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NITROCELL CANADA LTD.,

Hill Group

Nicola Mining Division

B.C.

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July 28, 1972 W.G. Hainsworth P.Eng.

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W. G. HAINSWORTH

CONSULTING GEOLOGIST

INTRODUCT ION

At the request of Mr. V.M. Prescott, managing director of NITROCELL CANADA LTD., this report has been prepared for the company concerning their recent claim block acquisition in the Aspen Grove area of British Columbia. The information contained herein is based on intensive study and evaluation of geological data pertaining to the area in general and information obtained during a visit to the property on November 22nd 1971.

The property is a copper prospect located in the Nicola Mining Division of British Columbia.

SUMMARY AND CONCLUSIONS

The twenty HILL claims of NITROCELL CANADA LTD., are located in the Nicola volcanics close to the contact with the Pennask Batholith.

Two sets of fracture systems, almost at right angles to one another, run to copper mineralization at the intersection of their planes. Mineralization may, or may not, continue beyond the junction. At the present stage of the property's development it is not known which of the systems was the more responsive to the mineralizing conditions.

Three adits, time of excavation unknown, have been driven on several of these shear structures along the sidehill of a ridge. The shears, as mentioned, are receptive to copper deposition in the sulphide and oxide versions. Assays taken from two of the adits by the writer ran good copper grades with weak gold and silver analyses.

The presence of copper, the strong structural design, and the favourable geological environment, all are factors which combine to warrant an intensive investigation of the property. The goal could be that of an underground high-grade copper operation. All investigation should be geared to that possibility.

RECOMMENDATIONS

The property should be examined through a two stage program. The first stage would be a reconnaisance program completely covering the twenty claims searching for targets. With the sucessful completion of this phase, the second stage would be the determination of the dimensions of the targets.

The first stage would utilize all purface surveys designed to show the presence of sub-surface mineralization and structure. For this purpose geochemical (soil analysis for copper) and geophysical (EM 16 for structural interpretation) surveys should be run along predetermined surface lines. In order to outline as many as possible shear intersections it is recommended that the lines be closely spaced, in the order of 200 feet. This tight grid spacing does not pose an expensive operation due to the openness of the terrain. It is also highly recommended that a geological survey be included at this point.

The second stage would be diamond drilling of the better targets resulting from the earlier phase. This initial drilling could well be expanded as targets proved themselves.

A later stage, and not elaborated upon at this point in time, would be underground exploration of the targets by means of adits.

An approximate budget for the above recommendations is presented. Stage I

Line Cutting:

31 line for 7500' each 1 base line for 6000' 2 tie lines for 6000' each	= 232,500 feet = 6,000 = 12,000
	250,500 feet or 47.5 miles
47.5 miles line work @ \$60/ mile	= \$ 2,750
Soil Sampling:	
2500 camples collected, assayed @ \$2	/semple = 6,250

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E.M. 16 Survey:

47.5 mile of readings @ \$60/mile		\$ 2,750	
Geological Survey:			
47.5 miles of mapping @ \$50/mile		2,375	
Interpretation & Consultation	and a	1,000	
Contingencies 10%	=	1,575	
		and the state of the	

Stage II

Diamond Drilling: 5000 feet @ \$10/foot = \$50,000Core Analysis: = 3,000 Interpretation & Consultation = 2,000 Contingencies 10% = 5,500\$60,500

From the above figures it can be seen that the property can be thoroughly examined in two stages for expenditures slightly over the \$75,000 figure.

July 28, 1972 Vancouver, B.C. W.G. Hainsworth P.Eng.

\$ 16,700

LOCATION & ACCESS

The claim block lies 18 miles southeast of the village of Merritt. Its co-ordinates are approximately 49° 55' North Latitude and 120° 28' Most Longitude. The N.T.S. location of the property is 92 H - 16 e.

Access to the claims is made at a point 15 miles south from Merritt on Highway #5. This easterly entry, just bouth of Courtney Lake, is a typical dirt road of this dry belt area which is used by ranching, logging and mining personnel. The road cuts through the northwestern portion of the claim group 113 miles from the main highway.

As neighbours, Bethlehem Copper has a large block of claims to the southwest of the NITROCELL block. To the north and northwest lie large claim groups belonging to International Mariners Resources Ltd.

