

FORDING RIVER OPERATIONS SUMMARY REPORT 1978 COAL RESERVE DEVELOPMENT PROGRAM March 28, 1979

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Mine Manager

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> Exploration Geologist Fording River Operations

Coal License Owners & Numbers

Fording Coal Limited:

314-334, 336-340, 342-344, 348, 353, 355-364, 510, 511, 554-560, 801-804, 943, 944, 964, 3899-3903.

Total 29,935 acres/12,114.3 hectares

Cominco Limited:

539, 541, 543, 545, 547, 549, 551, 553

Total 3,200 acres/ 1,295 hectares

Coal Lease Owner and Numbers

Fording Coal Limited:

Coal Lease Nos. 1 & 2

Total 8050 acres/3258 hectares

GEOLOGICAL BRANCH ASSESSMENT REPORT



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V. APPENDICES

* 1. Technical Reports
FOR ANALYSIS DATA

a) Petrographic A
REPER TO CONFIDENTIAL Petrographic Analysis - Cascade Coal Petrography Limited COAL ANALYSIS FILE b) Gieseler Fluidity Tests - Birtley Coal & Minerals Testing

- * 2. Copies of drillhole logs including assays & washability tests.
 - 3. Copies of geophysical logs.
- * 4. Copies of diamond drill core structural logs.
 - 5. Copies of Invoices for Supporting Cost Statement.
- Core logging and coal sample analysis for several drillholes is still in progress. Necessary information will be forwarded when available.

Note: This report is comprised of three volumes:

Volume 1: Sections I, II, III, IV

Volume 2: Sections V - Appendix

Volume 3: Sections V - Appendixes 2,3,4.5

(Government copy only)

LIST OF ILLUSTRATIONS

Illustration No.	Description
1	General Geology and Coal Properties Map. 1:50,000 Scale Index Map
2	1978 Exploration, Development and Geological and Environmental Assessment Program. 1"1000' Scale General Geology Map
3	1978 Geological and Environmental Assessment Program. 1"1000' Elk Valley General Geology Map.
4	Columnar Sections - Elk Valley Diamond Drill Holes. 1"=1000' Vert. Scale.
5	1978 Exploration & Development Greenhill South - Burnt Ridge Area. Map 1"=200' Scale
6	Geological Section 480,000 N. 1"=100' Scale Greenhills S. Area
7	Geological Section 481,750 N. l"=100' Scale Greenhills S. Area
8	1978 Exploration & Development Map 1:2000 Scale Greenhills N. Upper Seams Area
9	Geological Sections. 148400 N, 148950 N, & 149300 N. 1:1000 Scale Greenhills N. Upper Seams Area
10	1978 Exploration Map √ 1"=200' Lake Mt. N. Area
11	Section - G, & Longitudinal Section 1"=200' Lake Mt. N. Area
12	1978 Exploration, Development & Geological Assessment Program Map 1"=200 Turnbull Mt. & West Turnbull Area
13	Geological Section 500,500 N. 1'=100' West Turnbull
14	Geological Section 503,000 N. 1"=100' West Turnbull
15	1978 Exploration & Development 1"=200' Clode Pit
16	Geological Section 495,750 N. 1''=100' Clode Pit
17	Geological Section 496,500 N. 1"=100' Clode Pit

FORDING RIVER OPERATIONS

SUMMARY

1978 EXPLORATION AND DEVELOPMENT PROGRAM

1. INTRODUCTION

Fording River Operations 1978 Coal Reserve Development Program included an extensive drilling program plus a selective geological and topographical mapping program. With the exception of 3 diamond core holes drilled in the Elk Valley and 3 centre-return rotary holes drilled in the Brownie-McQuarrie Creek Areas, all work was done within a 3 mile radius of the plant site. Fifty percent of the work was to upgrade geological information in areas for which there is already a pit design; fifty percent was outside of present coal reserve boundaries.

The majority of the drilling was done by contractors, during the period May 2 to December 4. Fill-in and exploration drilling by the Geology Department's Mobile B-50 rotary drill continued throughout the year.

This report covers results of the 1978 Exploration program of Fording River Operations and forms the basis for work credits claimed for the Coal License requirements under the Coal Act (1974), specifically Sections 19, 21, and 23.

II. SUMMARY

One hundred and thirty-two holes were completed for a total of 67,282 ft./20,508m.: 17,874 ft./5448m. of drilling was in 15 HQ Diamond core holes, 44,025 ft./13419m. in 84 centre-return 4 7/8 in. dual-wall rotary holes, and 5383 ft./164lm. in 33 conventional 3 7/8 in. diameter single-wall rotary holes. Coal analysis was done for all significant seams at Fording's Process Plant Laboratory. Coal seam interval samples were analysed for % Ash and FSI. Weighted seam composites were tested for Proximate Analysis, FSI, % Sulphur and calorific value. Washability tests were done for all seam cores. The washed products from seam cores, plus selected washed seam composites from rotary holes were sent to outside laboratories for petrographic analysis, fluidity, dilatation, hardness, ultimate analysis and ash analysis tests. All drillholes were down-the-hole geophysically logged using either the gamma ray or gamma ray-neutron method. All diamond core holes plus the deeper rotary holes were directionally logged. In addition, the three diamond core holes in the Elk Valley were logged with caliper, sidewall densilog, and focused beam methods, to test the effectiveness of these methods in this area.

Pre-logging of access road right-of-ways and drillsite locations was undertaken on all timbered areas prior to drilling. All merchantable material was salvaged and sold. Non-merchantable material was slashed and buried.

The contractors which had a major involvement in the 1978 Exploration and Development Program are briefly summarized as follows.

- 1. SDS Drilling Limited centre-return (dual wall) rotary drilling. Equipment used included: One Gardner-Denver 1,000 HD Drill mounted on a Nodwell FN110 carrier; one Sanderson Cyclone TH70 drill mounted on a Kenworth Tandem; and one Gardner-Denver 1700 Drill, with mud pump and tanks, mounted on an International truck. Pipe carriers for the three drills were a Nodwell FN800 and two Kenworth Tandems.
- 2. Connors Drilling Limited Diamond core drilling (HQ). Equipment used included: 1 Boyles BBS-56A Diamond drill and two Longyear S-38 diamond drills.
- 3. G.J. Ackles Limited water haulage to supply the diamond drills.
- 4. Latka Contracting pre-logging access road and drillsite locations.

- 5. Rudy A. Johnson Contracting Limited road building, drillsite construction, towing drills and equipment with a Caterpillar D-8K tractor.
- 6. Roke Oil Enterprises Limited down-the-hole geophysical logging.
- 7. Cascade Coal Petrography Limited Petrographic analysis.
- 8. Birtly Engineering Limited Various coal tests including fluidity, dilatation, hardness, ultimate analysis, and ash analysis.

Fording Geologists and summer students mapped the various rock outcrops and seam exposures, did the geological and structural logging and colour photography of diamond drill core, and installed and monitored the piezometers on various drillholes. Staff surveyors provided the necessary mapping control and located the drill holes.

Summary statements of work done and the results obtained are included for each of the exploration areas. Also included are geophysical logs, diamond and rotary hole geological logs, diamond drill core structural logs, technical reports on various laboratory tests, together with plans, representative sections, and general geological maps showing the location of drill holes and access roads.

III. INDIVIDUAL AREA PROGRAMS AND RESULTS

A. Greenhills Area

Total drilling in the Greenhills area included 4615 ft./1407m. in 3 diamond core holes, 20,504 ft./6250m. in 43 centre-return rotary holes and 4370 ft./1332m. in 29 conventional rotary holes.

The original proposal for 24 centre-return rotary holes and 3 diamond core holes was designed to obtain coal quality and seam definition information for the medium and high volatile coal in this area. The 3 diamond core holes also provided continuity information for seams "B" to "I" plus structural data from this stratigraphic interval. All of these holes (DDH1120 to 1122; RH1123 - 1146 inclusive) were completed. Petrographic analysis, fluidity tests, and washabilities were done on all coal cores. Petrography and fluidity tests were also done on selected seam composites from rotary drill samples.

In addition to the originally proposed program, 19 centre-return rotary holes (RH1139a, 1147 - 49 inclusive and 1160 - 1174 inclusive) for 8425 ft./ 1256 m. were completed in the South Greenhills and 29 conventional rotary holes (RH 1048, 1103 to 1111 inclusive & 1200 - 1210 inclusive) for 4370 ft./ 1332m. were completed in the South Greenhills and K seam areas.

Results from the diamond drilling program established with one notable exception, the continuity of seams Eu, El, D, and B for several hundred feet down-dip from existing and designed pits. In hole 1122, B seam has been totally removed by normal faulting. Two major faults were encountered in the bottom third of this hole, one which displaces B seam, and a lower fault which displaces much of the basal sandstone unit with the shale beds of the Fernie formation.

