

Geological Report by R. Jury, B. Sc.

The Sproat Mtn. Asbestos Prospect, Sidmouth,

Revelstoke M.D., B.C. 50° 117° N.W.

Composed of the following claims:-

Sid. 00, 0, 1, 2, 3, 4, 5, 6, 7, & 8

Arrow 4, 6, & 9A (all fractions)

Sproat 1, 3, 5, 6 (fraction), 7, 8, & 9.

(20 Claims in total)

82K/13W

Claims held by Canadian Johns-Manville Co. Ltd.

of Asbestos, P.Q.

Dates of work:- Sept. 1st. - 9th. 1962
inclusive (9 days)

and

Oct. 3rd. - 8th. 1962
inclusive (6 days)

00469

T A B L E O F C O N T E N T S.

General Geology	Page 1
Table of Formations Within Map Area	Page 1
Hamill Series	Page 2
Badshot Formation	Page 2
Quartz Veins	Page 2
Structural Geology	Page 3
Appendix	Page 4

Maps (6) Accompanying Report -

1	Claim Distribution Scale	1" = 500'	
2	Geology Sheet # 18	Scale 1" = 200'	
3	Geology Sheet # 13	Scale 1" = 200'	
4	Geology Sheet # 13 - 6	Scale 1" = 50'	
5	Geology Sheet # 13 - 11	Scale 1" = 50'	With legend
6	Geology Sheet # 13 - 14	Scale 1" = 50'	

Location and Grid Reference Map Scale 1" = 1000'
Shows departure position.

Department of	
Mines and Petroleum Resources	
ASSESSMENT REPORT	
NO. 469	MAP

October 8th., 1962

SPROAT MTN. ASBESTOS PROS., REVELSTOKE M.D., B.C.

GENERAL GEOLOGY.

The entire area covered by reconnaissance and detailed mapping is underlain by rocks of the Precambrian or early Palaeozoic Hamill series. (Jones, A.G., 1959; Vernon Map Area, G.S.C. Memoir 296)

The Hamill series is composed of slightly metamorphosed sedimentary rocks many of which are highly siliceous. Bands of dark blue and grey limestones occur throughout the series. Chlorite, sericite and carbonate rich schists are common. All rocks are very fine grained and are structurally simple except near the intrusive ultrabasic contact.

The ultrabasic sill intruding the Hamill series is apparently nearly conformable with the enclosing sediment but may very gently cut across the bedding along strike. The sill varies in thickness from one hundred to five hundred feet.

TABLE OF FORMATIONS WITHIN MAP AREA.

Era	Period	Lithology
Cenozoic	Pleistocene & Recent	Glacial Debris, Talus ^s and stream sediments.
	Unconformity	
		Quartz vein
		Ultrabasic Intrusive
	Intrusive Contact	
Precambrian and ? Paleozoic	Windsore and ? Cambrian	Hamill series of quartzite, mica schists, argillite and limestones.

HAMILL SERIES

The upper portion of the Hamill series is exposed on the claim group. The oldest sediments, and least metamorphosed, is a thick section of fine grained black shale exposed in the canyon of Crawford Creek. Dark bluish grey and creamy white limestones occur above the shale, followed in turn by repeated layers of metamorphosed quartzite and crystalline limestone, argillite, siliceous, calcareous, micaceous and chloritic schists and finally white massive faintly layered quartzite. Metamorphism appears to be more intense in the upper portion of the series.

The schistose rocks are generally fine grained and uniform in structure and texture. Carbonate crystals, where developed, are up to $1/8''$ in size giving the rock a spotted appearance on fresh surfaces. Elongate lenses and pods of quartz were noted in some outcrops. White quartz lenses, up to $\frac{1}{2}$ inch by 1 inch in size, elongate along schistosity planes may represent an original quartz rich conglomerate.

One of the thickest and most uniform lithologic sections of the Hamill series is the white quartzite. Several hundred feet of faintly banded impure greyish white and pink quartzite occur as the hanging wall of the ultrabasic intrusive. This rock is locally so massive and structurless that it closely resembles white vein quartz. Blocky fracturing and faint layering is however more characteristic. Layers of phyllite and micaceous schists several feet thick occur within the quartzites.