PROPERTY

The NITROCELL CANADA claim block located in the Nicola Mining Division of British Columbia is composed of twenty (20) contiguous claims held by right of location.

The claims were recently purchased outright from V. Paulger of Kamloops, B.C.

Sufficient accessment work has been recorded against the claims to hold them in good standing for a year from their original recording date.

The claims were recorded in the Marritt Mining Recorders office on April 9, 1971.

The claims:

Hill 1-20 inclusive. Record numbers 48813-32 inclusive. In good standing until April 9, 1973.

TOPOCRAPHY

The topography of the claims can best be described as a modest rise

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20 18573 32696 C. PL 92 32024 1733 ECHO 17339 173406 co 4 H 15 5141 3269 59 CHALCO 37819N ECHO ne 80 p ECHOC 31977k 3202 36969 CITE 60 CHAL 32694 5455 32851 90 p HOC ECHO ECHO 31978 MALA CI 5268 32022 15269 N E 13 32695 .SCHO 11/11 3285 (97 3190 CHALCO CITL ECHO CHALCO 31975 N ECHS 144 11 320191 CITE C 58 32693 ACHO 31 G C 88 32020 15449P 15450 31976A ALSO ECHO ECHO 85 3696 15270N 15271N 297 35143 0 3198 CHITE 6 ECH 32853 ECHO 13 MALA MALA ECHO 56 ECHOC 32690 ECHO 23 320171 CHITE 182.41 CHITE Se N ECHO 31974 96 p 36797P 35799 HO 32018 9 EG 1 32691 2240 3198: 15462 3697 531 83 MAL ECHO MAL 5273A 32 955 ECHO 310711 10 3285k 32015K 152721 SCHO 51 ECHO 20 18112-ECHO 84 ci-ECHO 52016 31972 CHITE 3 CHITE 4 7 C 9 32854 35800 35/798F P 51 979 ECHO 319700 19 4.3 A G 36973 MAL MAL 35805 328 ECHO NO 52 6 0) 1545 MAL 31967K 31994 FR 369756 C 9 1 19 21 ECHO 36972 m ECHO 31968 K 378201 35803P ECHO ECHO 104 35804 F 98 20 MAL ECHO 3 LCHO 32859 35802 35801P MAL SC 30 K MAL p 103 492 36974 0 31982 24 MAL MAL 32859 EGHO 319651 25 C HO 1966 99 22 ECHO 23 ECHO ECHO 18C 36073 37821N 37822N 100 ECHO R 2575 72860 MAL 36074A MAL 2 348800 C 35154 MAL MAL 29 C 3286 Gr 31979 KC C 26 270 G P 31991 ECHO 3 35168 5157 12574 HN 500 125 GC G ECHO 20) 102 270 P 35160 20 12579 3516 188131 2 1257: GC WEN ABBIAD HIL HN 88231 2 1 10 HILL! 12578 12580 18824L HILL 2 498151 WEN 11 WENC HILL. 1 48916D P 4 HILL 2 10 12577 189251 HILL 9250 3514G-(63G 0 488261 35758 18817L WEN' BIONIST HILL 4 HILL 14 13 ABBIBL HILL GSPU N (188271) HILL 35757 5 15683E 457590 45760E 45768E 15761E 684E 35760 A8828D 188/91 6 GSPC A184 A 186 1 185 1/013 A 107 A183 GSP C 488200 HILL 35759 4 35762 188291 HILL 45757E 45758E 45784E 7634 15685E 4 6800 GSP GSPC 48830 48821 A IBI A 182 A 188 110 A 109 D 35761 6 HILL 188222 3576 d GSPC 9 168312 HILL GSI 45687E 13735E 15756E 4576.5E 4570 6885 5 10 HILL D 190 35763 112 A 179 A 180 A AI A - As C 188 GSP 4576BE 15689E43753E 45754E 5690E 5767 19392 192 191 A 113 A 177 A 178 A 114 C 45770E 19391 19400 3500 4.569 IE 15751E 45752E 45769E A 194 A 1193 116 A175 A 176 A 115 C. 01 19402 19399 15693E 45750E +57.191 457728 45771E 56.9A.E. A 174 A 195 RIT A 173 A 1/96 19401 194.04 118 C C 5696E45695E 45747E 45148 45774E 45773E 194.03 19406 A 119 A 171 A17. A 198 A 197 120 C. C 19405 45746E45.776E 45775E 48577(0) 485 457452 5698845697E A 169 A 170 A 300 OCELL A 121 WM 122 A199 Ŵ NI R CANAD si 22 457446 45778E 5 4.5777E 185756 CLAIMS 98 HILL 70000 257431 WM 1:108 A 201 124 A EDE N 45690 ASPEN GROVE, B.C. 4 V C 20 2ABE 45780E 45779E 485736) 48. 45701E 7026 LOCATION AIM 204 186 A_125 A EO3 WM W 18 CS Can an C 15 ·波文前14 SCALE : I"= 1/2 Mile 157391 11 TOBE 457078 151.1.1. 45781E 481 W.G.H. 100