The results of the rotary drilling program are summarized as follows:

1. High volatile coal areas.

Holes that penetrated the I,J,K, seam interval show that with the exception of I seam, which has a resonably consistant thickness (10 - 15 ft./ 3.0 - 4.5 m.), the high volatile coal seams in the Greenhills are extremely variable in thickness and location with respect to each other. "J" seam is generally split into two seams which vary in thickness from 3 ft./ lm. to 10 ft./ 3m.. Seam K, although quite variable in South Greenhills, is reasonably uniform in the North, maintaining a thickness of 15 ft./ 4.5m. to 22 ft./ 6.7m. Extensive drilling for seam "K" is anticipated for the future.

2. Medium volatile coal areas.

The majority of holes drilled in the South Greenhills, penetrated the G and H seam horizon. Results show these seams to maintain consistent thicknesses (ave. 25 ft./ 7.6m. and 20 ft./ 6.lm. respectively) throughout the area. 'G' seam reaches thicknesses up to 35.0ft./ 10.7m. in several locations. At least two zones of thrust faulting with displacements in the order of 50 ft./ 15m. were identified, causing repetition of the seams along the fault planes.

The seam definition and coal quality information collected for seams "G & H" was sufficient to allow for the design of additional Truck/Shovel - Dragline pits in South Greenhills. The resulting increase to Proven coal reserves was 1.8 x 10^6 L.T.R.C.

3. Low-Medium volatile coal areas.

Holes drilled in the Burnt Ridge area provided "fill-in" information for seam "B" to "F" within the presently designed dragline mining area. These holes were precisely located in order to upgrade the interpretation on the effects that several zones of thrust-faulting have on the coal seams. In addition, several holes drilled in the south-east corner of Burnt Ridge, provided information on the location and effects of the major Ericson fault.

Redesign and extensions to previous designs, based on the information gained from fill-in rotary drilling on Burnt Ridge, resulted in a net increase of 0.4×10^6 LTRC to proven reserves. These additions were primarily from seams D, Eu, El & F.

References

- Illustration No. 5 1978 Exploration & Development Greenhill South Burnt Ridge Area (i)
- Illustration No. 6 Geological Section 480,000 N.
- (iii) Illustration No. 7 Geological Section 481,750 N.
- (iv) Illustration No. 8 - 1978 Exploration & Development Map
- 1:2000 Greenhills N Upper Seams
 Illustration No. 9 Geological Sections 148400 N,
 148950 N, & 149300 N. (v)

Cost of Greenhills Program \$374,878.77

В. Lake Mountain

Nine of a proposed 10 centre return rotary holes were drilled (4921 ft./ 1500m.) on the western dip-slope face of Lake Mountain. All holes were logged using the gamma-neutron method. Drilling was initiated to investigate encouraging intersections obtained from preliminary drilling in 1977. Drillhole results show that the seams in the 'H' to 'K' interval have been severely thinned. (less than 5 ft.)

A limited field mapping program, confined primarily to road cut exposures was conducted. Bedding attitudes showed marked change in dip direction from a north-west dip in the southern region to almost due north in the northern region. Consequently, the northernmost drillholes penetrated rock units that are stratigraphically above the coal bearing interval of Kootenay tormation.

To minimize environmental damage and reclamation costs, all right-of-ways were cleared prior to road and drillsite construction.

References

- Illustration No. 10 1978 Exploration Map (i)
- Illustration No. 11 Section G, & Longitudinal Section (ii)

Cost of Lake Mountain Program \$72,752.57

C. Turnbull Area

Total drilling on the Turnbull Mountain and Fording Valley bottom areas included 9,307 ft./2837m. in 9 diamond core holes, 10,252 ft./3218m. in 18 centre-return rotary holes, and 495 ft./151m. in 2 conventional rotary holes.

Piezometers were installed in the diamond drill holes to monitor the water pressures at several horizons. The core was structually logged to provide essential data on ground stability. Washability tests were done on all seam cores, and selected cores were tested for petrography and fluidity.

The rotary drill holes supplied information on fault locations coal quality, and seam location, continuity and thickness. This information was required to assist in the developing of seam contours in several areas of the proposed Turnbull Pits and for fill-in between diamond drill holes on the valley floor.

Results from the drilling program on Turnbull Mountain show the seam and fault locations to be essentially as projected.

Drill holes located on the Fording Valley bottom immediately west and north of Turnbull Mountain intersected seams below the Major Thrust Zone. Previous work in this area was very limited and confined to the southern half of the proposed West Turnbull Pit.

Some of the significant results from this program are as follows:

- 1. The major coal seams are several hundred feet deeper than projected.
- 2. The north plunging Turnbull Anticline which begins to develop in the Southern Area, continues and increases in magnitude to the north.
- 3. The Number 2 Thrust Zone, defined in 1977 as occuring on the west limb between seams R5 and R4, is much more extensive in stratigraphic influence to the north. This zone affects the entire sequence below seam R7u causing the R7u to R5 interval to be doubled in several locations. Thrust faulting has caused severe splitting, thinning, and repeating of seam R4 in almost all areas. The R7u to R4 stratigraphic interval has been increased by several hundreds of feet.
- 4. The alluvial and glacial overburden is often in excess of 100 feet deep.
- 5. Several drillholes encountered significant artesian water pressures and continued to flow for several months after drilling was completed.
- 6. Diamond drill holes #283 & 284, located on the Henretta Valley floor to the east of the Fording Valley, established some tentative correlations between information on Henretta Mountain (pre 1975) and the Fording Valley Turnbull Mountain Area.

All drill holes were geophysically logged using the gamma rayneutron method. Directional logs were run in all holes drilled in excess of 700 feet.

All access roads right-of-ways and drillsites located in forested areas were logged prior to construction. Merchantable timber was recover and non-merchantable material was slashed and buried. Many drillsites were reclaimed and re-seeded shortly after completion of drilling.

References

- (i) Illustration No. 12 1978 Exploration, Development & Geological Assessment Program Map
- (ii) Illustration No. 13 Geological Section 500,500 N.
- (iii) Illustration No. 14 Geological Section 503,000 N.

Cost of Turnbull Program \$459,601.49

D. Clode Pit

Eleven centre-return rotary holes (7,751 ft./2363m.) and 2 conventional rotary holes (518 ft./158m.) were drilled from the pit floor to determine the continuity of seams R7, R5, and R4. These seams are below the major thrust fault zone which defines the bottom limit of Clode Pit as presently designed.

Drilling results show these seams to be reasonably continous both laterally and down dip, except for the up-dip areas where the seams are affected by the Major Thrust Zone. Near normal seam thicknesses are maintained.

Large scale open pit mining for the repeat seams is not economically feasible, although selected areas may be feasible for mining on a small scale, as minor extensions to the present pit design.

This area may have potential for underground mining and future drilling is anticipated to determine this potential.

References

- (i) Illustration No. 15 1978 Exploration & Development
- (ii) Illustration No. 16 Geological Section 495,750 N.
- (iii) Illustration No. 17 Geological Section 496,500 N.

Cost of Clode Program \$26,548.06

E. Elk Valley Area

A program of 3 deep diamond core holes was instigated to assess the 8 coal licenses (Cominco Ltd., License group 55, C.L. 539 - 553 inclusive) held in the Elk Valley area.

Three diamond core holes (3252 ft./1205m) were completed over a strike length of approximately 5,000 ft./1525m. south of the Britt Creek substation. All holes were collared along the Kan-Elk powerline road at the western base of the Greenhills range and drilled through Kootenay formation strata, of the west limb of the Greenhills syncline. An additional hole, collared on the Elk River flood plain was abandoned in unconsolidated overburden at 215 ft./66m.

Although significant coal seams were interesected in all three holes, correlation between holes is made difficult by the long distance between holes and apparent structural complexities. Any correlation between these holes and holes drilled on the east limb area is not apparent at this time.

Basal Kootenay sandstone (Moose Mountain Member) was not reached in any of the holes due to excessive water pressures and hole caving at depth. Artesian conditions were encountered and holes continued to flow for varying time periods after cessation of drilling.

All cores were structurally and stratigraphically logged. Coal seam cores were subjected to various tests, including washability, proximate analysis, sulphur & FSI determination, petrographic analysis and fluidity tests. Geophysical logs for each hole included gamma ray-neutron, directional, caliper, sidewall density, and focused beam.

References

- Illustration No. 3 1978 Geological & Environmental (i) Assessment Program
- Illustration No. 4 Columnar Sections _ Elk Valley Diamond (ii) Drill Holes.

Cost Elk Valley Program \$129,028.30

F. Brownie - McQuarrie Creek Area

The exploration work done in the Brownie-McQuarrie Creek Area, in conjunction with an on-going environmental impact study, was initiated to assess the five new coal licenses (Fording Coal Limited CL 3899 - 3902 inclusive) granted in 1978.

