GM 56799

FINAL REPORT ON THE 1998 RECONNAISSANCE PROGRAM, PAYNE BAY PROPERTY

Groupe-conseil
CYGNUS
Consulting

TM 99174016

BUREAU DU RECENSEMENT

FINAL REPORT ON THE 1998 RECONNAISSANCE PROGRAM PAYNE BAY PROPERTY, NORTHERN QUEBEC

NTS 25 D/01 AND D/08

MRN-GÉOINFORMATION 1999

GM 56799

submitted to

OSISKO EXPLORATION LTD.

Jim Mungall, Ph.D.

December, 1998

Groupe-conseil Cygnus inc.
5475 Royalmount #133, Montréal QC H4P 1J3
☎ 514-735-9477 fax: 514-735-9224

SUMMARY

The following report, written for Osisko Exploration Ltd., summarizes the results of a 10-day reconnaissance exploration program effected on part of the Payne Bay property, located near the western shore of Ungava Bay in northern Quebec. The property offers potential for economic Ni-Cu-Co mineralization. A three-man crew were on site for 10 days in August, 1998. Work performed included prospecting, rock sampling, geological mapping and soil sampling.

The property consists of two mineral exploration permits that cover a total surface area of 17,412 hectares. Its southernmost portion lies within Category I Inuit land controlled by Saputik Landholding Corp. of Kangirsuk, from which Osisko Exploration Ltd. has obtained permission to perform exploration. Osisko Exploration recently entered into a joint venture agreement with Virginia Gold Mines Inc., in which Virginia has the option to acquire a 50% undivided interest in the property from Osisko by incurring $600,000 in exploration expenditures over a three year period.

The property is situated at the northern extremity of the Early Proterozoic Labrador Trough (New Quebec Orogen). It includes voluminous mafic-ultramafic sills, up to 500 m thick and 16 km long, intruded into a sequence of basalts and sulfidic sediments along the western limb of a large allochthonous fold structure call the Roberts Syncline. Reconnaissance field work in 1998 revealed that one mafic-ultramafic system (Qarqasiaq Complex) consists of gabbro, basalt and peridotite. Several peridotite lobes within the complex are interpreted as olivine cumulates at the bases of basaltic flows. The Qarqasiaq complex hosts disseminated to massive sulfides showings over a 7.5 km strike length. Eleven showings were located within two structural units in the complex. Massive sulfide showings in the upper Qarqasiaq Unit assayed 3.60% to 6.50% Ni, whereas massive sulfide showings within the lower Tasikutaak Unit, up to 96 m long on surface, assayed 0.32 to 1.54% Ni.

A chloritic mafic schist unit, interpreted to consist mostly of mafic volcanoclastics, occurs along the western margin of the property over a strike length of 35 km. This mafic schist is associated with highly anomalous stream geochemical values (up to 500 ppm Cu and 400 ppm Ni) at the northern end of the property, and also with soil geochemical anomalies of up to 606 ppm Cu and 68 ppm Ni at the southern end of the property. These anomalies are untested and unexplained.

The property covers an area that constitutes a geologically favorable environment to the formation of economic Ni-Cu deposits, i.e. voluminous ultramafic sills intruded into sulfur-bearing supracrustal rocks. Observed mineralization in the Qarqasiaq Complex occurs near the bases of trough-like

peridotite bodies, which represent in part olivine cumulates within basaltic lava flows. The Raglan nickel mining camp, situated about 250 km to the northwest in rocks of similar age and structural setting, may therefore serve as a useful exploration model for the Payne Bay property. Alternatively, if some of the peridotite bodies are intrusive in nature, the Payne Bay property would represent an environment that is similar to that of the southern Cape Smith Belt or the rest of Labrador Trough, i.e. i.e. sill-sediment complexes that are apt to host Ni-Cu-Co massive sulfide deposits near the bases of ultramafic intrusions.

A systematic exploration program is recommended to determine the extent and grade of mineralization in the Qarqasiaq Complex and to investigate the potential for mineralization elsewhere on the property. Further exploration is recommended following a program that is similar to that of Phase 2 outlined by Bardoux (1998). The program should also include reconnaissance prospecting over the Chaunet mafic-ultramafic Complex on PEM 1413, which had not been acquired at the time of the writing of the report by Bardoux. An airborne MAG-EM survey over the property will be completed by year end as a result of the option agreement with Virginia Gold Mines. Prior to 1999 field work, the airborne data should be compiled with geological data with particular attention paid to magnetic conductors within or near the mafic-ultramafic complexes and within the mafic schist unit.

TABLE OF CONTENTS

1. INTRODUCTION 1
2. PROPERTY LOCATION AND DESCRIPTION 1
3. ACCESS AND PHYSIOGRAPHY 2
4. REGIONAL AND LOCAL GEOLOGY 2
5. PREVIOUS EXPLORATION 4
6. RESULTS OF 1998 RECONNAISSANCE
   - 6.1. Qarqasiaq Complex 6
   - 6.2. Mafic schist 12
   - 6.3. Whole-rock geochemistry 13
7. CONCLUSIONS AND RECOMMENDATIONS 14
8. SUMMARY OF EXPENDITURES 16
9. REFERENCES 17

FIGURES

Figure 1. General location map.
Figure 2 (in pocket). Local geology and detailed property location (1:250,000).
Figure 3. LANDSAT TM image of the Kangirsuk area.
Figure 4 (in pocket). Detailed geology and sample location, Qarqasiaq Complex.
Figure 5. Photo of TA2 showing.
Figure 6. Soil geochemical sections with copper values (1:20,000).
Figure 7. Soil geochemical sections with nickel values (1:20,000).
Figure 8. MgO-TiO2 plot of igneous samples from Payne Bay property.

APPENDIX A - Rock sample assay certificates

APPENDIX B - Soil sample assay certificates

APPENDIX C - Sample descriptions and locations

1. INTRODUCTION

The following report, written for Osisko Exploration Ltd., summarizes the results of a 10-day reconnaissance exploration program effected on part of the Payne Bay property, located near the western shore of Ungava Bay in northern Quebec. The property offers potential for economic Ni-Cu-Co mineralization. A three-man crew consisting of a geologist, a prospector and an Inuit field assistant from Kangirsuk were on site between August 16 and August 25, 1998, inclusively. Three days were devoted to travel, camp setup and standby, while the remaining seven days were devoted to field work. Work performed included prospecting, rock sampling, geological mapping and soil sampling. The favorable results of the reconnaissance program have confirmed the economic potential of this property and further work is recommended.

2. PROPERTY LOCATION AND DESCRIPTION

The Payne Bay property consists of two mineral exploration permits (PEM) registered to Osisko Exploration Ltd. Permit # 1375 covers 7,550 hectares and expires June 28, 2003 while Permit # 1413 covers 9,862 hectares and expires October 14, 2003. The property is located near the coastal community of Kangirsuk, which is situated on the north shore of the Arnaud River at 60° 05' N latitude, 70° 02' W longitude in northern Quebec (NTS 25D/01 and 25D/08, Figures 1 and 2). The southernmost 35 km^2 of Permit # 1375 lie within Category I Inuit land controlled by Saputik Landholding Corp. of Kangirsuk. Osisko Exploration Ltd. has obtained permission from the corporation to perform exploration work within Category 1 land until October 31, 1999. The agreement is renewable on an annual basis.

Osisko Exploration recently entered into a joint venture agreement with Virginia Gold Mines Inc., in which Virginia has the option to acquire a 50% undivided interest in the property from Osisko by incurring $600,000 in exploration expenditures over a three year period. These expenses will be added to a commitment of $300,000 in exploration expenditures on the part of Osisko.

3. ACCESS AND PHYSIOGRAPHY

The property is accessible by hydroplane or helicopter from Kuujjuaq, located 235 km southeast of Kangirsuk. The town of Kuujjuaq includes a commercial airport with daily flights from Montreal. There is a gravel airstrip in Kangirsuk and the community is serviced by two daily scheduled Air Inuit flights from Kuujjuaq. Jet "A" fuel and aviation gas are available at the airstrip.

The region is relatively flat, lying between 150 and 300 m above sea level. There are numerous lakes, some of which are several kilometers long but less than one kilometer wide. The area is covered entirely by tundra, and ridge tops consist commonly of bare rock exposures hundreds of meters in extent.

4. REGIONAL AND LOCAL GEOLOGY

The Labrador Trough (also known as the New Quebec Orogen) constitutes the northeastern extension of the Trans-Hudson Orogen, an Early Proterozoic collisional zone that borders the Superior Province. The Trans-Hudson orogen also includes the Thompson Belt of Manitoba and the Cape Smith Belt of northern Quebec, both of which host important nickel mining camps. The Trough is an 800 km long northwest-trending orogenic belt (2.1-1.8 Ga) that separates the Superior province from the Churchill province. The volcanic and sedimentary strata which comprise the orogen (Kaniapiskau Supergroup) are distributed in three broad belts: a western parautochthonous sedimentary zone, a central allochthonous zone of sedimentary and volcanic rocks, and a poorly-defined eastern hinterland comprising amphibolite to granulite facies rocks and remobilized Archean basement. The two western belts make up the foreland and have a southwest-vergent fold-thrust geometry. The foreland consists of two major volcano-sedimentary sequences separated by unconformities. Each sequence records a transition from continental sedimentation and local alkaline volcanism to progressively deeper water basinal sedimentation and submarine tholeiitic basaltic volcanism (Skulski et al., 1993). North of latitude 57°, the second sequence onlaps the Superior craton along most of the orogen's western margin and consists of a transgressive orthoquartzite overlain by banded iron-formation (Superior type) and younger turbidites. Eastern facies of the second sequence reflect deposition in deeper waters and consist, in the central and eastern portions of the northern Trough, of turbidites with banded iron

formation (Algoman type) and a thick overlying pile of tholeiitic basalts. Formations in the eastern Trough are intruded by abundant tholeiitic gabbro/peridotite sills known as the Montagnais sills (Skulski et al., 1993). These sills are generally comagmatic with the basalts and both consist of relatively evolved transitional tholeiites. Porphyritic gabbro sills are less abundant but are commonly associated, along with peridotites, with Cu-Ni deposits in the northern Trough. These disseminated sulfide deposits are generally low grade (0.6%–2% Cu and 0.2%–0.9% Ni) but include showings of high grade (3%–4% Ni and 3%–6% Cu) mineralization (Clark, 1987; Wares and Mungall, 1997).

The Payne Bay region, located at the northern extremity of the Labrador Trough, was mapped by Hardy (1969, 1973, 1976) at a scale of 1:63,360. In this area, the contact between supracrustal rocks of the Labrador Trough and Archean gneisses of the Superior Province is probably a thrust-fault, judging by its irregular, folded basal contact. Both the basement and the allochthon were folded into a synclinal structure 20 km wide and 80 km long that plunges gently southeastward (Roberts Syncline, Figure 2). The thrusted sole of the package is folded into kilometer-scale parasitic folds around the margin of the Roberts Syncline, which now defines a klippe. Schistosities are moderately steep on the west limb and subvertical on the east limb of the syncline, indicating that it is slightly overturned toward the west. Metamorphic grade increases from greenschist along the west limb to amphibolite facies along the east limb of the syncline. The amphibolite isograd passes within one kilometer of the east limb (Hardy, 1976).

The Roberts Syncline is rimmed by sedimentary rocks (iron formation, turbidites, sulfidic/graphitic mudstones and minor dolomite) and cored by a thick sequence of basalt containing minor sulfidic/graphitic mudstone. The stratigraphic correlation to formations further south is uncertain, and the absence of key formations in the local stratigraphy suggests the klippe is probably composed of multiple imbricate thrust slices. The basaltic pile has been intruded by several layered mafic-ultramafic sills. Some sills are well differentiated (Ward, 1988), showing fine-grained chilled lower margins (generally against sulfide-rich graphitic schist) overlain by layers of serpentinized peridotite that grade upward into amphibolite, metagabbro and iron-rich metadiorites.

The Qarqasiaq sill, which is covered by PEM 1375 (Figure 2), is a long (16 km) and voluminous (up to 500 m thick) gabbro-peridotite sill within the Roberts Syncline. It was the focus of the 1998 reconnaissance work as available data (see below) suggested the presence of massive sulfides. The Lac Chaunet sill is located in the core of the syncline on PEM 1413 and includes a folded/faulted gabbro-peridotite sill that is 15 km long and up to 1 km thick (Figure 2).

Another type of mafic rock in the syncline occurs as a band of chlorite-actinolite schist (Figure 2). Outcrops of this rock are found intercalated with pelitic schists along the western contact between the basaltic pile and the metasediments. The unit has a probable strike length of about 35 km, most of which is covered by PEM 1375. It is described by Hardy (1976) as a schistose, light green weathering rock consisting of actinolite and chlorite with minor albite, clinozoisite and leucoxene. At the northern end of PEM 1375, Hardy (1976) reports stream sediment anomalies of up to 500 ppm Cu and 400 ppm Ni that are spatially related to the chlorite-actinolite schist (Figure 2).

A large mafic-ultramafic intrusion called the Kyak Bay intrusion was emplaced near the core of the Roberts Syncline (Figure 2). A thermal metamorphic aureole (hornfels) about 100 m wide surrounds the intrusion. The intrusion shows primary magmatic layering disposed approximately parallel to the structures in the host schists. The age of the intrusion is unknown, and it is unclear whether it predates regional deformation of the Hudsonian orogeny.

The entire region is cut by late, NE-striking subvertical faults that affected the Archean basement, the Proterozoic supracrustal rocks and the Kyak Bay intrusion. The faults display apparent horizontal displacements of several hundred meters and form prominent kilometer-scale lineations in the topography.

5. PREVIOUS EXPLORATION

This section is summarized from the qualification report by Bardoux (1998). During the course of geological mapping in the area by the Quebec government, 408 stream sediment samples were collected and analyzed for Cu, Ni, Zn, Pb and U (Hardy, 1976). The sample spacing was low (1–3 km), but several samples gave anomalous results in nickel and copper (Figure 2). As previously mentioned, two samples highly anomalous in copper and nickel are located

within PEM 1375 over the actinolite-chlorite schist near lac Roberts. No follow-up work was done on these anomalies and the source of metals in the stream sediments remains unexplained.

Prior exploration in the Payne Bay area focused on iron ore deposits along the margin of the syncline, and on Ni-Cu showings within the Kyak Bay intrusion. Between 1968 and 1973 several companies performed geological mapping, ground/airborne geophysical surveys and drilling on the Kyak Bay showings, which occur at the bases of peridotite bodies within the intrusion. The showings consist of brecciated fragments of peridotite sitting in a matrix of finer-grained sulfide-rich peridotite which occasionally grades into massive pyrrhotite, chalcopyrite and pentlandite. Peridotite above the breccias generally contains disseminated sulfides. Grab samples assayed up to 1.74% Cu, 1.04% Ni and 0.20% Co. The largest deposit outlined by drilling is a pipe-like body 18 m in diameter and at least 60 m deep grading about 0.4% Cu and 0.3% Ni.

