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Province of
British Columbia

Ministry of
Energy, Mines and
Petroleum Resources

ASSESSMENT REPORT
TITLE PAGE AND SUMMARY

TYPE OF REPORT/SURVEY(S) DRILL REPORT	TOTAL COST 58,631.80
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AUTHOR(S) Phil D. de Souza, P.Eng SIGNATURE(S) P. D. de Souza

DATE STATEMENT OF EXPLORATION AND DEVELOPMENT FILED June 16, 1993 YEAR OF WORK 1992

PROPERTY NAME(S) CEDAR GROUP 1A

COMMODITIES PRESENT Copper Silver Gold

B.C. MINERAL INVENTORY NUMBER(S), IF KNOWN

MINING DIVISION FORT STEELE NTS 82G6E

LATITUDE 49.24.15 North LONGITUDE 115.13.30 West

NAMES and NUMBERS of all mineral tenures in good standing (when work was done) that form the property [Examples: TAX 1-4, FIRE 2 (12 units); PHOENIX (Lot 1706); Mineral Lease M 123; Mining or Certified Mining Lease ML 12 (claims involved)]:

LOG NO. SEP 20 1993

OWNER(S)
(1) R. H. STANFIELD (2)

MAILING ADDRESS
Suite 350, 4723 1st Street SW
CALGARY, Alta T2G 4Y8

OPERATOR(S) (that is, Company paying for the work)
(1) As above (2)

RECEIVED
GOVERNMENT AGENT
NELSON
SEP 13 1993
NOT AN OFFICIAL RECEIPT
TRANS #

MAILING ADDRESS
As above

SUMMARY GEOLOGY (lithology, age, structure, alteration, mineralization, size, and attitude):
Recent tills, gravels, sands and alluvium overlying uninterrupted sequences of Aldridge Argillite (lower, middle and upper) with evidence of Creston Argillite. A Shear Zone thought to be associated with the Rocky Mountain Trench east margin cuts across the Claim Group. Evidence of step faulting along the margin exists.

REFERENCES TO PREVIOUS WORK Trenching and early mining through Shafts and Adits on Copper, Silver and Gold occurrences. (c. 1900). Stanfield exploration. (see Refs)

22,997

CONTENTS

										Page
1.	Introduction	...	...	...	...	...	...	...	...	1
2.	Location	...	...	...	...	...	...	...	...	1
3.	Physiography	...	...	...	...	...	...	...	...	1
4.	Previous Work	...	...	...	...	...	...	...	...	2
5.	Geology	...	...	...	...	...	...	...	...	2
6.	Objectives	...	...	...	...	...	...	...	...	3
7.	Logs, Lithology and Structure - Diamond Drill Hole C1.92	...	...	...	...	...	...	...	...	4
8.	Results and Conclusions	9
9.	Statement of Costs	10
10.	References - on company file	12
11.	Certificate									

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FIGURES

Figure 1	...	Location and Claim Area	after page	1
Figure 2	...	Tectonic Domains showing Cedar Group 1A	2
Figure 3	...	Local Area Geology and Drill Site	...	...	...	3

1. Introduction.

Diamond Drill Hole C1.92 was commenced on July 30, 1992 and terminated on November 18, 1992. Commenced at an elevation of 908 metres on the central southerly boundary of the northeast quadrant of Cedar #3 of the Cedar Group #1A, the hole was drilled to a depth of 1058.27m (3472ft) through a pre-percussed casing to bedrock of 187.76m (616ft). The hole was sited on the southerly fringe of the BC Hydro Power Line clearing to the south of the main southerly dipping shear zone thought to comprise the major zone of imbricate faulting comprising the easterly Rocky Mountain Trench margin.

Cedar Group #1A comprises five contiguous mineral claims within the total Stanfield Holdings in the Fort Steele Mining Division of southeast British Columbia.

2. Location.

The Stanfield Holdings are located totally within the Fort Steele Mining Division of southeast British Columbia (NTS 82G6) astride Provincial Highway #3 almost halfway between the towns of Fernie and Cranbrook and encompassing the community of Galloway, see Figure 1.

Cedar Group #1A sits astride a section of the Rocky Mountain Trench easterly margin in the vicinity of Rosen Lake immediately to the north of the communities of Galloway and Jaffray - see Figure 2.

