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GEOPEKO
 A DIVISION OF PEKO-WALLSEND OPERATIONS LIMITED

 ANNUAL REPORT - E.L. 24/73

 DIAL RANGE
 1981 - 1982 FIELD SEASON
82-1875(1) P.A. WILSON
 DEVONPORT
 SEPTEMBER, 1982

ORIGINAL

AMG REFERENCE POINTS ADDED

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PROGRESS REPORT ON E.L. 24/73 FOR 1981/82 SEASON

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1. INTRODUCTION

E.L. 24/73 covers an area of 1068 km² and is located to the south of Penguin in North West Tasmania. The licence extends over the main part of the Dial Range trough, an elongate basin which was the site of deposition of a thick sequence of sediments and volcanics in the Cambrian-Ordovician periods.

Previous exploration in the area by Geopeko and Duval Mining has been directed towards the tin and copper potential of the clastic volcano-sedimentary sequences of the basal Cambrian known as the Cateena Group. Most of this work has been concentrated in the north-central part of the E.L., known as the Dial Mine Grid (fig 1). These detailed investigations have resulted in the intersection of anomalous tin and copper values in drill core corresponding to an interbedded sequence of breccias, sandstones and siltstones (Large, 1981).

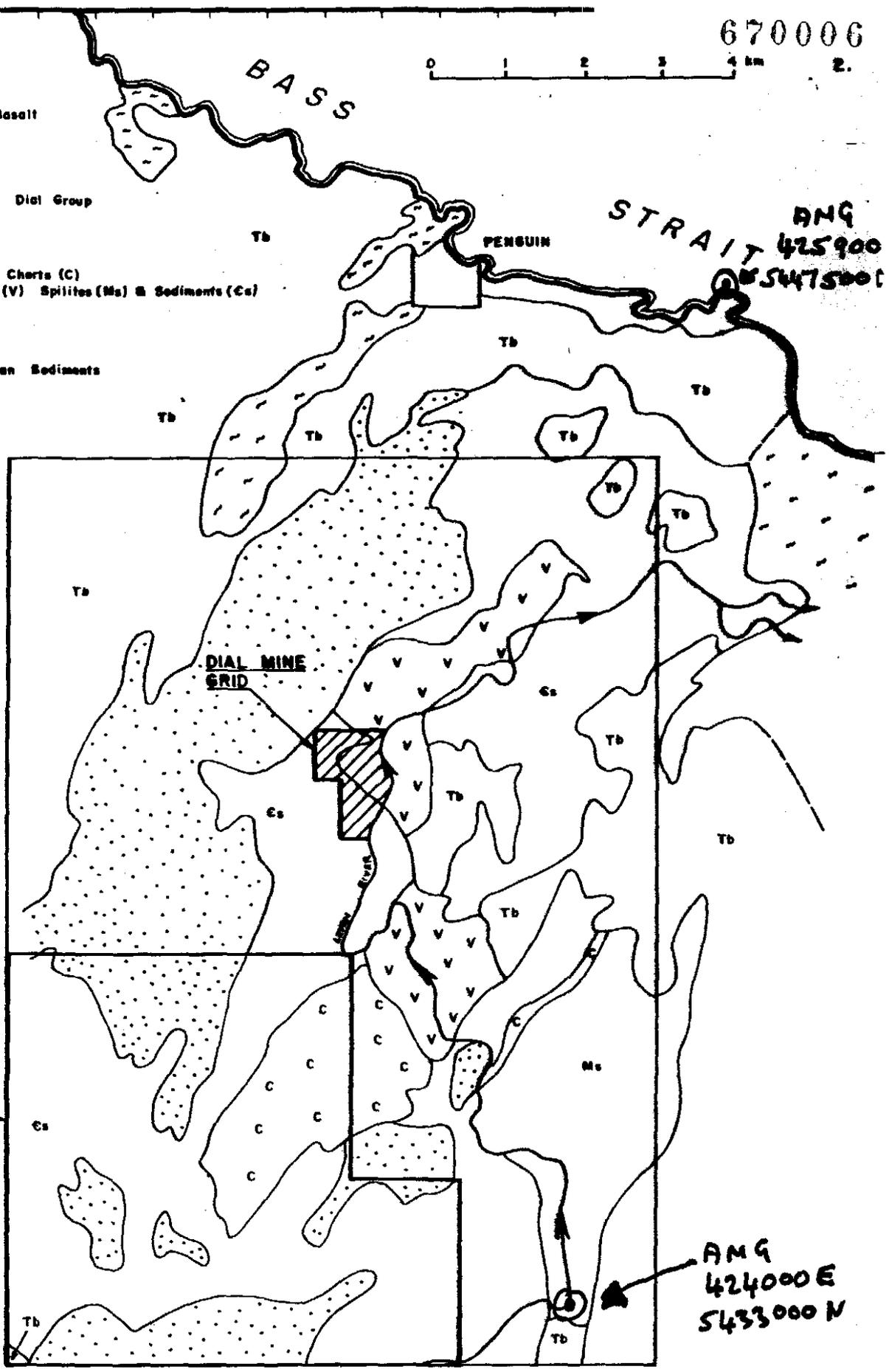
This report details the exploration which was completed between July and September 1981 and which included:

1. A regional stream sediment sampling and geological mapping program over the south west quadrant of the E.L.
2. Further investigations on the Dial Mine Grid namely, detailed soil sampling and mapping in the environs of DDH 10.
3. Gridding, soil geochemistry and IP in the area immediately north of the Dial Mine Grid in the area referred to as the M.I.P. grid.