starting in the western half, approximately 3900' above sealevel, to a height exceeding 4400' along the eastern boundary. The claims lie along the northwestern flank of a two mile long ridge which peaks in the 4900' elevation.

The ground is typical of this dry belt area being predominately rolling pasture lands. Little timber is present except for small clumps of spruce, pine and fir normally located near low swampy areas.

The overburden does not appear to be very thick. The amount of rock exposures is modest due to the persistent but thin soil mantle.

HISTORY OF THE AREA

The Aspen Grove area is an integral portion of the well-established Princeton-Merritt-Kamloops copper belt. The mineral deposits of this area are represented by a number of diverse types. The principle copper deposits occur as vein structures, shear zone fillings and disseminated material.

The quartz-diorite intrusive mass which covers most of the northeastern portion of the Princeton map area has seen sporadic but intensive investigation during the last century. The early gold and platinum placer miners working the Tulameen and Similkameen Rivers and their tributaries in the early 1860's edged further inland to this large intrusive body. Small lode deposits along the creek beds were the initial discoveries. However this area despite scattered showings of base and precious metals was singularily unsuccessful in developing a producing mine during the first half of the Twentyth century. An exception to this was the Copper Mountain deposit near Princeton.

In 1964 Brenda Mines started their field program on one of the better known old properties. The program eventually led to the proving up of a large tonnage porphry copper orebody. In 1968 Newmont of Canada using a new approach to the old Copper Mountain property developed a large reserve of low grade material at the present Ingerbelle Mine.

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GEOLOGY

Geologically the large area under consideration covers part of the western margin of an intrusive mass that connects the Okanagan Batholith to the south with the Pennask Batholith on the north. Several offshoot plugs of the batholiths lie peripheral to the main bodies. Between the two batholiths and intruded by the connecting mass are stratified country rocks of the Nicola Group, which occur partly as an uninterrupted expanse to the west and partly as fair-sized isolated bodies further east within the intrusive structure.