A total of 3 centre-return rotary holes were drilled (597ft/182m.); one in the Kilmarnock Creek Valley near the confluence of Brownie Creek, and 2 along an existing seismic road in the McQuarrie Creek Valley.

Drill chip samples together with gamma-neutron logs, showed the strata in this area to be a very hard, cherty, dolomitic sandstone, most likely from the Spray River Formation.

Reference

Illustration No. 2 - 1978 Exploration, Development & Geological & Environmental Assessment Program.

Cost of the Brownie-McQuarrie Creek program \$78,551.68

Submitted by:

D.L. Johnston, P.Eng. Mine Manager

P.M. Daignault

Senior Mine Geologist

Prepared by:

K.A. Komenac

Exploration Geologist

IV VALUATION OF WORK

A. <u>SUMMARIES</u>

1. TOTAL EXPENDITURES PER TYPES OF WORK

<u>Drilling</u>	Dozer Work	Radiation Logs	Sample Processing	Geological Supervision & Mapping
\$819,291.76	\$70,345.54	\$56,879.11	\$18,245.00	\$17,810.10
Camp Costs	Truck Rentals	Misc. Equip. & Supplies	Core Storage	Reclaimation Logging
\$51,813.53	\$14,709.21	\$34,590.26	\$22,715.91	\$22,552.45
Surveying \$ Topographic \$12,408.00	Maps			

TOTAL EXPENDITURES \$1,141,360.87

2. PRORATED EXPENDITURES PER INDIVIDUAL LICENSES

LICENSEE	LICENSE GROUP	INDIVIDUAL LICENSE NO.	EXPENDITURES
Cominco Ltd.	55	CL 541	56,387.65
Cominco Ltd.	55	543	71,766.11
Fording Coal Ltd.	197	CL 340	64,749.79
Fording Coal Ltd.	198	CL 336	84,181.93
Fording Coal Ltd.	Ungrouped	CL 3900	23,652.59
Fording Coal Ltd.	Ungrouped	CL 3901	3,371.25
Fording Coal Ltd.	Ungrouped	CL 3902	3,371.25
Fording Coal Ltd.	Ungrouped	CL 3903	47,616.59
TOTAL			355,097.16

VALUATION OF WORK: COST STATEMENT (Sec. 27, B.C. Reg. 436/75)

ON-PR	ROPERTY COSTS: For period	l from Janu	ary 1	to December	19 78
1. OPI	ERATOR'S FEES, SALARIES,	AND WAGE	S: Average Rate	Average Number of Days	Amount
Prof	fessional and technical				·
	chine operators and support				2 (02 00
₹ 1	Fording		•		3,493.02
Oth					
2 CO	NTRACTORS AND CONSULT	CANTS.	To	otal operator's costs	\$ 21,303.12
	Name er to attached List	THILD:	Service	e	Contract Amount
	ntractors & Consultants"				1,017,238.14
	illiactors & Consultants	· · · · · · · · · · · · · · · · · · ·		· .	1,017,230.14
*******			***************************************		
	- 10 × 10 × 10 × 10 × 10 × 10 × 10 × 10				
	**************************************	Tot	al contractor o	and consultant costs	\$1,017,238.14
				er i de en	P.1.501/1,6200,14
3. EQU	JIPMENT AND INSTRUMEN Type	TS USED: O	wnedRented Fro		- Amount
	**************************************		Kemed Plo		Amoun
				· · · · · · · · · · · · · · · · · · ·	***************************************
	<u></u>			·	
*		····			
		Total	equipment and	l instrument rentals	\$
4. FIEI	LD CAMP COSTS:				
Food		Catering			Amount 51,813.53
Acco	ommodation - Services Li	mited			
Fuel		•			
Othe	>r	·			
	The state of the s		To	tal field camp costs	\$ 51,813.53
5 SAN	IPLING, ANALYSIS, AND TE	ECTING:			
	Service		Performed	•	Amount
Pe	trographic				
				_	
See	" Contractors & Consult				
			(18245'')		
		Total	s, samplings, a	analysis, and testing	\$
	PLIES AND MATERIALS CO				_ Amount _
Proc	ess supplies Poly Bags Wir	e Ties, Tag	s, Etc.		3,790.19
	e Storage Facilities ating and maintenance supplies				22,715.91
	e and technical supplies Repair				2,221.54
Othe	er supplies and materials Drill	casing, sur	plies, rep	oairs	7,828.96
	5 5 4		Total, sup	pplies and materials	\$36,556.60
7. TRA	ANSPORTATION COSTS (Grou	ınd transportati	on details):		· · · · · · · · · · · · · · · · · · ·
	Vehicles	Owner		Rental Rate	Amount
<u></u>		Canada Ltd.			\$14,449.48

Aircraft Type Owner Chart	
Total transportation cost	s \$ 14,449.48
RECLAMATION WORK:	
Pre-Logging: See Consultants & Contractors	\$
	Ψ
TRAVEL EXPENDITURES (operator's costs only): Number of Personnel Number of Trips	Amount
Total travel expenditure	s \$
Total cost	s \$ 1,141,360.87
(Secs. 28 and 29, B.C. Reg. 436/75)	
FF-PROPERTY COSTS: Period from to to	, 19
() Y - 2 () 4 C - 14	Amount ø
(a) Logistics and field support	
(b) Technical and feasibility studies	
(c) Preparation of reports	
(d) Supplies and services	
(e) Mobilization and demobilization of equipment	
(f) Travelling expenses (Itemize)	
Tota	al \$
Tota	Amount
Supporting Cost Statements Attached Tota	Amount
Supporting Cost Statements Attached Tota	Amount
Supporting Cost Statements Attached Tota	Amount
Supporting Cost Statements Attached Total Total supporting cost	Amount
Supporting Cost Statements Attached Total supporting cost SUMMARY On-property costs	s 1,141,360.8
Supporting Cost Statements Attached Total supporting cost SUMMARY On-property costs Off-property costs	s 1,141,360.8
Supporting Cost Statements Attached Total supporting cost SUMMARY On-property costs Off-property costs	\$ 1,141,360.8° \$ 1,141,360.8°

ATTACHMENT TO 'VALUATION OF WORK: COST STATEMENT'

2. CONTRACTORS AND CONSULTANTS

NAME & ADDRESS	SERVICE	CONTRACT AMOUNT
Roke Oil Enterprises Ltd., 516 Moraine Road, N.E. Calgary, Alberta T2A 2P2	Radiation Logging	\$ 57,788.62
SDS Drilling Limited 4636 - 1 Street, S.E. Calgary, Alberta T2G 2P2	Drilling Contractor	\$445,767.24
Connors Drilling 205 - 1201 W. Pender St., Vancouver, B.C.	Drilling Contractor	\$373,524.52
C-II Industries Ltd., Box 1274 Fernie, B.C. VOB IMO	Bulldozer Rental	\$ 8,425.15
Cascade Coal Petrography Ltd., 588 Cleveland Cres., S.E. Calgary, Alberta T26 4A9	Sample Processing	\$ 18,245.00
Rudy A. Johnson Contracting Ltd., R.R. 1, Sparwood, B.C. VOB 2GO	Bulldozer Rental	\$ 67,458.00
G.S. Ackels Ltd., Box 1617 Sparwood, B.C. VOB 2GO	Water Haulages	\$ 7,680.00
Bothemley Contracting Box 352 Elkford, B.C. VOB IHO	Bulldozer Rental	\$ 2,782.00
Latka Contracting Box 457, Blairmore, Alberta TOK OEO	Reclamation Logging	\$ 9,674.62
BC Research		\$ 13,484.99
Crowsnest Helicopters Ltd., Sparwood, B.C.		\$ 2,358.00
McElhanney Surveying & Engineering Ltd. 200-1200 W. Pender St., Vancouver B.C. V6E 2T3		\$ 10,050.00

INVOICE LIST

Thiessen Equipment Ltd.

