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ASSESSMENT REPORT

describing

GEOPHYSICAL SURVEYS

at the

SIMPSON PROPERTY

D2 1-24	YB60180-YB60203
25-94	YB61382-YB61451
95-108	YB61728-YB61741
109-235	YB77285-YB77411

NTS 105A/12 & 13
Latitude 60°46'N; Longitude 129°36'W

in the

Watson Lake Mining District,
Yukon Territory

prepared by

Archer, Cathro & Associates (1981) Limited

for

STRATEGIC METALS LTD.

by

W.A.Wengzynowski, P.Eng.
May, 2007

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INTRODUCTION

The Simpson property is a volcanogenic massive sulphide (VMS) prospect located in the Finlayson District of southeastern Yukon. It is owned 100% by Strategic Metals Ltd.

This report describes helicopter-borne geophysical surveys conducted between May 30 and 31, 2006 by Geotech Ltd. on behalf of Strategic. Archer, Cathro & Associates (1981) Limited managed the program and provided some logistical support. The author supervised the work and his Statement of Qualifications appears in Appendix I.

PROPERTY LOCATION, CLAIM DATA AND ACCESS

The Simpson property is located in southeastern Yukon at latitude 60°46'N and longitude 129°36'W on NTS map sheets 105A/12 and 13. It lies 20 km west of Km 85 on the Robert Campbell Highway and approximately 90 km northwest of Watson Lake (Figure 1). The property consists of 235 mineral claims that are registered with the Watson Lake Mining Recorder in the name of Archer, Cathro which holds them in trust for Strategic. Claim locations are shown on Figure 2 while registration data are listed below.

<u>Claim Name</u>	<u>Grant Number</u>	<u>Expiry Date *</u>
D2 1-24	YB60180-YB60203	February 15, 2009
25-94	YB61382-YB61451	February 15, 2007
95-108	YB61728-YB61741	February 15, 2007
109-235	YB77285-YB77411	February 15, 2007

* Expiry dates do not include 2006 work which has not yet been filed for assessment credit.

The 2006 program was done from a base at Watson Lake using an Astar 350B2 contracted from Trans North Helicopters of Whitehorse. Midday refueling was done alongside the Robert Campbell Highway.

Although there is no road access to the property, a bulldozer tote trail passes within 15 km of the claim block. During winter heavy equipment could access the claims by traveling 25 km west along the tote trail from its point of departure off the Robert Campbell Highway (0.5 km south of the junction with the Nahanni Range Road) to Little Jimmy Lake, and then following a broad valley bottom south to the property. Sambo Lake, which lies immediately east of the property, is accessible by float plane.

HISTORY

The original twenty-four claims comprising the core of the Simpson property were staked by Nordac Resources Ltd. in summer 1995 to protect prospective VMS targets in a

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FIGURE 1

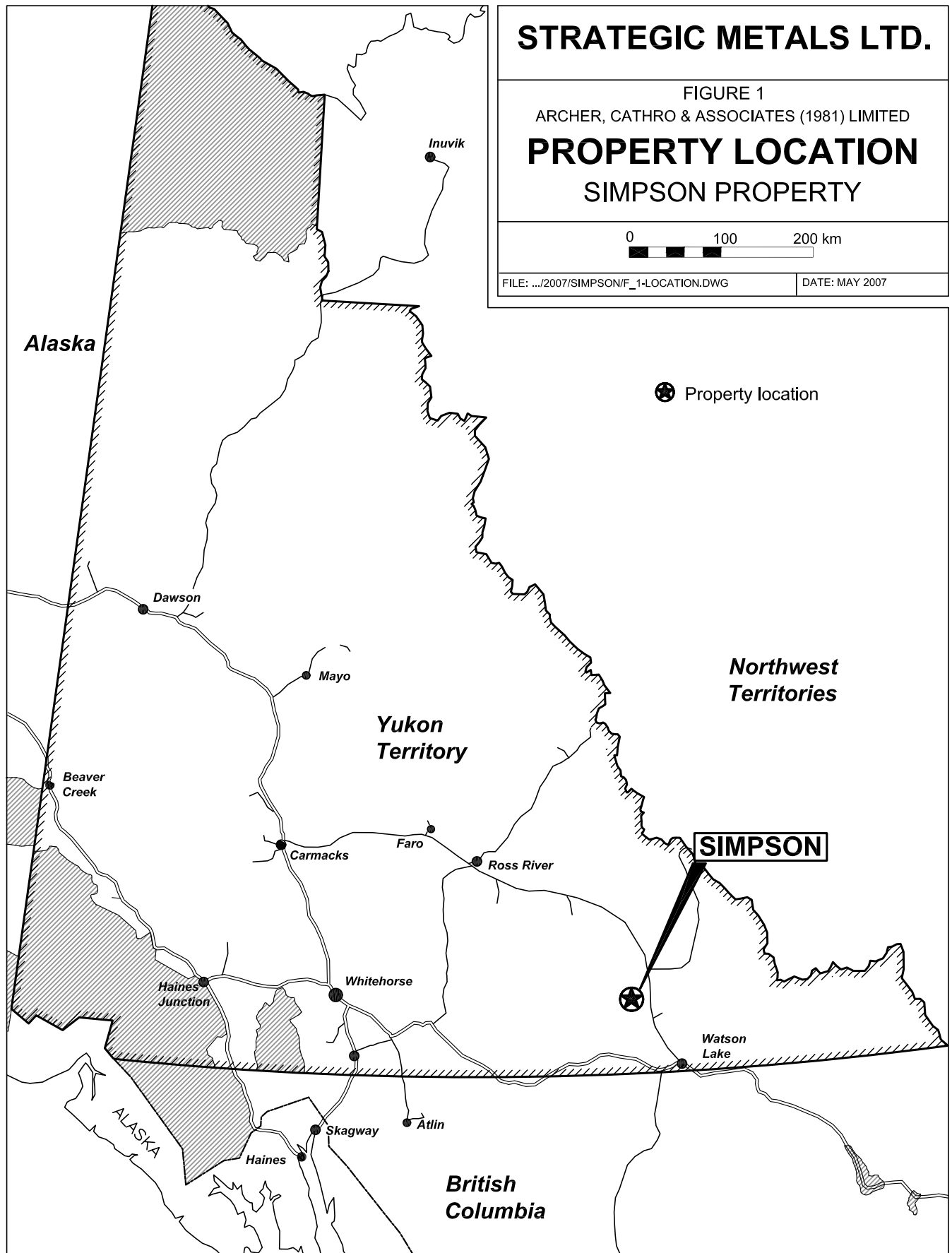
ARCHER, CATHRO & ASSOCIATES (1981) LIMITED

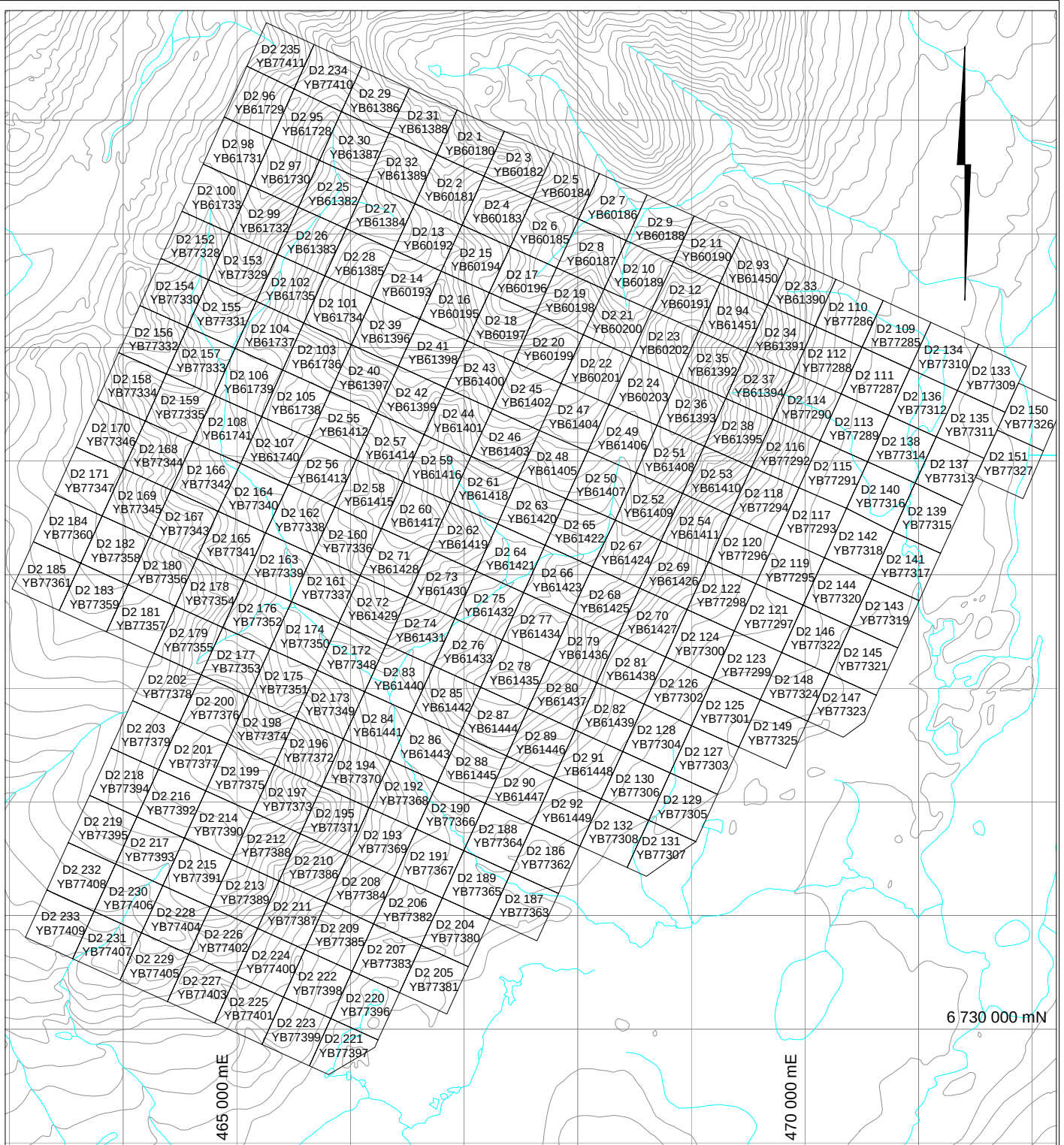
PROPERTY LOCATION SIMPSON PROPERTY

0 100 200 km

FILE: .../2007/SIMPSON/F_1-LOCATION.DWG

DATE: MAY 2007





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FIGURE 2
ARCHER, CATHRO & ASSOCIATES (1981) LIMITED
CLAIM LOCATION
SIMPSON PROPERTY

0 4 km

UTM Zone 9, NAD83

FILE:../2007/SIMPSON/F2_CLAIM_LOC

DATE: MAY 2007

drainage that produced stream sediment geochemical anomalies. Although a government sponsored sediment sampling program had earlier identified multi-element anomalies in two lakes immediately east of the property, the area had never been previously staked.

Exploration by Nordac in 1995 included preliminary geological mapping, prospecting and reconnaissance soil geochemical sampling. It resulted in the discovery of two stratabound lead-zinc-copper-silver showings within Devono-Mississippian felsic metavolcanic rocks (Carne, 1996). The remainder of the property was staked following these discoveries.

In 1996 Nordac conducted airborne and ground geophysical surveys, geological mapping, prospecting, reconnaissance and grid soil sampling, and hand trenching (Duso, 1997).

The 1997 exploration program consisted of grid soil sampling and 980 m of diamond drilling in six holes. No work was done on the property from then until 2006. Nordac changed its name to Strategic Metals Ltd. in 2001 following a share rollback.

GEOMORPHOLOGY

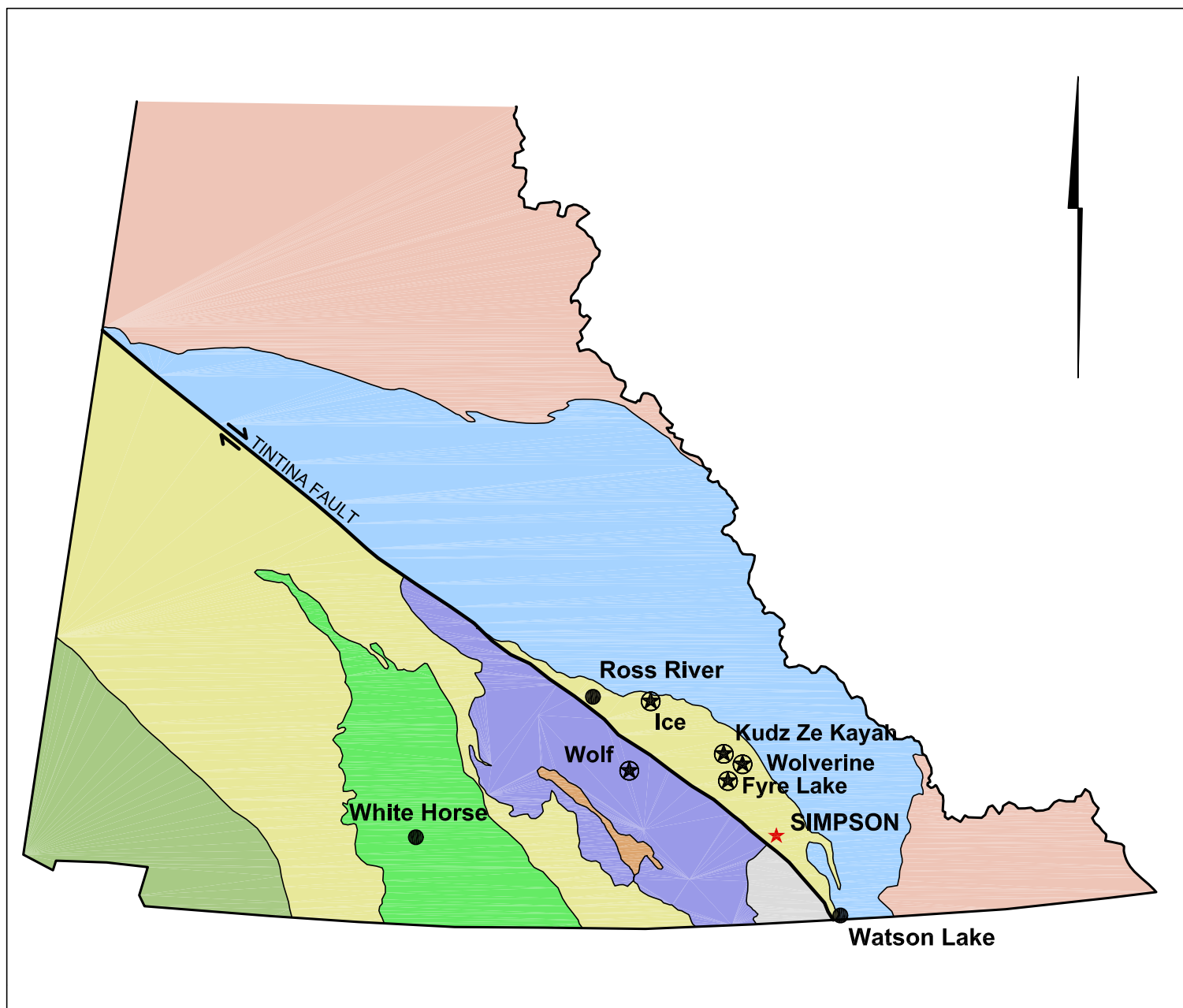
The property is located within the Simpson Range of the Pelly Mountains immediately east of the Liard River Plateau. Elevations on the property range from 820 m on the shore of Sambo Lake to over 1700 m along a sinuous southeasterly trending ridge in the northwestern corner of the claim block.