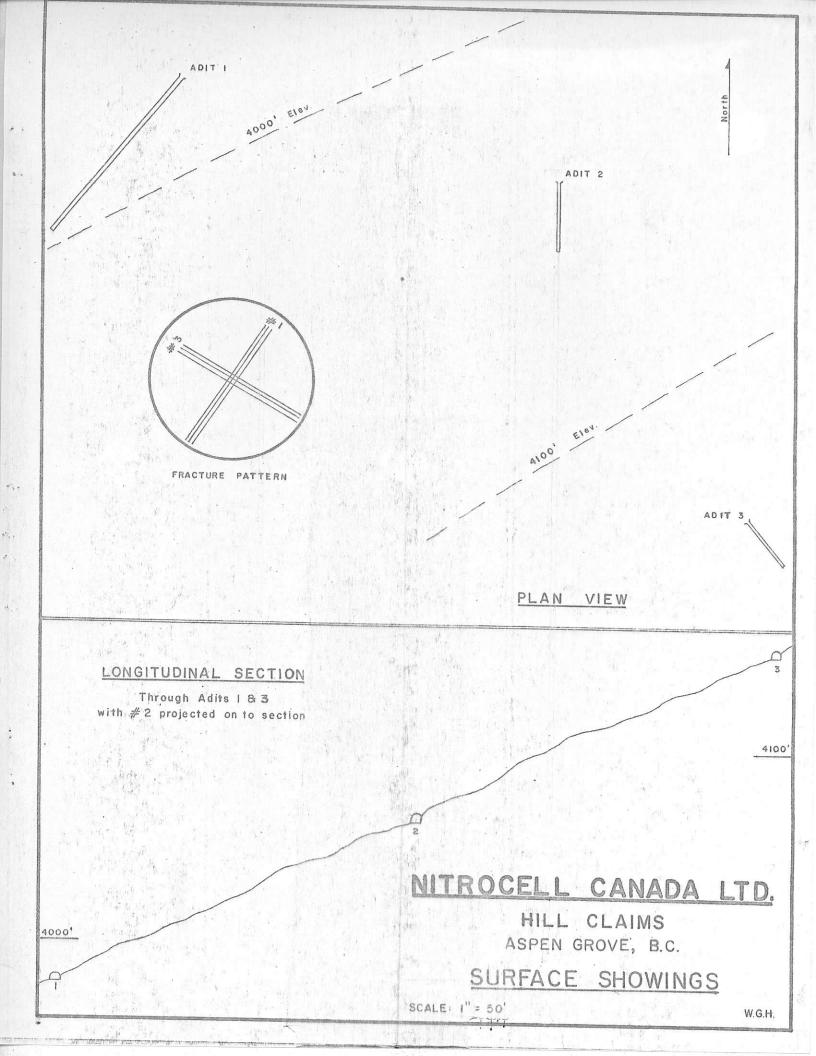
The Coast intrusions, of which the Okanagan and Pennask batholiths are prodigies, are believed to represent a protracted and, possibly, intermittent period of intrusion continuing from Jurrassic through to the Upper Cretaceous period. Three phases of this intrusion have been recognized. Government mapping of the area shows the various types to cut one another whereas in other localities the contacts are gradational. Characteristic of the three phases is a tendency to be acidic, carry large amounts of free quartz and to maintain a composition between granodiorite and quartz diorite.

Structurally the formations of the Nicola group have been folded into tight, north to northeast trending anticlines and synclines. Faulting is well developed in the area extending north from Princeton but is not as much in surficial evidence in the Aspen Grove area. The fault action, thought to be pre-intrusive, has had later movement which affected the Jurassic intrusive bodies.

The NITROCELL group of HILL claims lies a mile and a half west of the western boundary of the Pennask batholith.

The claims are represented on government geological maps as being completely underlain by Nicola volcanics. The writer verified the presence of these volcanics during the examination. In addition some granitic material was

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identified in one trench.

The general trend of the fracture systems in the volcanics on the NITROCELL claims is north to northwest with steep dips to the east. A strong set of northeast trending fractures also exists.

SHOW INGS

The showings on the property consist of three adits and several trenches. The adits date back several decades at least whereas the trenches have been put in quite recently.

The three adits are located at several points up the side hill of the ridge with the two trenches being at higher elevations.

Adit # 1: This adit is located a short distance from the road at valley level (3975' elev).

The host rock is Nicola andesites of a dark greenish to black colour in an aphanitic texture. The adit has been driven over a hundred feet into the sidehill on a bearing of S 40° W. Objective of the drive was a shear structure which resulted from two cross cutting fracture zones. The fracture zones run 120° and 35° azimuth. At their junction a strong shear results along the 35° set, which dips steeply to the east. Mineralization in the form of chalcopyrite and its accompanying oxide form, malachite, prevails at the intersection of the fractures. Strong oxidation is present. The width of the shear varies from 12° to 18° but mineralization often runs into the wall rock.

At a point 20 feet in from the portal the writer chipped a 3 foot sample (# 14152) from the back across a highly oxidized zone. The assay:

Cu: 2.58%; Au: Tr; Ag: 0.15 oz/t.

At another point in the same adit 30 feet from the face a 2 foot sample (# 14153) was chipped from the back across weakly mineralized shear rock. The assay:

Cu; 2.62%; Au: 0.02 oz/t; Ag: 0.96 oz/t.

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Adit # 2: This adit is located some 200 feet further up the sidehill at the 4050" elevation. It has been driven for 35 feet on a south bearing. Again the point of interest is a weakly mineralized shear varying from $2\frac{1}{2}$ feet at the portal to 2" at the face. No sample was taken from this working.