COMPANY	INVOICE NOS.
Ackels, G.J. Limited	1102, 1146
Advance Plastics Limited	008366, 007145, 007561, 008066
B.C. Government	1680, 026340
Bothamley Contracting	1
Cascade Coal Petrography Ltd.	1106, 1107, 1099
C-11 Industries Limited	41, 54, 35, 40, 55, 47
Connors Drilling Limited	8826, 8866, 8785, 8505, 8537, 8431, 8404, 8466, 8580, 8668
Cook's Pharmacy	1
Cal-Van Catering Services	1- 16 inclusive
Expense Account	1- 16 inclusive
General Fasteners Limited	14157
Johnson, Rudy A Contracting Ltd.	101, 102, 103, 104, 105, 107, 108, 119, 112, 116
Kodak Canada Ltd.	5103366D, 51024883, 51043677, 5100579-1
Kootenay Truck & Saw Service Ltd.	4597
Latka Contracting	021966, 49545
Lowen's Plumbing & Heating Ltd.	1335
Lens and Shutter	11911
Malkin and Pinton	881538CA-1
McGauley Redi-Mix	3258
Nelson Daily News	4856, 4262
Peerless Pipe & Equipment	C40914, C40916
Russel Sheet	044247, 043301
Roke Oil Enterprises Ltd.,	1467, 1476, 1493, 1489, 1437, 1435, 1432, 1403, 1336, 1317, 1330, 1289, 1416, 1303
Rentway Canada Ltd.	86773, 84344, 83141, 80811, 78364, 76062, 73840, 86774, 84345, 83142, 80812, 78365, 76063, 73841, 89215, 89216
Simplex Burcraft	7910, 7868
Tested Truss Systems	R0022-794

Invoice List (cont'd)

COMPANY	INVOICE NOS.
B.C. Research	27357
Crowsnest Helicopters Ltd.	1
McElhanney	9021349, 9021428

ATTACHMENT TO "SUPPORTING COST STATEMENTS"

Roke Oil Enterprises Ltd.	\$	57,788.62
SDS Drilling Ltd.	Ş	445,767.24
Connors Drilling Ltd.	\$	373,524.52
C-11 Industries Ltd.	\$	8,425.15
Rudy A. Johnson Contracting Ltd.	\$	67,458.00
G.J. Ackels Ltd.	\$	7,680.00
B.C. Government	\$	1,185.90
Cascade Coal Petrography Ltd.	\$	18,245.00
Bothamley Contracting	\$	2,782.00
Cooks Pharmacy	\$	66.24
Cal Van (Canus) Catering Services	\$	51,813.53
Kodak Canada Ltd.	\$	48.20
Kootenay Truck and Saw Servicing Ltd.	\$	422.84
Latka Contracting	\$	9,674.62
Lowens Plumbing & Heating Ltd.	\$	10.76
Lens & Shutter	\$	87.91
Malkin & Pinton	\$	206.64
McGauley Redi-Mix	\$	230.69
Nelson Daily News	\$	140.54
Peerless Pipe & Equipment	\$	49.79
Russel Steel	\$	5,781.58
Rentway Canada Ltd.	\$	14,449.48
Simplex Burcraft	\$	78.76
Tested Fruss Systems	\$	336.44
Thiessen Equipment	\$	184.80
BC Research	\$	13,484.99
Advance	\$	251.93
Crowsnest Helicopters Ltd.	\$	2,358.00
McElhanney Ltd.	\$	10,050.00
GRAND TOTAL	\$1	,092,584.07

	DIAMOND	DRILLING	ROTARY DR	ILLING	BULLDOZER	GEOLOGICAL	RECLAMATION .	SURVEYING	TRUCK RENTAL	MISC. EQUIPMENT	RADIATION LOGS	PRE-LOGGING ACCESS	PETROGRAPHIC	
MONTH	FOOTAGE RATE	DAY WORK & SUPPLIES	FOOTAGE RATE	DAY WORK & SUPPLIES	RENTAL	SUPERVISION CORE OR LOGGING DATA REVIEW				SUPPLIES & SERVICES	BORE HOLE SURVEYS	ROADS	See The second second	STORAGE
•		- 010		020	100	200	250	300	400	500	600	700		900
JÜLY	·		/						Cost Coll.					
	-								\$222.56		<u>.</u>			-
AUGUST									Cost Coll.		ļ			
	ļ	/_	<u> </u>			ļ	<u> </u>	ļ	\$254.79					41
SEPTEMBER		//			ļ	<u> </u>		: *	Cost Coll			 -	· · · / ·	13
	444	/		ļ	<u> </u>	<u> </u>	ļ		\$39.48	<u> </u>		 -	 -	112
OCTOBER	,	/			ļ		ļ	ļ <u>.</u>	Cost Coll.		ļ		 	
 	:	/				ļ			\$86.69				 	- -/-
NOVEMBER _		_/	ļ			ļ	ļ		Cost Coll.			 	 	12
	-	_ -/	<u> </u>				·		\$135.05					1112
DECEMBER	1,	_ /	 	<u> </u>	 		<u> </u>	<u> </u>	Cost Coll.	 	<u> </u>	 	 	
	 		 	 	-	 	 -		\$70.33		<u> </u>	 	- 	111
ANIJARY		_	ļ	· ·		·	 		Cost Coll.				 	1112
	-	/	ļ	ļ	<u> </u>				\$65.64			 	1 1	1112
	 /		<u> </u>	<u> </u>		<u> </u>	ļ	ļ				 		
استوسوا والمستاكات	-			<u> </u>				•		-			 	
TOTAL	 / -		*		ļ	<u> </u>	*			 				
			ļ	ļ		GRAND		874 ^{.54}				 	 	
	 									<u> </u>		\ 		1112
					,		Lange W.							
			1							1			1	113
*****	1/	<u>, , </u>												S
	<u> </u>	. 4	<u> </u>			Care Service Production				<u> </u>		1	5	נטין,
	Λ .									<u> </u>			<u> </u>	
	C 3631	W	EARY	RIDGE				•	ν.	1978 D	RILLING	PRO	GRAM	

MONTH	DIAMOND DRILLING		ROTARY DRILLING		BULLDOZ ER RENTAL			N SURVEYING	TRUCK RENTAL	MISC. EQUIPMENT	RADIATION LOGS	PRE-LOGGING ACCESS	PETROGRAPHIC ANALYSIS	CORE
	FOOTAGE	DAY WORK & SUPPLIES	POOTAGE RATE	DAY WORK & SUPPLIES		CORE OR LOGGING DATA REVIEW				SUPPLIES & SERVICES	SORE HOLE SURVEYS	, , , ,		
		010		080		200	250	300	400	500	600	700		7. TOHN SO
00017					R. JOHNSON	K. HANSEN EXPENSE ACC	,			CAL-VAN				· # 101
APRIL	-				\$3,264.00	B83.17	•	71		\$ 36.00				\$680.00
				•	C-11 XHD. # 35	K KOSAR		7		1600 eleter				
	······	 			\$1,286.95	\$ 151.95		1		# 4789. 3				,
<i></i>	CONNORS	HCKELS	5.0.5.		C-11 IND.	LENS & SHUTTER				B2,520.00	4089	<i>6</i> 0		
MAY	# 8431 843,551.00	\$4,080.00	#0280		\$ 177.25	\$ 87.91				CAL- YAN 12,178-00	ROKE #120	•		
	1.40,337.02	CONNORS	5. D. S.											
	-	#8404 \$1,253.00	\$ 29,656.00	S. D. S.	R. JOHNSON	7	1		COLLECTION	 				COST. COLLECT.
·	CONHORS	F1,300	00,0000	# 0276 \$3,000.00	# 102 \$5,644.00	MAY COST	 		8101 59	CAR - VAN 8864.00	 			\$ 1,327.
	# 8466 #15,876.00			-5,000,00	1-1	B2,060.26	· · · · · ·	_		M867.00				
	#13, 376.00		<u> </u>		 	-2,020.xc	 			CAL- VAN \$512.00	 			COST COLLECT
JUNE	CONNORS #8537		5. D. S. #0309	-	# 103	/	 		RENTWAY 8685-42	#372.00			•	\$606.6
JUIL	\$ 13,754.80		\$6,725.00		\$6,052.00	,							İ	
			5. D. S. #03/1		C-11 IND. # 47					# 1530	Ð			COLLECT
			\$3,092.50		\$ 773.10	1				BOARD				\$1,639.0
····		,	S.D.S. #0307		JUNE COST	,	 			REBATE -#1,159. 26	;			
			\$50,010.75	-	BBO. 89		 							
			1		C-II IND.		 			CAL- YAN	5397	v z.	,	
					#07-115		 	 	_ 	\$89.55 \$552.84		○3		
					A 163. 75		1			733207				-
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<i>(*)</i>	}		1		1		V 2		1	1		1		