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-  Tertiary Basalt
-  Ordovician Dial Group
-  Cambrian Cherts (C)
Volcanics (V) Spilites (Ms) & Sediments (Cs)
-  Precambrian Sediments



**AREA COVERED BY
1981-82
DRAINAGE
SAMPLING**

AMG
424000 E
5433000 N

AMG REFERENCE POINTS ADDED

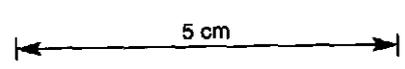


FIG. 1

	GEOPEKO	
	A DIVISION OF PEKO-WALLBEND OPERATIONS LTD	
	DIAL RANGE	
	LOCATION MAP WITH REGIONAL GEOLOGY AFTER BURNS (1964)	
DATE 2/8/82	GEOL P.A.W	
DWN R. Toog	CHKD <i>JS</i>	

2. SUMMARY AND CONCLUSIONS

1. The regional geological mapping in the south-western part of the E.L. failed to locate outcrop of the Mt. Housetop granite or a contact aureole. In this area the Cambrian sediments consist of a thick flysch like assemblage of sandstones and shales showing evidence of deposition by turbidity currents.
2. Results from the panned concentrate drainage sampling program effectively downgrade the tin potential of the S.W. portion of the E.L. However, a number of Pb and Cu, Pb, Zn anomalies related to the Barrington cherts were defined by the -80 mesh stream sediment fractions.
3. Coarse clastic lithologies which could correlate with the Lower Cateena Group were recognised adjacent to a Sn drainage anomaly (1980 sampling program) north of Clarke's Bridge, some 6km south of the Dial Mine area.
4. Close spaced soil sampling on a 300m² grid around DDH 10 defined a linear Cu anomaly and broader Sn anomaly which coincide with the subsurface intersections. Highly anomalous arsenic values were recorded in both soil and re-analysed core and correlate with the tin geochemistry. Petrographic examination of core from early drill holes (2 and 3) shows the extent of tourmalinization in the breccias.
5. The M.I.P. zone north of the Dial Mine Grid gave a good IP response which extends and improves for 400m along strike. The absence of soil geochemistry on the grid is attributed to the Ordovician cover.

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3. RECOMMENDATIONS

1. Geological mapping, rock chip sampling to explain the base metal anomalies in Adit Creek and the tributary of Walloa Creek.
2. Reconnaissance gridding and soil sampling over the area north of Clarke's Bridge containing possible correlates of the Lower Cateena Group.
3. Completion of the IP survey and magnetics on the M.I.P. grid and testing the best target with a shallow drill hole.
4. Costeaming of geochemical anomalies and selected 'geological' contacts on the Dial Mine Grid for grade assessment and to clarify the field relations and genesis of the different breccias horizons.
5. Drill a deep drill hole to intersect the DDH 10 stratigraphy below the oxidation base.
6. Detailed mapping, rock chip sampling and panning in Stanton and Revels Creeks to locate the upper cut off of the Sn anomaly and for geological information in fresh country rocks.

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4. REGIONAL EVALUATION OF THE SOUTH-WESTERN AREA4.1 Introduction

A program of stream sediment sampling, rock chip sampling and regional geological mapping was completed over the southern portion of the E.L. The primary purpose of the exploration was to assess the potential of this area for replacement or stockwork Sn/W mineralization associated with the outcrop of the Devonian Mt Housetop granite. According to the mapping by Burns (1964) the granite outcrops in the south western extremity of the exploration licence.

The stream sediment survey encompassed an area of 30sq km of rugged, thickly forested and well incised terrain. Samples were collected at approximately 400m intervals along the main drainage systems resulting in an average density of 4-5 samples per sq km. Two samples were collected at each site, a panned concentrate sample and a conventional stream sediment sample. The panning procedure was systemised so a constant volume of material (1 pan = c4kg) was collected at each site and panned down to a constant volume (c 100gm) giving a concentration factor of about 40. Since the creeks were sampled in winter they were high with water and the more favourable trap sites were not accessible.

Panned concentrate samples were dried at the office and then examined under a binocular microscope to identify gold and cassiterite. Each sample was also scanned with a UV light. The two samples were analysed for the following elements:

Panned concentrates	-	Sn, W, Au, Cu, Pb, Zn, Fe, Mn
-80 mesh	-	Cu, Pb, Zn, Mn, Fe, Ag, Mo, Bi, Sn, W

The geological mapping program utilised the outcrops in the main creek systems. Emphasis was placed on the recognition of lithologies, especially carbonates, which could be suitable host rocks for tin mineralization.

4.2 Regional Geology

The geology of the Dial Range trough is detailed in the Geological Survey report on the Devonport Sheet (Burns, 1964) and has been summarised by Large and Herrmann (1980) and Large (1981). This report describes the geology of the southern part of the E.L., extending from the Dial Mine Grid to Gunns Plains and bounded by the Leven River to the east (fig 1).

The area has a maximum relief of 350m and is well incised by a radial drainage system. Vegetation cover is thick and renders access difficult. This factor combined with the deep surface weathering in areas of positive relief, restricts the better outcrops to the creeks and bulldozed forestry tracks.

The Cambro-Ordovician rocks of the Dial Range were deposited in an elongate N-S trending, linear trough between the Forth and Rocky Cap Geanticlines. Burns (1964) has subdivided the succession in the Dial Trough into the following lithostratigraphic units:

	Thickness (m)
Dial Group	
Jukesian Unconformity	
Beecraft Megabreccia	170
Radford's Creek Group	300
Motton Spillite	0 - 500
Barrington Chert	80 - 900
Hardstaff Unconformity	
Cateena Group	> 1000
Lobster Creek Volcanics	> 300

Lobster Creek Volcanics

This unit outcrops in the northern part of the area studied and extends from the Dial Mine Grid 5km south to McKenna Creek where it is unconformably overlain by the Barrington chert. The Lobster Creek volcanic is typically a massive, homogeneous igneous rock which has been variously described as syenite (Twelvetrees, 1903) keratophyre (Burns, 1964) and dacite (Large, 1981).