Light green soft fissile schist occurs above the quartzite and contains visible magnetite along some planes of schistosity. This schist is the cause of some anomalous magnetometer readings but has much too low a magnetite content to be of economic interest.

BADSHOT FORMATION

Thin banded grey limestone found at elevation 6000 feet near the headwaters of Dupont creek is thought to represent the Badshot limestone. This formation has not been mapped in detail nor has it been examined in a type section, but from descriptions in G.S.C. Memoirs 296 and 228 these outcrops may represent the Badshot.

QUARTZ VEINS

Past ultrabasic quartz veins are found throughout the Hamill series. Many are up to four feet wide and occasionally larger. Smaller veins are numerous. No sulphide was noted in any of these veins however a garlic odour was often noticed when hammering the veins. Pink and yellowish stains were noted along fracture planes in many veins. Poorly developed quartz crystals up to $1\frac{1}{2}$ inches wide on terminal faces were found in veins only two feet wide. Crystals were most often found in veins cutting the talc carbonate zone of the ultrabasic sill.

STRUCTURAL GEOLOGY

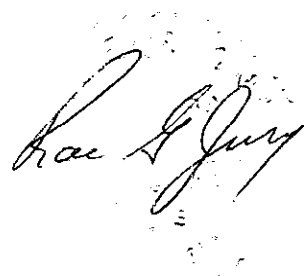
The ultrabasic sill outcrops on the west limb of a broad gently plunging synclinal fold. Its surface expression is a broad arc concave to the southwest. The sill is conformable with sediments of the Hamill series.

Strike faults in the area of the fibre zone are suspected but have not been observed. Minor cross faults especially near the fibre zone have been noted. Extensive fracturing is evident in the serpentized zones of the ultrabasic.

The southern extremity of the ultrabasic sill narrows rapidly before apparently lensing out. North-east the sill narrows quickly along strike to approximately 200 feet and continues very persistently at least as far as the first southern tributary of Crawford Creek. Only the wider fibre zone area of the sill is serpentized peridotite. The remainder of the sill is altered to talc carbonate.

Schists and limestone within several feet of the footwall contact of the sill are contorted and tightly folded where the sill gently cuts across the bedding. Where the sill is conformable with sediments the intrusive has had little if any effect on the sediments.

R. Jury.

A handwritten signature in cursive script, appearing to read "R. L. Jury", is located in the lower right quadrant of the page. The signature is written in dark ink and is somewhat stylized.

A P P E N D I X

Number employed in work:- One (R. Jury).

Time devoted to work:- 15 days

Periods of work:- Sept. 1st. - 9th. 1962 inclusive
Oct. 3rd. - 8th. 1962 inclusive

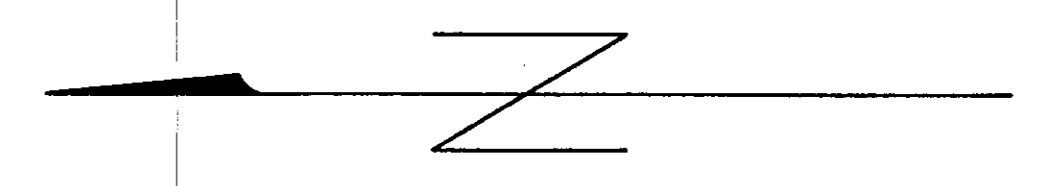
Fee per day:- \$20. 06.

Total Cost:- \$300.90.

And I make this solemn declaration conscientiously believing it to be true, and knowing that it is of the same force and effect as if made under oath and by virtue of the "Canada Evidence Act."

Declared before me at the *City*)
of *Vancouver* , in the)
Province of British Columbia, this)
15 day of *Feb.* 1963, A.D.)
Jill Turner
Sub-Mining Recorder

R. H. James



- Legend.**
- Posts of location lines, Claims to be Retained.
 - Posts of location lines, Claims to be Relinquished.
 - ⋯⋯⋯ Outlines, ultra-basic body.
 - - - - - Access road, dirt.

Map compiled from an enlarged N.T.S. map, air photos & a pace of compass traverse.