3. Physiography.

The claim group (Cedar #1A) extends from an elevation of 853 metres in the Rocky Mountain at Jaffray to an elevation of 1676 metres on the southwest facing slopes of the Lizard (Front) Range mountains known as Mountain #2 (the most southerly) and Mountain #3 (the northerly of the two) by the Stanfield Group.

Ground Water run off from the Front Range flows southwesterly to the southerly flowing Little Sand Creek on the western boundary of Cedar #2 and #4 or to the westerly flowing Big Sand Creek on the eastern and southern boundary of Cedar #1 and thence, in both cases, westwards to the Kootenay River at Lake Koocanusa.

*THE
R. H. STANFIELD
GROUP*

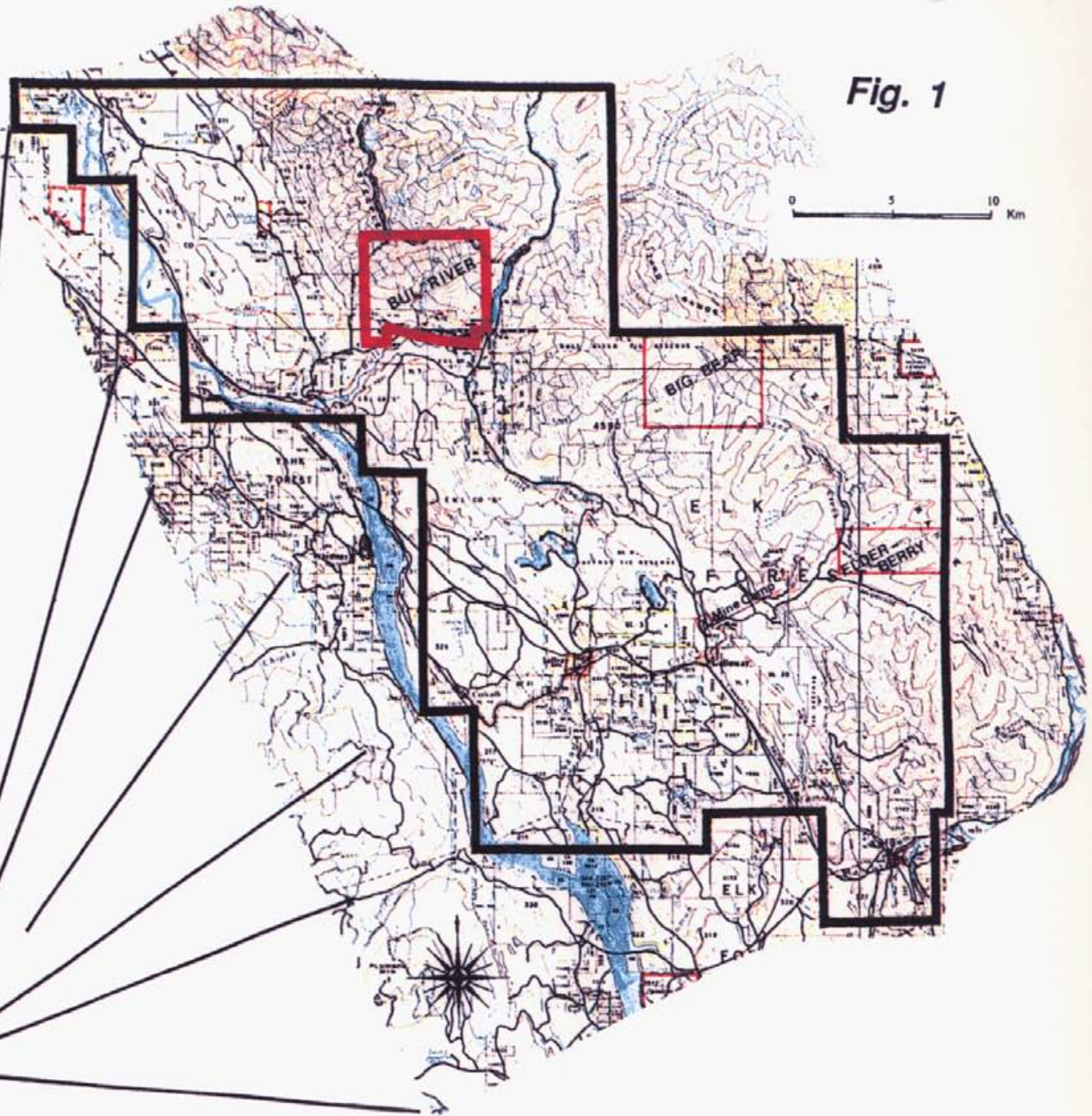


Fig. 1

LOCATION AND CLAIM AREA

Fig. 1

4. Previous Work.