Adit # 3: This cribbed structure is located 200 feet further up the hill at elevation 4150'. The 30 foot drive shows a steep dipping mineralized shear striking S 40° E. A high-grade ore dump at the portal yielded the following from a grab sample:

Cu: 4.84%; Au: 0.02 oz/t; Ag: 1.36 oz/t.

<u>Trench # 1</u>: Thirty feet further up the hill from the last adit and at the 4175' elevation a trench has been ripped through the shallow overburden for several hundred feet. The trench shows a strong oxidation effect and is well stained with malachite and small amounts of azurite. Some sulphides, chalcopyrite and pyrite, were noticed but were not strong. Unfortunately the ripped rock was not cleared nor was the ripping taken below the oxidation level in order to show trench walls. A narrow dyke of fine-grained, acidic material appeared to cut the ripped area.

<u>Trench # 2</u>: At the 4350' elevation another trench showed very little mineralization.

With reference to sketch showing the adits etc, it would appear that #1 and # 3 adits are on diametrically opposite shears. Presumably the stronger and better mineralized of the two sets at the portal of each adit decided the direction that that particular drive would take. In the case of #2 adit the writer postulates that at the portal the strength of the shears and the mineralization was confusing to the miners so they drove due south. As they progressed south the shear would naturally weaken as they drove across and

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out of the strikes of both fracture zones.

It should be noted that copper oxides are present in all adits and trenches. This could be due to either an oxide zone extending an unknown depth below the bedrock or to the breakdown of chalcopyrite brought about by the time element involved since the adit and trenches were opened.

The survey of the adits and trenches was by rough pace and compass during the examination.

The assays were for total copper and would include the oxide copper in the final figure. Assaying was done by General Testing Laboratories of Vancouver.

Respectfully submitted,

July 28, 1972 Vancouver, B.C.

W.G. Hainsworth P.Eng.

W. G. HAINSWORTH CONSULTING GEOLOGIST

CERTIFICATE

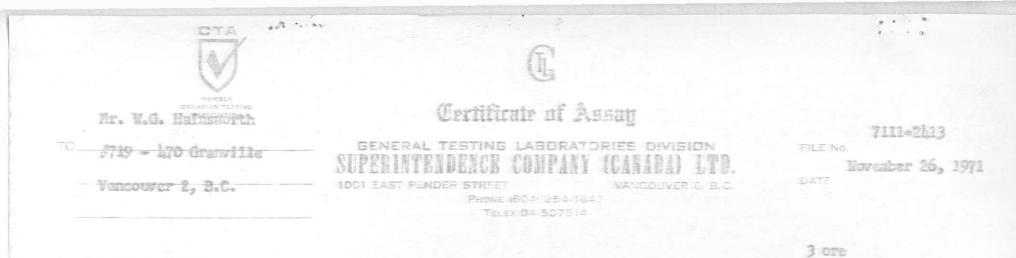
I, WILLIAM G. HAINSWORTH, HEREBY CERTIFY:

- That I am a geologist residing at #303 2187 Bellevue St.,
 West Vancouver, British Columbia.
 - 2. That I am a graduate of the University of Western Ontario, London Ontario with a B.SC. degree in Honours Geology and am a registered member of the Association of Professional Engineers of the Province of British Columbia.
 - 3. That I have practiced my profession for twenty-two years.
 - 4. That I have no financial interest, either direct or indirect in the subject properties, in the securities of Nitrocell Canada Ltd., nor in that of any of its affiliates and that I do not expect to obtain any such interest.
 - That the information contained in this report is based on my personal knowledge of the general area and specific examination of the property pertained to in the report on November 22, 1971.

Vancouver, B.C. July 28, 1972

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W.G. Hainsworth P.Eng.



We Hereby Certify that the following are the results of assays made by us upon submitted

	G	OLD	SILVER	Copper (Ce)			1.50		
MARKED	OUNCES FER TON	PER TON	DUNCES PER TOM	PER CEN7	Pas N7	IPEK CENT	PER	RER	PER
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26152	12765 C	eterena	0.15	2.58		194625		Tileno an	1220
100	0.02	0.70	0.96	2,62		-	Gamban	a and	-62.00 M

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concrete to second arrangement.

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We Hereby Certify that the following are the results of assays made by us upon submitted.

