30.64	21.22	0.003	0.001	0.16	0.008	0.02	47.15	99.28
3	0.04	0.02	30.22	21.55	0.003	0.001	0.17	0.008	0.02	47.15	99.18
3a	0.09	0.02	30.08	21.72	0.007	0.001	0.10	0.006	0.02	46.95	98.98
4	0.09	0.06	30.36	21.55	0.005	0.004	0.17	0.010	0.02	46.90	99.16
5	0.09	0.06	29.94	21.72	0.004	0.002	0.16	0.008	0.02	47.00	98.99
6	0.96	0.30	49.66	4.59	0.012	0.040	0.19	0.012	0.03	43.75	99.55
6a	1.16	0.43	42.25	10.50	0.009	0.057	0.39	0.023	0.03	44.65	99.49
7	0.05	0.04	30.50	21.39	0.004	0.001	0.09	0.005	0.02	46.90	99.00
8	2.80	0.81	40.71	10.59	0.100	0.013	0.60	0.039	0.03	43.30	99.01
9	4.06	1.28	43.37	7.53	0.066	0.308	0.53	0.021	0.07	42.25	99.49
10	0.09	0.06	30.36	21.55	0.007	0.001	0.13	0.006	0.02	46.95	99.16
11	0.06	0.04	30.50	21.22	0.011	0.001	0.33	0.090	0.02	46.85	99.12
12	0.09	0.06	34.28	18.07	0.005	0.002	0.19	0.057	0.02	46.50	99.26
13	0.11	0.04	30.22	21.55	0.007	0.001	0.13	0.021	0.02	47.10	99.19
14	0.06	0.04	30.50	21.39	0.015	0.004	0.11	0.019	0.02	47.05	99.21
15	0.17	0.06	30.22	21.55	0.007	0.002	0.11	0.009	0.02	47.00	99.15
15a	0.19	0.08	30.64	21.22	0.011	0.001	0.14	0.013	0.02	46.85	99.16
16	0.06	0.04	31.06	20.89	0.009	0.006	0.16	0.034	0.02	46.95	99.22
17	0.28	0.15	49.10	5.41	0.016	0.022	0.10	0.014	0.02	44.00	99.11
18	0.06	0.06	30.64	21.22	0.005	0.001	0.26	0.044	0.02	46.90	99.21
19	0.04	0.04	30.22	21.55	0.003	0.001	0.16	0.041	0.02	46.95	99.02
20	0.05	0.04	30.22	21.55	0.003	0.002	0.20	0.014	0.02	47.05	99.16
21	0.24	0.11	48.69	5.89	0.005	0.006	0.19	0.026	0.02	44.00	99.16
22	0.04	0.04	30.50	21.39	0.012	0.001	0.27	0.049	0.02	47.00	99.32
23	0.06	0.04	30.78	21.06	0.003	0.001	0.29	0.048	0.02	46.90	99.19
24	0.04	0.04	31.62	20.39	0.003	0.001	0.11	0.027	0.02	46.60	98.85

Sample Number	Cu ppm	Ag ppm
9	4	<0.1
11	3	<0.1