The R.H. Stanfield Group has conducted various Percussive and Diamond Drilling programmes within this Claim Group since the late 1960's and has flown the area on a wide spaced magnetometer survey (Magnetometer G-803) through Apex Airborne Surveys Ltd., in 1982.

Previous trenching, shaft mining and aditing has taken place on the Rex and Dean showings dated variously at between 1890 and 1910. Samples varying from 2 to 5.8% copper, 0.7 to 3.0 oz/t silver and 0.01 to 0.5 oz/t gold from widths ranging from 1.5 to 2.4 metres have been obtained at the Rex while typical assays from the old operators at the Dean are reported as 0.25 oz/t gold, 1.6 oz/t silver and 3.3% copper (B.C.Macdonald P.Eng., 1966).

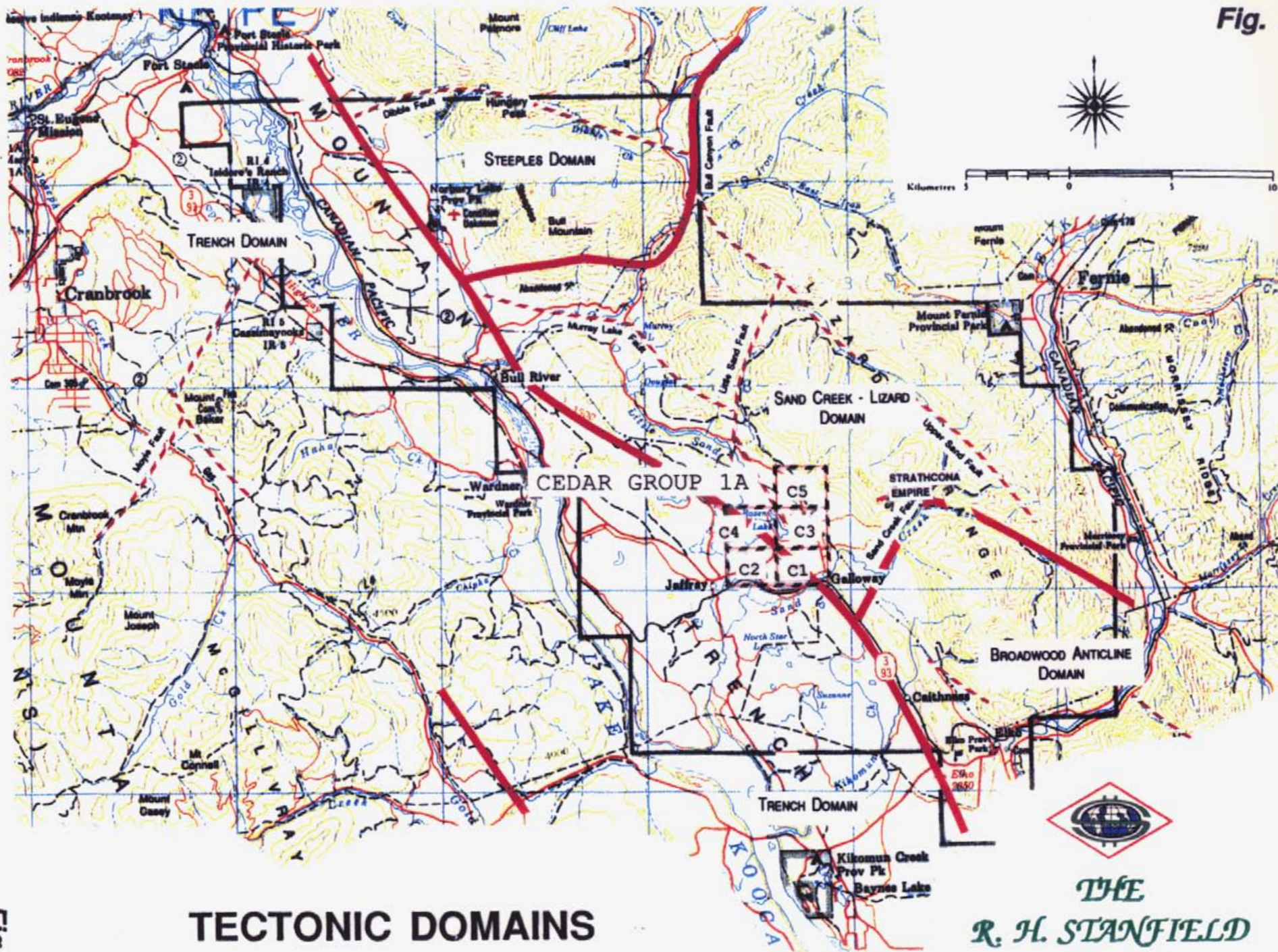
5. Geology.