Where examined, the rock weathers to a rustic-orange or grey-brown colour and commonly contains 1-5 vol% chlorite or biotite 'clots' after phenocrystic hornblende. The groundmass is mottled, fine-grained and weakly sericitised. Magnetite was noted as an important accessory in outcrops by the Leven River on the Dial Mine Grid. In thin section the rock displays a porphyritic texture. Euhedral, 4-5mm long, partially sericitised zoned plagioclase (albite-oligoclase?) crystals occur in a granular groundmass of quartz and feldspar. Green chlorite pseudomorphs after hornblende and pyrite cubes form the only mafic minerals. The rock is probably an andesite or dacite in composition.

The Cateena Group

Burn's defines the Cateena Group as the group of mudstones, sandstones, conglomerates and volcanic rocks which disconformably overlie the Lobster Creek Volcanics and are unconformably overlain by the Barrington chert. Burns has divided the Cateena Group into 6 lithostratigraphic units but only the lower members are represented in the Dial Range E.L.

For simplicity the writer has divided the Cateena Group into two principal units:-

Upper	-	Hardstaff Creek Formation
Lower	-	Stanton Creek Formation

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The lower members of the Cateena Group outcrop immediately west of the Lobster Creek Volcanics and have been mapped in a continuous belt from Revells Creek (419500E, 5439300MN) to the mouth of Hardstaff Creek (AMG 419500ME, 5437000MN). They consist of a varied sequence of rudaceous and arenaceous sediments which include coarse polymictic breccias, grits, sandstones and siltstones. An overall upwards fining of the sequence is apparent on both a macro and hand specimen scale.

The basal members are typified by the rocks exposed on the Dial Mine Grid where deeply weathered ferruginous breccias and fresh chert breccias are interbedded with siltstones and mudstones. A fresher sequence of lithologies are exposed in the creeks which drain the grid. Here pyritic breccias and blue siltstones are visible.

Similar lithologies were recognised north of Clarke's Bridge on the Leven River (423200mE, 5433000mN) where massive chert breccias outcrop in the river bank and boulders of 'ferruginous' breccia occur on the hill slopes. Narrow bands of pyritic chert in weathered grits and clays were mapped 2km north of the bridge. This sequence has been tentatively included in the Cateena Group by the writer.

An arbitrary top to the Lower Cateena Group is taken where the coarse sediment breccias disappear and a finer-grained sequence of interbedded siltstones, brown mudstones and thin sandstones predominate. This sequence is well exposed along Hardstaff Creek and in the forestry track from the creek to Mt Duncan. Here 5-50cm thick ferruginous sandstone beds are interbedded with siltstones and display grading and cross bedding structures.

Numerous volcanic units have been observed in the Cateena Group. On the Dial Mine Grid rhyolitic crystal tuffs and lithic tuffs and andesites have been intersected in drill core (Graham, 1978). Burns describes a thick lava exposed in Hardstaff Creek which he correlates with the Kerrison Volcanics which outcrop west of Ulverstone. The unit is massive orange-brown porphyritic rock. Rounded quartz phenocrysts up to 2mm in diameter and comprising 5 vol% of the rock are rimmed by pink potassic feldspar. A chloritised ferromagnesian phenocrystic phase is also present. The groundmass is grey-green and fine grained in colour, consisting of granulose feldspar and quartz (KR 9319).

Barrington Chert

This unit occurs as a thick 'tongue' like outcrop in the central part of the area mapped, centred on Mt Lorymer. It is a well bedded, laminated blue-grey to white banded rock. The white variety is the dominant lithology and is a massive flinty rock composed almost entirely of cryptocrystalline silica (KR 7823). This is interbedded with a dark grey cherty mudstone (KR 7824). Alternation from massive white chert to the darker coloured impure cherts is on scales ranging from metres to cms.

The relationship between the chert and Cateena Group is problematical. Burns has mapped an unconformity (Hardstaff) at the base of the Barrington chert. Extensive float of black chert, with rosettes of pyrite (KR 9315), was observed near Hardstaff Creek but the contact was not exposed.

Motton Spilite

This unit was not observed in the area mapped and outcrops only on the eastern side of the Leven River where it conformably overlies the Barrington Chert.

Radford's Creek Group

Burns (1964) defines this group as a sequence of predominantly mudstones which conformably overlie the Barrington Chert. They were examined in Radford's Creek where they comprise of well bedded dark grey mudstones with thin interbeds of poorly sorted, 'dirty' siltstone. Disruption and brecciation of the mudstone laminae occurs when they are incorporated as fragments in the coarser graded siltstones (KR 7841). Elsewhere the bedding is remarkably planar with fine sandstone units grading into fine siltstones on a 1cm scale. (KR 7844). The sandy layers are well sorted and are composed of angular to subrounded quartz grains, polycrystalline 'quartzite' fragments and ilmenite (?) in a quartz-feldspathic-micaceous groundmass.

In Adit Creek a thick sequence of thinly bedded, grey-blue, fine-grained siltstones and brown sandstones were noted. The bottom of the sandy layers are irregular displaying ripple bases frequently scouring the underlying finer-grained siltstone. In thin section (KR 7820) the sandstones have well sorted angular grains of quartz, quartzite, sericitised feldspar and an opaque mineral (ilmenite?). Lithic fragments of grey mudstone up to 1cm across can be observed in some sandstones and locally comprise 20vol% of the rock.