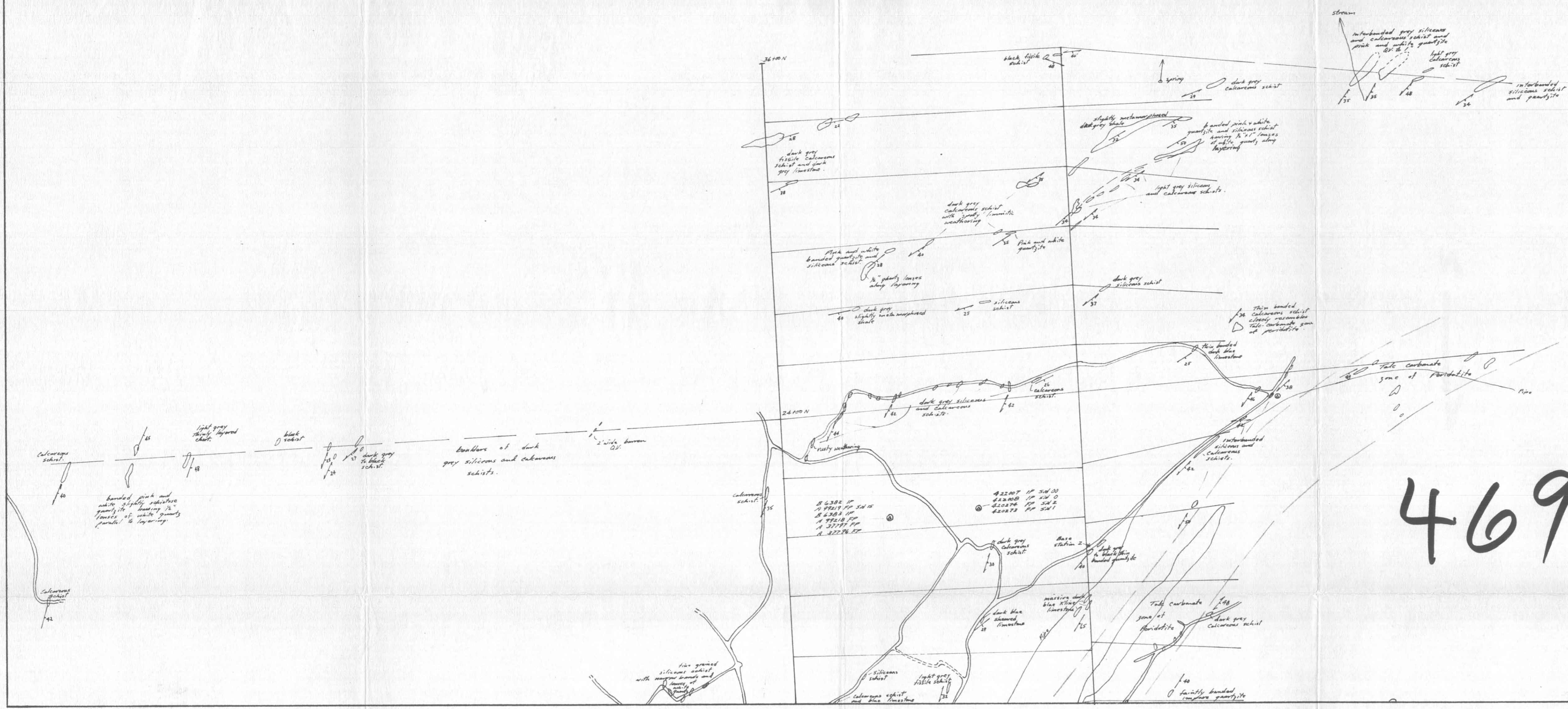
Claim Distribution

Claim Distribution

CANADIAN JOHNS-MANVILLE COMPANY LTD.
EXPLORATION DIVISION
VANCOUVER - BRITISH COLUMBIA - CANADA

Sproat Mtn. Prospect, B.C.
~~Claims to be Held Through~~
~~Period Spring '63 to Spring '64~~