Outcrops of the Precambrian Aldridge formation occur on the north boundary of the Cedar #5 claim, the central east and northeast areas of Cedar #3 and just east of the southeast corner of Cedar #1. The Aldridge formation is here clearly an interbedded sequence of quartzites and argillites dipping generally shallowly to the northeast and striking generally to the northwest. A major shear zone identified at both the Rex and Dean zones strikes generally north northwest - south southeast down the easterly side of Cedar #3 from Cedar #5 to the north and crossing into Dogwood #10 and #8 claims to the south - see Figure 3.

It is considered by the Stanfield Group that the Shear Zone forms/masks the main structural features that gave rise to the Rocky Mountain Trench, but it is considered that the Trench Boundary is actually a series of imbricate type faults each separated by a stepped block of Aldridge. The platforms between the fault structures may well be masked by the recent detritals which usually mask geophysical signals from bedrock due to their water content, depths and high iron content, so drilling remains the premier method for tracing the potential underlying vein systems.

The detritals within which the Aldridge subcrops consists largely of glacial and river sediments, sands and gravels. The Aldridge in the area is the predominant host of major mineralization and therefore its examination below the detritals in areas adjacent to known showings is of major importance.

Fig. 2



TECTONIC DOMAINS

THE
R. H. STANFIELD
GROUP

Fig. 2

6. Objectives.

Earlier theories that the more easterly Empire Strathcona Zone (see Figure 2) was linked to the Rex Zone - the similarity of mineralogical content and perceived lineal continuity giving rise to such a theory (Macdonald) - had almost been discounted through a three hole percussive and extensive (six) diamond drill programme in 1966 which failed to define any pay continuity between the zones although a reconnaissance electromagnetic survey had identified the potential for such an extension. Given however an imbricate (step) faulted terrain, a possibility not considered during earlier exploration programmes, the combination of slope of ground, change in dip and relative displacement on these faults could have resulted in a perceptible lateral shift of the strike of such a connection.

It has previously been the experience of operators in the region (Cominco, Placid) that the use of EM and Magnetic geophysical techniques along the boundary of the Trench is limited due to the reasons mentioned previously in the report. It has likewise not been possible for the Stanfield Group to exactly delimit or position extensions of faults or vein systems through their earlier geophysical programmes where these structures are masked by the Trench tills. It is very likely that the earlier diamond drilling programme had been positioned over pseudo-anomalies and not bedrock anomalies so that the drilling may not have penetrated sufficiently deeply to intersect the true targets whose potential had been suggested by the earlier survey.

Recent advances in instrumentation and geophysical methods have provided the Stanfield Group with opportunities to resurvey the area with much greater success. Interpretation of geophysical/geological data is now enhanced by computer imaging techniques.

The present deep diamond drilling programme is designed to:

- a) continue to test the possibility of a connection between the Rex/Dean and Empire Strathcona Group mineral showings and/or their shear zone envelopes directly and with regard to the Trench margin;
- b) to compare the Aldridge stratigraphic sections' lithologies in the area of the Rex/Dean showings with that at Bul River mainly to determine its potential for hosting other Bul River type mineralization and,
- c) to better define the Rocky Mountain Trench east boundary.

7. Logs, Lithology and Structure - Diamond Drill Hole C1.92

A copy of the Diamond Drill Core Log as conducted by Mr. Pilsum Master M.Sc., P.Geol (Alb) is provided on the following four pages.