Steep slopes are common at higher elevations, especially in northerly-facing cirques. Outcrop is surprisingly sparse. The upper slopes are usually talus covered while the lower areas are blanketed with extensive glacial deposits. Lodgment till is widespread while moraines are present on cirque floors.

Vegetation at lower elevations consists of mature white or black spruce with a thick understorey of willow in boggy areas. Upper slopes support a typical assemblage of balsam, fir, black spruce, willow and dwarf birch. Ridge crests and steep northerly facing slopes are usually bare except for caribou moss and lichen. Treeline is at about 1500 m.

REGIONAL GEOLOGY

The Simpson property is located within the Finlayson Block, a 380 by 60 km area comprised primarily of the Yukon-Tanana geologic terrane (Figure 3). This terrane represents the innermost of the accreted or "suspect" terranes in the Canadian Cordillera (Mortensen and Jilson, 1985). The northeastern margin of the block is the Finlayson Lake Fault Zone, a complex zone of steep and shallow faults related to transpressive suturing. The southwestern boundary of the block is the Tintina Fault, a major strike-slip fault with at least 450 km of dextral displacement during Late Cretaceous and/or Early Tertiary time (Tempelman-Kluit et al, 1976).



TERRANE

	Quaternary		VMS deposit
	Mackenzie Platform		Property
	Selwyn Basin		
	Slide Mountain		
	Cassiar Platform		
	Yukon-Tanana Terrane		
	Intermontane		
	Insular		

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FIGURE 3

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TECTONIC SETTING SIMPSON PROPERTY



FILE: ...2007/SIMPSON/F_3-TECTONIC.DWG

MAY 2007

Regional mapping of the Finlayson Block was completed by the Geological Survey of Canada (GSC) in the 1960's and 1970's (Gabrielse, 1967; Blusson, 1996; Tempelman-Kluit, 1977 and 1979). More recent regional studies have been published by the Yukon Geological Survey, including Murphy et al., (2001) and Mortensen and Murphy (2005). A compilation of this work is shown on Figure 4.

The Yukon-Tanana Terrane consists largely of Paleozoic continental margin and or/arc stratigraphy deposited on a continental basement of uncertain origin (Mortensen, 1992). The Yukon-Tanana Terrane in the core of Finlayson Block, is composed of three major packages, collectively termed the Layered Metamorphic Sequence. The lowermost package is Upper Devonian or older in age and consists of various schists with interbanded marbles, calc-silicates and calcareous schists near the top. The middle package comfortably overlies the lower package and is called the Grass Lakes Succession. It is Upper Devonian in age and comprises quartzite, schist and phyllite with rare conglomerate and two important metavolcanic units.

The Fire Lake metavolcanic unit lies at the base of the Grass Lakes Succession. It is mainly composed of metamorphosed mafic volcanic strata which consists mostly of plagioclase-chlorite schist. This unit hosts the Fire Lake VMS deposit. The Kudz Ze Kayah metavolcanic unit is near the middle of the Grass Lake Succession. It consists primarily of feldspar-muscovite-quartz schist derived from felsic volcanics. The Kudz Ze Kayah and GP4F VMS Deposits are hosted in this unit.

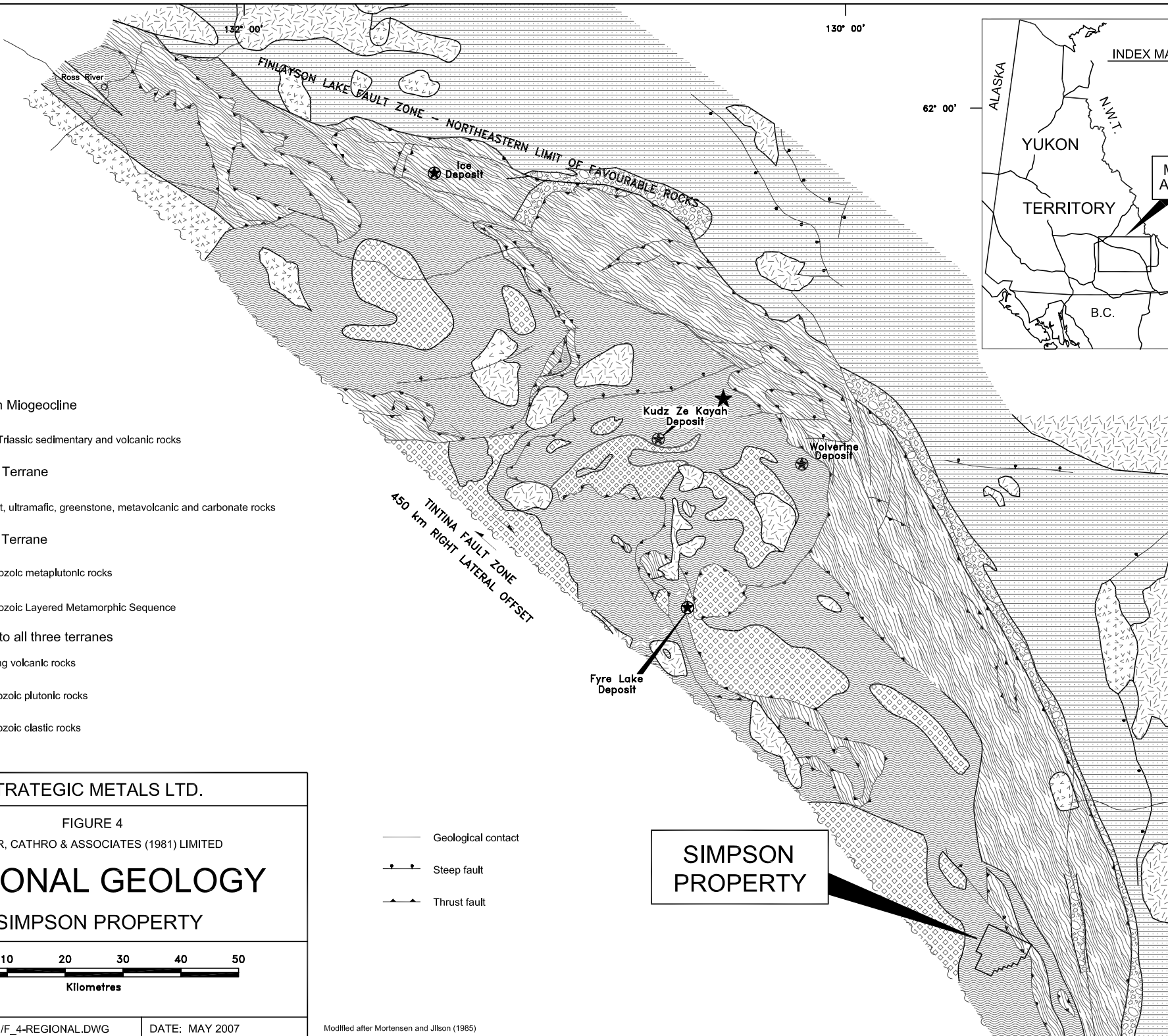
The uppermost package in the Layered Metamorphic Sequence is the Wolverine Succession which uncomfortably overlies the other packages. It is Early Mississippian in age and includes another unit of felsic metavolcanic stratigraphy that hosts the Wolverine VMS Deposit.

The lower packages of the Layered Metamorphic Sequence are locally intruded by thick mafic and ultramafic sills and dykes, collectively referred to as the North Lake Meta-Diorite. These intrusions are believed to be Late Devonian in age.

Meta-plutonic gneiss and augen gneiss are also found in the lower two packages of the Layered Metamorphic Sequence. They are assigned to the Grass Lakes Plutonic Suite or the Simpson Plutonic Suite, both of which are granitic to monzonitic in composition. Although the meta-plutonic rocks have produced Upper Mississippian age dates, they are only found below the unconformity separating the Wolverine Succession from the other packages.

Locally within the Finlayson Block, the Layered Metamorphic Sequence is overlain by the Campbell Range Succession. This unit is Early Devonian in age and mostly consists of massive basalt. It hosts the Ice VMS Deposit.

Mid Cretaceous, two mica granite and quartz monzonite stocks are common in the Finlayson Block.



North American Miogeocline

 Pre-Triassic sedimentary and volcanic rocks

Slide Mountain Terrane

 Chert, ultramafic, greenstone, metavolcanic and carbonate rocks

Yukon-Tanana Terrane

 Paleozoic metaplutonic rocks

 Paleozoic Layered Metamorphic Sequence

Units common to all three terranes

 Young volcanic rocks

 Mesozoic plutonic rocks

 Mesozoic clastic rocks

 Geological contact

 Steep fault

 Thrust fault

**SIMPSON
PROPERTY**

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FIGURE 4

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REGIONAL GEOLOGY

SIMPSON PROPERTY



Numerous thrust faults have been identified in various parts of the Yukon-Tanana Terrane. Some of these structures juxtapose quite different packages of rocks. One of the largest faults is the Money Creek Thrust.

REGIONAL MINERALIZATION

Since the mid-1990's, the Finlayson Block has emerged as a significant VMS camp. Most of the known VMS occurrences are Kuroko-type (Kudz Ze Kayah, GP4F and Wolverine Deposits) but Besshi-type (Fire Lake Deposit) and Cyprus-type (Ice Deposit) mineralization has also been discovered and their stratigraphic position relative to one another is illustrated on Figure 5. The Kudz Ze Kayah Deposit, which is the main "type-deposit" for exploration at the Simpson property, is briefly described below.

The Kudz Ze Kayah Deposit lies within Yukon-Tanana Terrane near the centre of the Finlayson Block (Cominco Exploration, 1995; Whiteway, 1995). It is a VMS deposit hosted by an overturned assemblage of felsic pyroclastics, aphanitic massive rhyolites and metasilicastic rocks belonging to the Grass Lakes Succession of the Layered Metamorphic Sequence. Although both the sulphides and wallrocks are highly strained and exhibit pervasive schistosity, compositional layering in the vicinity of the deposit is relatively undeformed with a consistent, shallow northerly dip. Sphalerite, chalcopyrite and galena are the main economic minerals while the gangue includes mixtures of magnetite, barite, pyrrhotite, pyrite and carbonate. The deposit averages about 18 m thick and has been traced 700 m along strike and up to 400 m downdip. It grades 5.9% zinc, 0.9% copper, 1.5% lead, 130 g/t silver and 1.3 g/t gold (Schultze, 1996). Preliminary studies suggest that satisfactory lead, zinc and copper concentrates can be produced using conventional flotation processes (Cominco Exploration 1995). The mineralization responds well to magnetic and electromagnetic surveys but geochemical response is somewhat erratic because the entire deposit is covered by 2 to 10 m of glacial till.

PROPERTY GEOLOGY AND SURFACE MINERALIZATION

The Simpson property lies south of the Money Creek Thrust and is underlain by a succession of layered metamorphic rocks plus extensive granitic gneiss and a number of small, younger intrusions. The metamorphic succession is largely comprised of quartz-muscovite and quartz-chlorite-muscovite schists, which have felsic to intermediate volcanic protoliths (Figure 6). A few thin magnetite-bearing, biotite rich horizons that may represent a more mafic protolith are also present. The metamorphic rocks were initially assigned a Proterozoic (Hadrynian) age by the GSC (Gabrielse, 1967) but have more recently been correlated with rocks of the Layered Metamorphic Sequence (Mortensen and Jilson, 1985). The succession in the vicinity of the Simpson property is now called the Waters Creek Formation (Mortensen and Murphy 2005). It is thought to be Upper Devonian in age and maybe correlate with the Kudz Ze Kayah metavolcanic unit, which lies north of the Money Creek Thrust.