In 1987 La Fosse Platinum Group Inc. performed reconnaissance exploration for platinum group elements on the layered peridotite-gabbro sills in the Roberts Syncline (Ward, 1988). The Kyak Bay intrusion itself was not sampled. A number of showings were discovered in the Qarqasiaq sill. The main showing is reported to consist of a massive sulfide pod (pyrrhotite-chalcopyrite-pentlandite) 15 cm wide occurring within a zone of disseminated sulfides in peridotite measuring 4 x 7 meters. Several other showings of disseminated sulfides were located along strike of the sill as far as 2 km southeast of the main showing. Grab samples of the sulfides assayed up to 610 ppb Pt, 790 ppb Pd and 0.20% Co. Several disseminated sulfide showings in peridotite and gabbro were also reported by Ward (1988) in the Chaunet mafic-ultramafic Complex. Surprisingly, Ni and Cu were not assayed by La Fosse Platinum, despite the fact that Ward reported that sulfide mineralization in peridotite responded to the dimethylglyoxime field test for nickel. Ward (1988) did not follow the mineralized zone at Qarqasiaq further to the southeast, presumably because it lay within Category I land.

A false-colour LANDSAT Thematic Mapper (TM) image of the Payne Bay area was produced by Cygnus Consulting Inc. (Figure 3) by composing each of the colour components of the RGB image from a ratio of TM spectral bands chosen to emphasize the presence of iron oxides (gossans). The village of Kangirsuk is clearly visible in this image as a pink patch along the shore of Rivière Arnaud

(1). A bright pinkish-red streak leading to a lake about 2 km due north represents disturbed ground near an airstrip, which is apparent as a thin black line in the middle of the red patch. Similar pinkish-red areas appear where unconsolidated sediments are exposed in river valleys near the southeast and southwest corners of the image. In the area between Lac Virgin and Kyak Bay in the northeast corner of the image several bright orange-red patches are visible (2). Reference to Figure 2 indicates that these are large outcrops of iron formation. The orange-red patch marked by a black circle in the northwest corner of the image corresponds to the location of the sulfide showing discovered by Ward (1988). The known southeast extension of the gossan is clearly visible in the image as additional red patches (3). Of particular interest is that the LANDSAT TM image suggests that mineralization in the peridotite sill extends up to 6 km southeast of the showing, within Inuit Category 1 land, as indicated by other orange-red patches (4). This information led to the conclusion that the Qarqasiaq sill is indeed mineralized and should hence be the focus of the 1998 reconnaissance exploration.

6. RESULTS OF 1998 RECONNAISSANCE

6.1. Qarqasiaq Complex

The complex previously referred to as the Qarqasiaq sill was the object of a five-day program of prospecting, sampling, and reconnaissance mapping at a scale of 1:10,000. The results of this work are summarized in Figure 4 (in pocket). The area mapped includes most of the Qarqasiaq Complex, which follows an unnamed stream draining from Lac Qarqasiaq into the Tasikutaak River. The Qarqasiaq Complex was mapped by Hardy (1976) as a layered peridotite-gabbro sill up to 800 m thick at its northwest end, dividing into two layered peridotite-gabbro sills with a similar combined thickness in the Lac Tasikutaak area and continuing as two bodies almost all the way to the town of Kangirsuk, 23 km to the southeast. The complex is located within a thick sequence of basalts with minor intercalated sediments and gabbro sills.

Field work revealed that the Qarqasiaq Complex is in part extrusive as it includes mafic-ultramafic lava flows up to 300 m thick. These flows include basal olivine cumulates that have the field appearance of peridotite. There may be ultramafic sills (i.e. intrusive peridotite) within the sequence, but in all cases

where bases or tops of units could be observed, the outcrop textures suggested flow margins rather than intrusive contacts. The main diagnostic feature observed at the lower margins is pillowed basalt overlying sulfidic sediment and capped by pillow breccia with a pyroxene matrix, grading rapidly into maroon-colored olivine peridotite. The upper margins of the layered units are basaltic horizons up to 15 m thick with chaotic flow-top breccias up to 5 m thick. These textures are difficult to interpret as upper chilled margins of intrusions, but are fully consistent with extrusive flow-tops. The intervening layered peridotite-gabbro units between the upper and lower marginal facies are dominantly peridotitic, with the gabbroic zones forming at most 20% of their thickness. The peridotite bodies are crescent-shaped and slightly concave upward, with typical lengths of 1 to 1.5 km and thicknesses of up to 300 m (Figure 4). At their lateral extremes the layered bodies taper to thicknesses of 2 to 10 m, including peridotitic layers 0 to 5 m thick, locally with well developed pillowed basaltic bases and brecciated basaltic flow tops. The thin distal portions can be traced for up to 1.5 km away from the main, trough-like peridotite bodies at their centers.

Two sets of flows (volcanic units) were recognized within the Qarqasiaq Complex, separated by a thrust fault which is generally concordant and which follows a horizon of interbedded sulfide-rich meta-chert, siltstones and slates. Below the fault (i.e. with younging direction to the NE), the Tasikutaak Unit comprises three main layered flow horizons that are named alphabetically in ascending stratigraphic order: horizons TA through TC. Above the fault the Qarqasiaq Unit also comprises three main layered flow horizons called QA, QB and QC.

Eleven sulfide showings were discovered within the Qarqasiaq Complex over a strike length of 7.5 km. Assay results of samples are reported in Table 1 and samples are located in Figure 4. A complete set of assay results is provided in Appendix A and all sample descriptions and UTM locations are supplied in Appendix C. Samples that were analyzed but that are not described in Table 1 refer to sulfidized but barren samples of basalt and sediment.

The Qarqasiaq horizons A, B, and C all contain small showings of massive to disseminated sulfide consisting of pyrrhotite, chalcopyrite and pentlandite. The QC showing, 100 m long and 1 to 5 m thick, corresponds to one of the showings

TABLE 1 - Assay results from Qarqasiaq Complex (ND= not determined)

Sample #	Zone	Sulfides	Cu %	Ni %	Co %	Au (ppb)	Pt (ppb)	Pd (ppb)
JMPAR98-06	QA1	MS	0.22	3.60	0.18	15	678	2351
JMPAR98-17	QA2	DISS	0.73	0.96	0.05	ND	ND	ND
JMPAR98-18	QA2	DISS	0.34	1.22	0.06	ND	ND	ND
JMPAR98-19	QA2	DISS	0.23	1.15	0.06	ND	ND	ND
SFPAR98-06	QA2	DISS	0.15	1.21	0.07	12	169	219
SFPAR98-07	QA2	DISS	0.32	0.40	0.02	ND	ND	ND
SFPAR98-05	—	VEINS	2.30	0.03	0.02	7	4	2
JMPAR98-01	QB1	MS	0.17	3.70	0.25	10	430	106
JMPAR98-08	QB1	MS	0.20	4.10	0.27	7	988	140
JMPAR98-15	QB2	DISS	0.34	0.59	0.04	ND	ND	ND
SFPAR98-01	QB2	DISS	0.47	1.77	0.11	ND	ND	ND
JMPAR98-09	QC	DISS	0.05	0.17	0.01	ND	ND	ND
JMPAR98-10	QC	DISS	0.08	0.27	0.02	ND	ND	ND
JMPAR98-11	QC	MS	0.09	6.50	0.32	5	539	295
JMPAR98-12	QC	VEINS	1.40	0.06	0.01	4	1450	827
JMPAR98-13	QC	MS	0.09	6.00	0.34	4	731	174
JMPAR98-14	QC	DISS	0.28	1.14	0.06	ND	ND	ND
JMPAR98-24	TA1	DISS	0.22	0.54	0.04	ND	ND	ND
SFPAR98-09	TA2	MS	0.22	0.38	0.08	7	65	307
SFPAR98-10	TA2	MS	0.40	0.34	0.08	18	67	426
JMPAR98-25	TB2	MS	0.33	1.13	0.15	9	386	27
JMPAR98-26	TB2	MS	0.31	1.54	0.16	1	274	127
SFPAR98-14	TB2	MS	0.19	0.65	0.16	4	153	832
JMPAR98-28	TB3	DISS	0.36	0.28	0.03	ND	ND	ND
ATPAR98-01	TC1	MS	0.53	0.32	0.06	133	71	373
JMPAR98-21	TC1	MS	0.40	0.40	0.08	10	90	603
SFPAR98-13	TC1	MS	1.00	0.38	0.08	77	79	443
JMPAR98-27	TC2	MS	0.32	1.45	0.18	44	418	1970
SFPAR98-15	TC2	MS	0.42	0.65	0.14	6	292	1483
SFPAR98-16	TC2	MS	0.36	0.47	0.10	2	308	633
SFPAR98-18	TC2	MS	0.95	0.76	0.18	6	161	325

discovered by Ward (1988). This disseminated sulfide zone contains pods of massive sulfide up to 0.5 m wide, which are hosted by brecciated peridotite in the strongly sheared basal zone of the peridotite. The massive sulfide may therefore be tectonically remobilized from a structurally deeper source. Massive sulfide at QC assayed 6.00%– 6.50% Ni and 0.32%– 0.34% Co (Table 1), while disseminated sulfide samples assayed up to 1.14% Ni.

Showing QB1 consists of a pod of massive sulfide at least 1 m long and 0.5 m thick. The southeasterly extremity of the pod is exposed within peridotite near the base of QB horizon, but the sulfide pod continues under glacial till and could be considerably larger. Two samples assayed 3.70%– 4.10% Ni and 0.25%– 0.27% Co.

Showing QB2 consists of a disseminated sulfide zone measuring 10 x 3 m and located within peridotite near the base of unit QB. Two samples assayed 0.59%– 1.77% Ni and 0.04%– 0.11% Co.

The QA1 showing consists of several angular fragments of massive sulfide, up to 20 cm in size, distributed as frost heave over a 0.5 x 2 m area. This material is interpreted as frost heave since chips of metasediment around the sulfide fragments retain the general orientation of the metasediments in nearby outcrops. The association with metasediment suggests that the massive sulfide, which contains ovoid xenoliths of fine-grained ultramafic material, was injected into sediment/basalt. All loose fragments of massive sulfide on surface (approx. 8 kg) were recovered for analysis and display purposes. Assay of 4 kg of massive sulfide yielded 3.60% Ni and 0.18% Co.

Showing QA2 consists of a 10 x 1 m zone of disseminated sulfide in basal peridotite that produced assays of up to 1.22% Ni and 0.06% Co. Approximately 80 m north of the showing, a small chalcopyrite stockwork at the peridotite-basalt contact yielded 2.30% Cu with traces of other metals.

All showings in the Qarqasiaq Unit contain relatively high Ni and Co tenors. Recalculation of massive and disseminated sulfide samples to 100% sulfide (Table 2) yields high nickel (2.33%– 7.33% Ni) and high cobalt tenors (0.11%– 0.42% Co) with large fluctuations in copper (0.11%– 3.48% Cu), indicating that sulfides in the Qarqasiaq Unit are enriched in base metals. This fertile system offers potential for buried, economic massive sulfide mineralization, specifically near the bases of the peridotite lenses.

Table 2 - Recalculated Ni-Cu-Co analyses - Qarqasiaq Complex

Qarqasiaq Unit						Values, 100% sulfide		
Sample #	Zone	Cu %	Ni %	Co %	S total (%)	Cu %	Ni %	Co %
JMPAR98-06	QA1	0.22	3.60	0.18	35.85	0.25	4.22	0.21
JMPAR98-17	QA2	0.73	0.96	0.05	8.63	3.48	4.56	0.22
JMPAR98-18	QA2	0.34	1.22	0.06	11.60	1.24	4.38	0.23
JMPAR98-19	QA2	0.23	1.15	0.06	11.36	0.84	4.24	0.23
SFPAR98-06	QA2	0.15	1.21	0.07	12.47	0.49	4.07	0.24
SFPAR98-07	QA2	0.32	0.40	0.02	7.33	1.85	2.33	0.11
JMPAR98-01	QB1	0.17	3.70	0.25	33.88	0.21	4.58	0.31
JMPAR98-08	QB1	0.20	4.10	0.27	33.69	0.25	5.09	0.34
JMPAR98-15	QB2	0.34	0.59	0.04	6.78	2.09	3.61	0.24
SFPAR98-01	QB2	0.47	1.77	0.11	18.06	1.08	4.10	0.25
JMPAR98-11	QC	0.09	6.50	0.32	36.48	0.11	7.33	0.36
JMPAR98-13	QC	0.09	6.00	0.34	33.78	0.11	7.31	0.42
JMPAR98-14	QC	0.28	1.14	0.06	10.12	1.15	4.70	0.26
Tasikutaak Unit								
JMPAR98-24	TA1	0.22	0.54	0.04	4.88	1.89	4.60	0.31
SFPAR98-09	TA2	0.22	0.38	0.08	33.87	0.28	0.49	0.11
SFPAR98-10	TA2	0.40	0.34	0.08	33.40	0.51	0.44	0.10
JMPAR98-25	TB2	0.33	1.13	0.15	36.59	0.38	1.33	0.17
JMPAR98-26	TB2	0.31	1.54	0.16	36.56	0.36	1.80	0.19
SFPAR98-14	TB2	0.19	0.65	0.16	32.43	0.26	0.86	0.21
JMPAR98-21	TC1	0.40	0.40	0.08	38.32	0.45	0.46	0.09
SFPAR98-13	TC1	1.00	0.38	0.08	34.42	1.24	0.48	0.09
JMPAR98-27	TC2	0.32	1.45	0.18	33.37	0.42	1.86	0.23
SFPAR98-15	TC2	0.42	0.65	0.14	31.05	0.58	0.90	0.20
SFPAR98-16	TC2	0.36	0.47	0.10	32.63	0.47	0.62	0.13
SFPAR98-18	TC2	0.95	0.76	0.18	33.72	1.20	0.97	0.22
N.B. 0.75 mole % Fe assumed in pyrrhotite in the calculation								

The Tasikutaak Unit hosts several lenses of massive sulfide that are longer but of lower grade than showings in the Qarqasiaq Unit. Showing TA1 is a 50 x 2 m zone of weakly disseminated sulfide located at the base of a thin (<10 m) olivine peridotite flow. One sample assayed 0.54% nickel.

Showing TA2 is isolated, occurring about 1 km NW of the other Tasikutaak showings. It lies at the base of a basalt flow interpreted to be the TA horizon that has been truncated by the thrust fault. This showing is distal to the peridotite relative to the other Tasikutaak showings. Showing TA2 consists of a 81 m long lens of massive pyrrhotite that is 1 to 2 m thick (Figure 5). This showing did not respond, contrary to others, to the dimethylglyoxime field test for nickel. Two grab samples assayed 0.34% and 0.38% Ni with minor cobalt and copper.