The Walloa-Pine Creek river systems expose a thick sequence of uniformly massive sandstone and siltstone which show evidence of deposition by turbidity currents. The graded sandstone beds are commonly 0.5-1m in thickness and have scoured bases.

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These lithologies extend over the south-western portion of the exploration licence and are in contact with the Mt Housetop granite outside the E.L.

A massive volcanic unit was mapped over 400m in Radford's Creek and correlates with the Applebee Volcanics of Burns (1964). It is orange-brown massive porphyritic rock containing 2mm long zoned and twinned plagioclase phenocrysts in a fine-grained partially sericitised granular quartzo-feldspathic groundmass. Clots of green chlorite and pyrite pseudomorph on early ferromagnesian mineral (hornblende?). The contact between this unit and the Radford's Creek mudstone is not exposed.

Post Cambrian Lithologies

A major unconformity separates the Cambrian strata from the overlying predominantly siliceous conglomeratic and arenaceous units which comprise the Ordovician Dial Group. Burns has divided the Dial Group:

Gordon Limestone
Moina Sandstone
Duncan Conglomerate
Gnomon Mudstone

The Duncan Conglomerates forms the main peaks of Mts Riana, Duncan, Dial and Montgomery. The Gordon limestone is of economic interest because of its relationship with WO_3/Sn mineralization at Kara and Moina. However it does not outcrop within the E.L. and consequently the Ordovician lithologies were not examined in any detail. A thick sequence of well bedded calcareous siltstones were noted interbedded with the Duncan Conglomerate in Hardstaff Creek (KR 9320).

Structural Geology and Sedimentation

The clastic sedimentary sequences of the Dial Range, show evidence of deposition in a high energy environment. Slope instability due to periodic uplift of the Forth block resulted in slumping and breccia formation. The breccia fragments consist of pre-Cambrian detritus and fragments of penecontemporaneous Cambrian sediments. In the south-western area of the E.L. finer grained sequences show evidence of deposition by turbidity flow and this suggests different conditions and deposition towards the centre of the basin.

The rocks are folded along northerly-NNE striking axes, folds where visible are open to tight with upright axial planes. Cleavage is absent. In the southern part of the area mapped the major folds are very open with long 1-2km wavelengths and locally overturned bedding. 72 poles to bedding are plotted on a stereonet and show a poorly defined saddle with a point maximum indicating the dominant fold limb to have a NE strike with easterly dips. (Plan 1.)

4.3 Litho geochemistry

A suite of 71 rock samples was collected during the regional mapping and are broadly representative of the main lithologies in this part of the E.L. They were collected to assess the background trace element distribution to aid in the interpretation of results from the drainage geochemical sampling. Sample locations are shown in plan 1 and the analyses are presented in Appendix 1. Duplicate reference samples are stored at Geopeko in Devonport.

The best tin values of 4150ppm (KR 9334), 200ppm (KR 9335A) and 300ppm (KR 9335B) were recorded from outcrops in the vicinity of the Dial Mine Grid. Another anomalous value of 800ppm Sn is from a sample of hematitic breccia collected

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from an outcrop near Fogg's Flats 2-3km south of the Dial Mine Grid.

4.4. Walloa Creek Workings

Two old adits were located during the sampling of Walloa Creek (AMG 4188500mE 5433100mN). One adit is at creek level and extends for 37m normal to the stratigraphy and then turns at right angles and follows the strike for another 58m. Approximately 15m above the creek a second adit was discovered adjacent to an old shaft.

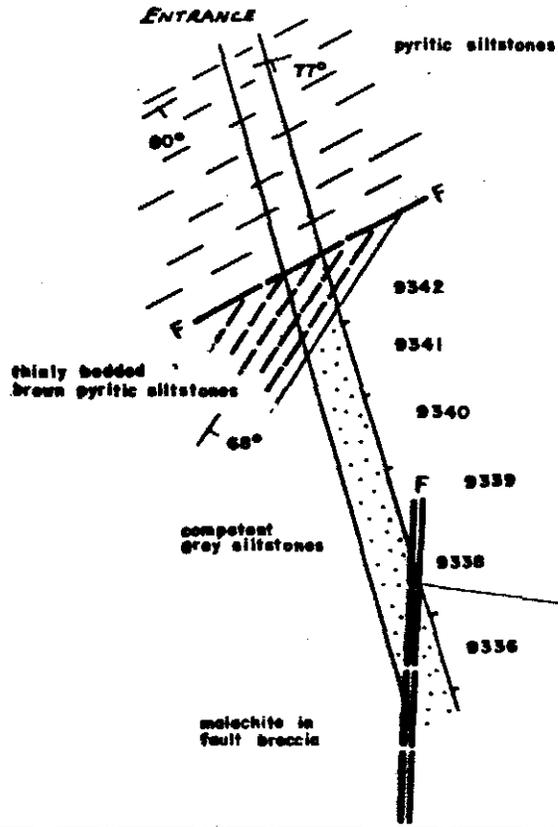
Encrustations of secondary copper minerals, namely malachite and chrysocolla were noted in massive silicified siltstones adjacent to the pit. The upper level was mapped and continuous chip samples collected over 1m intervals along the adit wall. The rocks consist of well bedded blue-grey to brown pyritic siltstones and massive, grey-coloured, siliceous siltstones. Bedding strikes NE (030-060°) and dips 70°SE. A breccia filled fault zone containing malachite was observed at the end of the adit.