	DIAMOND D	RILLING	ROTARY DR	RILLING		GEOLOGICAL	RECLAMATION	SURVEYING	TRUCK	MISC.	RADIATION	PRE-LOGGING	PETROGRAPHIC	CORE
монтн	FOOTAGE RATE	DAY WORK & SUPPLIES	FOOTAGE RATE	DAY WORK & SUPPLIES		SUPERVISION CORE OR LOGGING DATA REVIEW			RENTAL	SUPPLIES 8 SERVICES	LOGS BORE HOLE SURVEYS	ACCESS ROADS	ANALYSIS	STORAGE
		010		050		200	250	300	400	500	600	700	800	90
LUKY.	CONNORS # 8580		5. D. S. # 523		R, JOHNSON # 104			(b)		COST	udat A		2000 100 100 100 100 100 100 100 100 100	COLLECT
	#15,880.21		\$32,065.50	5.0.S. # 527	\$8,976.00		•			A17.64	ROKE # 1317		82,020.00	125/.6
				83,68308						ROOM & BORRD REBATE	\$1,980,00			4357.6
										8686.46	# 1330	447 10 10 10 10		8657.0
								4 497 - 1454		CAL-YAN	\$ 2,675.19	40000000000000000000000000000000000000		2 1, 434.
										\$4,286.00	\$4,598.90			
	E. C.									CAL- VAN				
									$Y_{i,j} = \{ y_{i,j} \in \mathcal{Y}_{i,j} \mid y_{i,j} \in \mathcal{Y}_{i,j} \}$	\$509.48				
										CAL-VAN				
				Victorial Victorial						\$ 100.00			1 413	
				1988 - 1988 - 1988 - 1988 - 1988 - 1988 - 1988 - 1988 - 1988 - 1988 - 1988 - 1988 - 1988 - 1988 - 1988 - 1988 -						CAL-VAN				
			· Section			•				81,112.00				
				35, 2, 32, 911			类系。 电线			CAL-VAN	· 特别。	in the second		
			1. _{1/2} .							\$882.00				
IGUST	4 43.20	ION	S. D. S. #534		R. JOHN SON # 105		i de la companya de l	3.1	RENTWAY	CAL- VAN	# 1336			COLLECT
		,	816,749.05		\$1,326.00				\$ 728.46		\$1,966.80	And Spare		8839.5
										SIMPLEX BURCRAFT	ROKE # 1336			
										# 7910	\$3,198.03	[14] (9][[為集		
					C-11 INDUSTRIES				A CAMPINE	\$ 78.76	4世紀的中華	and the same		44000
•			111111111111111111111111111111111111111		\$219.75	War and the	Alle La		in the sense of th	DAILY NEWS		· · · · · · · · · · · · · · · · · · ·		
										# 4856			A STATE SALE	
			HARRING AND A	- Market State (State)						\$ 140.54	A Part Mill	A A A		
			雄浪		4					CAL-YAH \$ 3,258.00		*****		
17			3.3		Algeria, dels selves		State of Same	.5	and a thinking	\$ 100.00	7.44.31		Section 181	

	DIAMOND	DRILLING	ROTARY DR	RILLING	BULLDOZER	GEOLOGICAL	RECLAMATION	SURVEYING	TRUCK	MISC.	RADIATION	PRE-LOGGING	PETROGRAPHIC	CORE
MONTH	FOOTAGE RATE	DAY WORK & SUPPLIES	FOOTAGE RATE	DAY WORK & SUPPLIES	RENTAL	SUPERVISION CORE OR LOGGING DATA REVIEW	·	SURVETING	RENTAL	SUPPLIES & SERVICES	LOGS BORE HOLE SURVEYS	ACCESS ROADS	AV ALYSIS	STORAGE
		- 010		020	100	200	250	300	400	500		700	800	90
AUGUST					71 - 127 4 1 - 131					F. C. # 14455	Sept 1	第 次标识量的		
								P. A. Harris		\$426.91	the first h		外(40) (4(4))	
								1 southeady			Start Start			4.7 %
										COLLECTION		Spring Dr.		42.05
								i i na di		\$16.89		A Sold And Adding		145 11 147
											NEW MARK	Professional Company		
SEPT.						KODAK			RENTWAY	CAL-VAN		PROVINCE OF B. C.		COST
			ā.,			# 100579-1			8 37.74	\$150.00		F026340		8196.0
	of 1			(g.), ()		\$ 8. 72			RENTWAY			#592.95		
						COLLECTION			#532.63			·文明。4.8分为元	well and the state of	COST COLLECT
CTOBER						\$ 2.90								\$5.00
			7	-		\$151.74						· · · · · · · · · · · · · · · · · · ·		14.46
											Windowski	3. A. C.		
NOVEMBER						KODAK #5102488-3			RENTWAY \$1,012.59	F. C. # 17584	ROKE # 1437		(1) 计制制	COLLECT
						\$13.07				8 40. 27	\$ 159.50		CASCABE # 1014	8743.
										F. C. # 17582		e to en en en en	\$ 1,000.00	
									RENTWAY \$436.56	\$ 175.00				
													CASCADE # 1106	
											Late was drawing	385 315 475 IA	\$ 750.00	200
									· 特别的特别				CASCADE # 1107	
						, car	·						\$1,500.00	
		₩	i i i de des	Tales and the first						maran walk	13.27.2015	51216728		
	40,7000			40 F. Mark 1983										
1.77				And an establish				3660						

	DIAMOND I	DRILLING	ROTARY DRI	HLLING	BULLDOZER	GEOLOGICAL	RECLAMATION	SURVEYING	TRUCK	MISC.	RADIATION LOGS	PRE-LOGGING	PETROCHAPHIO	1
4: 4114	FOUTAGE RATE	BAY WORK & SUPPLIES	FOOTAGE RATE	DAY WORK & SUPPLIES	1	SUPERVISION CORE OR LOGGING DATA REVIEW			RENTAL	SUPPLIES &	BORE HOLE SURVEYS	ACCESS ROADS	ANALYSIS	STOHAGE
No. 1 S. C. L. Salvano, Salva Princes.		- 010	(020	100	200	250	300	400	500	600	700	800	900
DECEMBE	e													COLLECTION
1				-							· · · · · · · · · · · · · · · · · · ·			\$953.50
				-				ļ	_	<u> </u>				*1,029.55
			-	 	-	<u> </u>	-	-						4 195.67
	- manager sales				_	-			 	ļ		_		
				-		 	-			<u>"</u>		_		
JANUARY	1			-				 	RENTWAY	ADVANCE PLASTICS	-		CASCADE	
79.					 	 			# A 75, 25	#008360		- 		50
									7, 2	4 25183			1	
1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1									•				BIRTLEY # 1116	
				•									\$ 675.00	7
			***	0 \$										
TOTAL	89,105	5,333°	169,928	6683.0E	28,568	2,559°		<u> </u>	3,960	23,571,21	24,064	\$ 592 ^{.95}	3.19S.C	10,916,33
						-					<u> </u>			
					_	-								
	1						 				#	,878	<u> </u>	
1 - 1940 - Mary 1940 V	P. Harrier services were descentioned, companying to the control of						-		GRA	ND TOT	AL 3/4	,878		
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The street and an area							1			1070 0				
	C3632	(5	REENHIL	LLS	UPPER	SEAM		•		1978 D	.villinc	i PROC	BRAM	

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	DIAMOND	DRILLING	ROTARY DR	ILLING	BULLDOZ ER	GEOLOGICAL	RECL A	MATION	SURVEYING	TRUCK	MISC. EQUIPMENT	RADIATION				COME	
MONTH	FOOTAGE RATE	DAY WORK & SUPPLIES	FOOTAGE RATE	DAY WORK & SUPPLIES	RENTAL	SUPERVISION CORE OR LOGGING DATA REVIEW			SORVETING	RENTAL	SUPPLIES & SERVICES	LOGS BORE HOLE SURVEYS	ACCESS ROADS	ANAL		STOR	
		- 010		020	100	200		- 250	300	400	500	600			800		
ጠብሃ			\$.D.S. #0281	5.D. 6. # 0276	R. JOHNSON					RENTWAY	CAL-VAN		KOOTENAY SAW INV			1 4 %	
			\$26,289 00	\$500.00	\$1,904.00		•			\$ 193.20	\$810.00	,	#45.97	•			
TUNE					R. JOHNSON # 103	•					8648.00	ROKE # 1289	#422.84		, .	सन्दर्भ	
					\$1,190.00			•]		RENTWAY	8405.00	\$1,019.40				·4.	
										8692.33	ROOM V		COLLECTION				
										-	\$ 200.16		\$1,021.31				MI
													MALKIN & PINTON				-
		<i> </i>				,							#881538-CAI				
											4 405.00	KO4	8206.64				\neg
		17										,			1		\neg
		1/									COLLECTION	· · · · · · · · · · · · · · · · · · ·	COLLECTION		7		\neg
		7							\		\$ 151. 79		\$1,968.23	 	1		+
		/						1					\$ 61.18		1	i	1
		71		1			 	1					8274.00		1		+-
•		/					1	1		 		ROKE # 1303	2-11		1		T
''	/				-					 		\$1,202.01	INDUSTRIES	 /			 -
	 					<u> </u>	/		1				,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,			-	
בחדא -	 		5.D. S. # 525		R. 50HH50N # 104		1-1			C057	CAL-VAN		F. C. # 14461	 			
	 		816,660.60		15 44.00		-/-			\$ 9.89	8360.00		8 41.33	 /-			
·····	† <i>† † † †</i>						100			- 7.07	\$ 285.74		F. C. # 15113	 			
•	 	Appendix of the second						·			- 200.77		# 15/13	 -/		- - 	
·····	 /						 					RORE # 1330	# 103.36	-	No.	 	ž T
, ,,, ,, ,, ,,,,,,,,,,,,,,,,,,,,,,,,,	1/				 		₩					# 1330 \$418.50		65.		شسنا	