Showing TB2 is a 4 x 2 m pod of massive sulfide located within metasediment at the base of peridotite. Samples assayed up to 1.54% Ni and 0.16% Co. Showing TB3 consists of a faulted, 40 x 2 m zone of weakly disseminated sulfide in basal peridotite from which one sample assayed 0.28% Ni.

Showing TC1 is a 5 x 1 m lens of massive sulfide located at the contact of peridotite and basalt near the base of the TC peridotite horizon. Three samples of massive sulfide gave low nickel grades (0.32%– 0.40% Ni).

Showing TC2 lies along the same horizon as TC1, approximately 250 m to the south. It consists of a 96 m long lens of massive sulfide that is 1 to 3 m thick. The lens disappears under boulders at the southern end and, 60 m to the SSE, reappears as a 3 x 1 m pod of sulfides that is truncated by an easterly striking fault. The continuity between the two sulfide lenses could not be verified in the field. Three grab samples assayed 0.47%–1.45% Ni, while one 3.4 m long channel sample, taken across strike in the middle of the main massive sulfide lens, assayed 0.76% Ni, 0.18% Co and 0.95% Cu.

Recalculation of Tasikutaak massive and disseminated sulfide samples to 100% sulfide (Table 2) yields low nickel values (0.44%– 1.86% Ni) with corresponding low copper and cobalt values, with the exception of TA1 that gave 4.60% Ni equivalent in 100% sulfide. Co/Ni ratios are high at Tasikutaak relative to Qarqasiaq, suggesting early, interrupted enrichment of sulfide liquids in the system. The sulfides in the Tasikutaak Unit are generally base metal poor

relative to Qarqasiaq, indicating that the former offers less economic potential even though the exposed sulfide showings are more extensive.

Nineteen analyses of precious metals (Au-Pd-Pt) from the Qarqasiaq and Tasikutaak mineralized samples indicate anomalous values in PGEs. Massive sulfide samples from the Qarqasiaq Unit produced up to 2.35 g/t Pd and 0.99 g/t Pt with traces of gold (Table 1). One sample from a chalcopyrite stockwork at the QC showing (# JMPAR98-12) assayed 0.82 g/t Pd and 1.45 g/t Pt (with 1.40% Cu), probably indicating local enrichment due to metamorphic remobilization of chalcopyrite. Sulfides from the Tasikutaak Unit produced up to 1.97 g/t Pd, 0.42 g/t Pt and 0.13 g/t Au (Table 1).

6.2. Mafic schist

The chlorite-actinolite schist unit mapped by Hardy (1976), henceforth referred to as mafic schist, was examined in the field and, although poorly exposed, was observed to consist of a number of intercalated greenish lithologies that form a unit that is up to 400 m thick and quite distinct from the host turbidites (interbedded grey siltstone/mudstone). The lithologies include light green very fine-grained phyllite (interpreted to be a tuff or epiclastic siltstone), grey thinly laminated siltstone, dark green aphanitic chlorite schist and a basal member of medium-grained light green chlorite-actinolite-albite-clinozoisite schist (metagabbro). The green tuffaceous member predominates and is probably what Hardy described as chlorite-actinolite schist. No observed lithology could be described as ultramafic.

Two soil geochemical sections were sampled across the green schist unit near the Tasikutaak river (Figures 6 and 7). The sections, about 1 km apart and perpendicular to strike, were located randomly in an area of poor outcrop (Figure 2). Samples were collected every 75 m and surveyed by chain and compass. Analytical results are reported in Appendix B. The objective of the soil sampling was to test the schist unit for Ni and Cu anomalies since the northernmost extent of the unit on PEM 1375 is associated with stream geochemical anomalies in copper and nickel (Figure 2). The sections, particularly section 2, revealed highly anomalous values in copper (up to 606 ppm; Figure 5) and associated weak values in nickel (up to 59 ppm) over the mafic schist unit, although no mineralization was observed in the area.

6.3. Whole rock geochemistry

Thirteen rock samples were analyzed for major elements in order to obtain an overview of the geochemistry of various igneous lithologies on the property. Analyses are reported in Appendix A. All samples were taken from the Qarqasiaq Complex (Figure 4), with the exception of SFPAR98-017 (chlorite schist from the mafic schist unit), which was collected in the area of the soil geochemical sections (Figure 6), and samples JMPAR98-029 through -031, which were collected from the mafic schist unit at a site about 7 km NNW of the Qarqasiaq Complex. All analyzed samples are igneous with the exception of JMPAR98-022C, which was thought to be a mafic chill margin in the field but is in fact a sedimentary hornfels as revealed by the high silica content (60.1%).

The whole rock data indicate that all samples are basaltic to ultramafic in composition (SiO_2 of 41.0%– 53.3% and MgO of 7.15%– 23.8%). A plot of MgO vs. TiO_2 (Figure 8) that includes data from the northern Labrador Trough (Skulski et al., 1993; Wares and Mungall, 1997) indicates that the olivine cumulates at Qarqasiaq are of similar composition to intrusive peridotite sills from the northern Trough, many of which are associated with Ni-Cu mineralization. The flows at Qarqasiaq are picritic tholeiites with thick olivine cumulates. The liquids are of similar composition to the Hellancourt basalts (the dominant volcanic suite in the northern Labrador Through), although somewhat more mafic in composition (8%– 10% MgO with TiO_2 < 1%). The Qarqasiaq basalts fall in a field that is intermediate in composition between Hellancourt basalts and chill margin compositions of mafic-ultramafic sills. A regression line (Figure 8) from the basaltic liquids through the peridotites suggests an average olivine composition of FO_{78} in the olivine cumulates. Two samples from the mafic schist unit (SFPAR98-017 and JMPAR98-29) indicate a basaltic composition that is similar to the more evolved Hellancourt liquids, while one sample of a chill margin below the base of peridotite (JMPAR98-003) indicates an evolved tholeiitic liquid with high FeO-TiO_2.

Although the limited number of analyses prohibit definitive conclusions, the data suggest that the basaltic liquids at Qarqasiaq are picritic tholeiites with compositions corresponding to the mafic end (8%–10% MgO) of the Hellancourt basaltic suite. Olivine cumulates usually occur within basalts that are more mafic in composition (e.g. Raglan with liquids at 14%–18% MgO). The field evidence

indicating thick olivine cumulates within 10% MgO tholeiitic basalt flows at Qarqasiaq suggests the olivine crystals are xenocrysts that were transported and ponded, probably as a result of proximity to a feeder conduit, which sets conditions favorable to the formation of economic nickel deposits (Naldrett et al., 1996).

7. CONCLUSIONS AND RECOMMENDATIONS

The Qarqasiaq Complex constitutes a 16 km-long mafic-ultramafic complex that offers excellent potential for blind economic Ni-Co-Cu mineralization. This area has been virtually unexplored to date, partly because a significant proportion of the complex occurs on Inuit Category I land. Mineralization within both units of the complex has been observed over a strike length of 7.5 km. Nickel grades of massive sulfides within the Qarqasiaq Unit are economic (3.60%-6.50% Ni) whereas grades within the Tasikutaak Unit are marginal (<1.5% Ni). Both units look very similar in the field, except that the Qarqasiaq peridotites (olivine cumulates) are about 50 % thicker. It is possible that the two units represent different positions along the length of a single volcanic channel that has been structurally repeated by faulting. The thicker Qarqasiaq flows with their higher Ni and Co grades may thus represent a more proximal environment to a feeder system.

The property also hosts the Chaunet mafic-ultramafic Complex (in PEM 1413) that is faulted/folded, 15 km in strike length and up to 1 km thick. This complex, according to available government records, has only been superficially prospected in the past and is volumetrically more significant than the Qarqasiaq Complex. It may also contain volcanic olivine cumulates rather than intrusive peridotites. Finally, the occurrence of a mafic schist unit along the entire strike length of PEM 1375 (35 km), with which are associated anomalous Ni-Cu stream/soil geochemical values, has not been previously recognized and suggests the presence of unexposed Ni-Cu mineralization within a third geological unit.

The Payne Bay property hosts Ni-Co-Cu mineralization within ultramafic rocks and displays an environment that fulfills the essential requirements for formation of economic nickel deposits, i.e. olivine-bearing magmas intruded into sulfur-bearing supracrustal rocks. Observed mineralization in the Qarqasiaq Complex occurs near the bases of trough-like peridotite bodies, which represent in part olivine cumulates within basaltic lava flows. This environment is

consistent with a Raglan or Kambalda-type environment for magmatic sulfide deposits. The Raglan nickel mining camp, situated about 250 km to the northwest in rocks of similar age and structural setting, may therefore serve as a useful exploration model for the Payne Bay property. Alternatively, if some of the peridotite bodies are intrusive in nature, the Payne Bay property would represent an environment that is similar to that of the southern Cape Smith Belt or the rest of Labrador Trough, i.e. sill-sediment complexes that are apt to host Ni-Cu-Co massive sulfide deposits near the bases of ultramafic intrusions.

A systematic exploration program is recommended to determine the extent and grade of mineralization in the Qarqasiaq Complex and to investigate the potential for mineralization elsewhere on the property. Further exploration is recommended following a program that is similar to that of Phase 2 outlined by Bardoux (1998), i.e. regional prospecting and mapping of ultramafic units, 120 km of gridding, MAG-HLEM surveys and detailed mapping over the Qarqasiaq Complex, and 1000 m of drilling. The program should also include prospecting and mapping of the Chaunet mafic-ultramafic Complex on PEM 1413, which had not been acquired at the time of the writing of the report by Bardoux. An airborne MAG-EM survey over the property will be completed by year end as a result of the option agreement with Virginia Gold Mines. Prior to 1999 field work, the airborne data should be compiled with geological data with particular attention paid to magnetic conductors within or near the mafic-ultramafic complexes and within the mafic schist unit.

8. SUMMARY OF EXPENDITURES

Professional fees	10584.27
Hotel and food	1662.56
Field equipment rentals	200.00
Fuel	110.64
Field supplies	302.21
Floatplane	4470.83
Analyses	1751.90
Documents, photos	295.57
Courrier and shipping	3549.80
Personnel transport	2052.84
Communication charges	339.84
Administration fees	1653.04
TOTAL	**$26,973.50**

Respectfully submitted,

James E. Mungall, PhD, FGAC

Signed in Montreal, Québec, this 15th day of December, 1998.

9. REFERENCES

Bardoux, M., 1998 - Qualification report on the Payne Bay property, Northern Quebec. Ormico Exploration Ltd., unpublished internal report, 11 p.

Clark, T., 1987 - Platinum group element occurrences of the Labrador Trough. Ministère des Ressources Naturelles du Québec, PRO87-18.

Hardy, R., 1969 - Géologie de la région du lac des Chefs. Ministère des Ressources Naturelles du Québec, R.P. 574.

Hardy, R., 1973 - Géologie de la région du lac Roberts, Nouveau-Québec. Ministère des Ressources Naturelles de Québec, assessment file GM 28420.

Hardy, R., 1976 - Roberts des Chefs Lakes area. Ministère des Ressources Naturelles de Québec, RG 171, 99 pages.

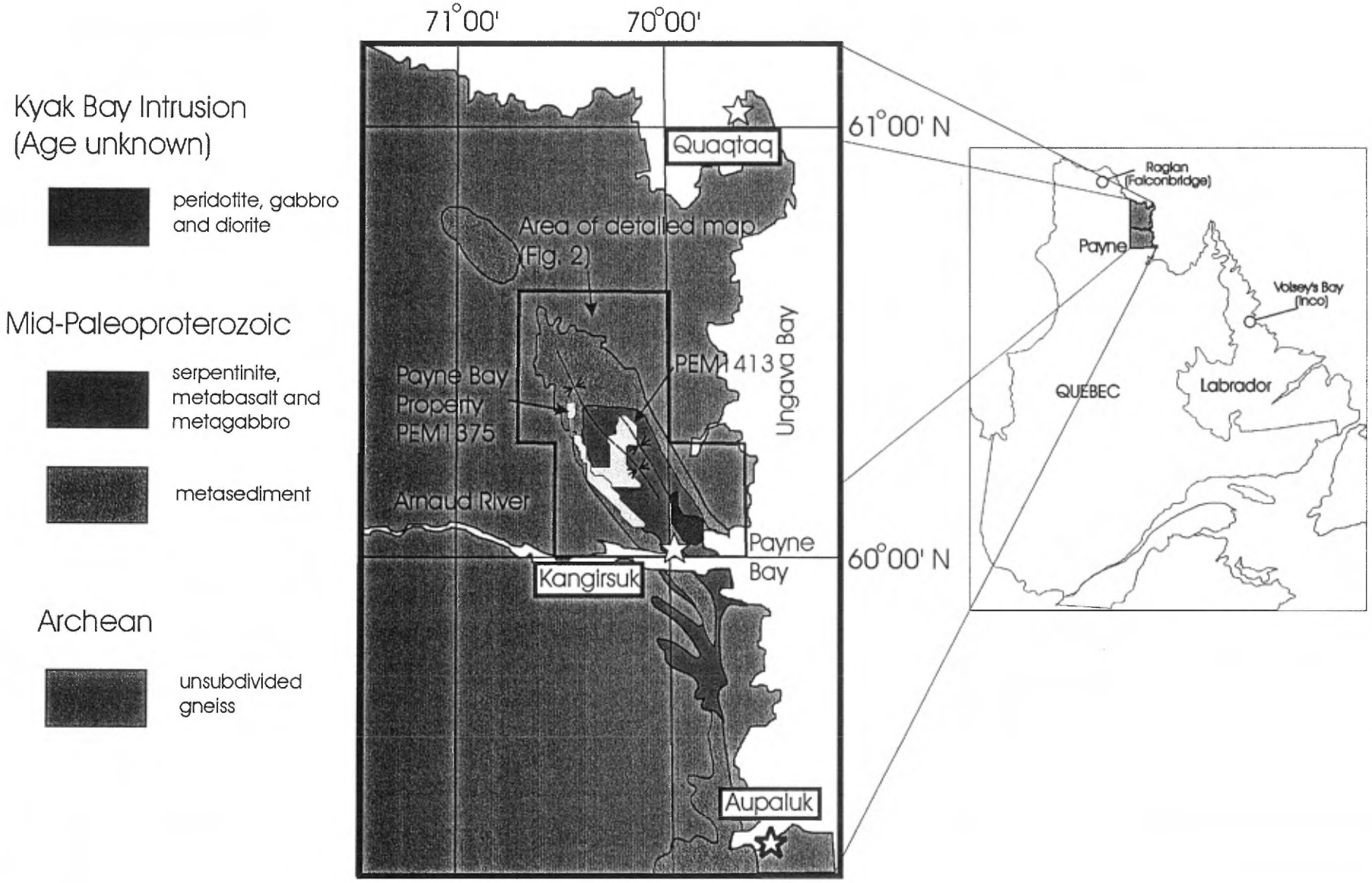
Naldrett, A.J., Keats, H., Sparkes, K. and Moore, R., 1996 - Geology of the Voisey's Bay Ni-Cu-Co deposit, Labrador, Canada. Explor. Mining Geol. 5, pp. 169-179.