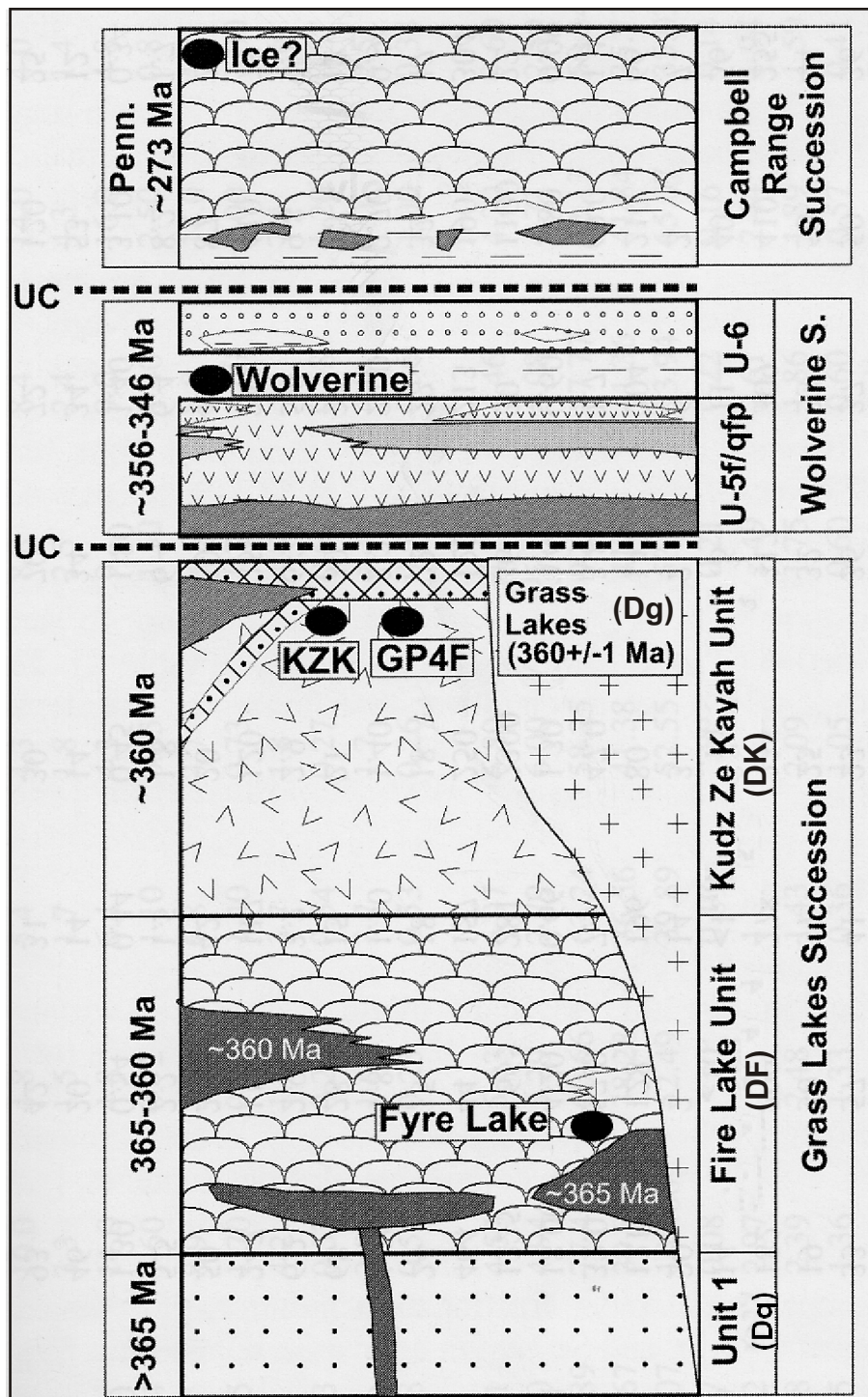


Fig 4. Schematic section of the Finlayson Lake District with the Paleozoic stratigraphy and location of VMS deposits. Dark intrusive rocks within the Fire Lake Unit are ultramafic unit Dum. Cretaceous granitic intrusions (Kg) are not shown. Modified after Murphy and Piercey (1999, 2000) and Piercey, et al, (2002)

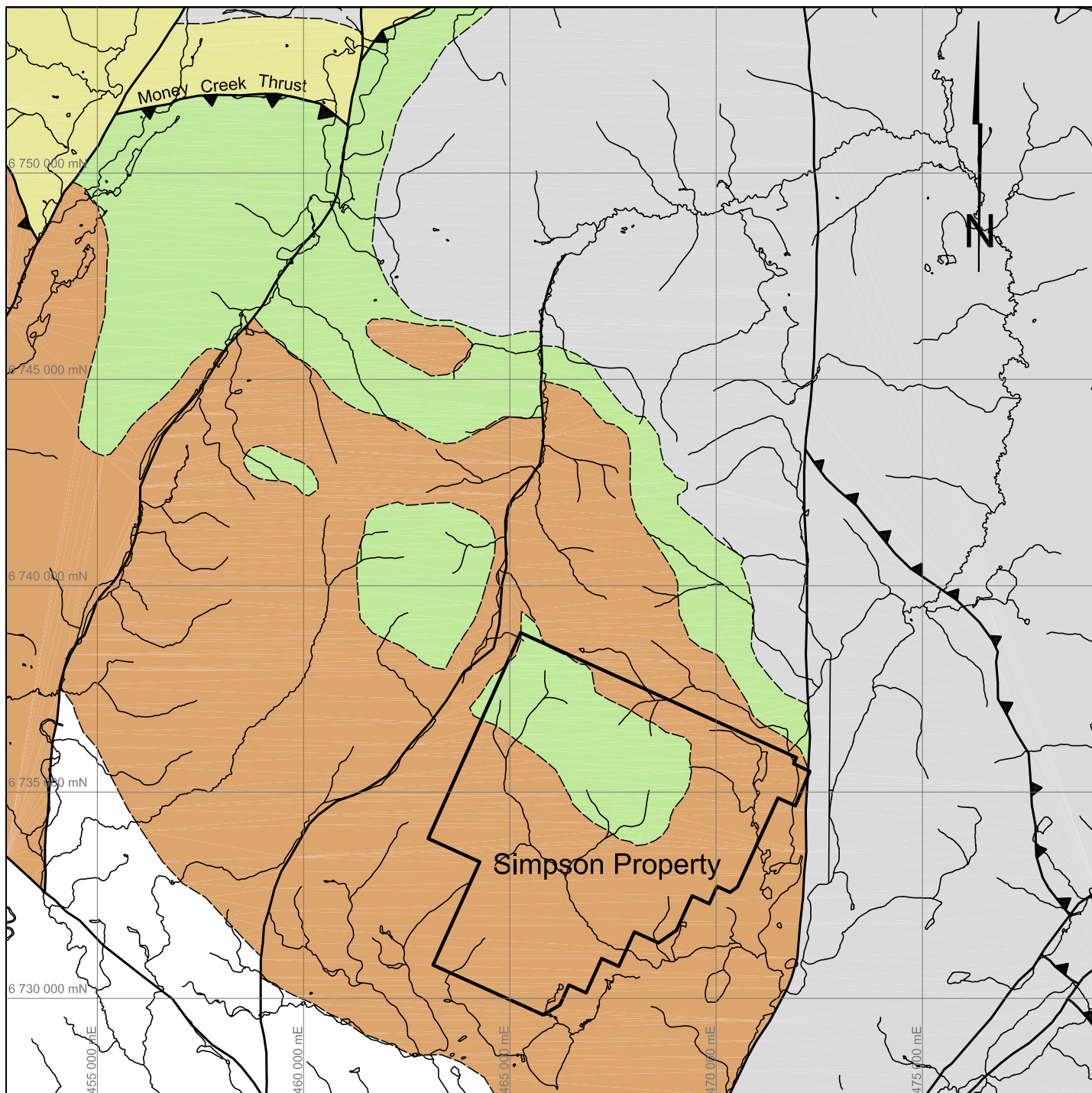
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FIGURE 5

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STRATIGRAPHY

SIMPSON PROPERTY



INTRUSIVE ROCKS

Early Mississippian

Simpson Range Plutonic Suite

weakly to strongly foliated granite to granodiorite

LAYERED ROCKS

Lower Permian to Lower Pennsylvanian

undifferentiated Yukon-Tanana Terrane

Upper Devonian

Waters Creek Formation

siliceous muscovite-quartz schist or phyllite and lesser chloritic schist

Kudz Ze Kayah Formation

felsic metavolcanic rocks, carbonaceous phyllite and quartzite

----- Contact ▲ Fault (thrust/normal)

Modified after Mortensen and Murphy, 2005

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FIGURE 6

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GEOLOGY

SIMPSON PROPERTY

0 10 km
105A 12/13, NAD 83, UTM ZONE 9V

FILE: 2007/SIMPSON/GEOLOGY.DWG

DATE: MAY 2007

Seven units recognized in the core area of property are described below in approximate order of formation and illustrated on Figure 7.

Lithology

Quart-chlorite-muscovite schist is the most abundant rock type on the property. It varies widely in colour and texture but is dominantly grayish green or white and well foliated with local mylonitic laminae. Relict quartz eyes and feldspar phenocrysts are common and are generally between 2 and 4 mm in diameter. Alteration minerals include talc which is best developed in footwall stratigraphy to the VMS showings and sericite which is primarily seen in hanging wall strata. Feldspar-rich horizons are often weakly to moderately clay altered throughout the section.

Quartz-muscovite±biotite schist is recognized as a separate unit within the schist package. It is well foliated, grey to tan on fresh surfaces and rusty weathering. Fine disseminated cubic pyrite occurs parallel to laminae and comprises between 2 and 20% of the rock.

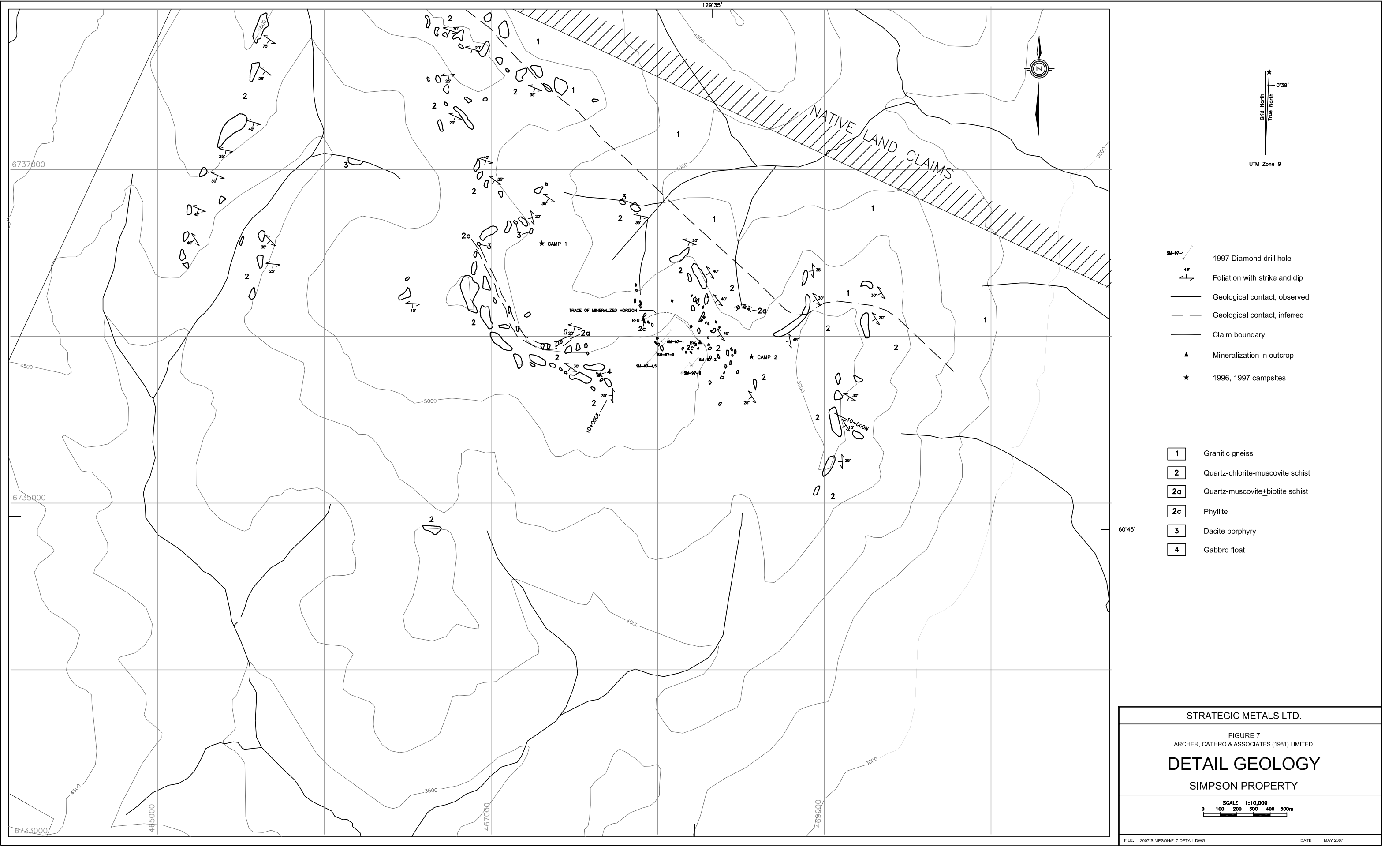
Phyllite is black and fissile. It contains varying amounts of sericite and graphite, and occurs as thin (<1 m thick) conformable horizons within the schist package. One horizon is situated about 20 m topographically above the main mineralized outcrop on the property. Similar but slightly thicker horizons were intersected in nearby drill holes.

Metatuff is mottled grey to light brown, aphanitic and siliceous. This unit is mainly recognized in drill holes and occurs as interfoliated layers up to 27 m thick within the schists. Quartz and feldspar phenocrysts are locally visible, ranging between 1 and 3 mm in diameter. Contacts are generally well preserved and sharp.

Granitic gneiss is tan to grey, moderately sheared and blocky weathering. It is composed of approximately 60 to 70% pink orthoclase, 20% grey quartz megacrysts and 10 to 20% chlorite after hornblende. Quartz and feldspar augen ranges between 2 to 30 mm in diameter. Foliation and cataclastic textures are also evident but are poorly developed.

Gabbro is dark green, coarse grained and moderately to strongly magnetic. It comprises plagioclase and clinopyroxene. This unit has only been observed as talus on steep slopes but it is believed to represent a mafic dyke or sill within the metavolcanic succession.

Dacite porphyry is a light brown to orange weathering, trachytic textured unit which consists of plagioclase and biotite phenocrysts in a brown aphanitic groundmass. Exposures are limited to a few outcrops in the northwestern part of the claim block. Moderate manganese staining is common.



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FIGURE 7
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DETAIL GEOLOGY

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SCALE 1:10,000
0 100 200 300 400 500m

Structure

The metavolcanic succession is bordered on the southwest and northeast by granitic gneiss of the Early Mississippian Simpson Range plutonic suite (Mortensen and Jilson, 1985 and Mortensen and Murphy, 2005). The northeastern contact between the two units strikes northwesterly and is relatively planar. The southwestern contact has not been observed and its nature is unknown.

Foliation is pervasive in the metavolcanic rocks but only minor gentle folding is recognized. Compositional layering generally parallels foliation, which strikes northwesterly and dips gently to the southwest. Slaty cleavage is observed in all the drill holes and is generally developed oblique (between 10 and 30°) to foliation. Gouge zones up to several metres wide are also observed in drill core. Some of the gouge zones appear to correspond to topographic linears at surface and are interpreted as faults. No sense of motion has been determined for these structures.