All drill core is stored at the Stanfield Group Core Shed at its Gallowai Camp.

**PERMISSION TO INCLUDE THESE DRILL LOGS
WITH THIS REPORT HAS BEEN GRANTED BY
MASTER MINERAL RESOURCE SERVICES LTD.**

DIAMOND DRILL LOG (Cover Page)

Hole No: C-1-92 Page: 1 of 4 Project: REX/DEAN Property: CEDAR CLAIMS (Group 14)
 Collar Elevation (m): 908 Collar Survey date: Sep. 21/90 Location: Latitude Departure Dip: Vert
 Objective: Depth (m): 1058.27m
 Commenced: July 30/92 Completed: Nov. 18/92 Logged by: P. Master Date: Dec. 7/92 Dip:
 Sampled by: P. Master Date: Dec. 7/92 Bearing:



From	To	Description:	Sample No.	From	To	Width	Analysis
0	188.1	Casing					
188.1	352.3	Argillaceous Qtzite, argillitic, slightly less visible than typical, fine banding @ 75° to CA. Disseminated and speck py. 188.1-238.4 : more predominant non-argillitic(?) portions. 278.9-352.3 : several bands of lighter coloured less argillitic(?) - more qtzitic(?) - generally parallel to bands in main argillaceous qtzite sequence. 288.6-290.2 : cemented Fault(?), with CO ₃ , some qtz, hematic and < 1% py. Numerous slip planes and flow bands. 315.8-316.2, 329.8-330.1 : "bleached" looking silicified(?) layers with banding parallel to CA. 339.5-339.9 : qtz-CO ₃ -bx some crackle chlorite, < 10% crackle py-pyrrhotite. 352.3-373.1 : Argillaceous Qtzite : gray, quite silicic, distinct banding @ high angle to CA. Some broken and fractured core. 363.0: changed to BQ 360.3-360.6 : typical qtz-CO ₃ -bx, little or no crackle sulphides. 363.6-364.8 : qtz-CO ₃ -bx, no crackle, no sulphides contact sharp but irregular.					
373.1	492.0	Contact Zone(?) : partly diorite(?), subtle banding still apparent - remnant of argillaceous qtzite(?) or volcanic flow. CO ₃ veintets < 0.6cm wide irregularly distributed and usually @ 45° to CA.					
402.0	507.5	Diorite(?) dyke(?) : medium grained, non-porphyritic very uniform looking, not much silicification chlorite only alteration apparent. Could be volcanic (petrography ?). 420.6-420.9, 422.3-422.6, 423.9-424.9, 429.5-429.5 : Qtz, almost massive with fractures @ 20° to CA, in qtz filled with white CO ₃ (?), no crackle, no chlorite or significant sulphide. 436.5-437.1 : qtz vein and bx, no crackle, no sulphides. 437.1-452.6 : stringers of qtz < 0.6cm width @ irregular intervals, not much CO ₃ , no crackle, no chlorite, no significant sulphides.					
507.5	511.1	Diorite(?) and qtzite mixed, difficult to distinguish.					
511.1	530.9	Contact Zone(?) : quite silicified, pseudo-banding still recognizable					

DIAMOND DRILL LOG (Secondary Page)