Skulski, T., Wares, R.P. and Smith, A.D., 1993 - Early Proterozoic tholeiitic magmatism in the New Québec Orogen. Canadian Jour. Earth Sciences 30, 1505-1520.

Ward, 1988 - Report on 1987 Exploration Results on Permits 808 & 834 Chef Lake Area, New Quebec for La Fosse Platinum Group Inc. Ministère des Ressources Naturelles de Québec, assessment file GM 47540.

Wares, R. and Mungall, J., 1997 - Final report on the 1996 exploration program, Hawk Ridge property (PEM 1050). Ministère des Ressources Naturelles de Québec, assessment file GM 54628.

Figure 1 Regional setting of the Payne Bay Property



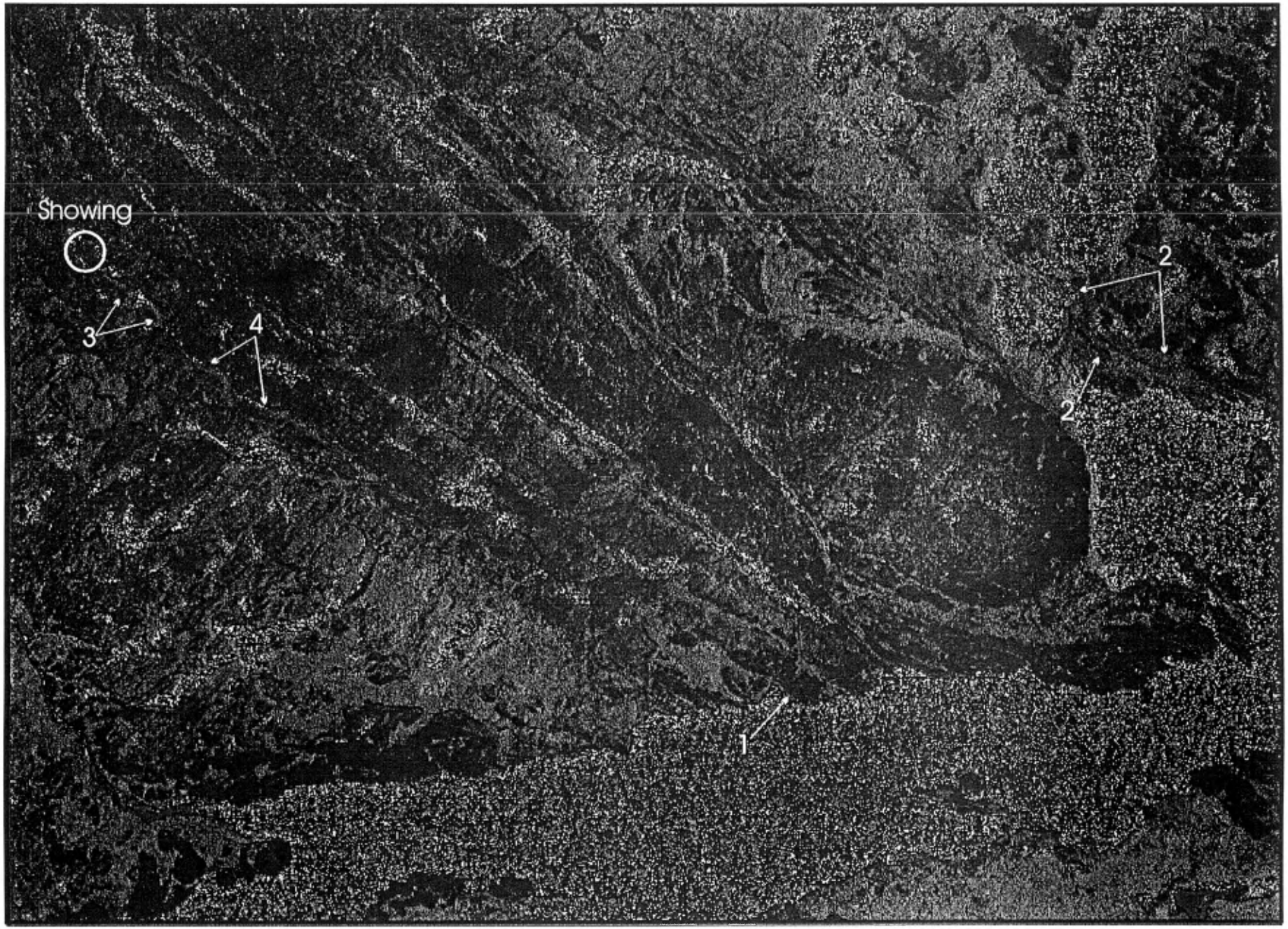
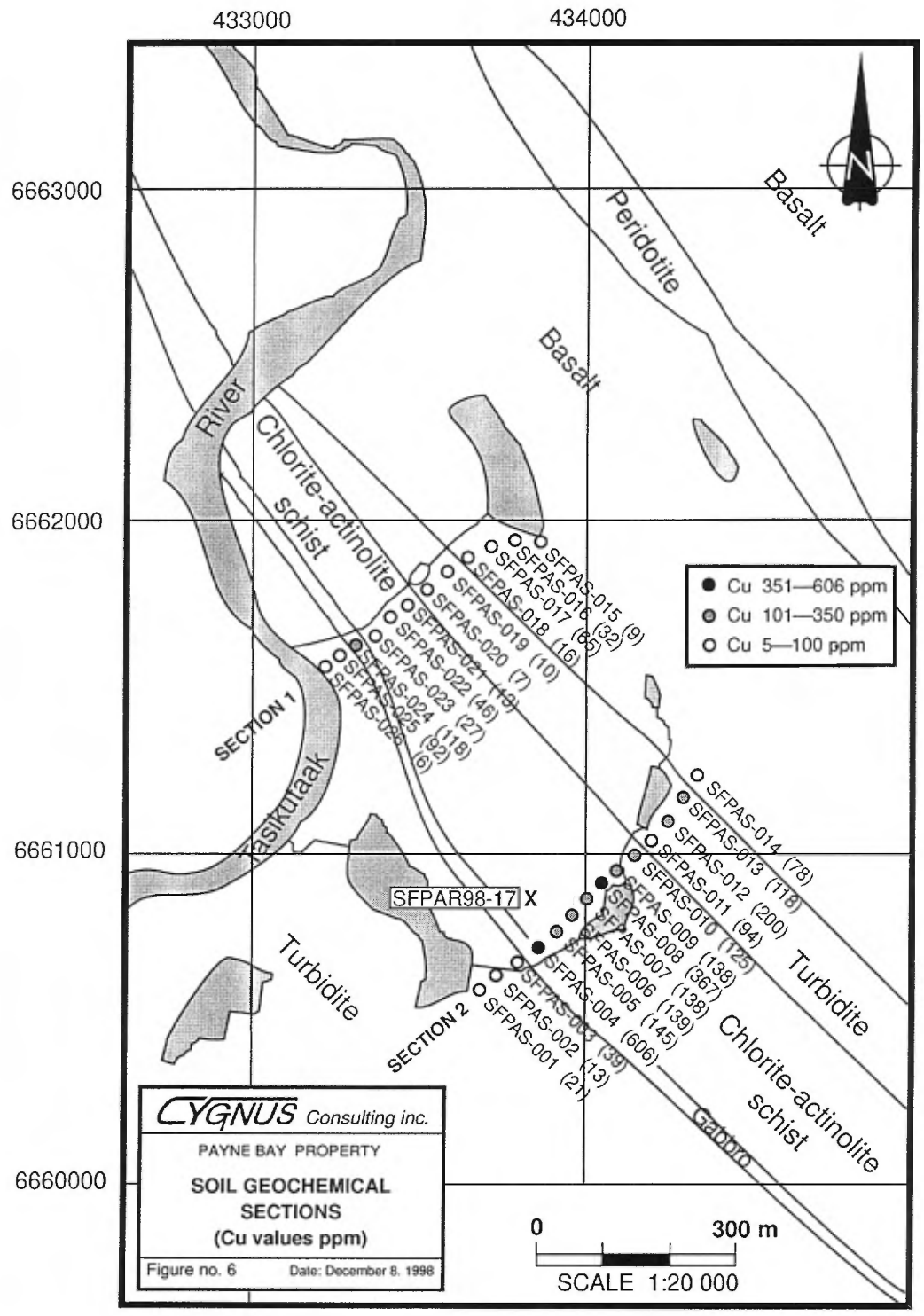
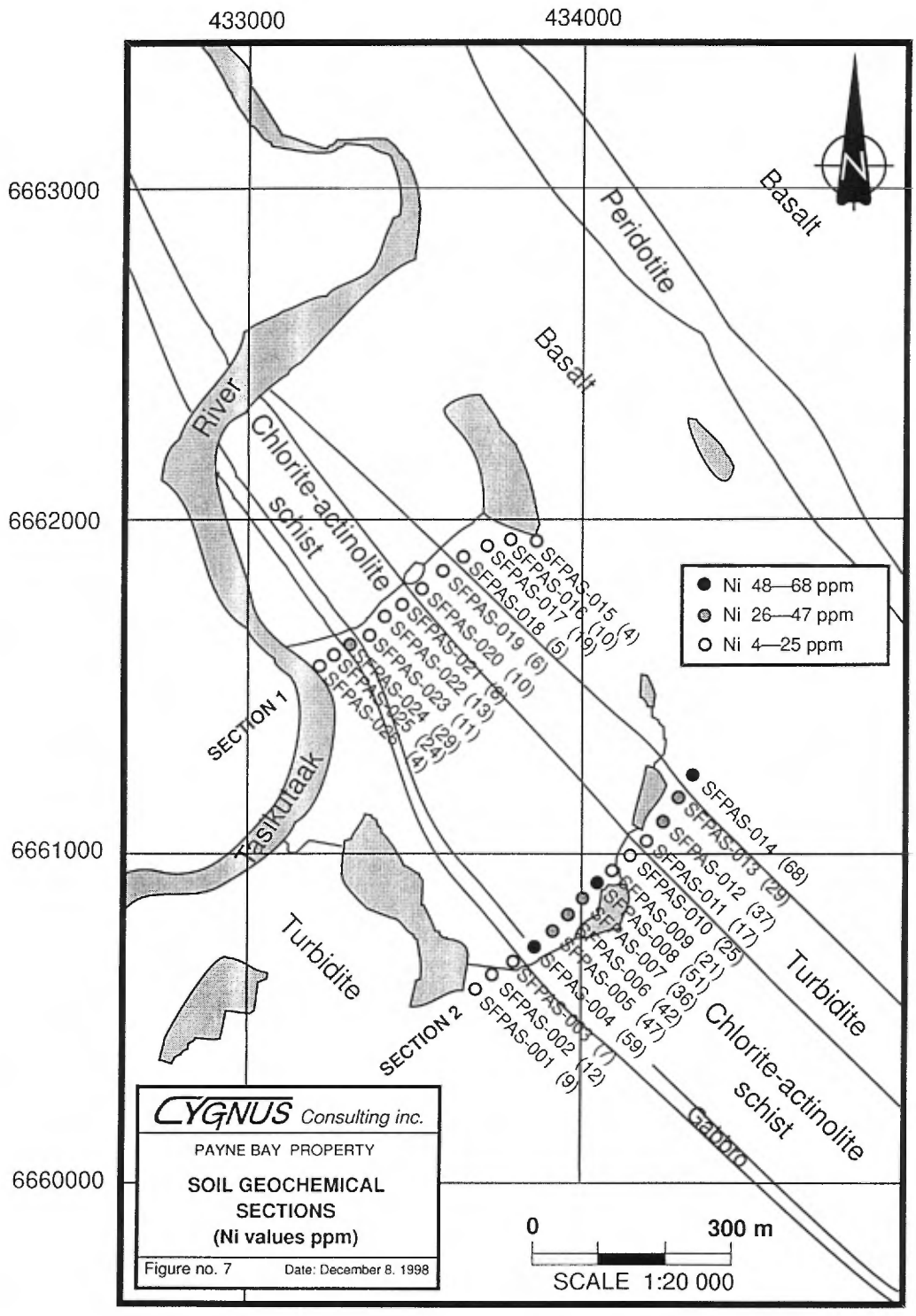


FIGURE 3

FIGURE 5 - Tasikutaak A2 showing


433000
434000
6663000
6662000
6661000
6660000
N
Basalt
Peridotite
Basalt
River
Chlorite-actinolite schist
Fasikutaak
Turbidite
Turbidite
Chlorite-actinolite schist
Gabbro
SECTION 1
SECTION 2
SFPAR98-17
SFPAS-001 (21)
SFPAS-002 (13)
SFPAS-003 (39)
SFPAS-004 (606)
SFPAS-005 (145)
SFPAS-006 (139)
SFPAS-007 (138)
SFPAS-008 (367)
SFPAS-009 (138)
SFPAS-010 (125)
SFPAS-011 (94)
SFPAS-012 (200)
SFPAS-013 (118)
SFPAS-014 (78)
SFPAS-015 (9)
SFPAS-016 (32)
SFPAS-017 (65)
SFPAS-018 (16)
SFPAS-019 (10)
SFPAS-020 (7)
SFPAS-021 (19)
SFPAS-022 (46)
SFPAS-023 (27)
SFPAS-024 (118)
SFPAS-025 (92)
SFPAS-026 (6)
Cu 351—606 ppm
Cu 101—350 ppm
Cu 5—100 ppm
CYGNUS Consulting inc.
PAYNE BAY PROPERTY
SOIL GEOCHEMICAL SECTIONS
(Cu values ppm)
Figure no. 6
Date: December 8, 1998
0
300 m
SCALE 1:20 000


433000
434000
6663000
6662000
6661000
6660000
Basalt
Peridotite
Basalt
River
Chlorite-actinolite schist
Ni 48—68 ppm
Ni 26—47 ppm
Ni 4—25 ppm
SFPAS-015 (4)
SFPAS-016 (10)
SFPAS-017 (19)
SFPAS-018 (5)
SFPAS-019 (6)
SFPAS-020 (10)
SFPAS-021 (8)
SFPAS-022 (13)
SFPAS-023 (11)
SFPAS-024 (29)
SFPAS-025 (24)
SFPAS-026 (4)
SECTION 1
Tasikutaak
SFPAS-014 (68)
SFPAS-013 (29)
SFPAS-012 (37)
SFPAS-011 (17)
SFPAS-010 (25)
SFPAS-009 (21)
SFPAS-008 (51)
SFPAS-007 (36)
SFPAS-006 (42)
SFPAS-005 (47)
SFPAS-004 (59)
SFPAS-003 (7)
SFPAS-002 (12)
SFPAS-001 (9)
Turbidite
Turbidite
SECTION 2
Chlorite-actinolite schist
Gabbro
CYGNUS Consulting inc.
PAYNE BAY PROPERTY
SOIL GEOCHEMICAL SECTIONS
(Ni values ppm)
Figure no. 7
Date: December 8. 1998
0
300 m
SCALE 1:20 000