Quartz-carbonate veins and veinlets are seen in float and most of the drill holes. They form irregular crosscutting masses of white quartz and buff weathering calcite with massive chlorite selvages. Interfoliated wisps and folded bands of schist are common within the veins.

Fractures generally cut foliation obliquely and are commonly rusty to a depth of 80 m below surface.

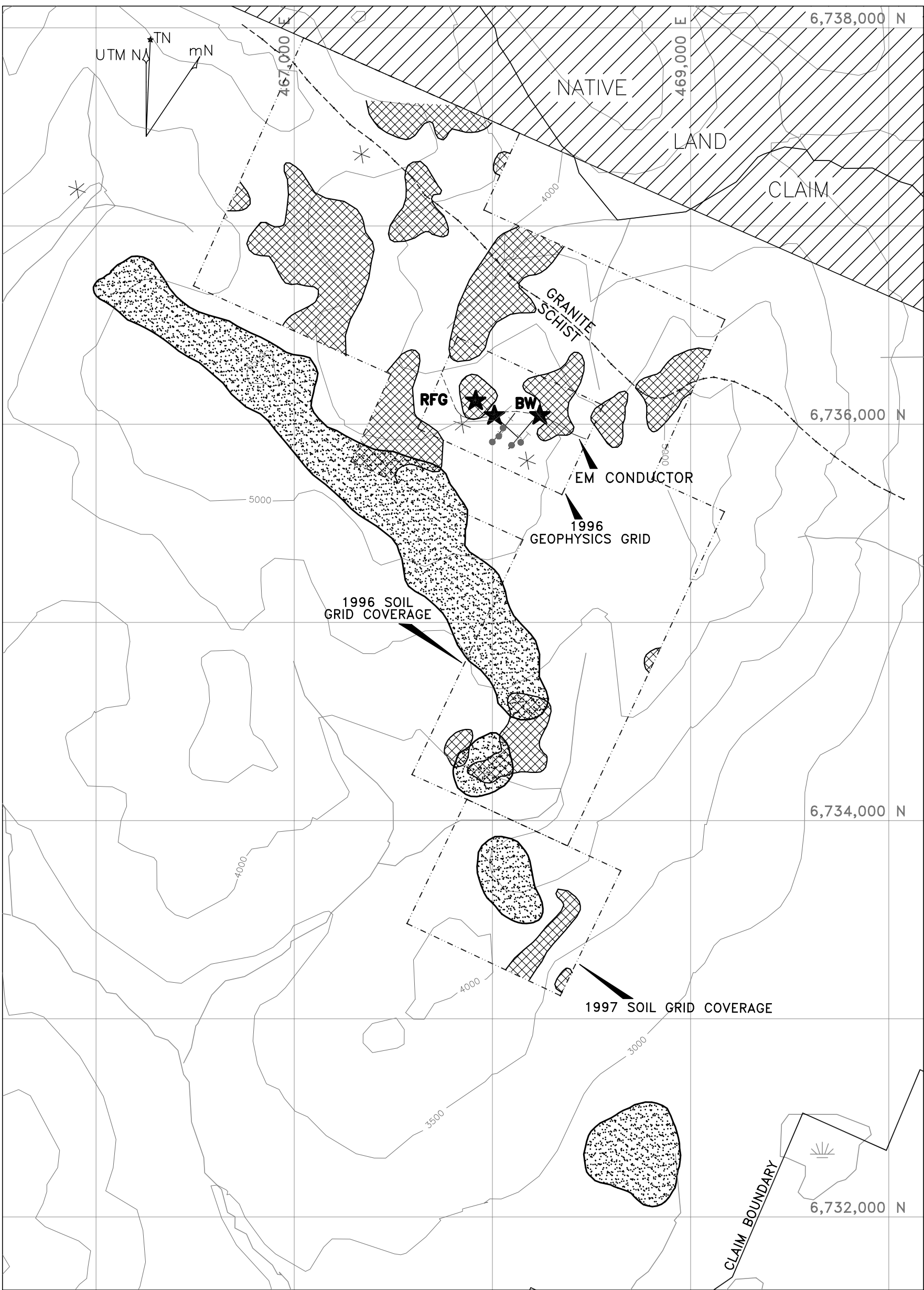
Mineralization

Four main areas of mineralized float and/or outcrop have been discovered in the north-central part of the claim block. Three of the showings are stratabound occurrences while the fourth is a vein. The showings are described in the following paragraphs and illustrated on Figure 8.

- i) The RFG and BW Zones are the principal mineral occurrences discovered to date. They are approximately 350 m apart and are believed to represent a single horizon within the package of metavolcanic rocks.

The RFG Zone is 30 cm thick at surface and is exposed for about 12 m before disappearing under overburden. Mineralization consists of weakly to moderately oxidized sphalerite-galena±chalcopyrite laminae within siliceous muscovite-chlorite schist. Specimens collected from the RFG Zone returned up to 2.17% copper, 10.50% lead, 7.60% zinc and 174.0 g/t silver. Hand trenches excavated along strike did not reach bedrock because they encountered thick glacial till and permafrost.

The BW Zone is located 350 m to the east and consists of a 2 to 5 cm thick boudinaged horizon of partially oxidized galena and sphalerite within manganese stained quartz-muscovite-chlorite schist. Specimens returned values up to 1.57% copper, 2.83% lead, 4.25% zinc, 185 g/t silver and 160 ppb gold.



Mineral showing



Aeromagnetic anomaly
contoured at 57795 nT



Soil geochemical exploration target
>50 ppm lead and/or >200 ppm zinc



Barite float



1997 Diamond drill hole

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FIGURE 8
ARCHER, CATHRO & ASSOCIATES (1981) LIMITED

COMPILATION

SIMPSON PROPERTY

SCALE 1:20,000

0 100 200 300 400 500m

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DATE: MAY 2007

A 20 cm thick band of black phyllite overlies both occurrences and may represent a post-mineralization period of quiescence.

- ii) A mineralized float train is located 65 m upslope of the RFG Zone. This float is similar in character to the mineralization in the RFG Zone but not as high grade. Hand pits failed to locate the source but it is believed to lie about 55 m up section from the RFG horizon. Float specimens returned up to 0.16% copper, 3.51% lead, 4.64% zinc and 42 g/t silver.
- iii) White sucrosic barite with laminated or bedded texture occurs in talus fragments up to 30 cm thick, which have been traced to an area 75 m uphill above the RFG Zone. Interlaminated purple fluorite is present in several talus specimens and in drill core (see Diamond Drilling). Similar barite float is located about 400 m along strike to the east and 2300 m to the west in a southerly facing cirque.
- iv) Abundant barite-fluorite-galena float is scattered in talus just below a ridge crest along the northern granitic gneiss/metavolcanic contact. The barite is white to red in colour and sucrosic, with 5 to 10% intergrowths of crystalline purple fluorite and <1% cubic galena. The coarse grain size and symmetrical banding observed in the mineralized specimens suggest a vein source of uneconomic dimensions. Quartz vein float with minor malachite and galena also occurs in the area. No specimens of either type of mineralization have been analyzed.

PRE-2006 GEOPHYSICAL SURVEYS

A helicopter-borne, EM-resistivity-magnetic survey was conducted over the Simpson property in early 1996 by Dighem Power. In summer 1996 Amerok Geosciences Ltd. conducted a 5.4 line kilometre, ground horizontal loop electromagnetic (HLEM) and total magnetic field survey in an area centred on the RFG and BW Zones.

The airborne survey outlined a weak to moderate, semi-continuous, 4000 by 300 m magnetic high that trends subparallel to the general trace of compositional layering in the metavolcanic succession (Figure 8). The anomaly lies 500 to 700 m southwest of the RFG and BW Zones and contains the magnetic gabbro float occurrence. Electromagnetic response from the airborne survey was subdued.

HLEM data from the ground survey suggests a subtle flat lying or very shallowly dipping conductor that approximately coincides with the surface trace of the mineralized horizon, as shown on the compilation map. There is no ground magnetic response associated with this conductor.

PROPERTY GEOCHEMISTRY

Soil geochemical surveys conducted between 1995 and 1997 include stream sediment sampling, reconnaissance soil sampling along contours and claim lines and grid soil

sampling in the main area of interest. Survey control for the grid sampling was provided by three baselines that were cut and cleared to line-of-sight. Baselines were slope corrected and marked at 100 m intervals by a 1 m lath bearing aluminum tags inscribed with grid coordinates. Grid soil sampling was done at 100 m intervals along lines spaced 100 m apart and oriented perpendicular to baselines. Sample sites were marked by 50 cm lath with aluminum tags showing the grid coordinates and sample number.

The soil samples were taken from B and/or C Horizon material. They were dried, sieved to -80 mesh, dissolved in nitric-acid regia and analyzed for 32 elements using the Induced Coupled Plasma (ICP) technique. Results for lead and zinc are illustrated on Figure 8 while anomalous thresholds and peak values for common VMS indicator elements from soil samples are as follows.

Table I - Anomalous Thresholds and Peak Values (ppm)

Element	Threshold Weak	Threshold Moderate	Threshold Strong	1996 Peak Value
Lead	50	100	200	1150
Zinc	200	500	1000	1565
Copper	50	100	200	314
Silver	1	2	5	9.8

Lead is the most anomalous of the metals. The majority of the anomalous values occur in clusters in three parts of the grid. The strongest and largest anomaly is in the northern portion of the grid where clusters of high values form a broad 1800 m long, southeasterly-trending target that encompasses the RFG and BW Zones. The shape of the anomaly is somewhat irregular, in part because of downhill dispersion. Isolated areas within this anomaly also exhibit strong zinc, silver, and/or copper support.

The other two anomalies are situated 1800 and 2800 m to the south. Both are defined by weak lead response with coincident zinc support. These anomalies each cover a 400 by 200 m area and are situated on either side of a drainage from which stream sediment samples returned strongly anomalous zinc values and moderately anomalous lead values. The area is heavily vegetated and follow-up prospecting in the vicinity of high values failed to explain them.

DIAMOND DRILLING

In summer 1997, a total of 980 m of HQ and NQ drilling was completed in six holes (Wengzynowski, 1997) and machinery were contracted from E. Caron Diamond Drilling Ltd. of Whitehorse, Yukon. Drill hole locations are illustrated on Figure 8 while survey data are listed below.

Table II - 1997 Drill Hole Survey Data Property Grid Coordinates

DDH	Easting	Northing	Azimuth (°)	Dip (°)	Length (m)
SM-97-1	10+158	9+989	040	-55	148.4
SM-97-2	10+180	9+914	040	-55	209.4
SM-97-3	10+394	9+988	040	-55	96.6
SM-97-4	10+180	9+836	040	-55	215.2
SM-97-5	10+180	9+836	040	-85	183.5
SM-97-6	10+376	9+926	040	-85	127.1

After logging, selected sections of the core were split. Samples were sent to ALS Chemex Labs (formerly Chemex) where they were crushed to -150 mesh using a chrome steel ring mill and routinely analyzed for 32 elements by the ICP technique. Some samples were also assayed for copper, lead, zinc and silver.

Drill holes SM-97-1, 2, 4 and 5 are located on Section A-A' (Figure 9) approximately 170 m southeast along strike from the mineralized outcrop of the RFG Zone. Section B-B' contains holes SM-97-3 and 6 (Figure 10) and is located 200 m further along strike. The holes intersected the target horizon roughly 70 m apart along the section lines and have tested stratigraphy approximately 200 m down dip. The sections show a gently southwesterly dipping package of dominantly quartz-chlorite-muscovite schists with interbanded metatuff and graphitic to sericitic phyllite. A barite/magnetite horizon was intersected in the three deepest holes on Section A-A' approximately 40 m above the phyllite unit. The lithologies generally form continuous horizons but some facies changes are indicated. The phyllite and magnetite/ barite horizons appear to be thickening at depth. Gouge zones are present in some holes but faulting cannot be substantiated as there does not appear to be any significant displacement of the stratigraphy.

Sulphide mineralization was encountered in four of six holes (SM-97-1, 2, 3 and 6). The mineralized intervals show good correlation with the projected surface trace of the mineralized zones. Section A-A' illustrates two discontinuous mineralized zones separated by about 45 m of dominantly metatuff stratigraphy. The lower lens, which is correlated with the RFG Zone, is discontinuously developed within quartz-chlorite-muscovite schist near the basal contact of the thickest metatuff horizon. Sphalerite, galena and pyrite occur as thin bands and disseminations parallel to foliation within the schist. The best intersection returned 0.48% lead, 1.28% zinc and 9.2 g/t silver across 1.38 m. The upper zone was only intersected in SM-97-1. This mineralization is hosted within a thick sequence of quartz-chlorite-muscovite schist. A 1.01 m interval of wispy and disseminated sphalerite, galena and pyrite yielded 0.35% lead, 0.64% zinc and 4.8 g/t silver.

Down dip continuity and thickness of the RFG Zone appears to increase in Section B-B'. SM-97-3 and 6 both encountered a metal enriched horizon measuring 4.3 and 5 m thick, respectively. This horizon again occurs at the metatuff/schist contact. Mineralization consists of wispy and disseminated sphalerite, galena, chalcopryrite, pyrite and/or

NE
(A)

Sample No.	Cu(%)	Pb(%)	Zn(%)	Ag(g/t)	Interval(m)
59301	0.02	0.35	0.64	4.8	1.01
59302	—	—	—	—	1.53
59303	—	—	—	—	2.29
59304	—	—	0.01	—	3.00
59305	0.04	0.49	1.28	9.2	1.38
59306	—	—	—	—	2.60
59313	—	—	—	—	2.77
59314	—	0.03	0.06	2.6	1.30
59315	—	—	—	1.0	2.54
59316	—	—	—	1.2	2.61
59317	—	—	—	—	2.01

RFG mineralized horizon
projected to surface
using stratum contours

Upper RFG horizon
projected to surface
using stratum contours

SM-97-4,5
(projected to section)

SW
(A')

SM-97-2
(projected to section)

★ Barite
Float

SM-97-1

Barite and
Fluorite

Magnetite

Magnetite

Magnetite
and Barite



Overburden



Quartz-chlorite-
muscovite schist



Phyllite



Metatuff



Mineralization



Showing



Gouge

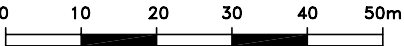
59316 Sample number

STRATEGIC METALS LTD.