-	DIAMOND	DRILLING	ROTARY DR	ILLING	BULLDOZER	GEOLOGICAL	RECLAMATK	N SURVEYING	TRUCK RENTAL	MISC.	RADIATION LOGS	PRE-LOGGING ACCESS	PETROGRA ANALYSIS		ORE
MONTH	FOOTAGE RATE	DAY WORK S SUPPLIES	FOOTAGE RATE	DAY WORK & SUPPLIES	RENTAL	SUPERVISION CORE OR LOGGING DATA REVIEW			RENIAL	SUPPLIES &	BORE HOLE SURVEYS	ROADS			ST ORAK
		- 010		020	100	200	250	300	400	500	600			× -	~~
UGUST			5.D.S. # 533						RENTWAY	CAL-VAN		COLLECTION			
		. /	\$5,464.50					·	\$1,019.18	# 1,026.06		8 737. 33		-4	• •
	·			•		'				COST COLLECTION	81,587.73	# 14461	,	_/	graph and
							•	-		B 352.45		869.93		-44	<i>!</i> .
				, •				Д		ļ	<u> </u>			-/-1	· · · · · ·
		1-/-										C057		-/	
EPTEMBER		/				ļ			RENTWAY	ļ		COLLECTION	 	/ }	
		- -/	<u> </u>						\$ 157.92	 		\$ 28.80	 	┦─┤	<u> </u>
			-		1		 -			22 = -:0	b			/ -}	
			 		 	1	 -		02.12.121	2250°C					
CTOBER	, , , , , , , , , , , , , , , , , , , ,		<u> </u>	 	 	 	 -		8346.68	#11160					
		-/					 -		P276.68	1	 	 			
love trace	<u> </u>	/			\		/-		RENTWAY	-	1		 -		
VOVE MRE		/	·			<u> </u>	1 /		\$ 540.12			<u> </u>			
	/					1	1-1-								
ECEMBER.									RENTWAY						
					·				# 281.34	;					
													1/		
AMU Nex					The part of				# 262.5	4	ļ		11-		
79							1					4 2 -			
TOTAL	/		48,414.10	500.0	3,638	-	 		* 3,503 ¹⁶	6498	4,227	5,970.7	1	•	1
	//	, ,					/	, 	GRAND T	OTAL 72	752.57		65.		
	<u>/</u>	4	LAKE	MT.	AREA		<u> </u>	<u> </u>		1978"0	PILLING	PPO	BRAM		1 4 4 h

,	DIAMOND D	RILLING	ROTARY DR	ILLING	BULLDOZER	GEOLOGICAL		A0500		TRUCK	MISG.	RADIATION	PRE-LO	GGING	PETROGRAPHIC	CORE
MONTH	POOYAGE RATE	DAY WORK & SUPPLIES	FOOTAGE RATE	DAY WORK & SUPPLIES		SUPERVISION CORE OR LOGGING DATA REVIEW	REGLAX		SURVEYING	RENTAL	EQUIPMENT SUPPLIES & SERVICES	LOGS BORE HOLE SURVEYS	ROAL	33	ANALYSIS	STORAGE
		010		050	100	200		250	300	400	500	600		700	600	900
APRIL	`								•							100
	45319592						•		,							
MAY	CONNORS # 8431		5.D.S. #0219	*	R. 30HN SON # 102		· · ·			RENTWAY	CAL-YAN	COST				R. Johns
	\$2,000.00 CONNORS		\$21,255.75		\$2,448.00					\$164.47	21,332.00	B 27.72				\$ 748.C
·	# 8466										CAL-VAN					COLLECT
	\$21,206.73		\$.D.S. #0277								\$2,196.00					B 999. 3
			\$ 38,778.00								CONNORS # 8466					
				\$.05. #0276							82,422. 94					
 			, , , , , , , , , , , , , , , , , , , ,	\$1,500.00												
											BOARD REBATE			·/	•	
JUNE										RENTWAY	-B 76/. 57			7		TESTED TRUSS
,										\$ 605.79				1		# R00227 # 336.4
*																COLLECT
											·					B 131.3
					,							 	1 7			\$ 56.6.
		•											1			
JULY		,						······································			,	ROKE . # 1303				<u> </u>
<i>c</i> .	•											83,879.20		·····	,	
					<u> </u>					COLLECTION		<u> </u>	17			COST
			-			,				8 8.65			17			8 396.0
	·						1						1/			2.5 e4V
							1/						11-	~		The second of
					- 1.	1	1/						+/	65. `		

P3602 --- TURNBULL MT. AREA

1978 DRILLING

PROGRAM

	DIAMOND D	RILLING	ROTARY D	RILLING	BULLDOZER	GEOLOGICAL	MECLAN	ATION	SURVEYING	TRUCK	MISC. EQUIPMENT	RADIATION	PRE-LOGGING		CORE
MONTH	POOTAGE RATE	DAY WORK & SUPPLIES	POOTAGE RATE	DAY WORK & SUPPLIES	RENTAL	SUPERVISION CORE OR LOGGING DATA REVIEW				RENTAL	SUPPLIES &	LOGS BORE HOLE SURVEYS	ACCESS ROADS	ANALYSIS	STORAGE
		010		080	100			250	300	400		600	700	800	900
RUGUST	`	COLLECTION				COLLECTION				# 891181	M.				COLLECTI
	•	8 192.72				\$ 181.80	•		Ť					***	21,782.5
				•		,									e de gr
														/) (m)
SEPTEMBER							,			# 136 18	SN ,				COST COLLECT
				·		·								CASCADE # 1099	842.9
						COLLECTION		\neg		CESTOMBETION	COST			\$2,550.00	
				•		# 2.91		7		\$ 303,35	886.40				COLLECT
								7							B 224. 4
								1						-	F. C. 1616
				·				1							\$ 60.80
						. /									
•					,			·							
										COST					,
NOVEMBER										# 472.60	10.	RORE # 1437		CASCADE # 1014	
		,								7.2		\$35.50	 	\$1,750.00	COST COLLECTION
											CAL-VAN	4			\$ 210.9
·							- -				\$100.00		- -	CASCADE	cos7
DECEMBER	·				,		-/-			# 246.17	, no		-/	\$1,250.00	# 195.6
			*	·									1/	CASCADE	
						, L 2								\$500.00	in sign
JANUARY		٠.					1	******		RENTWAY 229.68			1/		Page 1
77													} 		
TOTAL	23206 ⁷³	192.72	60033	1500	2448.0	184:71	1 1	-		3,060,70	\$ 5 37 C.77	3542. ^{A2}		6 050	\$ 5.05

	DIAMOND D	RILLING	ROTARY DR	ILLING	BULL DOZ ER	GEOLOGICAL	RECLAMATIC	HE W	VEYING	TRUCK	MISC. EQUIPMENT	RADIATION LOGS	PRE-LOGGING	PETROGRAPHIC	
MONTH	FOOTAGE RATE	DAY WORK & SUPPLIES	FOOTAGE RATE	DAY WORK & SUPPLIES	RENTAL	SUPERVISION CORE OR LOGGING DATA REVIEW				RENTAL	SUPPLIES 6 SERVICES	BORE HOLE SURVEYS	ACCESS ROADS	ANALYSIS	STORAGE
il.		010		020	100	200	250		300	400	500	600	700	800	900
APRIA								\mathcal{I}			MCGAULEY 8230.69				R. JOHNSO # 101
		N					•						,		\$748.0
				, ,		•		71							
MAY	CONNORS # 8431	CONNORS #8404		5.D.S. #0276	R. JOHNSON # 102			Π		COST CULLECTION	COST COLLECTION				
	#2,000.00	A1,253.00		\$2,000.00	\$5,440.00			П		\$ 15.68	\$75.03				COST
	CONNORS # 8466									· · · · · · · · · · · · · · · · · · ·	LOWENS # 1335				\$ 921.9
	\$1,920.60										\$ 10.76				
		,													
JUNE	CONNORS # 8505	`	5.0.5, # 0311		C-11 #ND. #55					BENTWAY \$ 456.94	CAL-VAN \$2,284.00				COST
	849,336.76		\$22,349.25		\$ 300. 40						CAL-VAN \$ 2448.00		COLECTION	•	\$ 161-78
								-				 	# 452. 28		#67.9.
	CONHORS #8537		5.0.5. # 0310		R. JOHNSON # 103			1.			CONNORS # 8505	 			\$ 144.0
	# 29,888.42		\$42,572.25		\$ 7,446.00				······································		#1,836.60	<u> </u>			8148-6
······································											PEERLESS #40914				B 2.98
			\$.D.S. #0307					_	,		8 45.71				\$ 35.2
		,	\$1,020.00										,		
		*			 		-/-	_	· · · · · · · · · · · · · · · · · · ·		PEERLESS #4916			,	
7						•,	-			1	\$4.08		,		
			ζ.		 							ROKE # 1303			
				200 J. S. W.		7 m. n. n.	# 2 m				CONNORS # 8537	\$3,477.60			
•			· · · · · · · · · · · · · · · · · · ·					_			\$4,270.17			,	
		1			 							 	1	A. A. Salaka	The same of the sa
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	C3633-		WEST	TURNBU	i J	REA	I	\	•		1978 D	RILING	PROG	MAG	SPACES T