	GO	LD	SILVER	Copper (Cu)						
MARKED	OUNCES PER TON	VALUE PER TON	OUNCES PER TON	PER CENT	PER CENT	PER . CENT	PER CENT	PER CENT	PER	
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14152	trace		0.15	2.58				00.00	-	
14153	0.02	0.70	0.96	2.62	State case tools	100-102-00		597-168 545		
					: Allers					
						•				

SH:AT

Note: Rejects retained two weeks

Pulps retained three months

Pulps and rejects may be stored for a maximum

of one year by special arrangement.

GOPY

Gold calculated at \$

H. Sharple

3 ore

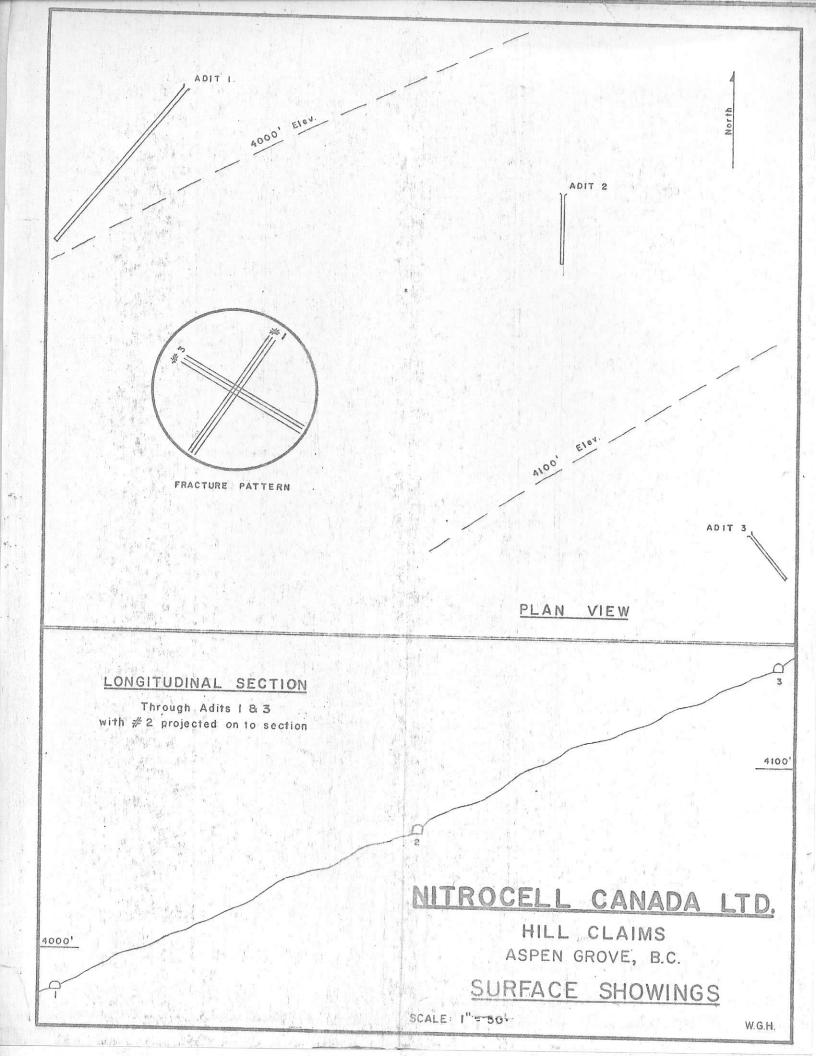
per ounce

samples

Provincial Assayer

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20 18573 32696 CIPI 1733. 17340E ECHO 32024 ćo H 15 ECHS 32697 17339 5141 59 37819N P CHALCO ECHO ne 80 ECHOC 31977k 32021 36969 CITE 32694 60 15455 32851 CHAL 90 HOC 11! p ECHO ECHO 31978 MALA CI 15268, 32022 20 15269 N E 13 13 32695 571 3285 SCHO 1319 4 n 11/1 11 ECHO 31976 CHALCO CHALCO 14 4 1 ECHS 32019k CITE C CITE 58 50 32693 ECHO G 88 31 32020 31976K 15449P 0 ECHO ALSO 3696 5 15271N ECHO 15270N 293 35/43 0 85 55 3198 ECH IALA 54 32853 ECHO ECHO CHITE 15 MAIA MRIA. 56 ECHOC 132690 32017k 3182.41 CHITE 2 C ECHO CHITE 86 31974 95 N 23 p 36797P ECHO 35799 ECHO 320191 9 1 32691 31983 15452 3697 NO 530 83 ECHO MAL MAL 5273A 31971k 32 855 EC 152721 32015K 3285A 54 ECNO 20 ARLP? 84 21 EC 10 0 ECHO 1 32016 21975 CHITE 7C 35/798P 9, C 35800 P 32854 510 6976 CHITE -\$ 1.0 0 931 ECHO 31 12 319700 MAL MAL 3580 36973 32857 ECHO 6 52 5454 MAL 319674 3198 FR G 97 656 9 21 EGHO 19 m 36972 319684 ECHO 378201 35803F FCHO ECHO 104 35804 98 MAL 20 ECHO \$50 3 ECHO 35802F 35801P 32858 6 1 C MAL 300 28 C 103 49 1-MAL 36974 0 MAL MAL 24 32859 31982 ECHO 31965% 25 1 50 99 ECHO 23 22 ECHE ECHO AFR ECHO 12 36073 18C 37821N 37822N 100 P 32860 2575 MAL 30 36074A MAL E 2 348800 C 35155 MAL 29 0 MAL 32861 31979 KC C 270 26 P 6 3199 ECHO F 3 35168 35/57 5.60 12574 125 GC G ECHO 102 200 HN P 27 35160 20 P 2519 35161 1 