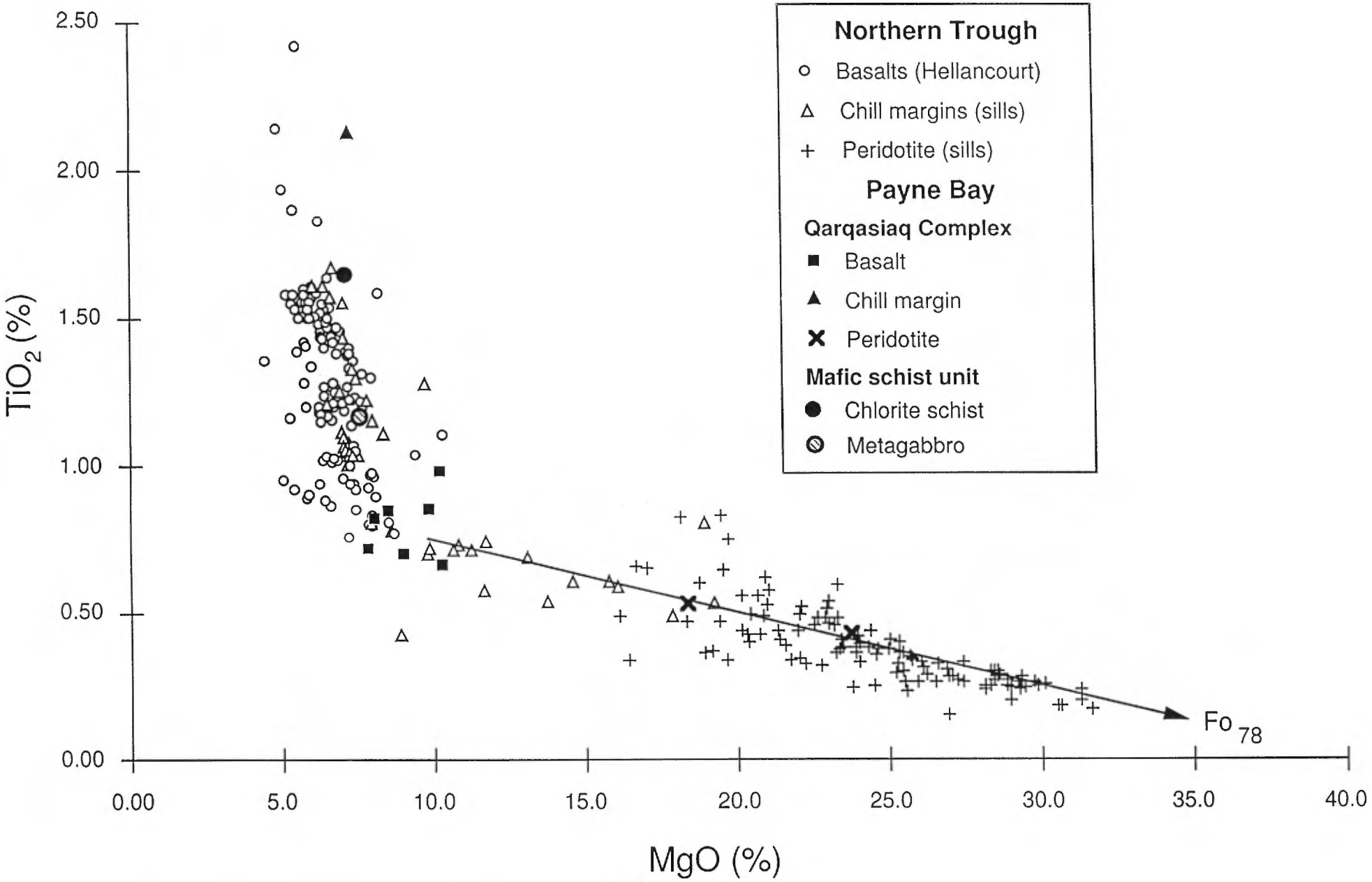


Figure 8. Geochemistry of Payne Bay igneous rocks relative to other samples from the northern Labrador Trough.

APPENDIX A
ROCK SAMPLE ASSAY CERTIFICATES

Intertek Testing Services
Chimitec Bondar Clegg

Certificat D'Analyse
Assay Lab Report

RAPPORT: C98-62603.0 (COMPLET) RÉFÉRENCE: 162349

CLIENT: GROUPE CONSEIL CYGNUS SOUMIS PAR: ROBERT WARES

PROJET: PAYNE DATE RECU: 31-AUG-98 DATE DE L'IMPRESSION: 3-SEP-98

DATE APPROUVÉ	COMMANDE	ÉLÉMENT		NOMBRE D'ANALYSES	LIMITE INFÉRIEURE DE DETECTION	EXTRACTION	MÉTHODE
980903	1	Cu	Cuivre	38	1 PPM	HCL:HNO3 (3:1)	ABSORPTION ATOMIQUE
980903	2	CuOL	Cuivre, semiquant	1	0.1 PCT	HCL:HNO3 (3:1)	ABSORPTION ATOMIQUE
980903	3	Co	Cobalt	38	1 PPM	HCL:HNO3 (3:1)	ABSORPTION ATOMIQUE
980903	4	Ni	Nickel	38	2 PPM	HCL:HNO3 (3:1)	ABSORPTION ATOMIQUE
980903	5	NiOL	NICKEL SEMIQUANT	5	0.1 PCT	HCL:HNO3 (3:1)	ABSORPTION ATOMIQUE

TYPES D'ÉCHANTILLONS	NOMBRE	FRACTION UTILISÉE	NOMBRE	PRÉP. DE L'ÉCHAN.	NOMBRE
ROCHE	38	-150	38	CONCASSER, PULVERISE	38

COPIES DU RAPPORT À: ROBERT WARES FACTURE À: ROBERT WARES

PAR FAX: 1-514-735-9224

****

Ce rapport ne doit être reproduit que dans sa totalité. Les données présentées dans ce rapport sont exprimées sur base sèche sauf indication contraire et ne concernent que les échantillons reçus, identifiés par le numéro d'échantillon.

****

ITS - Chimitec - Bondar Clegg
1322-B rue Harricana, Val d'Or, Québec, J9P 3X6
Tél: (819) 825-0178, Fax: (819) 825-0256

Intertek Testing Services
Chimitec Bondar Clegg

Certificat D'Analyse
Assay Lab Report

CLIENT : GROUPE CONSEIL CYGNUS PROJET: PAYNE
RAPPORT: C98-62603.0 (COMPLET) DATE RECU: 31-AUG-98 DATE DE L'IMPRESSION: 3-SEP-98

NUMÉRO DE L'ÉCHANTILLON	ÉLÉMENT UNITÉS	Cu PPM	CuOL PCT	Co PPM	Ni PPM	NiOL PCT
ATPAR-98-001		5308		616	3218	
JMPAR-98-001		1703		2530	>20000	3.7
JMPAR-98-004		179		42	45	
JMPAR-98-005		795		117	1279	
JMPAR-98-006		2160		1829	>20000	3.6
JMPAR-98-007		590		182	420	
JMPAR-98-008		2009		2727	>20000	4.1
JMPAR-98-009		532		143	1742	
JMPAR-98-010		834		206	2701	
JMPAR-98-011		944		3191	>20000	6.5
JMPAR-98-012		13985		59	603	
JMPAR-98-013		909		3439	>20000	6.0
JMPAR-98-014		2790		640	11400	
JMPAR-98-015		3388		394	5861	
JMPAR-98-016		1700		184	2490	
JMPAR-98-017		7305		465	9572	
JMPAR-98-018		3446		627	12172	
JMPAR-98-019		2270		632	11494	
JMPAR-98-021		4008		817	4047	
JMPAR-98-024		2217		368	5400	
JMPAR-98-025		3258		1467	11319	
JMPAR-98-026		3086		1645	15428	
JMPAR-98-027		3246		1764	14535	
JMPAR-98-028		3560		328	2750	
SFPAR-98-001		4961		1081	17664	
SFPAR-98-002		3298		23	312	
SFPAR-98-004		1036		63	489	
SFPAR-98-005		>20000	2.3	228	311	
SFPAR-98-006		1461		721	12079	
SFPAR-98-007		3217		185	4041	
SFPAR-98-008		329		49	234	
SFPAR-98-009		2187		840	3809	
SFPAR-98-010		3956		766	3372	
SFPAR-98-013		9980		761	3844	
SFPAR-98-014		1947		1555	6479	
SFPAR-98-015		4160		1422	6508	
SFPAR-98-016		3599		1021	4728	
SFPAR-98-018		9467		1765	7629	

ITS - Chimitec - Bondar Clegg
1322-B rue Harricana, Val d'Or, Québec, J9P 3X6
Tél: (819) 825-0178, Fax: (819) 825-0256

CLIENT : GROUPE CONSEIL CYGNUS PROJET: PAYNE
RAPPORT: C98-62603.0 (COMPLET) DATE RECU: 31-AUG-98 DATE DE L'IMPRESSION: 3-SEP-98

# MESURE / STANDARD	ÉLÉMENT - UNITÉS	Cu PPM	CuOL PCT	Co PPM	Ni PPM	NiOL PCT
STD GEOCHIMIQUE 3		836	-	45	602	-
Nombre d'analyses		1	-	1	1	-
Valeur de moyenne		836.4	-	44.5	601.8	-
Écart-type		-	-	-	-	-
Valeur acceptee		820	0.1	40	600	-
BLANC		3	-	<1	<2	-
BLANC		1	-	1	<2	-
Nombre d'analyses		2	-	2	2	-
Valeur de moyenne		2.0	-	0.8	1.0	-
Écart-type		1.41	-	0.35	0.00	-
Valeur acceptee		1	<0.1	1	1	<0.1
STD GEOCHIMIQUE 2		192	-	10	15	-
Nombre d'analyses		1	-	1	1	-
Valeur de moyenne		192.0	-	9.5	15.2	-
Écart-type		-	-	-	-	-
Valeur acceptee		190	-	7	15	-

ITS - Chimitec - Bondar Clegg
1322-B rue Harricana, Val d'Or, Québec, J9P 3X6
Tél: (819) 825-0178, Fax: (819) 825-0256

Intertek Testing Services
Chimitec Bondar Clegg

Certificat D'Analyse
Assay Lab Report

CLIENT : GROUPE CONSEIL CYGNUS PROJET: PAYNE
RAPPORT: C98-62603.0 (COMPLET) DATE RECU: 31-AUG-98 DATE DE L'IMPRESSION: 3-SEP-98 PAGE 3 DE 3

NUMÉRO DE L'ÉCHANTILLON	ÉLÉMENT UNITÉS	Cu PPM	CuOL PCT	Co PPM	Ni PPM	NiOL PCT
JMPAR-98-005		795		117	1279	
Duplicata		833		116	1439	
JMPAR-98-025		3258		1467	11319	
Duplicata		3281		1543	11719	

ITS - Chimitec - Bondar Clegg
1322-B rue Harricana, Val d'Or, Québec, J9P 3X6
Tél: (819) 825-0178, Fax: (819) 825-0256

ITS Intertek Testing Services
Chimitec Bondar Clegg

Rapport Lab Geochimie
Geochemical Lab Report

RAPPORT: C98-62603.1 (COMPLET) RÉFÉRENCE: 162349

CLIENT: GROUPE CONSEIL CYGNUS SOUMIS PAR: ROBERT WARES

PROJET: PAYNE DATE RECU: 04-SEP-98 DATE DE L'IMPRESSION: 11-SEP-98

DATE APPROUVÉ	COMMANDE	ÉLÉMENT	NOMBRE D'ANALYSES	LIMITE INFÉRIEURE DE DETECTION	EXTRACTION	MÉTHODE
980911	1 Au	Or - Pyro Analyse	10	1 PPB	PYRO ANALYSE	PYROANALYSE-DCP
980911	2 Pt	Platine	10	5 PPB	PYRO ANALYSE	PYROANALYSE-DCP
980911	3 Pd	Palladium	10	1 PPB	PYRO ANALYSE	PYROANALYSE-DCP
980911	4 Ag	Argent	10	0.2 PPM	HCL:HNO3 (3:1)	INDUC. COUP. PLASMA
980911	5 Cu	Cuivre	10	1 PPM	HCL:HNO3 (3:1)	INDUC. COUP. PLASMA
980911	6 CuOL	Cuivre, semiquant	2	0.1 PCT	HCL:HNO3 (3:1)	INDUC. COUP. PLASMA
980911	7 Pb	Plomb	10	2 PPM	HCL:HNO3 (3:1)	INDUC. COUP. PLASMA
980911	8 Zn	Zinc	10	1 PPM	HCL:HNO3 (3:1)	INDUC. COUP. PLASMA
980911	9 Mo	Molybdene	10	1 PPM	HCL:HNO3 (3:1)	INDUC. COUP. PLASMA
980911	10 Ni	Nickel	10	1 PPM	HCL:HNO3 (3:1)	INDUC. COUP. PLASMA
980911	11 Co	Cobalt	10	1 PPM	HCL:HNO3 (3:1)	INDUC. COUP. PLASMA
980911	12 Cd	Cadmium	10	0.2 PPM	HCL:HNO3 (3:1)	INDUC. COUP. PLASMA
980911	13 Bi	Bismuth	10	5 PPM	HCL:HNO3 (3:1)	INDUC. COUP. PLASMA
980911	14 As	Arsenic	10	5 PPM	HCL:HNO3 (3:1)	INDUC. COUP. PLASMA
980911	15 Sb	Antimoine	10	5 PPM	HCL:HNO3 (3:1)	INDUC. COUP. PLASMA
980911	16 Fe	Fer	10	0.01 PCT	HCL:HNO3 (3:1)	INDUC. COUP. PLASMA
980911	17 Mn	Manganese	10	1 PPM	HCL:HNO3 (3:1)	INDUC. COUP. PLASMA
980911	18 Te	Tellure	10	10 PPM	HCL:HNO3 (3:1)	INDUC. COUP. PLASMA
980911	19 Ba	Baryum	10	1 PPM	HCL:HNO3 (3:1)	INDUC. COUP. PLASMA
980911	20 Cr	Chrome	10	1 PPM	HCL:HNO3 (3:1)	INDUC. COUP. PLASMA
980911	21 V	Vanadium	10	1 PPM	HCL:HNO3 (3:1)	INDUC. COUP. PLASMA
980911	22 Sn	Etain	10	20 PPM	HCL:HNO3 (3:1)	INDUC. COUP. PLASMA
980911	23 W	Tungstene	10	20 PPM	HCL:HNO3 (3:1)	INDUC. COUP. PLASMA
980911	24 La	Lanthane	10	1 PPM	HCL:HNO3 (3:1)	INDUC. COUP. PLASMA
980911	25 Al	Aluminium	10	0.01 PCT	HCL:HNO3 (3:1)	INDUC. COUP. PLASMA
980911	26 Mg	Magnesium	10	0.01 PCT	HCL:HNO3 (3:1)	INDUC. COUP. PLASMA
980911	27 Ca	Calcium	10	0.01 PCT	HCL:HNO3 (3:1)	INDUC. COUP. PLASMA
980911	28 Na	Sodium	10	0.01 PCT	HCL:HNO3 (3:1)	INDUC. COUP. PLASMA
980911	29 K	Potassium	10	0.01 PCT	HCL:HNO3 (3:1)	INDUC. COUP. PLASMA
980911	30 Sr	Strontium	10	1 PPM	HCL:HNO3 (3:1)	INDUC. COUP. PLASMA
980911	31 Y	Yttrium	10	1 PPM	HCL:HNO3 (3:1)	INDUC. COUP. PLASMA
980911	32 Ga	Gallium	10	2 PPM	HCL:HNO3 (3:1)	INDUC. COUP. PLASMA
980911	33 Li	Lithium	10	1 PPM	HCL:HNO3 (3:1)	INDUC. COUP. PLASMA
980911	34 Nb	Niobium	10	1 PPM	HCL:HNO3 (3:1)	INDUC. COUP. PLASMA
980911	35 Sc	Scandium	10	5 PPM	HCL:HNO3 (3:1)	INDUC. COUP. PLASMA
980911	36 Ta	Tantale	10	10 PPM	HCL:HNO3 (3:1)	INDUC. COUP. PLASMA