A similar sequence of well bedded siltstones and mudstones was recognised in the lower adit and are faulted against a competent unit of massive grey brecciated cherty siltstones. There is no evidence of mineralization in the lower adit.

Analytical results from the 1m channel samples from the upper adit and grab samples from the lower adit are presented in Appendix 2. No further work is recommended.

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UPPER ADIT



LOWER ADIT

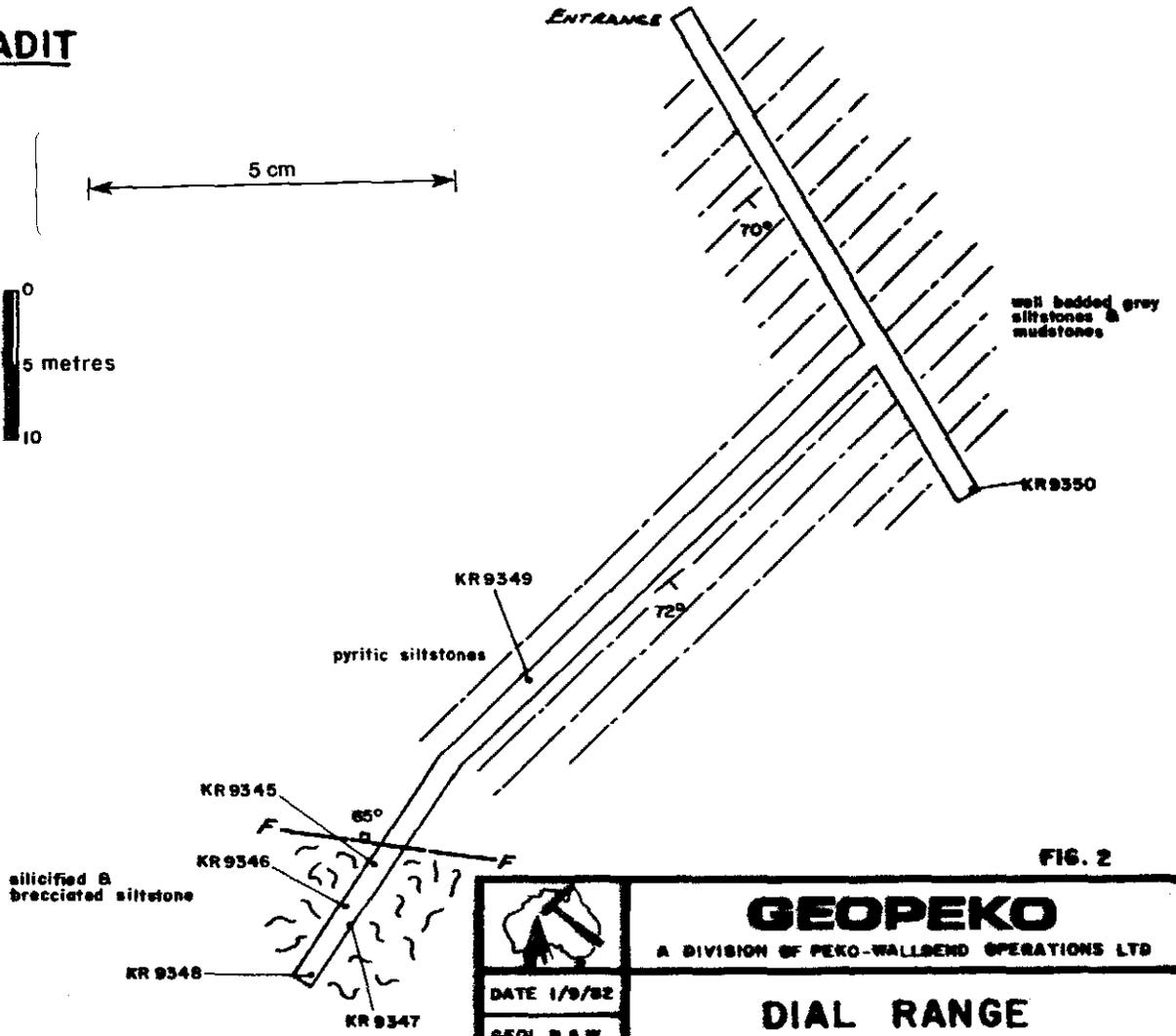
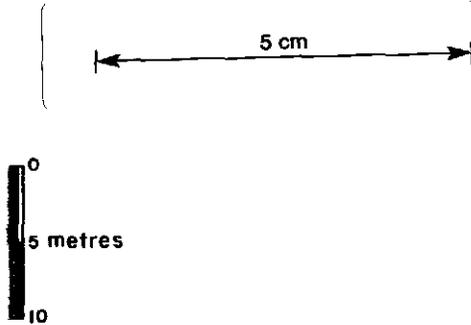


FIG. 2

	GEOPEKO
	A DIVISION OF PEKO-WALLSEND OPERATIONS LTD
	DIAL RANGE
	OLD WORKINGS IN WALLOA CREEK SHOWING GEOLOGY & SAMPLE LOCATIONS

DATE 1/9/82
GEOLOGIST P.A.W.
DRAWN BY R. TOG
CHECKED BY [initials]