	DIAMOND DE	RILLING	ROTARY DRI	ILLING		GEOLOGICAL	SECLA	MATION	SURVEYING	TRUCK	MISC.	RADIATION LOGS			
AON TH	FOOTAGE RATE	DAY WORK & SUPPLIES	FOOTAGE RATE	DAY WORK & SUPPLIES		SUPERVISION CORE OR LOGGING DATA REVIEW			Serve	RENTAL	SUPPLIES & SERVICES	BORE HOLE SURVEYS	ACCESS ROADS	", ", "	STORAGE
18.		010		020	100	200		- 250	300	400		600		800	900
UNE								/			5.0.5. # 0310		C-11 IND. \$ 1.136.86		
		N			•		•				\$680.00				<u> </u>
				, ,							ROOM & BOARD REBATE				
											-81,077.53				
											F.C. # 14798				
											\$1,102.50				
				,		,					COST	ROKE # 1817			
· · · · · · · · · · · · · · · · · · ·					1						\$111.31	#1,348.35			
		1						7			\$ 5.57				
······								7	,		\$ 231.46				
		7.53						7			,				
ULY	CONNORS #8580		S.D.S. #524		R. JOHNSON # 104	COLECTION	/ 	1	,		CAL-VAN \$2,334.00		BOTHAMLEY CONSTRUCT.		<u> </u>
	B17, 795.35		\$8,878.25		\$1,088.00			1			8 864,00	ROKE	\$2,782.00		COST COLLECT
							· · · · · · · · · · · · · · · · · · ·					\$5,366.51			\$618.0
							1	1	1		#432.00				\$1,281.
	-				-		1-1		-		\$108.00				\$432.0
							+	,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,			8 37.53			1	1276.8
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	CONNORS		5.0.S. #53%		1				 	 	\$5.29	 	-		—
UGUST	# 8668	1 may	#532		An Anna Maria								LATKA CONSTRUCT		COST
-	# 300, O.		#63.61.00						-	-	Russelster #044 247	7	\$641.00		B 797. 2
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	DIAMOND	DRILLING	ROTARY DR	ILLING	BULLDOZER	GEOLOGICAL	RECLAMATIO	N SURVEYING	TRUCK	MISC. EQUIPMENT	RADIATION	PRE-LOGGING	PETROGRAPHIC	t .
MONTH	FOOTAGE RATE	DAY WORK S SUPPLIES	FOOTAGE RATE	DAY WORK & SUPPLIES	RENTAL	SUPERVISION CORE OR LOGGING DATA REVIEW	I COLUMNIA NO	SORVETING	RENTAL	SUPPLIES & SERVICES	LOGS BORE HOLE SURVEYS	ACCESS ROADS	ANALYSIS	STORAGE
<u></u>		- 010		020	100	200	250	300	400	1	600	700		900
SEPT	•		5.D.S. # 563		R. JOHNSON # 107				COST COLLECTION	F. C. 751 # 16404#	1849 1849	LATKA CONSTRUCT.		COLLECTIC
			\$8,545.00		\$1,050.00			1	\$ 25.16	\$ 184.80		\$2,185.00		8389.0
			,							F, C. # 16661			•	
			5.D.S. #557		C-11 INDUST.					B 130. 13				
			8449.44		\$42.00						,			
			-\$146.26				·				ROKE # 1391	,	-	
										COLLECTION	\$562.40		·	
					R. JOHNSON # 112	COLLECTION			RENTWAY \$ 355.09	8812.88		PROVINCE OF B.C.		
·		•			\$750.00	\$ 2.91				\$ 0.98		#026340		
		•								\$6.94		\$592.95	•	
							1	·	,	\$10.94	 			
·									8675.07	\$ 44.10				
										CAL-VAN \$540-00				
										\$830,50				
OCTUBER			5.D.S. #598											COLLECTIO
		·	\$10,186.25			,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,		- 		F. C. # 16661	 	 	 	\$258.95
NOVEMBER		·			-					\$133, 25	ROKE # 1437	 	<u> </u>	
~				,						1	\$135.50		7.	
			ί.		 	 	1-1			 	V / 30 / 30	 	 	2057
		- Jan 19 7 - 17		20 3 MAR (20)			***					<u> </u>		#330.45
OECEMBER	the second second				R. 30HNSON # 119	Name		 	RENTWAY BJ91.04	 	ROKE # 1489			# 3 30 , 7 3
		4			\$ 150.00		1/			<u> </u>	\$775.00			Same of the same of
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C3633--- WEST TURNBULL AREA

1978 DRILLING

PROGRAM

	шамоно	DRILLING	ROTARY LE	HLLING	BULLDOZER	GEOLOGICAL	MECLAMATION	SURVEYING	TRUCK	MISC.	RADIATION	PRE-LOGGING	PETROGRAPHIC	CORE
3 4 11	FOOTAGE RATE	DAY WORK & SUPPLIES	FOOTAGE RATE	DAY WORK & SUPPLIES	RENTAL	SUPERVISION CORE OR LOGGING DATA REVIEW			RENTAL	SUPPLIES &	LOGS BORE HOLE SURVEYS	ACCESS ROADS	ANALYSIS	STORAGE
COMMENT OF STREET OF STREET	44 44 44	010		020	100	200	250	300	400	500	600	700	800	900
JANUARY									PENTWAY	CAL-YAN				
													-	
· • · · · · · · · · · · · · · · · · · ·														
· · · · · · · · · · · · · · · · ·														
7074	# 101,449	s # 00	# 2 94,492.	2,000	* 4	25			\$ 40	3 29 20A30	A 3/	4 0		3 4
TOTAL	101 449.	1,253	<u> </u>	2,000	16,266	25		<u> </u>						# 6,614. ⁴
									GRAND T	OTAL 264	,239.55			
							 							
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	C5533		WEST	TURNBU	JLL A	REA	i	,	<u></u>	1978 D	RILLING	PRO	TRAM	

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	DAY WORK & SUPPLIES	FOOTAGE	DAY WORK & SUPPLIES		CORE OR LOGGING DATA REVIEW	***	N SURVEYING	RENTAL	EQUIPMENT SUPPLIES & SERVICES	LOGS Bore Hole Surveys	ACCESS ROADS	ANALYSIS	BOARD
CONNORS # 8285 819,138.41 OCTOBER # 8826 814,349.56 CONNORS # 8866 821,867.24	210			R. 30HNSOH # 107		****					1		Z - 1
CONNORS # 8866 # 819,138.41 CONNORS # 8826 EUNIORS # 8866 # 811,867.24				# 107				J 230	250	260	290	280	270
819,138,41 OCTOBER # 8826 814,349.56 CONNORS # 8866 821,867.24			/					l l			1ATKA #591.12		
OCTOBER # 8826 814,349.56 CONNORS # 8866 821,867.24					EXPENSE ACCOUNT			1			R. JOHNSON		
OCTOBER # 8826 814,349.56 CONNORS # 8866 821,867.24					M. SCHAUMBERGER						\$1,350.00		
OCTOBER # 8826 814,349.56 CONNORS # 8866 821,867.24			1		\$ 36.19					-			
OCTOBER # 8826 814,349.56 CONNORS # 8866 821,867.24					\$ 130.02								
OCTOBER # 8826 8/4,349.56 CONNORS # 8866 821,867.24					D. MacFARLANE		_						
OCTOBER # 8826 814,349.56 CONNORS # 8866 821,867.24	İ		7		\$142.60								
\$ 14,349.56 CONNORS # 8866 \$21,867.24				R. JOHNSON		1			COST	RoKE # 1403	#021966		
\$21,867.24			1	81,950.00					B 5.85	# 1,895.19	\$1,123.50		CAL-VAN
\$21,867.24									-				E 225.00
NOVEMBER			7					١					\$1,845.00
NOVEMBER			7										,
NOVEMBER			7							ROKE # 1432	LATKA		
NOVEMBER			/							\$1,082.76	\$ 2,066.00		CAL-VAN
NOVEMBER		7											\$ 2,130.00
	1			R. 30HN30N # 116	COST								8 884.00
				# 75.00	COLLECTION STAFF SPLARIES							,	\$ 705.00
					82,926.00						LATKA		
										ROKE # 1435	\$ 2,968.00	,	
		7				1				#1,130.85			
DECEMBER		1		C-11 INDUSTRIES		1	_		-				
		7		\$ 144.00									
JANUARY					\$ 1620VG								•
TOTAL \$57,355.24		7		3,969	4855				* ₅ .85	4,108	8,098	2	5,789.00
C 3700		. 1	NORTH	TURN		ARE	Δ			RILLING	PRO(FRAM	