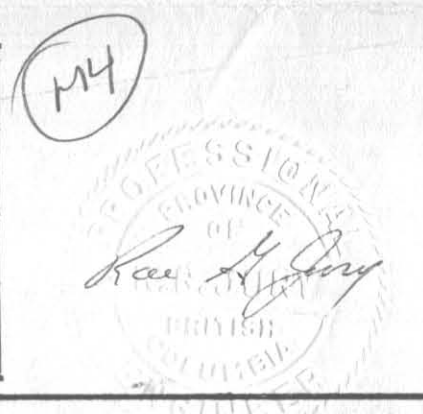
SCALE: 1" = 500'	DATE: Jan. '63	DRAWN: R.H.J. APP: R.H.J.
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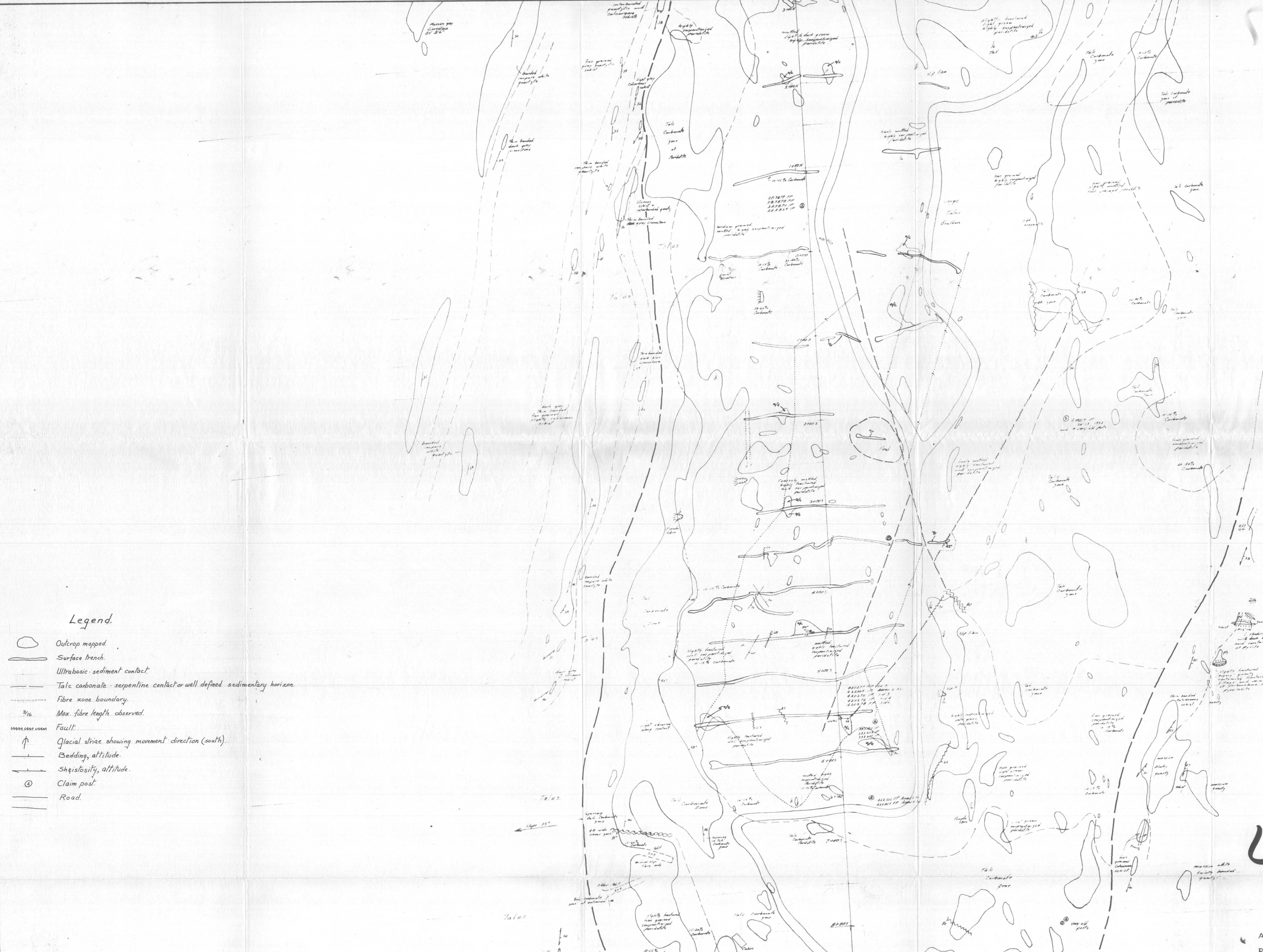


469

Department of
 Mines and Petroleum Resources
 ASSESSMENT REPORT
 NO. 469 MAP 4



M5



Legend.