FIGURE 9

ARCHER, CATHRO & ASSOCIATES (1981) LIMITED

CROSS SECTION
HOLES SM-97-1,2,4,5
SIMPSON PROPERTY



NE
(B)

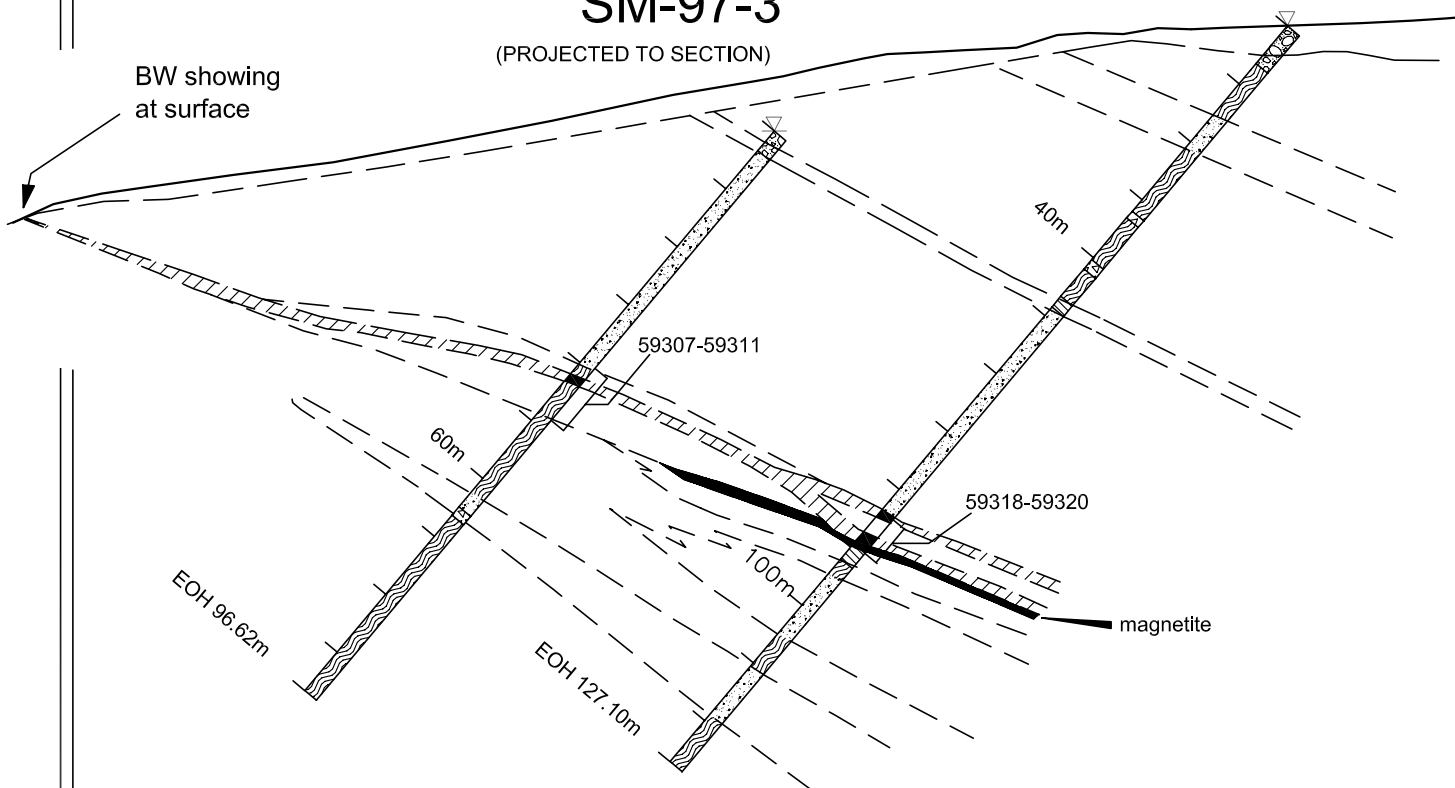
SW
(B')

SM-97-3

(PROJECTED TO SECTION)

SM-97-6

BW showing
at surface



Sample No.	Cu(%)	Pb(%)	Zn(%)	Ag(g/t)	Interval(m)
59307	—	—	0.27	0.6	2.00
59308	—	0.03	0.17	1.4	2.00
59309	0.19	0.06	7.82	31.0	0.30
59310	—	—	0.05	—	2.46
59311	0.01	0.04	0.18	1.2	2.65
59318	0.04	0.46	0.65	8.0	1.10
59319	—	0.03	0.03	0.2	2.65
59320	0.16	0.42	2.00	16.4	1.25



Overburden



Quartz + carbonate vein



Quartz-chlorite-muscovite schist



Metatuff



Phyllite



Mineralization

59318

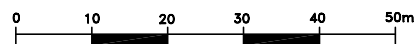
Sample number

STRATEGIC METALS LTD.

FIGURE 10

ARCHER, CATHRO & ASSOCIATES (1981) LIMITED

**CROSS SECTION
HOLES SM-97-3 & 6**
SIMPSON PROPERTY



FILE: ...2007/SIMPSON/F10-XS36.DWG

DATE: MAY 2007

magnetite. Both intersections exhibit narrow intervals of banded semi-massive sulphides within broader zones of disseminated mineralization. A 30 cm interval from SM-97-3 returned 0.19% copper, 0.06% lead, 7.82% zinc and 31.0 g/t silver. The grade across the entire width of the intervals is low, averaging less than 1% combined lead-zinc with 3.1 and 6.0 g/t silver over 4.3 and 5 m, respectively.

2006 GEOPHYSICAL SURVEYS

A total of 197 line km of VTEM and magnetic surveys was flown by Geotech Ltd. across the Simpson property on May 30 and 31, 2006. The block was flown at 200 m line spacing with two perpendicular tie lines approximately 1000 m apart. Where possible, the apparatus maintained a terrain clearance of 45 m. The survey was flown using an Astar B2 helicopter operated by Trans North Helicopters based out of Whitehorse.

The total magnetic field data over the survey area highlights the same arcuate northwest trending anomaly identified by the previous aeromagnetic survey conducted by Dighem. The magnetic axis appears to parallel the local stratigraphic orientations specifically in the vicinity of the mineralized showings. The main magnetic anomaly is offset to the southwest approximately 400 m from the surface trace of the mineralized horizon which lies within a linear zone of low magnetic response often referred to as a “shadow”.

No significant conductors are apparent from the survey; however, very subtle response is present in the northwestern and southern parts of the survey area. Data reduction is currently in process to evaluate to presence of specific targets for geometric modeling. A report describing the VTEM and magnetic surveys is contained in Appendix II.

CONCLUSIONS AND RECOMMENDATIONS

The Simpson property lies within the Yukon-Tanana Terrane and is largely underlain by a thick section of metavolcanic rocks similar to those hosting VMS mineralization at the Kudzu Ze Kayah Deposit. Soil geochemistry, geophysical surveys and prospecting have identified a number of VMS targets on the property, only one of which was partially tested by drilling in 1997.

Diamond drilling along strike and down-dip from mineralized outcrops encountered a typical Kuroko-type VMS host assemblage consisting of a gently-dipping, stacked and interfingered package of felsic and intermediate volcanic rocks. Narrow, discontinuous mineralization was intersected at two stratigraphic levels. Graphitic phyllite horizons occur at about the same level and likely represent shallow submarine basinal facies developed during periods of volcanic quiescence. A magnetite±barite exhalite is located approximately 10 to 60 m up-section from the mineralized horizons.

Sulphide intersections, although narrow and sub-economic in grade, are consistent with a distal Kuroko-type metal assemblage. Metal zonation in Kuroko deposits is characterized by a copper rich vent proximal facies overlain by lead-zinc mineralization. Horizons enriched in zinc are normally more laterally extensive than the deposits. Barite usually

overlies the deposits and forms distal facies of the mineralized horizons. Sulphide intervals in the Simpson property drill core are all enriched in zinc (up to 7.82% across 0.30 m) while lead and copper are only moderately and weakly elevated.

The 1997 drill program provided significant source vectors for future exploration. Drill cross sections show substantial thickening of the graphitic phyllite horizons and magnetite/barite exhalite downdip and along strike to the south. This interpretation is supported by a strong aeromagnetic anomaly located east of the drill area. The increased abundance of graphitic sediments may be indicative of a basinal environment which is favourable for sulphide accumulation. The sections also demonstrated lateral continuity of the RFG sulphide horizon over a strike length of approximately 350 m.

Further exploration should consist of diamond drilling both downdip and to the south of the current drill area. The depth of drill holes will not increase substantially in the downdip direction because topography crests just east of the last hole and then starts to descend. This drilling should be preceded by additional geological mapping, prospecting and hand trenching.

Respectfully submitted,

ARCHER, CATHRO & ASSOCIATES (1981) LIMITED.

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APPENDIX I
STATEMENT OF QUALIFICATIONS

STATEMENT OF QUALIFICATIONS

I, William A. Wengzynowski, geological engineer, with business addresses in Vancouver, British Columbia and Whitehorse, Yukon Territory and residential address at 301 Fairway Drive, North Vancouver, British Columbia, V7G 1L4 do hereby certify that:

1. I am President of Archer, Cathro & Associates (1981) Limited.
2. I graduated from the University of British Columbia in 1993 with a B.A.Sc in Geological Engineering, Option I, mineral and fuel exploration.
3. I registered as a Professional Engineer in the Province of British Columbia on December 12, 1998 (Licence Number 24119).
4. From 1983 to present, I have been actively engaged in mineral exploration in the Yukon Territory, Northwest Territories, northern British Columbia and Mexico.
5. I have personally participated in and supervised the fieldwork reported herein.



William A. Wengzynowski, P.Eng.
By his Attorney-in-Fact
Joan Mariacher

094830

Statement of Expenditures
D2 1-235 Mineral Claims
February 13, 2007

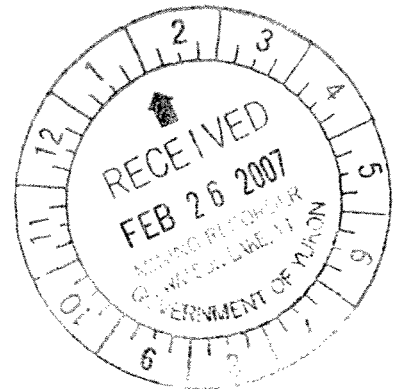
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Contract VTEM Airborne Survey

Geotech Ltd.
Support – Trans North Helicopters and Norcan Leasing

\$42,886.02
5,016.78
\$47,902.80

Entire claim block flown



APPENDIX II

VTEM GEOPHYSICAL REPORT BY GEOTECH LTD.

**REPORT ON A HELICOPTER-BORNE
TIME DOMAIN ELECTROMAGNETIC
GEOPHYSICAL SURVEY**

SIMPSON PROPERTY
Yukon Territory, Canada

for
Strategic Metals Ltd.

By

Geotech Limited
30 Industrial Parkway South
Aurora, Ontario, Canada
Tel: 1.905.841.5004
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Survey flown in May - July 2006

Project 663
October 2006

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REPORT ON A HELICOPTER-BORNE

TIME DOMAIN ELECTROMAGNETIC SURVEY

Simpson Property, Yukon Territory, Canada

Executive Summary

During the period of May 20th to July 8th, 2006, Geotech Limited carried out a helicopter-borne geophysical survey for Strategic Metals Ltd. over ten blocks located in the Yukon Territory, Canada, including **Simpson Property**.

Principal geophysical sensors included a versatile time domain electromagnetic system (VTEM) and a cesium magnetometer. Ancillary equipment included a GPS navigation system and a radar altimeter. A total of 2750.77 line-km. were flown, including 197 line-km. for **Simpson Property**.

In-field data processing involved quality control and compilation of data collected during the acquisition stage, using the in-field processing centre established at survey bases. Preliminary and final data processing, including generation of final digital data products was done at the office of Geotech Limited in Aurora, Ontario.

The processed survey results are presented as total magnetic field grid and electromagnetic stacked profiles.

Digital data includes all electromagnetic and magnetic products plus positional, altitude and raw data.

1. INTRODUCTION

1.1. General Considerations

These services are the result of the Agreement made between Geotech Limited and Strategic Metals Ltd., to perform a helicopter-borne geophysical survey over the multiple blocks, located in Yukon Territory, Canada, including **Simpson Property**.

2750.77 line-km of geophysical data were acquired during the survey.

The survey coordinates for **Simpson Property** are as shown in Appendix A.

The crew was based in various locations in Yukon Territory for the acquisition phase of the survey, as shown in Section 2 of this report.

The helicopter was obtained from TransNorth Helicopters for the duration of the survey. Multiple fuel caches were arranged.

Survey flying was completed on July 8th, 2006. Preliminary data processing was carried out daily during the acquisition phase of the project. Final data presentation and data archiving was completed in the Aurora office of Geotech Limited in November 2006.

1.2. Survey and System Specifications

The **Simpson Property** survey block was flown at a nominal traverse line spacing of 200 metres.

Tie lines were flown perpendicular to traverse lines at approximately 1720 metres, as shown in Section 2 of this report.

Where suitable, survey lines were extended beyond original block boundary to reach the minimum length of 3 km.

Where possible, the helicopter maintained a mean terrain clearance of 80 metres, which translated into an average height of 45 metres above ground for the bird-mounted VTEM system and 45 metres for the magnetic sensor.

The survey was flown using an Astar B2 helicopter, registration C-GTNU, operated by TransNorth Helicopters Limited. Details of the survey specifications may be found in Section 2 of this report.

1.3. Data Processing and Final Products

Data compilation and processing were carried out by the application of Geosoft OASIS Montaj and programs proprietary to Geotech Limited.

Database, grid and maps of final products were presented to Strategic Metals Ltd.

The survey report describes the procedures for data acquisition, processing, final image presentation and the specifications for the digital data set.

1.4. Topographic Relief

The **Simpson Property** survey block location is shown on the location map (Appendix A). It is 16 km. W of Simpson Lake and 90 km. NW of the town of Watson Lake.

Topographically, the block exhibits a rugged mountainous relief, with an elevation range of 720 metres to 1790 metres above sea level.

The survey area is on the easterly mountain of the Simpson Range. The area drapes from the mountain top west to a valley and east sloping downward to Sambo Lake.