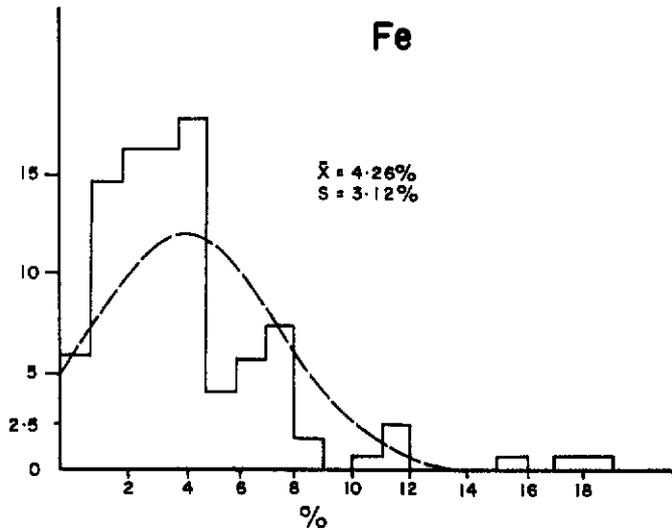
4.5. Drainage Geochemistry-80 Mesh Samples

Summary statistics for analytical values for the 119 stream sediment samples are tabulated below. They are presented as arithmetic and logarithmic frequency distributions (figs 3-4) and as the more conventional cumulative frequency distributions on log probability paper. (figs 5-6). Sample locations and results are plotted in plans 3-9.

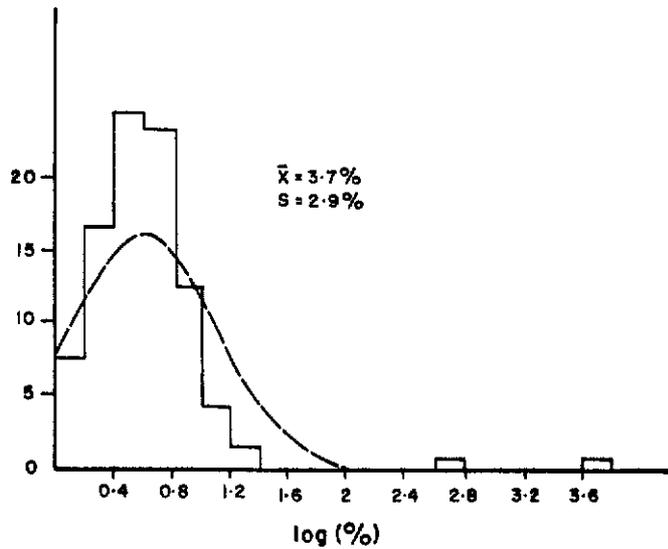
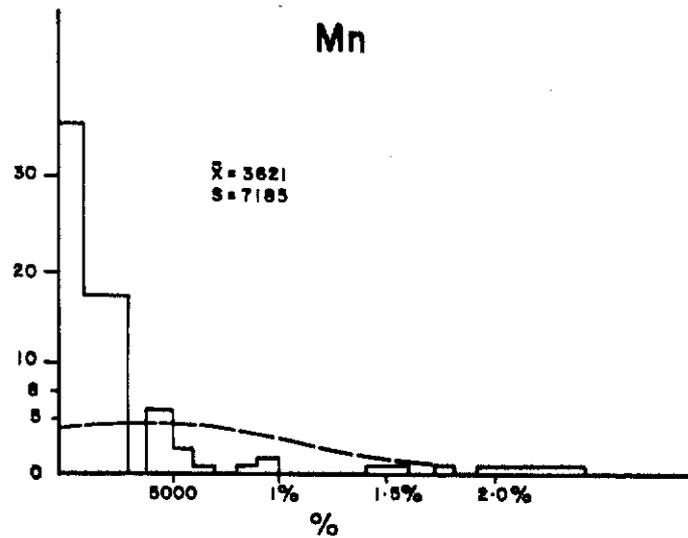
<u>Element</u>	<u>Arithmetic mean (ppm)</u>	<u>Standard deviation</u>	<u>Coefficient of Variation</u>
Cu	30	24	80
Pb	53	48	91
Zn	97	84	87
Fe	4.26%	3.1%	73
Mn	0.36%	0.71%	197

Cu, Pb, and Zn values approximate lognormal distributions whilst Fe and Mn show more complex polynomial distributions. Values for Sn, W, Bi and Mo are generally below the lower limits of detection and are therefore not treated statistically. Threshold values have been taken from the inflexion points on the cumulative frequency curves and are:

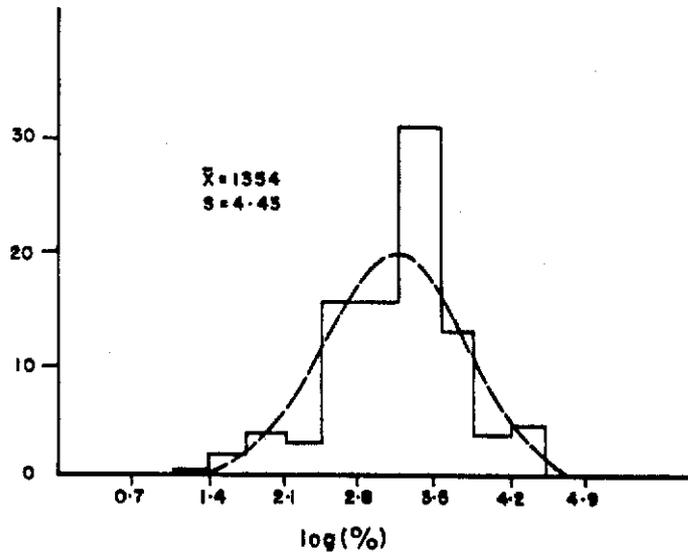
	<u>Threshold</u>	<u>Anomalous</u>
Mn	0.48%	1.5%
Fe	5.0%	15%
Cu	45	70
Pb	95	175
Zn	c120	230