- Outcrop mapped.
- Surface trench.
- Ultrabasic-sediment contact.
- Talc-carbonate-serpentine contact or well defined sedimentary horizon.
- Fibre zone boundary.
- Max. fibre length observed.
- Fault.
- Glacial striae showing movement direction (south).
- Bedding, attitude.
- Schistosity, attitude.
- Claim post.
- Road.

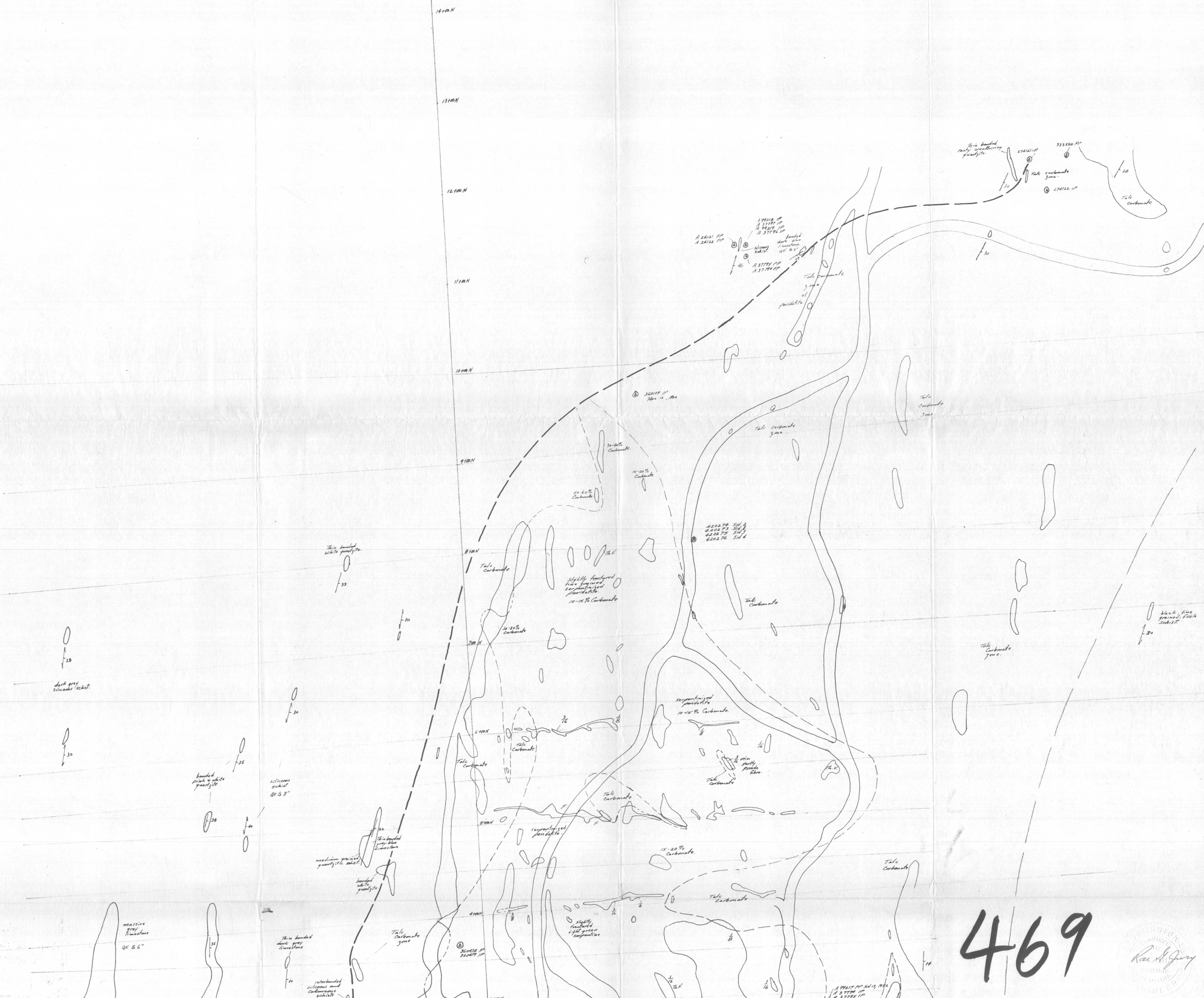
Note: Fibre Zone, chrysotile >1%, shown dotted.