DATE APPROUVÉ	COMMANDE	ÉLÉMENT	NOMBRE D'ANALYSES	LIMITE INFÉRIEURE DE DETECTION	EXTRACTION	MÉTHODE
980911	37 Ti	Titane	10	0.01 PCT	HCL:HNO3 (3:1)	INDUC. COUP. PLASM
980911	38 Zr	Zirconium	10	1 PPM	HCL:HNO3 (3:1)	INDUC. COUP. PLASM

TYPES D'ÉCHANTILLONS	NOMBRE	FRACTION UTILISÉE	NOMBRE	PRÉP. DE L'ÉCHAN.	NOMBRE
ROCHE	10	-150	10	ECHANT. DE RESERVE	10

COPIES DU RAPPORT À: ROBERT WARES FACTURE À: ROBERT WARES

PAR FAX: 1-514-735-9224

****

Ce rapport ne doit être reproduit que dans sa totalité. Les données présentées dans ce rapport sont exprimées sur base sèche sauf indication contraire et ne concernent que les échantillons reçus, identifiés par le numéro d'échantillon.

****

Intertek Testing Services
Chimitec Bondar Clegg

Rapport Lab Geochimie
Geochemical Lab Report

CLIENT : GROUPE CONSEIL CYGNUS — PROJET: PAYNE

RAPPORT: C98-62603.1 (COMPLET) — DATE RECU : 04-SEP-98 — DATE DE L'IMPRESSION: 11-SEP-98 — PAGE 1A(1/ 6)

NUMÉRO DE L'ÉCHANTILLON	ÉLÉMENT UNITÉS	Au PPB	Pt PPB	Pd PPB	Ag PPM	Cu PPM	CUOL PCT	Pb PPM	Zn PPM	Mo PPM	Ni PPM	Co PPM	Cd PPM	Bi PPM	As PPM	Sb PPM	Fe PCT	Mn PPM	Te PPM	Ba PPM	Cr PPM	V PPM	Sn PPM	W PPM	La PPM	Al PCT	Mg PCT	Ca PCT	Na PCT	K PCT	Sr PPM	Y PPM	Ga PPM	Li PPM	Nb PPM	Sc PPM	Ta PPM	Ti PCT
JMPAR-98-001		12	453	120	0.7	1363		11	98	2	>20000	1628	0.9	<5	<5	<5	>10.00	47	<10	<1	57	50	<20	<20	<1	0.02	0.12	<.01	<.01	<.01	<1	<1	<2	<1	<1	<5	<10	<.01
JMPAR-98-011		<1	538	313	2.2	807		2	151	2	>20000	2309	0.8	<5	<5	<5	>10.00	35	<10	<1	104	37	<20	23	<1	0.15	0.06	<.01	<.01	<.01	<1	<1	<2	<1	<1	<5	<10	0.04
JMPAR-98-012		3	1500	840	2.0	>10000	1.5	<2	100	2	413	44	0.2	<5	7	<5	>10.00	1798	<10	2	195	266	<20	<20	5	5.90	3.92	0.56	<.01	<.01	5	8	7	17	<1	10	10	0.37
JMPAR-98-021		10	94	636	1.2	3216		3	408	12	2691	573	7.4	<5	<5	<5	>10.00	15	<10	<1	125	101	<20	<20	1	<.01	<.01	0.01	<.01	<.01	<1	<1	<2	<1	<1	<5	<10	<.01
JMPAR-98-025		4	391	28	1.0	2711		2	56	3	7302	1067	<.2	<5	<5	<5	>10.00	1	<10	<1	29	10	<20	<20	<1	<.01	<.01	<.01	<.01	<.01	<1	<1	<2	<1	<1	<5	<10	<.01
JMPAR-98-027		55	428	1960	1.0	2646		3	59	2	8636	1230	<.2	<5	<5	<5	>10.00	40	<10	<1	183	30	<20	<20	<1	0.08	0.13	0.40	<.01	<.01	<1	<1	<2	<1	<1	<5	<10	<.01
SFPAR-98-005		5	<5	3	2.5	>10000	2.5	4	56	2	254	192	<.2	<5	6	<5	>10.00	422	<10	8	54	45	<20	<20	41	0.69	0.34	0.60	0.04	0.13	12	21	<2	2	<1	<5	<10	0.11
SFPAR-98-006		5	178	240	0.4	1288		<2	59	2	8652	569	<.2	<5	<5	<5	>10.00	269	<10	<1	985	84	<20	<20	<1	1.51	3.79	0.14	0.01	<.01	<1	1	<2	<1	<1	<5	<10	0.02
SFPAR-98-009		10	62	317	1.2	1880		5	42	7	2538	617	<.2	<5	<5	<5	>10.00	5	<10	<1	139	16	<20	<20	<1	<.01	<.01	<.01	<.01	<.01	2	<1	<2	<1	<1	<5	<10	<.01
SFPAR-98-016		2	313	720	1.1	2922		<2	52	2	2986	711	<.2	<5	<5	<5	>10.00	15	<10	<1	102	72	<20	<20	<1	<.01	<.01	<.01	<.01	<.01	2	<1	<2	<1	<1	<5	<10	<.01

CLIENT : GROUPE CONSEIL CYGNUS PROJET: PAYNE
RAPPORT: C98-62603.1 (COMPLET) DATE RECU : 04-SEP-98 DATE DE L'IMPRESSION: 11-SEP-98 PAGE 18(2/ 6)

NUMÉRO DE L'ÉCHANTILLON	ÉLÉMENT Zr UNITÉS PPM
JMPAR-98-001	1
JMPAR-98-011	2
JMPAR-98-012	<1
JMPAR-98-021	1
JMPAR-98-025	1
JMPAR-98-027	<1
SFPAR-98-005	29
SFPAR-98-006	<1
SFPAR-98-009	1
SFPAR-98-016	1

Intertek Testing Services
Chimitec Bondar Clegg

Rapport Lab Geochimie
Geochemical Lab Report

CLIENT : GROUPE CONSEIL CYGNUS — PROJET: PAYNE
RAPPORT: C98-62603.1 (COMPLET) — DATE RECU : 04-SEP-98 — DATE DE L'IMPRESSION: 11-SEP-98 — PAGE 2A(3/ 6)

# MESURE / STANDARD	ÉLÉMENT / UNITÉS	Au PPB	Pt PPB	Pd PPB	Ag PPM	Cu PPM	CUOL PCT	Pb PPM	Zn PPM	Mo PPM	Ni PPM	Co PPM	Cd PPM	Bi PPM	As PPM	Sb PPM	Fe PCT	Mn PPM	Te PPM	Ba PPM	Cr PPM	V PPM	Sn PPM	W PPM	La PPM	Al PCT	Mg PCT	Ca PCT	Na PCT	K PCT	Sr PPM	Y PPM	Ga PPM	Li PPM	Nb PPM	Sc PPM	Ta PPM	Ti PCT
BLANC		<1	<5	1	<.2	1	-	<2	<1	<1	<1	<1	<.2	<5	<5	<5	<0.01	<1	<10	<1	<1	<1	<20	<20	<1	<.01	<.01	<.01	<.01	<.01	<1	<1	<2	<1	<1	<5	<10	<.01
Nombre d'analyses		1	1	1	1	1	-	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Valeur de moyenne		0.5	3	1	0.1	1	-	1	0.5	0.5	0.5	0.5	0.1	3	3	3	0.005	0.5	5	0.5	0.5	0.5	10	10	0.5	.005	.005	.005	.005	.005	0.5	0.5	1	0.5	0.5	3	5	.005
Écart-type		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Valeur acceptee		5	5	5	0.2	1	<.01	2	1	1	1	1	1.0	2	5	5	0.05	1	.01	.01	1	1	.01	.01	.01	<.01	<.01	<.01	<.01	<.01	.01	.01	.01	.01	.01	.01	.01	<.01
LOW PT,PD,AUSTD		87	93	94	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Nombre d'analyses		1	1	1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Valeur de moyenne		87	93	94	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Écart-type		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Valeur acceptee		133	133	133	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
CANMET LAKE-SED 2		-	-	-	0.4	35	-	34	170	1	22	15	0.7	<5	12	<5	3.34	1754	<10	201	26	44	<20	<20	51	1.46	0.60	0.57	0.03	0.20	26	26	2	15	1	<5	<10	0.06
Nombre d'analyses		-	-	-	1	1	-	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Valeur de moyenne		-	-	-	0.4	35	-	34	170	1	22	15	0.7	3	12	3	3.34	1754	5	201	26	44	10	10	51	1.46	0.60	0.57	0.03	0.20	26	26	2	15	1	3	5	0.06
Écart-type		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Valeur acceptee		-	-	-	0.8	36	-	40	200	2	23	17	0.8	-	9	1	3.50	1840	-	-	29	48	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

CLIENT : GROUPE CONSEIL CYGNUS PROJET: PAYNE
RAPPORT: C98-62603.1 (COMPLET) DATE RECU : 04-SEP-98 DATE DE L'IMPRESSION: 11-SEP-98 PAGE 2B(4/ 6)

# MESURE	ÉLÉMENT Zr
STANDARD	UNITÉS PPM
BLANC	<1
Nombre d'analyses	1
Valeur de moyenne	0.5
Écart-type	-
Valeur acceptee	.01
LOW PT,PD,AUSTD	-
Nombre d'analyses	-
Valeur de moyenne	-
Écart-type	-
Valeur acceptee	-
CANMET LAKE-SED 2	<1
Nombre d'analyses	1
Valeur de moyenne	0.5
Écart-type	-
Valeur acceptee	-

ITS Intertek Testing Services
Chimitec Bondar Clegg

Rapport Lab Geochimie
Geochemical Lab Report

CLIENT : GROUPE CONSEIL CYGNUS
RAPPORT: C98-62603.1 (COMPLET)
PROJET: PAYNE
DATE RECU : 04-SEP-98 DATE DE L'IMPRESSION: 11-SEP-98 PAGE 3A(5/ 6)

NUMÉRO DE L'ÉCHANTILLON	ÉLÉMENT UNITÉS	Au PPB	Pt PPB	Pd PPB	Ag PPM	Cu PPM	CU.CL PCT	Pb PPM	Zn PPM	Mo PPM	Ni PPM	Co PPM	Cd PPM	Bi PPM	As PPM	Sb PPM	Fe PCT	Mn PPM	Te PPM	Ba PPM	Cr PPM	V PPM	Sn PPM	W PPM	La PPM	Al PCT	Mg PCT	Ca PCT	Na PCT	K PCT	Sr PPM	Y PPM	Ga PPM	Li PPM	Nb PPM	Sc PPM	Ta PPM	Ti PCT
JMPAR-98-021		10	94	636	1.2	3216		3	408	12	2691	573	7.4	<5	<5	<5	>10.00	15	<10	<1	125	101	<20	<20	1	<.01	<.01	0.01	<.01	<.01	<1	<1	<2	<1	<1	<5	<10	<.01
Duplicata		7	91	720	1.1	3251		4	397	10	2705	563	7.1	<5	<5	<5	>10.00	13	<10	<1	116	100	<20	<20	<1	<.01	<.01	0.01	<.01	<.01	1	<1	<2	<1	<1	<5	<10	<.01

CLIENT : GROUPE CONSEIL CYGNUS PROJET: PAYNE
RAPPORT: C98-62603.1 (COMPLET) DATE RECU : 04-SEP-98 DATE DE L'IMPRESSION: 11-SEP-98 PAGE 38(6/ 6)

NUMÉRO DE L'ÉCHANTILLON	ÉLÉMENT Zr UNITÉS PPM
JMPAR-98-021	1
Duplicata	1

ITS Intertek Testing Services
Chimitec Bondar Clegg

Certificat D'Analyse
Assay Lab Report

RAPPORT: C98-62603.2 (COMPLET) RÉFÉRENCE: 162349

CLIENT: GROUPE CONSEIL CYGNUS SOUMIS PAR: ROBERT WARES
PROJET: PAYNE DATE RECU: 10-SEP-98 DATE DE L'IMPRESSION: 18-SEP-98

DATE APPROUVÉ	COMMANDE	ÉLÉMENT		NOMBRE D'ANALYSES	LIMITE INFÉRIEURE DE DETECTION	EXTRACTION	MÉTHODE
980918	1	Au	Or - Pyro Analyse	11	1 PPB	PYRO ANALYSE	PYROANALYSE-DCP
980918	2	Pt	Platine	11	5 PPB	PYRO ANALYSE	PYROANALYSE-DCP
980918	3	Pd	Palladium	11	1 PPB	PYRO ANALYSE	PYROANALYSE-DCP
980918	4	S Tot	Soufre (Total)	25	0.02 PCT		LECO

TYPES D'ÉCHANTILLONS	NOMBRE	FRACTION UTILISÉE	NOMBRE	PRÉP. DE L'ÉCHAN.	NOMBRE
ROCHE	27	-150	27	ECHANT. DE RESERVE	25

COPIES DU RAPPORT À: ROBERT WARES
PAR FAX: 1-514-735-9224

FACTURE À: ROBERT WARES

****

Ce rapport ne doit être reproduit que dans sa totalité. Les données présentées dans ce rapport sont exprimées sur base sèche sauf indication contraire et ne concernent que les échantillons reçus, identifiés par le numéro d'échantillon.