Project: _____

Property: CEDAR CLAIMS

Hole No. From	To	Description	Sample No.	From	To	Width	Analysis							
758.9	764.7	Argillaceous Qtzite : dark gray, quite argillaceous, but still has silicic lustre. Banding @ high angle to CA.												
764.7	768.7	Argillaceous Qtzite : gray-green, less argillaceous, with silicic lustre. Banding @ high angle to CA.												
768.7	770.2	Mixture of Argillaceous Qtzite and concordant bands (0.01m - 0.13m wide) of gray qtzite medium grained and porphyritic (?).												
770.2	776.8	Qtzite : gray silicic, crackle CO ₂ in places more intense. 775.4-776.8 : qtz-CO ₂ -bx (Pbx) @ high angle to CA. No crackle, no significant sulphides.	4812	775.4	776.8									
776.8	855.6	Mixture of Argillaceous Qtzite (banded @ 70° to CA) and gray Qtzite. 801.6-802.2 : mega crackle still concordant with CO ₂ in matrix. 806.2-808.9 : broken core, some gouge on fractures @ high angle to CA. 825.1-826.3 : dark, banded hematite (?) 844.9-848.3 : bx with dark fragments in qtzite matrix (cemented fault ?) 844.9-845.2 : broken core and gouge 854.9-855.6 : fractured core												
855.6	910.4	Mixture of gray Qtzite (silicic) and Argillaceous Qtzite banded @ 45° to CA. Carbonate veinlets irregular discontinuous generally low angle to CA. 876.6-876.8 : broken and ground core												
910.4	940.6	Argillaceous Qtzite : gray green, graded bedding, banding @ 30° - 45° to CA. Some sections green in colour. 930.2-931.2 : broken and ground core												
940.6	953.1	"Bleached" appearance in "competent" HW Marker Zone type. Looks quite silicic (contact zone ?)												
953.1	960.7	Contact Zone(?) : less chlorite, more intensely "bleached".	4852 4853 4854 4855 4856	953.1	954.6 956.2 957.7 959.2 960.7									
960.7	962.6	Qtz bx in contact zone(?). No crackle, no significant sulphides.	4857	960.7	962.6									
962.6	998.8	Qtz-chlorite-silicic bx, "bleached" appearance. New unit? Hand specimen "971.4".	4858 4859	962.6	965.3 966.8									



8. Results and Conclusions.

The several sections of core prepared for sampling or petrographics are awaiting analysis.

In the absence of other deep holes in this area, this being the first in a programme, one cannot confidently predict which fault or horizon intersected matches the ones observed at surface, but preliminary comments are:

- a) although no clear marker horizons have been identified in the Aldridge and Creston Formations at the Bul River Mine area, visual criteria indicate that there is less correlation in the lithology of the first 825 metres to the Bul River area Aldridge sections, and below the cemented fault between 844.9 and 848.3 metres, the Aldridge lithology and sequence resemble the Bul River sections more closely.
- b) the cemented fault mentioned above, the fracture zone at 855 or the one at 930.2 metres is possibly the down dip (and strike) extension of the Rex/Dean Shear Zone located some 600 metres to the northeast. The presumed Shear connection between the Rex and Dean as shown in figure 3 which would give the shear an apparent dip of 65° to 70° degrees to the southwest - true dip measured at the Rex is 70° to the southwest. Slight differences in dip may be due to the rolling normally associated with imbricate faulting.
- c) the more strongly mineralized ground (or the most encouraging rock type) is found at depth beneath the re-cemented fault. If this fault corresponds with the Rex/Dean Shear Zone, then shallower drilling is more likely to encounter mineralization to the north east of C1.92 provided additional Imbricate faulting has not further displaced favourable zones. Other faulting was apparent at shallow depths (288.6m and 759m).
- d) Two distinctly different dykes (by colour) were encountered. Petrographic studies are awaited but one may be sericitic (green/yellow ochre) and the other chloritic (predominantly black). Their inter-relationship and association to mineralogical events is presently unknown.
- e) The existence of volcanic (dyke) activity and the proximity of major fault structures makes this area very attractive for future exploration.

8. Statement of Costs.

Costs comprise Direct Drilling Costs for C1.92 as enumerated below; Indirect Costs (Labour, Consultant Fees, Management/Health & safety etcetera); Pac Only Charges which are determined as those costs directly attributable to C1.92 not previously applied to assessment related purposes but without which the drilling of C1.92 could not have been accomplished; and, physical costs incurred in the maintenance of access to the site, sump preparations, site restoration etcetera.

Claim Group: Cedar #1A

Claims: Cedar#1, #2, #3, #4 and #5 - all 20 Unit Claims

Drilling Date Diamond Drilling - July 30, 1992 to November 18, 1992 (68 operating days)
Rotary Percussion - referred to as C3.R2 - Sept 21-25, 1990

Drill Crew	Driller	Mr. Robert Thelland	Box 24, Gallowai, B.C.
	Drill 2nd	Mr. T. Hewisson	Box 24, Gallowai, B.C.
	2nd Repl	Mr. S. Mugfich	Box 24, Gallowai, B.C.