2. DATA ACQUISITION

2.1. Survey Area

The survey block (see location map, Appendix A) and general flight specifications are as follows:

Survey areas	Line /Tie spacing (m)	Line /Tie - km	Line / Tie direction	Line number	Line KM
Simpson	200	172.5	N25E	7000 - 7320	197.6
	1720	25.1	N65W	7900 - 7940	

Table 1 - Survey block

The survey block boundary is shown in Appendix B.

2.2. Survey Operations

Survey operations were based in several locations in the Yukon Territory for the acquisition phase of the survey, including Watson Lake for the **Simpson Property**. The following table shows the timing of the various flights.

Simpson Property was flown along with other blocks in the same vicinity.

Date	Flights	Production	Block	Crew location	REMARK
20-May		0		Whitehorse	Mobilization to Whitehorse
21-May		0		Whitehorse	Assembly of system
22-May		0		Whitehorse	Helicopter installation, test flight
23-May		0		Teslin	Mobilization to Teslin - no production
24-May		0		Teslin	No production due to weather
25-May	1,2,3	109.5	BAR	Teslin	
26-May	4, 1, 2	161.09	BAR, CONVERT	Teslin	
27-May	7,8	95.62	CONVERT	Teslin	flying aborted – due to weather
28-May	9	18.83	BAR	Teslin	flying aborted – due to weather
29-May		0		Watson Lake	move to Watson lake, prepare fuel cache
30-May	10, 11, 12	118.74	SIM	Watson Lake	
31-May	13, 14, 15	109.46	SIM, 4C	Watson Lake	
01-Jun	16, 17, 18	87.97	4C	Watson Lake	flying aborted – due to rough terrain
02-Jun	19	5.38	SIM	Ross River	Re-flight
03-Jun	20	91.37	TIDD	Ross River	flying aborted – due to weather
04-Jun		0		Ross River	No production due to weather
05-Jun	21, 22, 23	270.54	TIDD	Ross River	
06-Jun	24, 25, 26	194.78	TIDD	Ross River	flying aborted – due to weather
07-Jun	27, 28, 29	269.91	TIDD	Ross River	
08-Jun	30,31	92.81	TIDD	Ross River	rough terrain
09-Jun		0		Ross River	
21-Jun		0		Mayo	Ferry flights, move fuel to MARG
22-Jun		0		Mayo	No production due to weather
23-Jun	1, 2	84.68	MARG	Mayo	flying aborted – due to weather
24-Jun	3,4,5	158.36	MARG	Mayo	
25-Jun	6,7	123.1	MARG	Mayo	
26-Jun		0		Dawson City	No production due to weather
27-Jun		0		Dawson City	No production due to weather
28-Jun	1,2,3	111	MIC	Dawson City	flying aborted – due to weather
29-Jun	3,4	139.51	MIC, MAG	Dawson City	
30-Jun	5,6,7	115.74	MAG	Dawson City	flying aborted – due to weather
01-Jul	7,8	101.59	CN	Dawson City	
02-Jul	9	76.63	CN	Dawson City	flying aborted – due to weather
03-Jul	10, 11	121.16	CN	Dawson City	
04-Jul	1,2	66	PAN	Dawson City	
05-Jul	3	3	PAN	Dawson City	Test flights
06-Jul	4	24	PAN	Dawson City	
07-Jul		0			helicopter inspection
08-Jul		0		Burwash	Burwash Block cancelled due to rough topo

Table 2 - Survey schedule

2.3. *Flight Specifications*

The nominal EM sensor terrain clearance was 45 m (EM bird height above ground, i.e. helicopter is maintained 80 m above ground). Nominal survey speed was 80 km/hour. The data recording rates of the data acquisition was 0.1 second for electromagnetics and magnetometer, 0.2 second for altimeter and GPS. This translates to a geophysical reading about every 2 metres along flight track. Navigation was assisted by a GPS receiver and data acquisition system, which reports GPS co-ordinates as latitude/longitude and directs the pilot over a pre-programmed survey grid.

The operator was responsible for the monitoring of the system integrity. He also maintained a detailed flight log during the survey, tracking the times of the flight as well as any unusual geophysical or topographic feature.

On return of the aircrew to the base camp the survey data was transferred from a compact flash card (PCMCIA) to the data processing computer.

2.4. Aircraft and Equipment

2.4.1. Survey Aircraft

An Astar B2 helicopter, registration C-GTNU - owned and operated by TransNorth Helicopters Ltd. was used for the survey. Installation of the geophysical and ancillary equipment was carried out by Geotech Ltd.

2.4.2. Electromagnetic System

The electromagnetic system was a Geotech Versatile Time Domain EM (VTEM) system. The layout of the configuration used for this survey is as indicated in Figure 1 below.

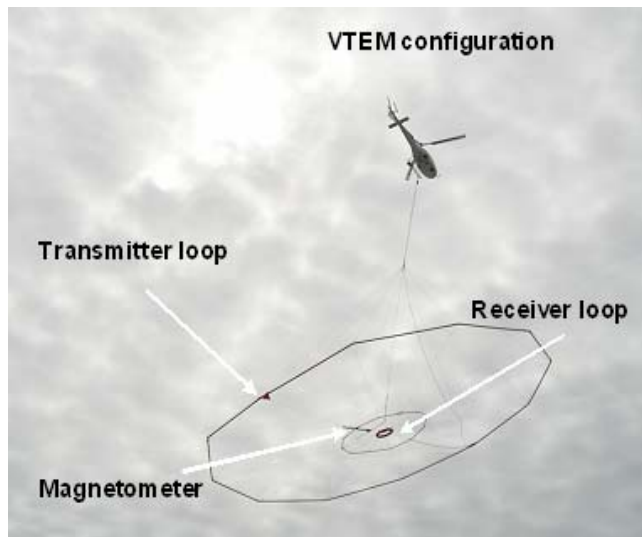


Figure 1 - VTEM Configuration

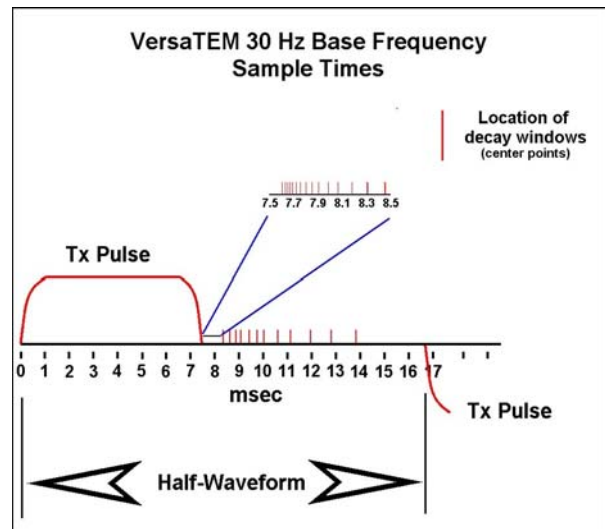


Figure 2 - VTEM sample times

Receiver and transmitter coils are concentric and Z-direction oriented.

The receiver decay recording scheme is shown diagrammatically in Figure 2.

Twenty-six measurement gates were used in the range from 130 μ s to 7540 μ s, as shown in the following table.

VTEM Decay Sampling scheme (Microseconds)			
Time gate	Start	End	Width
130	120	140	20
150	140	160	20
170	160	180	20
190	180	205	25
220	205	240	35
260	240	280	40
300	280	325	45
350	325	380	55
410	380	445	65
480	445	525	80
570	525	625	100
680	625	745	120
810	745	885	140
960	885	1045	160
1130	1045	1235	190
1340	1235	1470	235
1600	1470	1750	280
1900	1750	2070	320
2240	2070	2450	380
2660	2450	2920	470
3180	2920	3480	560
3780	3480	4120	640
4460	4120	4880	760
5300	4880	5820	940
6340	5820	6860	1040
7540	6860	8220	1360

Table 3 - VTEM decay sampling scheme

Transmitter coil diameter was 26 metres, the number of turns was 4.
Transmitter pulse repetition rate was 30 Hz.
Peak current was 167 A.
Duty cycle was 37%.
Peak dipole moment was 355,000 NIA.

Receiver coil diameter was 1.2 metre, the number of turns was 100.
Receiver effective area was 113 m²
Wave form – trapezoid.
Recording sampling rate was 10 samples per second.

The EM bird was towed 35 m below the helicopter.

2.4.3. Airborne magnetometer

The magnetic sensor utilized for the survey was a Geometrics optically pumped cesium vapour magnetic field sensor, mounted in a separate bird towed at the same altitude as the EM sensor. The sensitivity of the magnetic sensor is 0.02 nanoTesla (nT) at a sampling interval of 0.1 seconds. The magnetometer sends the measured magnetic field strength as nanoTeslas to the data acquisition system via the RS-232 port.

2.4.4. Ancillary Systems

2.4.4.1. Radar Altimeter

A Terra TRA 3000/TRI 40 radar altimeter was used to record terrain clearance. The antenna was mounted beneath the bubble of the helicopter cockpit.

2.4.4.2. GPS Navigation System

The navigation system used was a Geotech PC based navigation system utilizing a NovAtel's WAAS enable OEM4-G2-3151W GPS receiver, Geotech navigate software, a full screen display with controls in front of the pilot to direct the flight and an NovAtel GPS antenna mounted on the helicopter tail.

The co-ordinates of the block were set-up prior to the survey and the information was fed into the airborne navigation system.

2.4.4.3. Digital Acquisition System

A Geotech data acquisition system recorded the digital survey data on an internal compact flash card. Data is displayed on an LCD screen as traces to allow the operator to monitor the integrity of the system. Contents and update rates were as follows:

DATA TYPE	SAMPLING
TDEM	0.1 sec
Magnetometer	0.1 sec
GPS Position	0.2 sec
Radar Altimeter	0.2 sec

Table 4 - Sampling Rates

2.4.5. Base Station

A combine magnetometer/GPS base station was utilized on this project. A Geometrics Cesium vapour magnetometer was used as a magnetic sensor with a bench sensitivity of 0.002 nT. The base station records the magnetic field together with the GPS time at 1 Hz on a base station computer. The base station magnetometer sensor was installed away from electric transmission lines and moving ferrous objects such as motor vehicles. The magnetometer base station's data was backed-up to the data processing computer at the end of each survey day.

3. PERSONNEL

The following Geotech Ltd. personnel were involved in the project.

Field

Crew chiefs / Operators: Graeme Lille, Calin Cosma, Brad Marsh

The survey pilot and the mechanic engineer were employed directly by the helicopter operator – TransNorth Helicopters.

Pilots: Stephen Soubliere,
Mechanical Engineer: Margo Hager

Office

Data Processing: Harish Kumar
Data Processing / Reporting: George Lev
Data Technician: Maria Jagodkin

Final data processing at the office of Geotech Limited in Aurora, Ontario was carried out under the supervision of Andrei Bagrianski, Data Processing Manager.

Overall management of the survey was carried out from the Aurora office of Geotech Ltd. by Edward Morrison, President.

4. DATA PROCESSING AND PRESENTATION

4.1. *Flight Path*

The flight path, recorded by the acquisition program as WGS 84 latitude/longitude, was converted into the UTM coordinate system in Oasis Montaj.

The flight path was drawn using linear interpolation between x, y positions from the navigation system. Positions are updated every second and expressed as UTM eastings (x) and UTM northings (y).

4.2. *Electromagnetic Data*

A three stage digital filtering process was used to reject major spheric events and to reduce system noise. Local spheric activity can produce sharp, large amplitude events that cannot be removed by conventional filtering procedures. Smoothing or stacking will reduce their amplitude but leave a broader residual response that can be confused with geological phenomena. To avoid this possibility, a computer algorithm searches out and rejects the major spheric events. The filter used was a 16 point non-linear filter.

The signal to noise ratio was further improved by the application of a low pass linear digital filter. This filter has zero phase shift which prevents any lag or peak displacement from occurring, and it suppresses only variations with a wavelength less than about 1 second or 20 metres. This filter is a symmetrical 1 sec. linear filter.

The results are presented as stacked profiles of EM voltages for the gate times, in logarithmic scale.

Generalized modeling results of the VTEM system, written by Geophysicist Roger Barlow, are shown in Appendix C.

The VTEM output voltage of the receiver coil is shown in Appendix D.

4.3. Magnetic Data

The processing of the magnetic data involved the correction for diurnal variations by using the digitally recorded ground base station magnetic values. The base station magnetometer data was edited and merged into the Geosoft GDB database on a daily basis. The aeromagnetic data was corrected for diurnal variations by subtracting the observed magnetic base station deviations.

Tie line levelling was carried out by adjusting intersection points along the traverse lines. A micro-levelling procedure was then applied. This technique is designed to remove persistent low-amplitude components of flight-line noise remaining after tie line levelling.

The corrected magnetic data was interpolated between survey lines using a random point gridding method to yield x-y grid values for a standard grid cell size of approximately 0.2 cm. at the mapping scale. The Minimum Curvature algorithm was used to interpolate values onto a rectangular regular spaced grid.

5. DELIVERABLES

5.1. *Survey Report*

The survey report describes the data acquisition, processing, and final presentation of the survey results.

The survey report is provided in two paper copies and digitally in WORD format.

5.2. *Maps*

Final maps were produced at a scale of 1:20,000 for the **Simpson Property**. The coordinate/projection system used was the WGS84, UTM zone 9 north. All maps show the flight path trace. Latitude and longitude are also noted on maps.

The following maps are presented to Strategic Metals Ltd. on paper as results of the helicopter-borne geophysical survey carried out over the **Simpson Property**.

- Total Magnetic Field contours and colour images
- Logarithmic scale VTEM profiles, Time Gates 0.22 - 6.34 ms

5.3. *Gridded Data*

Total Magnetic Field grid is provided to Strategic Metals Ltd. in Geosoft GRD format. Grid cell size was adjusted to suit the parameters of the individual block.

For traverse line spacing of 200 metres, 20 m grid cell size was used.

5.4. Digital Data

There are three (3) main directories,

Data contains a database, grid and maps, as described below.

Report contains a copy of the report in WORD format and appendices in PDF format.

VTEM_fp_GoogleEarth contains kmz file containing flightpath of the Simpson Property.