****

ITS - Chimitec - Bondar Clegg
1322-B rue Harricana, Val d'Or, Québec, J9P 3X6
Tél: (819) 825-0178, Fax: (819) 825-0256

ITS Intertek Testing Services
Chimitec Bondar Clegg

Certificat D'Analyse
Assay Lab Report

CLIENT : GROUPE CONSEIL CYGNUS PROJET: PAYNE
RAPPORT: C98-62603.2 (COMPLET) DATE RECU: 10-SEP-98 DATE DE L'IMPRESSION: 18-SEP-98 PAGE 1 DE 3

NUMÉRO DE L'ÉCHANTILLON	ÉLÉMENT UNITÉS	Au PPB	Pt PPB	Pd PPB	S Tot PCT
JMPAR-98-001		7	406	92	33.88
JMPAR-98-006					35.85
JMPAR-98-008					33.69
JMPAR-98-011		9	540	277	36.48
JMPAR-98-012		6	1400	813	
JMPAR-98-013					33.78
JMPAR-98-014					10.12
JMPAR-98-015					6.78
JMPAR-98-017					8.63
JMPAR-98-018					11.60
JMPAR-98-019					11.36
JMPAR-98-021		11	86	570	38.32
JMPAR-98-024					4.88
JMPAR-98-025		14	380	26	36.59
JMPAR-98-026					36.56
JMPAR-98-027		32	408	1980	33.37
SFPAR-98-001					18.06
SFPAR-98-005		10	<5	<1	
SFPAR-98-006		20	159	197	12.47
SFPAR-98-007					7.33
SFPAR-98-009		18	67	297	33.87
SFPAR-98-010					33.40
SFPAR-98-013					34.42
SFPAR-98-014					32.43
SFPAR-98-015					31.05
SFPAR-98-016		2	302	545	32.63
SFPAR-98-018		6	161	325	33.72

ITS - Chimitec - Bondar Clegg
1322-B rue Harricana, Val d'Or, Québec, J9P 3X6
Tél: (819) 825-0178, Fax: (819) 825-0256

Intertek Testing Services
Chimitec Bondar Clegg

Certificat D'Analyse
Assay Lab Report

CLIENT : GROUPE CONSEIL CYGNUS PROJET: PAYNE
RAPPORT: C98-62603.2 (COMPLET) DATE RECU: 10-SEP-98 DATE DE L'IMPRESSION: 18-SEP-98

# MESURE / STANDARD	ÉLÉMENT / UNITÉS	Au PPB	Pt PPB	Pd PPB	S Tot PCT
BLANC		<1	<5	<1	-
Nombre d'analyses		1	1	1	-
Valeur de moyenne		0.5	2.5	0.5	-
Écart-type		-	-	-	-
Valeur acceptee		5	5	5	<0.01
STANDARD DCP		82	87	87	-
Nombre d'analyses		1	1	1	-
Valeur de moyenne		82.0	87.0	87.0	-
Écart-type		-	-	-	-
Valeur acceptee		83	83	83	-
Zinc Concentrate CRM		-	-	-	31.87
Nombre d'analyses		-	-	-	1
Valeur de moyenne		-	-	-	31.870
Écart-type		-	-	-	-
Valeur acceptee		-	-	-	31.60

ITS - Chimitec - Bondar Clegg
1322-B rue Harricana, Val d'Or, Québec, J9P 3X6
Tél: (819) 825-0178, Fax: (819) 825-0256

Intertek Testing Services
Chimitec Bondar Clegg

Certificat D'Analyse
Assay Lab Report

CLIENT : GROUPE CONSEIL CYGNUS PROJET: PAYNE
RAPPORT: C98-62603.2 (COMPLET) DATE RECU: 10-SEP-98 DATE DE L'IMPRESSION: 18-SEP-98 PAGE 3 DE 3

NUMÉRO DE L'ÉCHANTILLON	ÉLÉMENT UNITÉS	Au PPB	Pt PPB	Pd PPB	S Tot PCT
JMPAR-98-001		7	406	92	33.88
Duplicata					33.86
JMPAR-98-019					11.36
Duplicata					11.33
JMPAR-98-021		11	86	570	38.32
Duplicata		11	87	503	
JMPAR-98-027		32	408	1980	33.37
Duplicata					33.34
SFPAR-98-010					33.40
Duplicata					32.68
SFPAR-98-018		6	161	325	33.72
Duplicata					33.31

ITS - Chimitec - Bondar Clegg
1322-B rue Harricana, Val d'Or, Québec, J9P 3X6
Tél: (819) 825-0178, Fax: (819) 825-0256

ITS Intertek Testing Services
Chimitec Bondar Clegg

Certificat D'Analyse
Assay Lab Report

RAPPORT: C98-62603.3 (COMPLET) RÉFÉRENCE: 162349

CLIENT: GROUPE CONSEIL CYGNUS SOUMIS PAR: ROBERT WARES
PROJET: PAYNE DATE RECU: 07-OCT-98 DATE DE L'IMPRESSION: 13-OCT-98

DATE APPROUVÉ	COMMANDE	ÉLÉMENT		NOMBRE D'ANALYSES	LIMITE INFÉRIEURE DE DETECTION	EXTRACTION	MÉTHODE
981013	1	Au	Or - Pyro Analyse	9	1 PPB	PYRO ANALYSE	PYROANALYSE-DCP
981013	2	Pt	Platine	9	5 PPB	PYRO ANALYSE	PYROANALYSE-DCP
981013	3	Pd	Palladium	9	1 PPB	PYRO ANALYSE	PYROANALYSE-DCP

TYPES D'ÉCHANTILLONS	NOMBRE	FRACTION UTILISÉE	NOMBRE	PRÉP. DE L'ÉCHAN.	NOMBRE
ROCHE	9	-150	9	ECHANT. DE RESERVE	9

COPIES DU RAPPORT À: ROBERT WARES
PAR FAX: 1-514-735-9224

FACTURE À: ROBERT WARES

****

Ce rapport ne doit être reproduit que dans sa totalité. Les données présentées dans ce rapport sont exprimées sur base sèche sauf indication contraire et ne concernent que les échantillons reçus, identifiés par le numéro d'échantillon.

****

ITS - Chimitec - Bondar Clegg
1322-B rue Harricana, Val d'Or, Québec, J9P 3X6
Tél: (819) 825-0178, Fax: (819) 825-0256

ITS Intertek Testing Services
Chimitec Bondar Clegg

Certificat D'Analyse
Assay Lab Report

CLIENT : GROUPE CONSEIL CYGNUS PROJET: PAYNE
RAPPORT: C98-62603.3 (COMPLET) DATE RECU: 07-OCT-98 DATE DE L'IMPRESSION: 13-OCT-98 PAGE 1 DE 3

NUMÉRO DE L'ÉCHANTILLON	ÉLÉMENT UNITÉS	Au PPB	Pt PPB	Pd PPB
ATPAR98-01		133	71	373
JMPAR98-06		15	678	2351
JMPAR98-08		7	988	140
JMPAR98-13		4	731	174
JMPAR98-26		<1	274	127
SFPAR98-10		18	67	426
SFPAR98-13		77	79	443
SFPAR98-14		4	153	832
SFPAR98-15		6	292	1483

ITS - Chimitec - Bondar Clegg
1322-B rue Harricana, Val d'Or, Québec, J9P 3X6
Tél: (819) 825-0178, Fax: (819) 825-0256

Intertek Testing Services
Chimitec Bondar Clegg

Certificat D'Analyse
Assay Lab Report

CLIENT : GROUPE CONSEIL CYGNUS PROJET: PAYNE
RAPPORT: C98-62603.3 (COMPLET) DATE RECU: 07-OCT-98 DATE DE L'IMPRESSION: 13-OCT-98 PAGE 2 DE 3

# MESURE	ÉLÉMENT	Au	Pt	Pd
STANDARD	UNITÉS	PPB	PPB	PPB
BLANC		<1	<5	<1
Nombre d'analyses		1	1	1
Valeur de moyenne		0.5	2.5	0.5
Écart-type		-	-	-
Valeur acceptee		5	5	5
WPR-1		42	316	266
Nombre d'analyses		1	1	1
Valeur de moyenne		42.0	316.0	266.0
Écart-type		-	-	-
Valeur acceptee		42	285	235

ITS - Chimitec - Bondar Clegg
1322-B rue Harricana, Val d'Or, Québec, J9P 3X6
Tél: (819) 825-0178, Fax: (819) 825-0256

ITS Intertek Testing Services
Chimitec Bondar Clegg

Certificat D'Analyse
Assay Lab Report

CLIENT : GROUPE CONSEIL CYGNUS PROJET: PAYNE
RAPPORT: C98-62603.3 (COMPLET) DATE RECU: 07-OCT-98 DATE DE L'IMPRESSION: 13-OCT-98 PAGE 3 DE 3

NUMÉRO DE L'ÉCHANTILLON	ÉLÉMENT UNITÉS	Au PPB	Pt PPB	Pd PPB
JMPAR98-13		4	731	174
Duplicata		3	798	165

ITS - Chimitec - Bondar Clegg
1322-B rue Harricana, Val d'Or, Québec, J9P 3X6
Tél: (819) 825-0178, Fax: (819) 825-0256

ITS Intertek Testing Services
Chimitec Bondar Clegg

Rapport Lab Geochimie
Geochemical Lab Report

RAPPORT: C98-62961.0 (COMPLET) RÉFÉRENCE: 162359

CLIENT: GROUPE CONSEIL CYGNUS SOUMIS PAR: R. WARES

PROJET: PAYNE DATE RECU: 01-OCT-98 DATE DE L'IMPRESSION: 13-OCT-98

DATE APPROUVÉ	COMMANDE	ÉLÉMENT		NOMBRE D'ANALYSES	LIMITE INFÉRIEURE DE DETECTION	EXTRACTION	MÉTHODE
981017	1	SiO2	Silica (SiO2)	13	0.01 PCT	FUSION BORATE	INDUC. COUP. PLASMA
981017	2	TiO2	Titane (TiO2)	13	0.01 PCT	FUSION BORATE	INDUC. COUP. PLASMA
981017	3	Al2O3	Alumine (Al2O3)	13	0.01 PCT	FUSION BORATE	INDUC. COUP. PLASMA
981017	4	Fe2O3*	Fer Total (Fe2O3)	13	0.01 PCT	FUSION BORATE	INDUC. COUP. PLASMA
981017	5	MnO	Manganese (MnO)	13	0.01 PCT	FUSION BORATE	INDUC. COUP. PLASMA
981017	6	MgO	Magnesium (MgO)	13	0.01 PCT	FUSION BORATE	INDUC. COUP. PLASMA
981017	7	CaO	Calcium (CaO)	13	0.01 PCT	FUSION BORATE	INDUC. COUP. PLASMA
981017	8	Na2O	Sodium (Na2O)	13	0.01 PCT	FUSION BORATE	INDUC. COUP. PLASMA
981017	9	K2O	Potassium (K2O)	13	0.05 PCT	FUSION BORATE	INDUC. COUP. PLASMA
981017	10	P2O5	Phosphore (P2O5)	13	0.03 PCT	FUSION BORATE	INDUC. COUP. PLASMA
981017	11	LOI	Perte au feu	13	0.05 PCT	Perte au feu 1000 C	GRAVIMETRIE
981017	12	Total	Elements majeurs Tot	13	0.01 PCT		
981017	13	Ba	Baryum	13	10 PPM	FUSION BORATE	INDUC. COUP. PLASMA
981017	14	Cr	Chrome	13	10 PPM	FUSION BORATE	INDUC. COUP. PLASMA
981017	15	Sr	Strontium	13	5 PPM	FUSION BORATE	INDUC. COUP. PLASMA

TYPES D'ÉCHANTILLONS	NOMBRE	FRACTION UTILISÉE	NOMBRE	PRÉP. DE L'ÉCHAN.	NOMBRE
ROCHE	13	-150	13	CONCASSER, PULVERISE	13

COPIES DU RAPPORT À: ROBERT WARES FACTURE À: ROBERT WARES

ITS Intertek Testing Services
Chimitec Bondar Clegg

Rapport Lab Geochimie
Geochemical Lab Report

CLIENT : GROUPE CONSEIL CYGNUS — PROJET: PAYNE

RAPPORT: C98-62961.0 (COMPLET) — DATE RECU : 01-OCT-98 — DATE DE L'IMPRESSION: 13-OCT-98 — PAGE 1 DE 3

NUMÉRO DE L'ÉCHANTILLON	ÉLÉMENT UNITÉS	SiO2 PCT	TiO2 PCT	Al2O3 PCT	Fe2O3* PCT	MnO PCT	MgO PCT	CaO PCT	Na2O PCT	K2O PCT	P2O5 PCT	LOI PCT	Total PCT	Ba PPM	Cr PPM	Sr PPM
JMPAR-98/003		48.35	2.13	14.26	13.79	0.18	7.30	6.83	3.46	1.19	0.19	2.64	100.44	756	328	127
JMPAR-98/020		42.88	0.43	7.49	12.04	0.16	23.78	6.31	0.07	<.05	0.04	6.59	99.99	<10	1934	6
JMPAR-98/022		41.01	0.53	9.49	16.60	0.19	18.43	7.06	0.02	<.05	0.05	6.80	100.28	<10	1033	<5
JMPAR-98/022 C		60.13	0.67	18.61	5.90	0.04	2.71	1.42	8.11	0.05	0.06	2.04	99.79	15	127	264
JMPAR-98/029		50.29	1.17	13.93	13.03	0.31	7.65	8.15	3.42	0.47	0.09	2.36	100.93	225	212	120
JMPAR-98/033		53.27	0.72	14.26	10.09	0.08	7.89	4.68	4.83	1.25	0.07	2.15	99.40	216	621	264
JMPAR-98/034		51.20	0.70	13.90	10.12	0.11	9.00	9.01	2.71	1.37	0.06	1.92	100.27	236	627	732
JMPAR-98/035		45.10	0.66	13.37	11.81	0.20	10.32	13.50	0.12	0.90	0.05	2.55	98.96	1060	569	2306
JMPAR-98/049		49.57	0.85	13.87	10.37	0.13	9.85	9.56	3.08	0.38	0.05	2.60	100.37	55	456	121
JMPAR-98/050		52.95	0.98	12.40	9.52	0.10	10.25	7.62	3.84	0.17	0.06	2.39	100.36	24	559	67
JMPAR-98/051		51.41	0.82	13.74	10.71	0.14	8.05	9.80	2.61	<.05	0.06	2.27	99.65	<10	294	72
JMPAR-98/052		51.60	0.85	13.96	11.03	0.17	8.53	9.19	1.88	<.05	0.06	2.96	100.27	<10	321	47
SFPAR-98/017		48.36	1.65	13.01	13.67	0.23	7.15	7.73	3.40	0.11	0.12	4.98	100.45	<10	262	168