Site Crew	Manager	Mr. R. Stanfield Jr.,	Box 24, Gallowai, B.C.
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Equipment 1 Longyear 44 Diamond Drill - heavy duty mast and all weather skid shack, Peder and Submersible Pumps, Pump Shack, Honda Generator set, Hobart welder,
Ford F600 4x4 Pipe Truck, Crew and Service 4x4 F250 Pick-ups with Bush Boxes, Case 580 Super D Back Hoe for Sumping, Allis Chalmers HD16 Tractor for loading drill at Bull River, Contractor Heavy Duty Flat Bed for drill conveyance to Gallowai area, D9 Cat for unloading and set-up, Champion 740 for site and access maintenance.

Costs:***Direct Drill Costs:***

<i>Owning and Operating Costs for M/c, String and Bits</i>	13.598 \$/ft
<i>Moving, Aligning, Surveying (dth), Pumping, etc</i>	0.938
<i>Ancillary Charges @ 50% Industry Average (0.5965 of above)</i>	8.885
<i>Contingency allowance (8% of above)</i>	<u>1.903</u>
	<u>25.684 \$/ft</u>

Total Hole Depth 3472 feet (1058.27m)

Total Percussed 616 feet (187.76m)

Diamond Drill Direct Drill Cost 25.684 x 2856 = 73,353.50

Drill Indirects:

Drillers Wages (68 days) (15707 + 13299 + 330)/2856 10.272 \$/ft

R&B @ 65 \$/man/day (65 x 2 x 68)/2856 3.095

13.367 \$/ft

38,176.15

Consultant Fees - Report, Inspections, Logging 1,200.00

Site Foreman - R&B, Wages (65 + 150) x (68 + 32) 21,500.00

Drillers truck (inc Slip Tank) 68 x 50 3,400.00

Foreman's vehicle 100 x 50 5,000.00

Drill Pipe Truck 1200 x 3 mths 3,600.00

Pump/Generator Sets and House 1,100.00

147,329.65

PAC ONLY CHARGES:

300 x 9.7 \$/ft for 6⁵/₈" Casing Pipe 2,910.00

617 x 5.45 \$/ft for 4¹/₂" diam Casing/Liner Pipe 3,362.65

6,272.65

TOTAL COSTS - DRILLING AND PAC 153,602.30

Physical Costs

D9 Crawler Tractor 8hrs x \$220.00/hr 1,760.00

HD16 Tractor 8hrs x \$100.00/hr 800.00

Champion 740 16hrs x \$55.00/hr 880.00

Case 580D 16hrs x \$42.00/hr 672.00

Operator Trucks (x2) 2 x 3 x \$50.00/day 300.00

Service Pers. R&B 2 x 3 x \$65.00/day 390.00

Road Haul Contractor 227.50

TOTAL PHYSICAL COSTS 5,029.50

TOTAL ASSESSED COSTS - CEDAR GROUP #1A \$158,631.80

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CERTIFICATE

September 8, 1993

I, Phil D. de Souza, certify that:

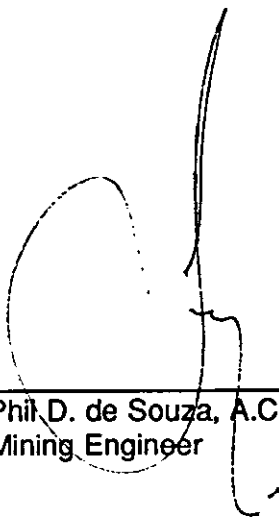
I am a graduate of the Camborne School of Mines, Cornwall, England and that I hold the degree of ACSM First Class in Mining Engineering therefrom.

I am a member of the Canadian Institute of Mining and Metallurgy and a member of the American Institute of Mining, Metallurgical and Processing Engineers.

I am a licensed Professional Engineer of the provinces of Alberta, British Columbia and Ontario, Canada and have been practising my profession for the past thirty years.

This Assessment Report on Cedar Group 1A for the R.H. Stanfield Group, Fort Steele Mining Division, British Columbia, is based on site selection and core examination by Precious and General Metals and from a study of the Drill Logs prepared by Master Mineral Resource Services of Calgary, Alberta.

I certify that neither I nor my Associates or Partners hold any interest or securities in any of the four corporations owning an interest in the properties, nor do I, or we, expect to receive any, directly or indirectly.



Phil D. de Souza, A.C.S.M., P.Eng.
Mining Engineer