Free version of Google Earth software can be downloaded from,
<http://earth.google.com/download-earth.html>

- Database in Geosoft GDB format, containing the following channels:

X:	X positional data (metres – WGS84, utm zone 9 north)
Y:	Y positional data (metres – WGS84, utm zone 9 north)
Z:	GPS antenna elevation (metres - ASL) (on the tail of the helicopter)
Gtime1:	GPS time (seconds of the day)
Radar:	Helicopter terrain clearance from radar altimeter (metres - AGL)
DEM:	Digital elevation model (metres)
Mag1:	Raw Total Magnetic field data (nT)
Basemag:	Base station magnetic data (nT)
Mag2:	Total Magnetic field base station corrected data (nT)
Mag3:	Levelled Total Magnetic field data (nT)
C130f:	Raw 130 microsecond time channel (pV/A/m^4)
C150f:	Raw 150 microsecond time channel (pV/A/m^4)
C170f:	Raw 170 microsecond time channel (pV/A/m^4)
C190f:	Raw 190 microsecond time channel (pV/A/m^4)
C220f:	Raw 220 microsecond time channel (pV/A/m^4)
C260f:	Raw 260 microsecond time channel (pV/A/m^4)
C300f:	Raw 300 microsecond time channel (pV/A/m^4)
C350f:	Raw 350 microsecond time channel (pV/A/m^4)
C410f:	Raw 410 microsecond time channel (pV/A/m^4)
C480f:	Raw 480 microsecond time channel (pV/A/m^4)
C570f:	Raw 570 microsecond time channel (pV/A/m^4)
C680f:	Raw 680 microsecond time channel (pV/A/m^4)

C810f:	Raw 810 microsecond time channel (pV/A/m ⁴)
C960f:	Raw 960 microsecond time channel (pV/A/m ⁴)
C1130f:	Raw 1130 microsecond time channel (pV/A/m ⁴)
C1340f:	Raw 1340 microsecond time channel (pV/A/m ⁴)
C1600f:	Raw 1600 microsecond time channel (pV/A/m ⁴)
C1900f:	Raw 1900 microsecond time channel (pV/A/m ⁴)
C2240f:	Raw 2240 microsecond time channel (pV/A/m ⁴)
C2660f:	Raw 2660 microsecond time channel (pV/A/m ⁴)
C3180f:	Raw 3180 microsecond time channel (pV/A/m ⁴)
C3780f:	Raw 3780 microsecond time channel (pV/A/m ⁴)
C4460f:	Raw 4460 microsecond time channel (pV/A/m ⁴)
C5300f:	Raw 5300 microsecond time channel (pV/A/m ⁴)
C6340f:	Raw 6340 microsecond time channel (pV/A/m ⁴)
C7540f:	Raw 7540 microsecond time channel (pV/A/m ⁴)
PLinef:	Power line monitor (linear trend removed)

- Grids in Geosoft GRD format, as follow,

sim_magfin: Total Magnetic field (nT)

A Geosoft .GRD file has a .GI metadata file associated with it, containing grid projection information.

- Maps at 1:10,000 scale in Geosoft MAP format, as follow,

sim_magfin: Total Magnetic Field image and contours

sim_EM_LP: Logarithmic scale profiles, Time Gates 0.22 – 6.34 ms

- ASCII file VTEM_WaveForm.xyz in Geosoft format containing the following channel:

Volt: output voltage of the receiver coil
(volts, sampling rate 20 microseconds)

- A *readme.txt* file describing the content of digital data, as described above.

6. CONCLUSIONS

A versatile time domain electromagnetic helicopter-borne geophysical survey has been completed over 10 blocks located in the Yukon Territory, Canada, including **Simpson Property.**

Total survey line coverage is 2750.77 line kilometres, including 197 line-km. for the **Simpson Property.** The principal sensors included a Time Domain EM system and a magnetometer. Results have been presented as colour contour maps and stacked profiles.

Final data processing at the office of Geotech Limited in Aurora, Ontario was carried out under the supervision of Andrei Bagrianski, Data Processing Manager.

Respectfully submitted,

Marta Orta
on behalf of

George Lev
Geotech Limited
November 8, 2006

APPENDIX A

SURVEY BLOCK LOCATION MAP



APPENDIX B
SURVEY BLOCK COORDINATES

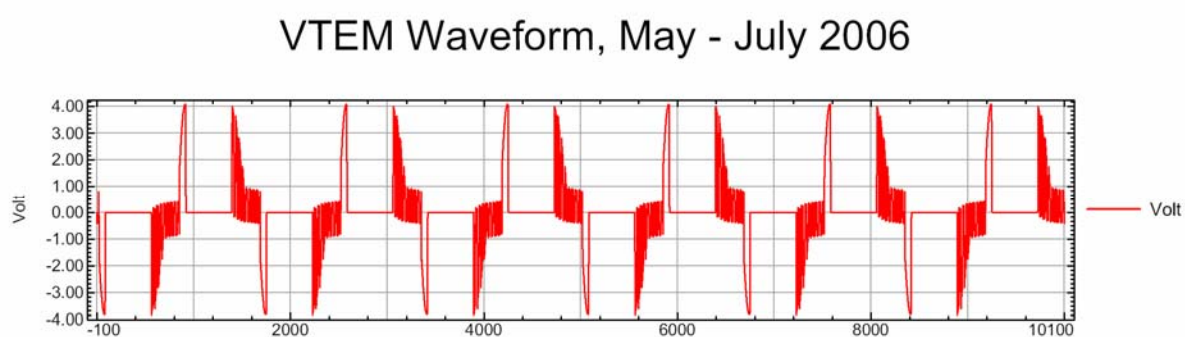
(WGS 84, UTM zone 9 N)

SIMPSON	
465347.0	6738922.0
471047.0	6736322.0
468747.0	6731422.0
463047.0	6734072.0

APPENDIX C

General Modeling Results of the VTEM Stysem

APPENDIX D
VTEM WAVE FORM



GENERALIZED MODELING RESULTS OF THE VTEM SYSTEM

Introduction

The VTEM system is based on a concentric or central loop design, whereby, the receiver is positioned at the centre of a 26.1 metres diameter transmitter loop that produces a dipole moment up to 625,000 NIA at peak current. The wave form is a bi-polar, modified square wave with a turn-on and turn-off at each end. With a base frequency of 30 Hz, the duration of each pulse is approximately 7.5 milliseconds followed by an off time where no primary field is present.

During turn-on and turn-off, a time varying field is produced (dB/dt) and an electro-motive force (emf) is created as a finite impulse response. A current ring around the transmitter loop moves outward and downward as time progresses. When conductive rocks and mineralization are encountered, a secondary field is created by mutual induction and measured by the receiver at the centre of the transmitter loop.

Measurements are made during the off-time, when only the secondary field (representing the conductive targets encountered in the ground) is present.

Efficient modeling of the results can be carried out on regularly shaped geometries, thus yielding close approximations to the parameters of the measured targets. The following is a description of a series of common models made for the purpose of promoting a general understanding of the measured results.

Variation of Plate Depth

Geometries represented by plates of different strike length, depth extent, dip, plunge and depth below surface can be varied with characteristic parameters like conductance of the target, conductance of the host and conductivity/thickness and thickness of the overburden layer.

Diagrammatic models for a vertical plate are shown in figures A and G at two different depths, all other parameters remaining constant. With this transmitter-receiver geometry, the classic **M** shaped response is generated. Figure A shows a plate where the top is near surface. Here, amplitudes of the dual peaks are higher and symmetrical with the zero centre positioned directly above the plate. Most important is the separation distance of the peaks. This distance is small when the plate is near surface and widens with a linear relationship as the plate (depth to top) increases. Figure G shows a much deeper plate where the separation distance of the peaks is much wider and the amplitudes of the channels have decreased.

Variation of Plate Dip

As the plate dips and departs from the vertical position, the peaks become asymmetrical. Figure B shows a near surface plate dipping 80°. Note that the direction of dip is toward the high shoulder of the response and the top of the plate remains under the centre minimum.

As the dip increases, the aspect ratio (Min/Max) decreases and this aspect ratio can be used as an empirical guide to dip angles from near 90° to about 30°. The method is not sensitive enough where dips are less than about 30°. Figure E shows a plate dipping 45° and, at this angle, the

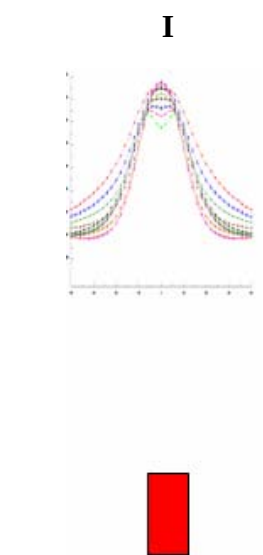
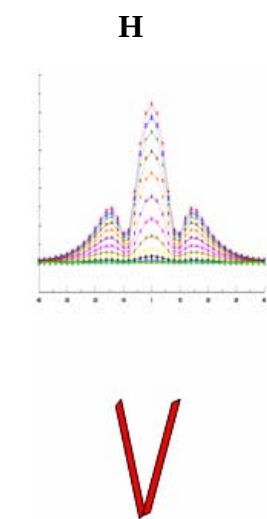
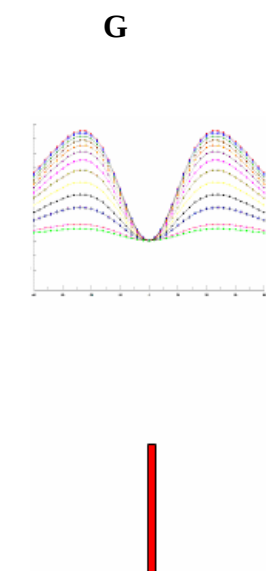
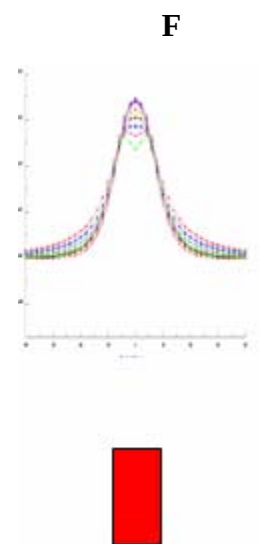
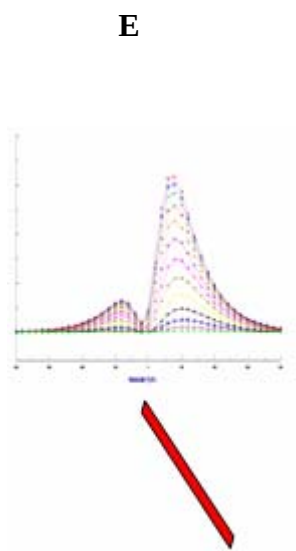
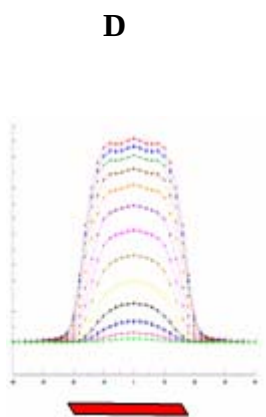
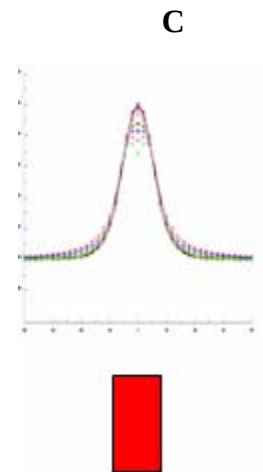
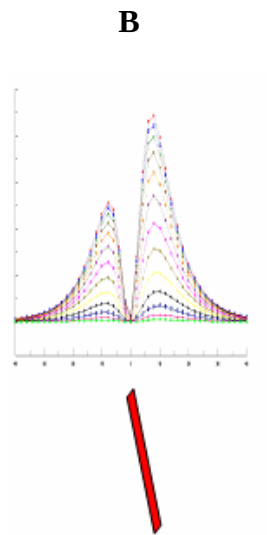
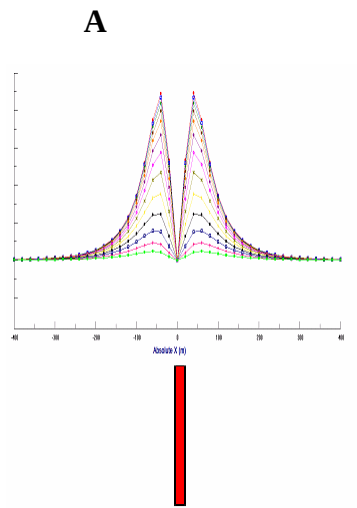
minimum shoulder starts to vanish. In Figure D, a flat lying plate is shown, relatively near surface. Note that the twin peak anomaly has been replaced by a symmetrical shape with large, bell shaped, channel amplitudes which decay relative to the conductance of the plate.

Figure H shows a special case where two plates are positioned to represent a synclinal structure. Note that the main characteristic to remember is the centre amplitudes are higher (approximately double) compared to the high shoulder of a single plate. This model is very representative of tightly folded formations where the conductors were once flat lying.

Variation of Prism Depth

Finally, with prism models, another algorithm is required to represent current on the plate. A plate model is considered to be infinitely thin with respect to thickness and incapable of representing the current in the thickness dimension. A prism model is constructed to deal with this problem, thereby, representing the thickness of the body more accurately.

Figures C, F and I show the same prism at increasing depths. Aside from an expected decrease in amplitude, the side lobes of the anomaly show a widening with deeper prism depths of the bell shaped early time channels.



General Modeling Concepts

A set of models has been produced for the Geotech VTEM® system with explanation notes (see models A to I above). The reader is encouraged to review these models, so as to get a general understanding of the responses as they apply to survey results. While these models do not begin to cover all possibilities, they give a general perspective on the simple and most commonly encountered anomalies.

When producing these models, a few key points were observed and are worth noting as follows:

- For near vertical and vertical plate models, the top of the conductor is always located directly under the centre low point between the two shoulders in the classic **M** shaped response.
- As the plate is positioned at an increasing depth to the top, the shoulders of the **M** shaped response, have a greater separation distance.
- When faced with choosing between a flat lying plate and a prism model to represent the target (broad response) some ambiguity is present and caution should be exercised.
- With the concentric loop system and Z-component receiver coil, virtually all types of conductors and most geometries are most always well coupled and a response is generated (see model H). Only concentric loop systems can map this type of target.

The modelling program used to generate the responses was prepared by PetRos Eikon Inc. and is one of a very few that can model a wide range of targets in a conductive half space.