A



B

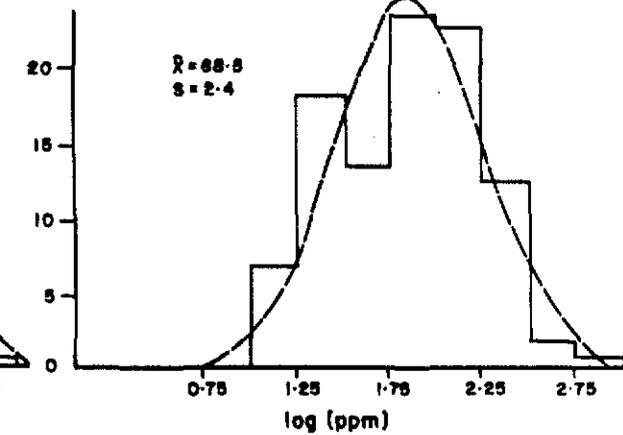
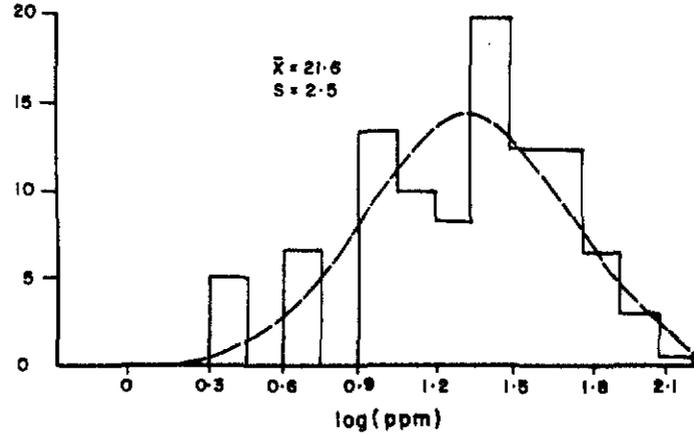
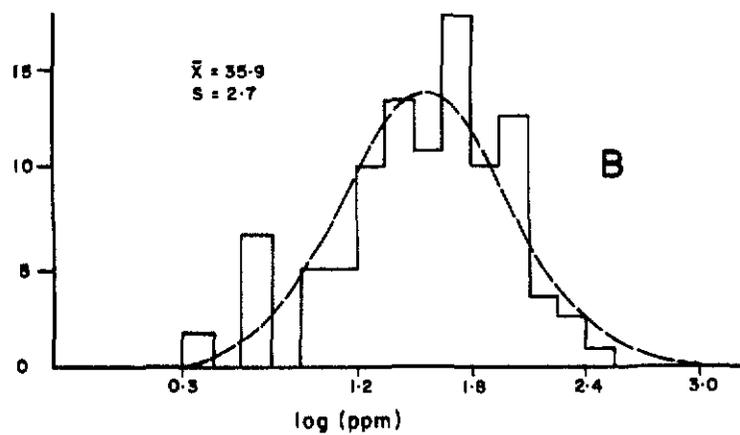
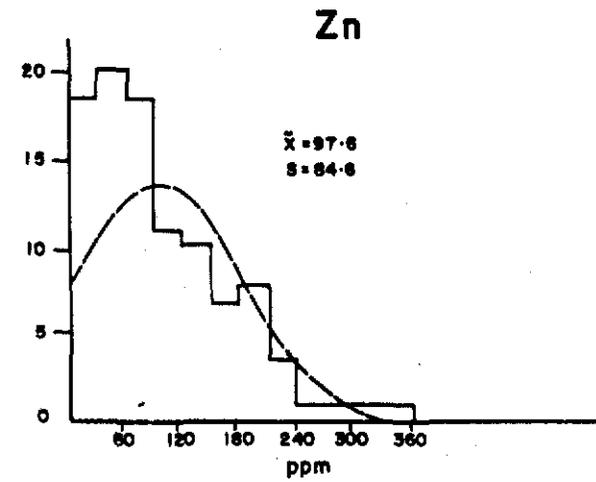
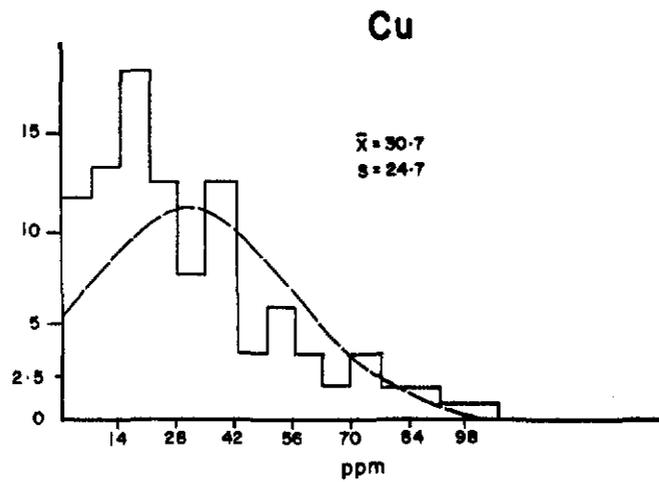
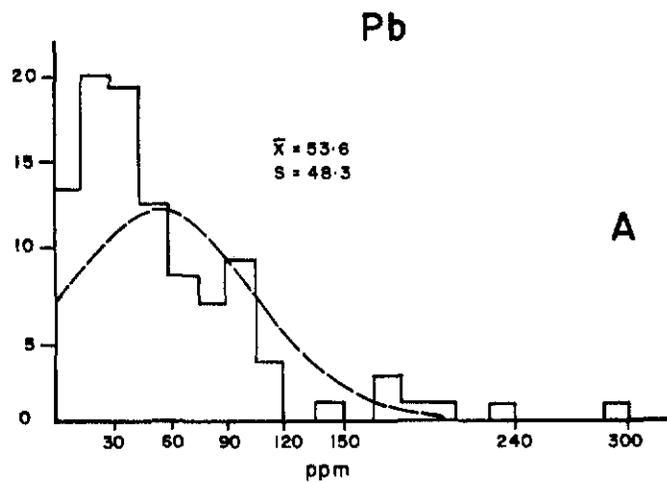


Histograms of Fe & Mn values in stream sediments (-80 mesh) from Dial Range plotted arithmetic (A) & logarithmic (B). Mean, \bar{X} & standard deviation, s are shown. Theoretical normal curve drawn computed from mean & standard deviation figures.