GRAND TOTAL # 84, 181.93

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THE RESERVE AND A 12 CONTRACT OF THE PARTY O	DIAMOND	DRILLING	ROTARY DR		BULL	DOZER	GEOLOGICAL	رسما		ION	SURVEYIN	3	TRUCK RENTAL	MISC. EQUIPMENT	RADIATION LOGS	PRE-LO		PETRO	GRAPHIC	CORE	11.14
MONTH	POOTAGE RATE	DAY WORK &	FOOTAGE RATE	DAY WORK & SUPPLIES	RE	ITAL)	CORE OR LOGGING DATA REVIEW							SUPPLIES & SERVICES	BORE HOLE SURVEYS	ROA					
		- ∮010		020		= 100	200		25	•	3	0		500	600		-700		-800		
MAY			/	•			<u> </u>						COLECTION				~	_	· ·		
•		1 /											8 70.47			ļ		/		<u> </u>	
TUNE			5.D.S. # 03/0	4			,					_/		CAL-VAN		<u> </u>		1			
			\$ 12,280.25										RENTWAY	8432.00		 		<u> </u>		 	
										1.		\perp	8254.63	CAL-VAN				 		<u> </u>	
										_				\$509.48		<u> </u>	-	 		 	
										<u> </u>		_		ROOM ¥ BOARD REBATE					_	<u> </u>	
1												_		B 95.70		· ·				<u> </u>	
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	<u>.</u>												,				<u>·/</u>		_	↓	_
SULY		V	5.D.S. # 524				-						<u> </u>		ROKE # 1303	1			<u></u>	1	
		7	\$8,785.00										COLLECTION		8938.72				1.00	<u> </u>	
		7				7							8 3.7/							↓	
						1	·.,						RENTWAY	COLLECTION	# 1330	1					_
UGUST	/	,	COLLECTION										\$382.19	\$666.00	\$ 739.25						
	/		#320.64				· · · · · · · · · · · · · · · · · · ·		7					# 8.13					. .		
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	DIAMOND	DRI	LLING :	ROTARY DR	ILLING		LOCZER	105					SURVEYII	NG	TRUCK RENTAL	MISC. EQUIPMENT	RADIATION LOGS	AC	LOGGING ESS		ograp Ysis	HIC CO	ORAGE
мти	POOTAGE RATE		MY WORK B SUPPLIES	POOTAGE	DAY WORK & SUPPLIES			800	ORE OR OGGINS ITA REVIEW		•					SUPPLIES &	BORE HOLE SURVEYS	R	DADS		·		
			010		020				200		250			500	400	500	600		700		800		90
MBER			/					1			,,_,	_/			RENTWAY	'				├ ─	 		,
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TAL	1		 	[#] 21,385	\$	-	 -	+							# 1300°	\$ 2276·\	1,677	7		+	-		
AAC		}		21,263	 	†	_	1				_		••••	1200		1					*	
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	DIAMOND D	RILLING	ROTARY DE	RILLING	BULLDOZER	GEOLOGICAL	RECLAMATION	SI IDIA VILIA	TRUCK	MISC.	RADIATION		PETROGRAPHIC	CORE
MONTH	FOOTAGE RATE	DAY WORK & SUPPLIES	FOOTAGE RATE	DAY WORK & SUPPLIES		CORE OR LOGGING DATA REVIEW	RECEARM ION	304451190	RENTAL	SUPPLIES B.	LOGS BORE HOLE SURVEYS	BOARD	ANALYSIS	STORAGE
!		110			120	140	***	***	130	150	160	170	180	
EPTEMBER	CONNORS # 8785			,	R. JOHNSON # 107				/			 		
	\$34,524.35				\$2,250.00		,	/						
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				1		ACCOUNT				-				
, -11 -21 - 12 - 12 - 12 - 1						H. BAAL \$ 90.00								
	To reference of the same of th	·		1	-	70.00		/-	-					-
CTOBER	CONNORS # 8826			1	R. 30HN SOH # 112			1						
	\$ 19, 740.57				8 3, 7/2. 50	`		1		COST COLLECTION	ROKE # 1403			
				1				1		\$ 115.20	\$ 1,655.39	CAL-VAN		-
	CONNORS # 8866			7				7		F. C. # 17589		\$225.00	 	
	\$20,011.96			7				1	,	\$ 288.75		\$1,845.00		
				7		Staffpy		/		COST COLLECTION	ROKE # 14/6		-	1
						\$150000			·	\$181.50	8 926.50		<u> </u>	-
							1							-
			1					-		·				1. 1
			1				1			-		CAL-YAN		
			1				/				ROKE # 1435	82,130.00		
OVEMBER	# 8906	ACKELS	7		R. JOHNSON # 1/6	KODAK	1			COLLECTION	8 545. 05	\$ 884.00	,	-/-
	\$17,138.03	# 1146	7		\$ 1,612. 50	#5103346 D				8 78.37		\$ 60.00		-
		\$3,600.00	1			84.36				\$ 175. 20		8705.66		17-
			7			COLLECTION		,		F.C. # 17775		\$2,190.00		1
						8 66.24	1			839.95				17
						F.C. # 17638	1				ROKE # 1467			1
			7			# 3.31	1				\$ 3, 228.37			

	DIAMOND D	IOND DRILLING ROTARY DRIL			BULLDOZER	GEOLOGICAL			TRUCK		RADIATION	ROOM &	PETROGRAPHIC	4	
MONTH		DAY WORK & SUPPLIES	FOOTAGE RATE	DAY WORK & SUPPLIES	RENTAL	SUPERVISION CORE OR LOGGING DATA REVIEW		SURVEYING	RENTAL	SUPPLIES & SERVICES	LOGS BORE HOLE SURVEYS	BOARD	ANALYSIS	STORAGE	
:		110			120	140		***	130	150	160	170	180		
NOYEMBER				· /		#5/04367-7									
****						8 4.62	<u>'</u>			-					
DECEMBER						KODAK					COST				
						\$17.43					\$62.77				
we should be the sugar-	a replace places, per 5 and Archaeck Section 1.			 /-		3635.3	3		-						
JANUARY						STAFF PAY	5			COSTGLL. EXP. ACC.					
	 									# _{42.99}					
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TOTAL	51,414	36000	[/		7,575	10,184.	/		00445 ==	# 921 ⁹⁶	6418.08	#8 035°	1		
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i ·	DIAMOND DRILLING		ROTARY DRILLING		BULLDOZER	GEOLOGICAL	RECLAMATION	SUPVEYING	TRUCK	MISC.	RADIATION			TOPOGRAPH-
	FOOTAGE RATE	DAY WORK & SUPPLIES	FOOTAGE RATE	DAY WORK 8 SUPPLIES		CORE OR LOGGING DATA REVIEW	NEULANIAI IVI	SONVETING	RENTAL	SUPPLIES B SERVICES	LOGS BORE HOLE SURVEYS	BOARD	ENTAL STUDY	SURVEYING
			310			***		~= ~ ~		350	360	370	385	3 95
		/			R. JOHNSON # 105									
AUGUST	1			· · · · · · · · · · · · · · · · · · ·	\$ 1,360.00	1		/	1	` ` ` ` ` ` ` ` ` ` ` ` ` ` ` ` ` ` `				
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	7	 												
SEPTEMBER	7	1	5.0.5. #562		R. JOHNSON # 107									
			\$40,470.52		\$3,900.00				<i> </i>					
	1						/		/					
	7	7			C-11 THOUSTRIES			<u> </u>						
					\$ 459.00									
		1							1					
					C-II INDUSTRIES		/	/	/					
					8 789. 75			/	/			,		<u> </u>
OCTOBER									,	COLLECTION	ROKE # 1391	CAL-VAN		Crowspest Helicopky
	1				C-II THDUSTRIES					\$ 11.50	\$579.00	\$ 1,080.00		# 7
	1				81,371.50			1			ROKE # 1403	8 336.04		72,358, ⁹⁹
	/-	,	•			1		1			\$ 145.00	\$ 1,661.00		
	1											B 495.38		McEhonne
													'	#902/34
	1	-		***************************************		//		17					1	140001000
111111 00	///	-				/		17					B.C.RESEA	1 1005Q
JANUARY	<i>-</i> /				,	17		1					TNV. # 273	7,0050
	\ <u> </u>	_	-	-		1/		17		a	V		<u>. </u>	
TOTAL	7		40,470.5	2	7880	₹	*	/		¥ 50	724.00	3572.4	13,484	12,408
1	(3	700	RD.	OWNIE	CREE	KARE	Δ	• · · · · · · · · · · · · · · · · · · ·	8		RILLING	PRO	RAM	
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GRAND TOTAL # 78,551.68











