48813 12573 G WEN BIAL HIL HN 3 0 9827 10 HILL 2578 12580 88241 HILL :2 48815L WEN 11 HILL WENC 1 P 4 48816D HILL 2 12 12577 .7 1257) HILL 9150 35758 4882.61 188171 W BIONEY 35146 HILL 1 (63G HILL 11 13 488/8L GSPL HILL N (188271) HILL 35757 5 684E +5683E 45759E 45760E 45762E STALE 35760 18828D GSPC 488/91 6 A 107 A183 A184 A 186 9 185 103 GSP C 188200 HILL 4 35759 35762 18829D HILL 686245685E45757E 4.5758E 45764E 763 GSP GSPC 48830 V D 48821 9 110 A 109 A IBI A 182 A 188 3 3576 6 18822Z HILL 3576 GSP 48831T HILL GS +3735E 45756E 45766E 6885 45687E 45 5 HILL D 35763 A A 179 A 180 A 190 A UR 198 690E45689E43753E 45768E 45754E 5767 19392 A 192 A 178 191 114 A 113 A 177 0 c 092E 45691E 45751E 45770E45769E 19391 19400 45752E A175 A 176 A 194 AI 193 116 A 115 C C 19399 19402 694E 45693E 45749E45750E 45772E 45771E C A117 A 1/96 A 195 118 A 17.3 A 174 19401 19404 C C C 45774E 19406 19403 45773E 696E45695E 45747E 45748 A 198 120 A 119 A 171 A17. A 197 0 0 C 19405 45746E 45.776E 45775E 48577(0) 485 45745 598E 45657E NITROCELL CANADA A 169 122 A 121 A 170 A 300 A 199 WM W LTD 22 ç. ć ç., 15744E 45778E ero 4.5777E 485756 48 HILL CLAIMS 7005 157434 A.108 A 202 WM 124 A 201 N 45690 ASPEN GROVE, B.C. 0 20 V ć 48573(0) TOPE 45701F 45741E 457.80E 4.5779E 48 CLAIM LOCATION = = W A EQ4 186 A_125 A 203 WM 18 C :2: C C SCALE : I"= 1/2 Mile 08E45707E45739545740E * 3 3 48 4578/E W.G.H 485710





	GO	LD	SILVER	Copper (Cu)			1		
MARKED	PER TON	VALUE PER TON	DUNCES PER TON	PER CENT	PER CENT	PER CENT	PER	HER DENT	P
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14151	0.02	0.70	1.36	4.84	Rear Providence	107 atriga	wheels	-5500 cr	
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	d Callenne				40.0040	10.020	Westerd	(200-00	
14153	0.02	0.70	0,96	2,62	10.000	- 100 tip no-	siviliar	100 au 10	-
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STAR							1	1	

Pulps and rejects may be stored for a maximum

of one year in sportal arrangement.

UU 100 STREEDLOS