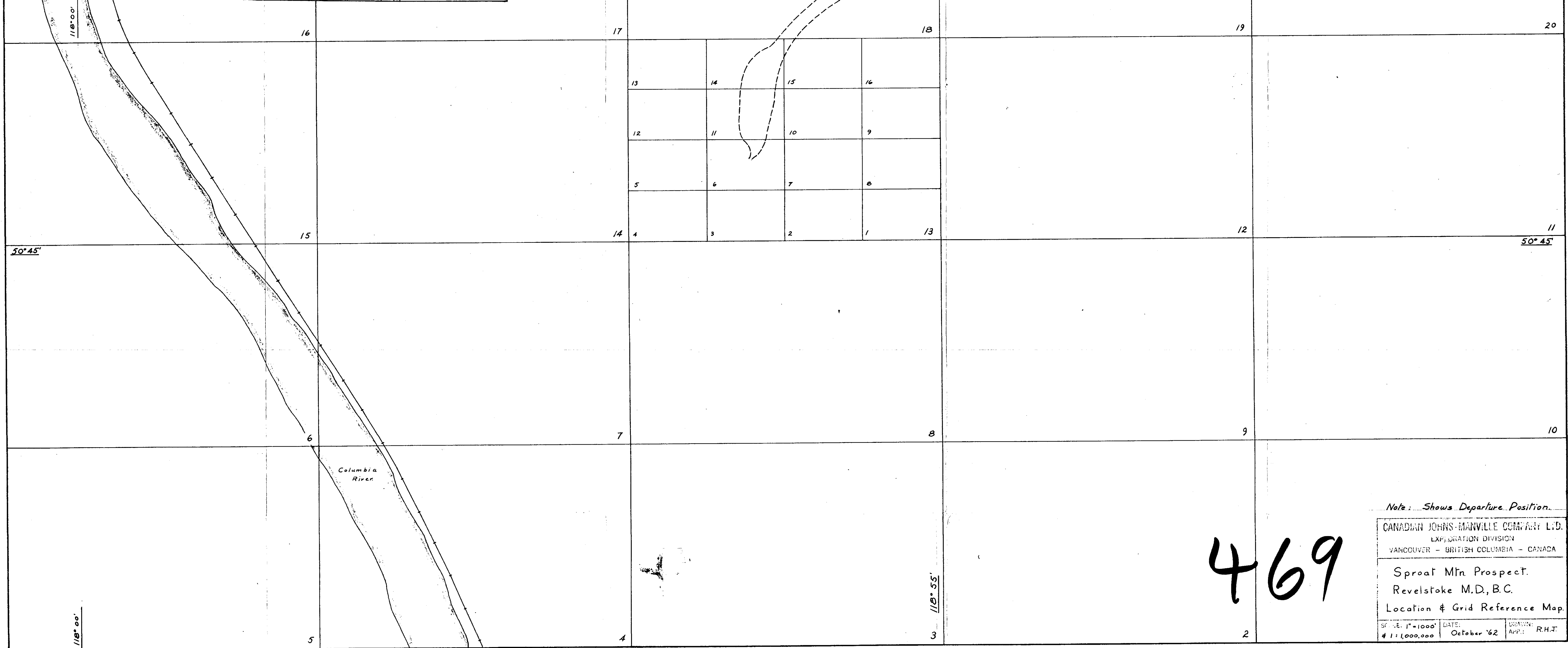
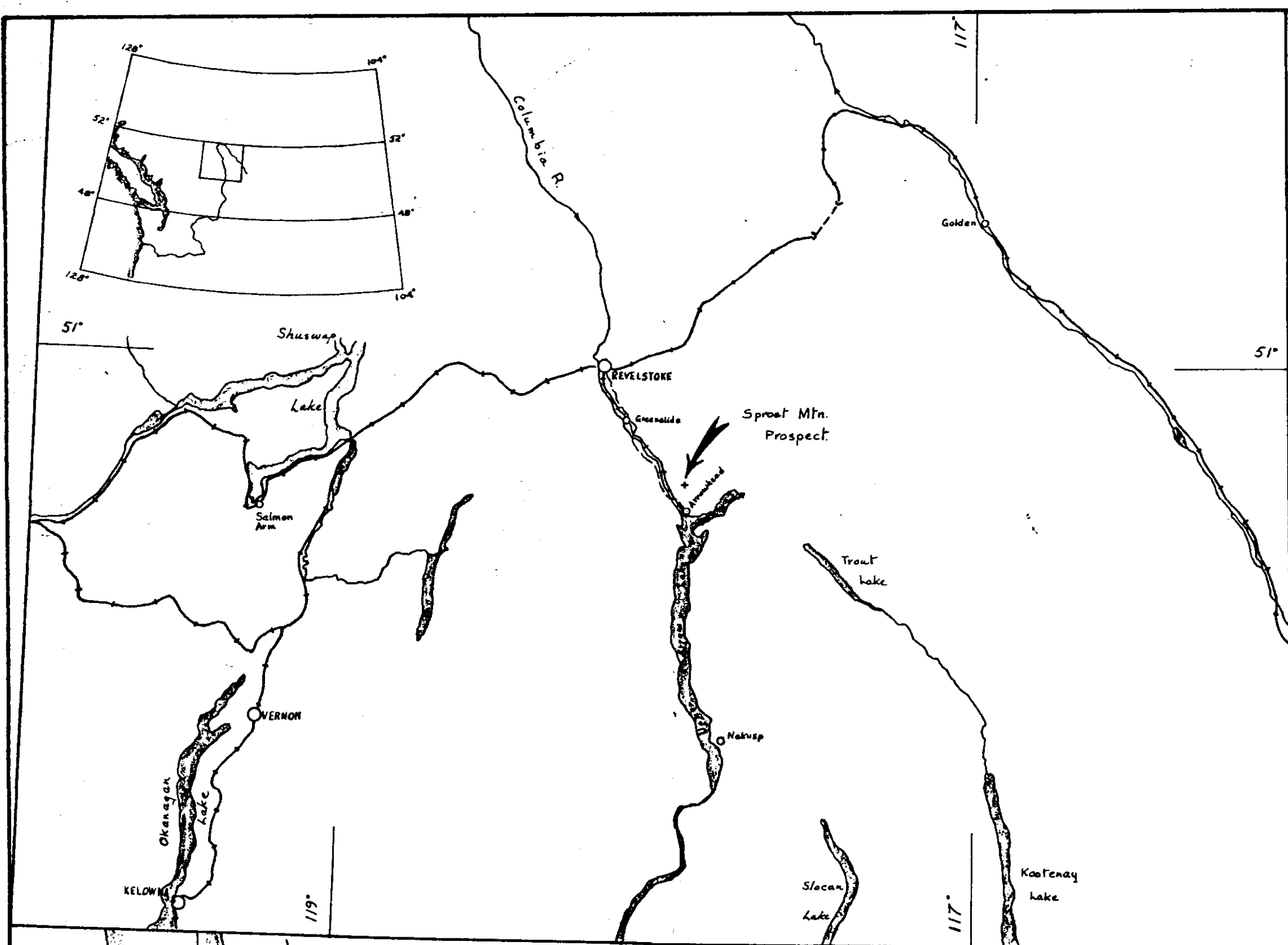
469



SPROAT MOUNTAIN
Asbestos Deposit - British Columbia
R.H. JAMES - Canadian Johns-Manville - Dec. 62.

Department of
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 ASSESSMENT REPORT
 NO. **469** MAP **6**





Note: Shows Departure Position.

CANADIAN JOHNS-MANVILLE COMPANY LTD.
 EXPLORATION DIVISION
 VANCOUVER - BRITISH COLUMBIA - CANADA

Sproat Mtn. Prospect.
 Revelstoke M.D., B.C.
 Location & Grid Reference Map.

SCALE: 1"=1000'
 # 1:1,000,000

DATE: October '62

DRAWN: R.H.J.
 APP: R.H.J.

469