Intertek Testing Services
Chimitec Bondar Clegg

Rapport Lab Geochimie
Geochemical Lab Report

CLIENT : GROUPE CONSEIL CYGNUS
RAPPORT: C98-62961.0 (COMPLET)

PROJET: PAYNE
DATE RECU : 01-OCT-98 DATE DE L'IMPRESSION: 13-OCT-98

# MESURE / STANDARD	ÉLÉMENT / UNITÉS	SiO2 PCT	TiO2 PCT	Al2O3 PCT	Fe2O3* PCT	MnO PCT	MgO PCT	CaO PCT	Na2O PCT	K2O PCT	P2O5 PCT	LOI PCT	Total PCT	Ba PPM	Cr PPM	Sr PPM
CANMET STD SY-3		59.77	0.15	11.79	6.45	0.32	2.66	8.27	4.15	4.20	0.54	-	98.38	431	16	306
Nombre d'analyses		1	1	1	1	1	1	1	1	1	1	-	1	1	1	1
Valeur de moyenne		59.77	0.15	11.79	6.45	0.32	2.66	8.27	4.15	4.20	0.54	-	98.38	431	16	306
Écart-type		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Valeur acceptee		59.68	0.15	11.80	6.42	0.32	2.67	8.26	4.15	4.20	0.54	1.20	-	430	10	306
BLANC		<0.01	<.01	<0.01	<0.01	<.01	<0.01	<0.01	<.01	<.05	<.03	-	-	<10	<10	<5
Nombre d'analyses		1	1	1	1	1	1	1	1	1	1	-	-	1	1	1
Valeur de moyenne		0.005	.005	0.005	0.005	.005	0.005	0.005	.005	0.03	0.02	-	-	5	5	3
Écart-type		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Valeur acceptee		<.001	<.01	<.001	<.0001	<.01	<.001	<.001	<.01	<.01	<.01	<.001	<.0001	.005	.005	.005
Perte au Feu Std.		-	-	-	-	-	-	-	-	-	-	4.09	-	-	-	-
Nombre d'analyses		-	-	-	-	-	-	-	-	-	-	1	-	-	-	-
Valeur de moyenne		-	-	-	-	-	-	-	-	-	-	4.09	-	-	-	-
Écart-type		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Valeur acceptee		-	-	-	-	-	-	-	-	-	-	4.24	-	-	-	-
Perte au Feu Std.		-	-	-	-	-	-	-	-	-	-	41.03	-	-	-	-
Nombre d'analyses		-	-	-	-	-	-	-	-	-	-	1	-	-	-	-
Valeur de moyenne		-	-	-	-	-	-	-	-	-	-	41.03	-	-	-	-
Écart-type		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Valeur acceptee		-	-	-	-	-	-	-	-	-	-	41.08	-	-	-	-

Intertek Testing Services
Chimitec Bondar Clegg

Rapport Lab Geochimie
Geochemical Lab Report

CLIENT : GROUPE CONSEIL CYGNUS PROJET: PAYNE

RAPPORT: C98-62961.0 (COMPLET) DATE RECU : 01-OCT-98 DATE DE L'IMPRESSION: 13-OCT-98 PAGE 3 DE 3

NUMÉRO DE L'ÉCHANTILLON	ÉLÉMENT UNITÉS	SiO2 PCT	TiO2 PCT	Al2O3 PCT	Fe2O3* PCT	MnO PCT	MgO PCT	CaO PCT	Na2O PCT	K2O PCT	P2O5 PCT	LOI PCT	Total PCT	Ba PPM	Cr PPM	Sr PPM
JMPAR-98/003		48.35	2.13	14.26	13.79	0.18	7.30	6.83	3.46	1.19	0.19	2.64	100.44	756	328	127
Duplicata												2.55				
JMPAR-98/020		42.88	0.43	7.49	12.04	0.16	23.78	6.31	0.07	<.05	0.04	6.59	99.99	<10	1934	6
Duplicata		42.58	0.42	7.36	11.89	0.16	23.79	6.22	0.06	<.05	0.05			<10	1897	5
JMPAR-98/050		52.95	0.98	12.40	9.52	0.10	10.25	7.62	3.84	0.17	0.06	2.39	100.36	24	559	67
Duplicata												2.51				

APPENDIX B

SOIL SAMPLE ASSAY CERTIFICATES

ITS Intertek Testing Services
Chimitec Bondar Clegg

Certificat D'Analyse
Assay Lab Report

RAPPORT: C98-62717.0 (COMPLET) RÉFÉRENCE: 162350

CLIENT: GROUPE CONSEIL CYGNUS SOUMIS PAR: J. MYNGALL

PROJET: PAYNE DATE RECU: 10-SEP-98 DATE DE L'IMPRESSION: 28-SEP-98

DATE APPROUVÉ	COMMANDE	ÉLÉMENT		NOMBRE D'ANALYSES	LIMITE INFÉRIEURE DE DETECTION	EXTRACTION	MÉTHODE
980917	1	Cu	Cuivre	26	1 PPM	HCL:HNO3 (3:1)	ABSORPTION ATOMIQUE
980917	2	Co	Cobalt	26	1 PPM	HCL:HNO3 (3:1)	ABSORPTION ATOMIQUE
980917	3	Ni	Nickel	26	2 PPM	HCL:HNO3 (3:1)	ABSORPTION ATOMIQUE

TYPES D'ÉCHANTILLONS	NOMBRE	FRACTION UTILISÉE	NOMBRE	PRÉP. DE L'ÉCHAN.	NOMBRE
SOL	26	-80	26	SECHAGE, TAMIS -80	26

COPIES DU RAPPORT À: ROBERT WARES FACTURE À: ROBERT WARES

PAR FAX: 1-514-735-9224

****

****

ITS - Chimitec - Bondar Clegg
1322-B rue Harricana, Val d'Or, Québec, J9P 3X6
Tél: (819) 825-0178, Fax: (819) 825-0256

ITS Intertek Testing Services
Chimitec Bondar Clegg

Certificat D'Analyse
Assay Lab Report

CLIENT : GROUPE CONSEIL CYGNUS — PROJET: PAYNE
RAPPORT: C98-62717.0 (COMPLET) — DATE RECU: 10-SEP-98 — DATE DE L'IMPRESSION: 28-SEP-98 —

NUMÉRO DE L'ÉCHANTILLON	ÉLÉMENT UNITÉS	Cu PPM	Co PPM	Ni PPM
SFPAS-001		21	4	9
SFPAS-002		13	3	12
SFPAS-003		39	2	7
SFPAS-004		606	10	59
SFPAS-005		145	39	47
SFPAS-006		139	12	42
SFPAS-007		138	16	36
SFPAS-008		367	25	51
SFPAS-009		138	10	21
SFPAS-010		125	9	25
SFPAS-011		94	5	17
SFPAS-012		200	6	37
SFPAS-013		118	13	29
SFPAS-014		78	18	68
SFPAS-015		9	2	4
SFPAS-016		32	4	10
SFPAS-017		65	2	19
SFPAS-018		16	2	5
SFPAS-019		10	<1	6
SFPAS-020		7	2	10
SFPAS-021		13	<1	8
SFPAS-022		46	8	13
SFPAS-023		27	2	11
SFPAS-024		118	15	29
SFPAS-025		92	11	24
SFPAS-026		6	<1	4

ITS - Chimitec - Bondar Clegg
1322-B rue Harricana, Val d'Or, Québec, J9P 3X6
Tél: (819) 825-0178, Fax: (819) 825-0256

Intertek Testing Services
Chimitec Bondar Clegg

Certificat D'Analyse
Assay Lab Report

CLIENT : GROUPE CONSEIL CYGNUS PROJET: PAYNE

RAPPORT: C98-62717.0 (COMPLET) DATE RECU: 10-SEP-98 DATE DE L'IMPRESSION: 28-SEP-98

# MESURE / STANDARD	ÉLÉMENT / UNITÉS	Cu PPM	Co PPM	Ni PPM
STD GEOCHIMIQUE 4		308	10	42
Nombre d'analyses		1	1	1
Valeur de moyenne		308.0	9.9	41.5
Écart-type		-	-	-
Valeur acceptee		290	9	42
BLANC		<1	<1	<2
Nombre d'analyses		1	1	1
Valeur de moyenne		0.5	0.5	1.0
Écart-type		-	-	-
Valeur acceptee		1	1	1

ITS - Chimitec - Bondar Clegg
1322-B rue Harricana, Val d'Or, Québec, J9P 3X6
Tél: (819) 825-0178, Fax: (819) 825-0256

Intertek Testing Services
Chimitec Bondar Clegg

Certificat D'Analyse
Assay Lab Report

CLIENT : GROUPE CONSEIL CYGNUS PROJET: PAYNE

RAPPORT: C98-62717.0 (COMPLET) DATE RECU: 10-SEP-98 DATE DE L'IMPRESSION: 28-SEP-98

NUMÉRO DE L'ÉCHANTILLON	ÉLÉMENT UNITÉS	Cu PPM	Co PPM	Ni PPM
SFPAS-008		367	25	51
Duplicata		350	25	45
SFPAS-025		92	11	24
Duplicata		85	9	22

ITS - Chimitec - Bondar Clegg
1322-B rue Harricana, Val d'Or, Québec, J9P 3X6
Tél: (819) 825-0178, Fax: (819) 825-0256

APPENDIX C
SAMPLE DECRIPTIONS AND LOCATIONS

PAYNE BAY SAMPLING 98							
Sample	Zone	Lithology	NAD83 East	NAD83 North	BM assay	PGE assay	Majors
ATPAR98-01	TC1	MASS SULF	431130	6666850	X	X	
JMPAR98-01	QB1	MASS SULF	428650	6669930	X	X	
JMPAR98-02	-	PERID	428650	6669930			
JMPAR98-03	-	BASALT	428530	6670000			X
JMPAR98-04	-	RUSTY SEDIM	428530	6670000	X		
JMPAR98-05	-	RUSTY PERID FLOAT	428190	6670330	X		
JMPAR98-06	QA1	MASS SULF	428030	6670470	X	X	
JMPAR98-07	-	RUSTY PER FLOAT	428030	6670470	X		
JMPAR98-08	QB1	MASS SULF	428650	6669930	X	X	
JMPAR98-09	QC	DISS. SULF IN PER	427720	6671610	X		
JMPAR98-10	QC	DISS. SULF IN PER	427720	6671610	X		
JMPAR98-11	QC	MASS SULF	427670	6671690	X	X	
JMPAR98-12	QC	CP STOCKWORK	427670	6671690	X	X	
JMPAR98-13	QC	MASS SULF	427670	6671690	X	X	
JMPAR98-14	QC	DISS. SULF IN PER	427670	6671690	X		
JMPAR98-15	QB2	DISS. SULF IN PER	427820	6671170	X		
JMPAR98-16	-	DISS. SULF IN PER	429040	6669240	X		
JMPAR98-17	QA2	DISS. SULF IN PER	429020	6669290	X		
JMPAR98-18	QA2	DISS. SULF IN PER	429020	6669290	X		
JMPAR98-19	QA2	DISS. SULF IN PER	429020	6669290	X		
JMPAR98-20	-	PERID	430950	6667200			X
JMPAR98-21	TC1	MASS SULF	431130	6666850	X	X	
JMPAR98-22	TC1	DISS. SULF IN PER	431130	6666850			X
JMPAR98-22C	-	SEDIMENT	431010	6666760			X
JMPAR98-23	-	DISS. SULF IN PER	431000	6666780			
JMPAR98-24	TA1	DISS. SULF IN PER	430920	6666580	X		
JMPAR98-25	TB2	MASS SULF	431070	6666470	X	X	
JMPAR98-26	TB2	MASS SULF	431070	6666470	X	X	
JMPAR98-27	TC2	MASS SULF	431230	6666460	X	X	
JMPAR98-28	TB3	DISS. SULF IN PER	431770	6665870	X		
JMPAR98-29	-	GABBRO	423350	6677350			X
JMPAR98-30	-	CHLORITE SCHIST	423350	6677350			
JMPAR98-31	-	SEDIMENT	423350	6677350			
JMPAR98-32	-	0.0 m - BAS	431040	6666500			
JMPAR98-33	-	0.1 m - BAS	431040	6666500			X
JMPAR98-34	-	0.6 m - BAS	431040	6666500			X
JMPAR98-35	-	1.5 m - BAS	431040	6666500			X
JMPAR98-36	-	1.6 m - PERID	431040	6666500			
JMPAR98-37	-	4.5 m - PERID	431040	6666500			
JMPAR98-38	-	13 m - PERID	431050	6666500			
JMPAR98-39	-	25 m - PERID	431060	6666510			
JMPAR98-40	-	40 m - PERID	431070	6666510			
JMPAR98-41	-	53 m - PERID	431080	6666520			
JMPAR98-42	-	66 m - PERID	431100	6666520			
JMPAR98-43	-	80 m - PERID	431110	6666530			
JMPAR98-44	-	92 m - PERID	431120	6666530			
JMPAR98-45	-	105 m - PERID	431130	6666530			
JMPAR98-46	-	120 m - PERID	431150	6666540			
JMPAR98-47	-	136 m - PERID	431170	6666550			
JMPAR98-48	-	140 m - PERID	431170	6666550			
JMPAR98-49	-	145 m - BAS	431170	6666550			X
JMPAR98-50	-	150 m - BAS	431170	6666550			X
JMPAR98-51	-	BASALT	430220	6667820			X
JMPAR98-52	-	BASALT	430190	6667800			X
SFPAR98-01	QB2	DISS. SULF IN PER	427820	6671170	X		
SFPAR98-02	-	DISS. SULF IN PER	427860	6671070	X		
SFPAR98-03	-	PERID	429030	6669460			
SFPAR98-04	-	DISS. SULF IN PER	429010	6669430	X		

PAYNE BAY SAMPLING 98							
Sample	Zone	Lithology	NAD27 East	NAD27 North	BM assay	PGE assay	Majors
SFPAR98-05	-	CP STOCKWORK	429010	6669370	X	X	
SFPAR98-06	QA2	DISS. SULF IN PER	429020	6669290	X	X	
SFPAR98-07	QA2	DISS. SULF IN PER	429020	6669290	X		
SFPAR98-08	-	RUSTY BASALT	429990	6668120	X		
SFPAR98-09	TA2	MASS SULF	430190	6667880	X	X	
SFPAR98-10	TA2	MASS SULF	430230	6667780	X	X	
SFPAR98-11	-	BASALT	430500	6667600			
SFPAR98-12	-	BASALT	430500	6667600			
SFPAR98-13	TC1	MASS SULF	431130	6666850	X	X	
SFPAR98-14	TB2	MASS SULF	431040	6666530	X	X	
SFPAR98-15	TC2	MASS SULF	431190	6666520	X	X	
SFPAR98-16	TC2	MASS SULF	431170	6666600	X	X	
SFPAR98-17	-	ACT-CHL SCHIST	433840	6660850			X
SFPAR98-18	TC2	MS CHANNEL	431190	6666550	X	X	