General Interpretation Principals

Magnetics

The total magnetic intensity responses reflect major changes in the magnetite and/or other magnetic minerals content in the underlying rocks and unconsolidated overburden. Precambrian rocks have often been subjected to intense heat and pressure during structural and metamorphic events in their history. Original signatures imprinted on these rocks at the time of formation have, in most cases, been modified, resulting in low magnetic susceptibility values.

The amplitude of magnetic anomalies, relative to the regional background, helps to assist in identifying specific magnetic and non-magnetic rock units (and conductors) related to, for example, mafic flows, mafic to ultramafic intrusives, felsic intrusives, felsic volcanics and/or sediments etc. Obviously, several geological sources can produce the same magnetic response. These ambiguities can be reduced considerably if basic geological information on the area is available to the geophysical interpreter.

In addition to simple amplitude variations, the shape of the response expressed in the wave length and the symmetry or asymmetry, is used to estimate the depth, geometric parameters and magnetization of the anomaly. For example, long narrow magnetic linears usually reflect mafic flows or intrusive dyke features. Large areas with complex magnetic patterns may be produced by intrusive bodies with significant magnetization, flat lying magnetic sills or sedimentary iron formation. Local isolated circular magnetic patterns often represent plug-like igneous intrusives such as kimberlites, pegmatites or volcanic vent areas.

Because the total magnetic intensity (TMI) responses may represent two or more closely spaced bodies within a response, the second derivative of the TMI response may be helpful for distinguishing these complexities. The second derivative is most useful in mapping near surface linears and other subtle magnetic structures that are partially masked by nearby higher amplitude magnetic features. The broad zones of higher magnetic amplitude, however, are severely attenuated in the vertical derivative results. These higher amplitude zones reflect rock units having strong magnetic susceptibility signatures. For this reason, both the TMI and the second derivative maps should be evaluated together.

Theoretically, the second derivative, zero contour or colour delineates the contacts or limits of large sources with near vertical dip and shallow depth to the top. The vertical gradient map also aids in determining contact zones between rocks with a susceptibility contrast, however, different, more complicated rules of thumb apply.

Concentric Loop EM Systems

Concentric systems with horizontal transmitter and receiver antennae produce much larger responses for flat lying conductors as contrasted with vertical plate-like conductors. The amount of current developing on the flat upper surface of targets having a substantial area in this dimension, are the direct result of the effective coupling angle, between the primary magnetic field and the flat surface area. One therefore, must not compare the amplitude/conductance of responses generated from flat lying bodies with those derived from near vertical plates; their ratios will be quite different for similar conductances.

Determining dip angle is very accurate for plates with dip angles greater than 30°. For angles less than 30° to 0°, the sensitivity is low and dips can not be distinguished accurately in the presence of normal survey noise levels.

A plate like body that has near vertical position will display a two shoulder, classic **M** shaped response with a distinctive separation distance between peaks for a given depth to top.

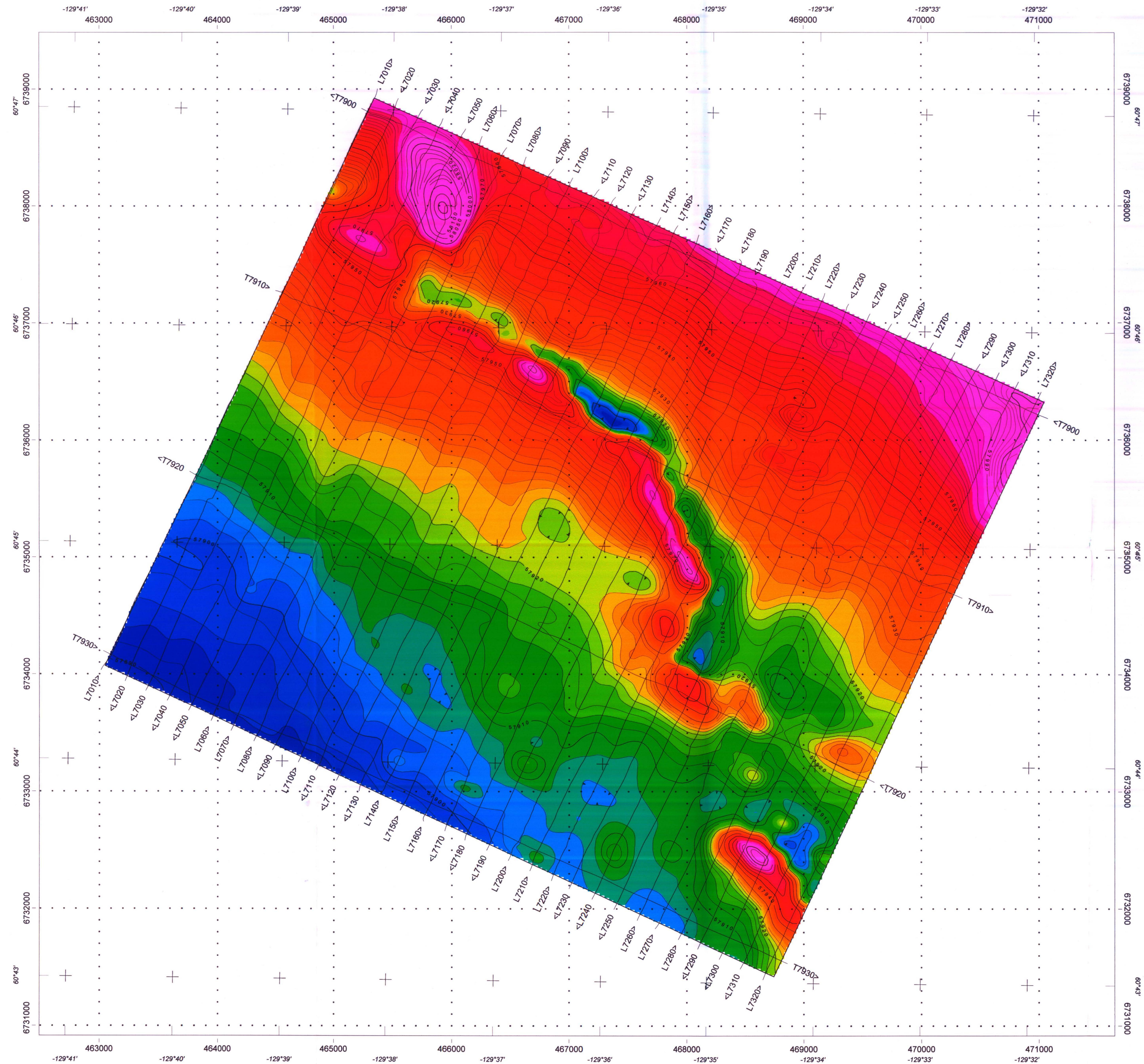
It is sometimes difficult to distinguish between responses associated with the edge effects of flat lying conductors and poorly conductive bedrock conductors. Poorly conductive bedrock conductors having low dip angles will also exhibit responses that may be interpreted as surficial overburden conductors. In some situations, the conductive response has line to line continuity and some magnetic correlation providing possible evidence that the response is related to an actual bedrock source.

The EM interpretation process used, places considerable emphasis on determining an understanding of the general conductive patterns in the area of interest. Each area has different characteristics and these can effectively guide the detailed process used.

The first stage is to determine which time gates are most descriptive of the overall conductance patterns. Maps of the time gates that represent the range of responses can be very informative.

Next, stacking the relevant channels as profiles on the flight path together with the second vertical derivative of the TMI is very helpful in revealing correlations between the EM and Magnetics.

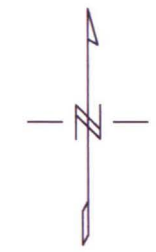
Next, key lines can be profiled as single lines to emphasize specific characteristics of a conductor or the relationship of one conductor to another on the same line. Resistivity Depth sections can be constructed to show the relationship of conductive overburden or conductive bedrock with the conductive anomaly.



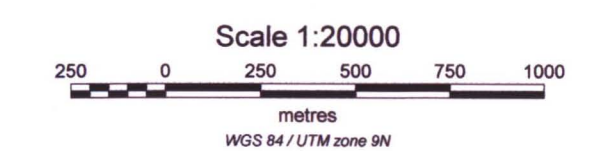
SURVEY SPECIFICATIONS:
Survey date: May - July 2006
Traverse Line Spacing: 200 metres
Traverse line direction: N25°E
Nominal terrain clearance: 80 metres
Nominal EM bird height: 45 metres
Nominal Magnetic bird height: 45 metres
Aircraft: Astar B2 helicopter, Registration: C-GTNU

INSTRUMENTATION
Data acquisition: Geotech Acquisition System
Electromagnetics: VTEM system
Base frequency: 30Hz
Transmitter Loop diameter: 26 metres
Dipole Moment 355,000 N/A
Transmitter Wave Form: Trapezoid
Transmitter Pulse Width: 7.5 ms
Magnetometer: Geometrics G-823A cesium vapour
Resolution: 0.02 nT at 10 samples/sec

NAVIGATION:
Equipment: NovAtel GPS card
Radar altimeter: Terra TRA3000/TRI-30



Contour intervals:
2 nT
10 nT
50 nT

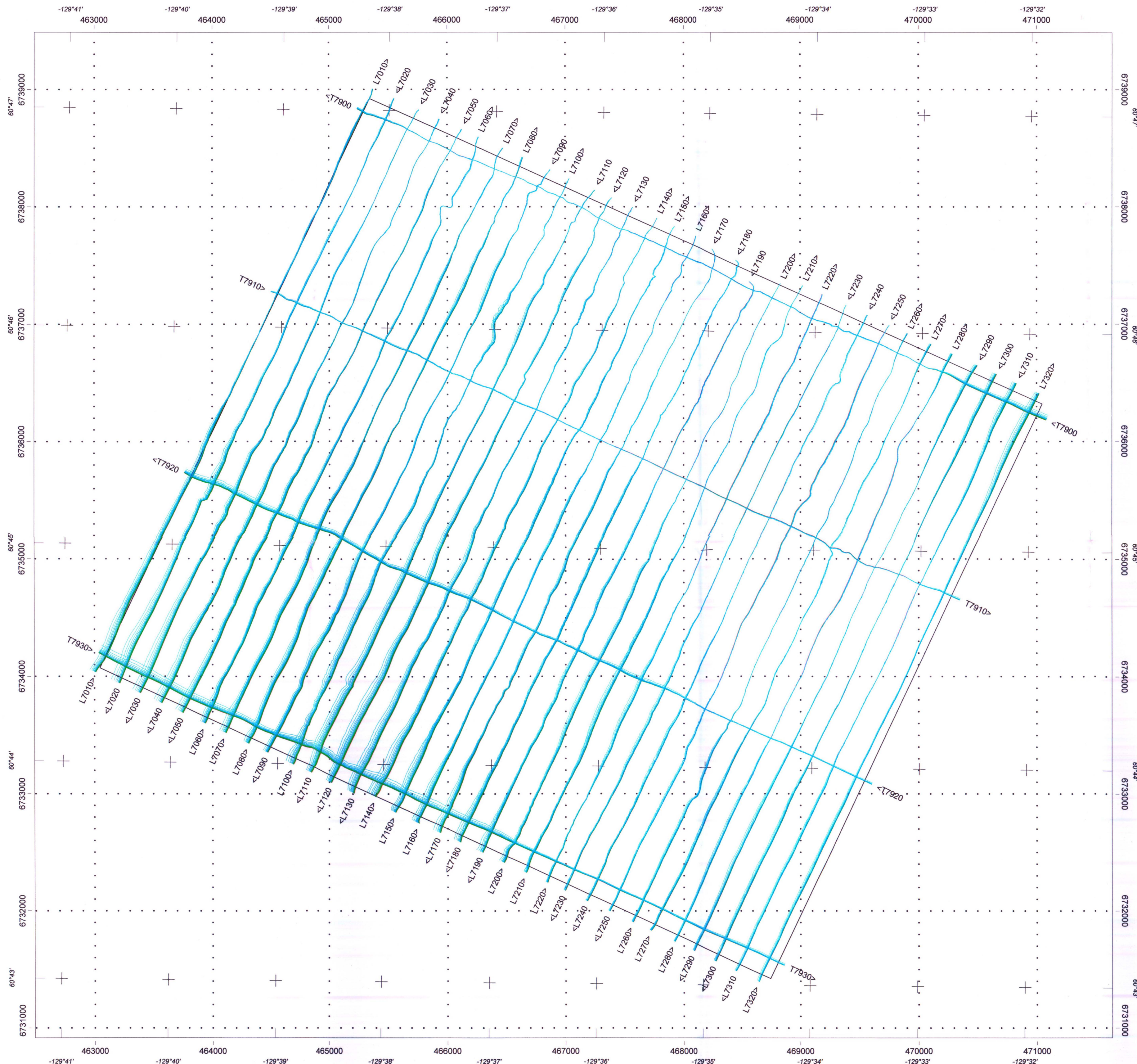


**Strategic Metals Ltd.
Simpson Property
Yukon Territory**

**Geotech VTEM System
Total Magnetic Field Map**

Flown and processed by Geotech Ltd.
30 Industrial Parkway South
Aurora, Ontario, Canada
www.geotechairborne.com

October 2006



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Resolution: 0.02 nT at 10 samples/sec

NAVIGATION:
Equipment: NovAtel GPS card
Radar altimeter: Terra TRA3000/TRI-30

Profiles scale 1 mm = 0.05 pV/A/m⁴
(Linear between +/- 0.2 pV/A/m⁴
logarithmic above 0.2 pV/A/m⁴)

0.22 ms
0.26 ms
0.30 ms
0.35 ms
0.41 ms
0.48 ms
0.57 ms
0.68 ms
0.81 ms
0.96 ms
1.13 ms
1.34 ms
1.60 ms
1.90 ms
2.24 ms
2.66 ms
3.18 ms
3.78 ms
4.46 ms
5.30 ms
6.34 ms

Scale 1:20000
metres
WGS 84 / UTM zone 9N

Strategic Metals Ltd.
Simpson Property
Yukon Territory

Geotech VTEM System
Logarithmic scale VTEM Profiles
Time Gates 0.22 - 6.34 ms

Flown and processed by Geotech Ltd.
30 Industrial Parkway South,
Aurora, Ontario, Canada L4G 3W2
www.geotechairborne.com

October 2006