DIAL RANGE E.L. 24/73

GEOLOGIST: P.A. Wilson DRAWN: R. Tog, 3/9/82

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Histograms of Pb, Cu & Zn values in stream sediments (80 mesh) from Dial Range plotted arithmetic (A) & logarithmic (B). Mean, \bar{X} & standard deviation, s are shown. Theoretical normal curve drawn computed from mean & standard deviation figures

DIAL RANGE E.L. 24/73

GEOLOGIST: P.A.Wilson DRAWN: R.Tog, 3/9/82

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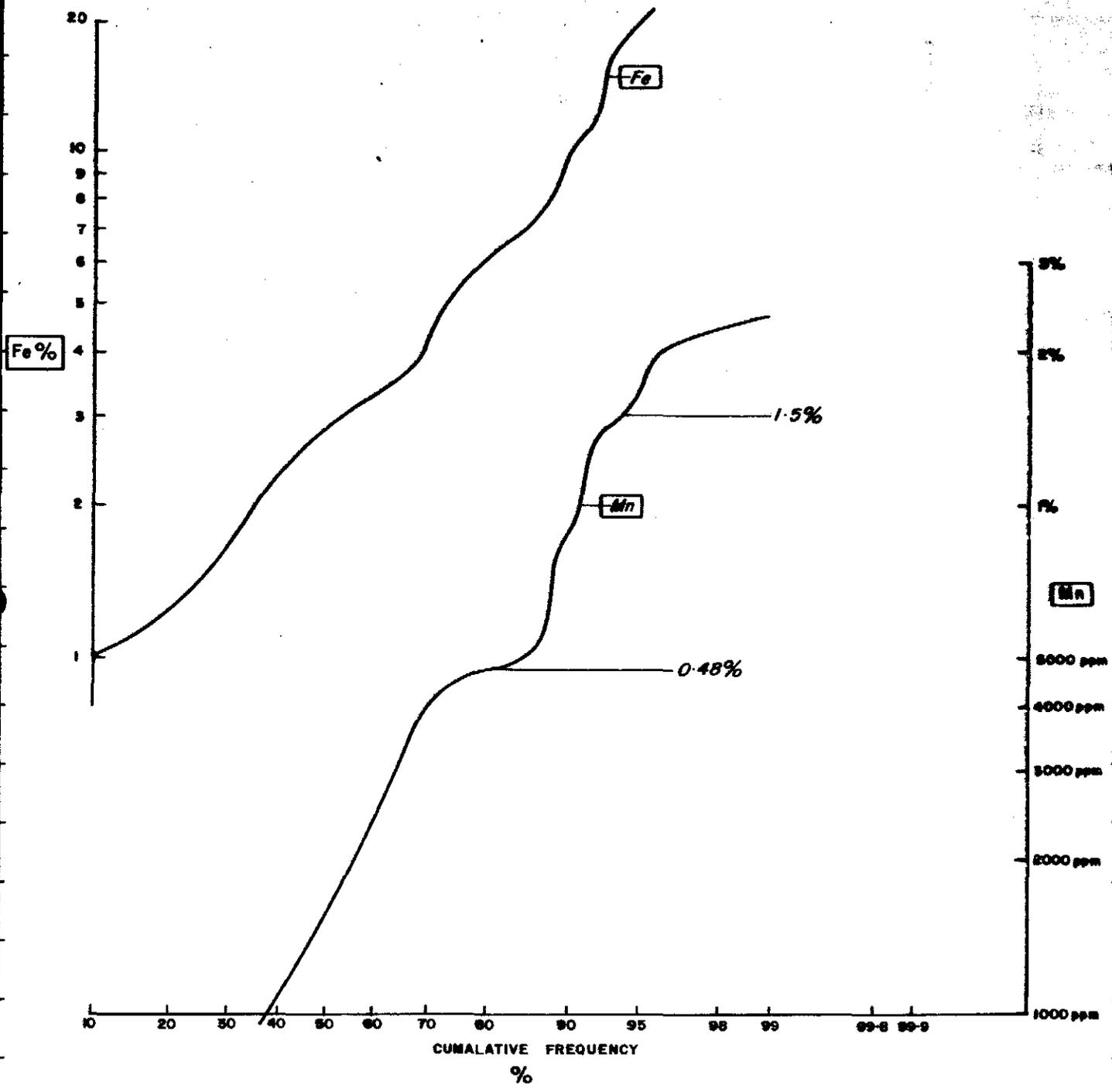


FIG. 8

	GEOPEKO	
	A DIVISION OF PEKO-WALLBERG OPERATIONS LTD	
	DIAL RANGE	
	CUMALATIVE PROBABILITY PLOTS OF -80 mesh STREAM SEDIMENT SAMPLES	
DATE 6/9/82		
GEOL P.A.W		
BWN R.7og		
CHKD		

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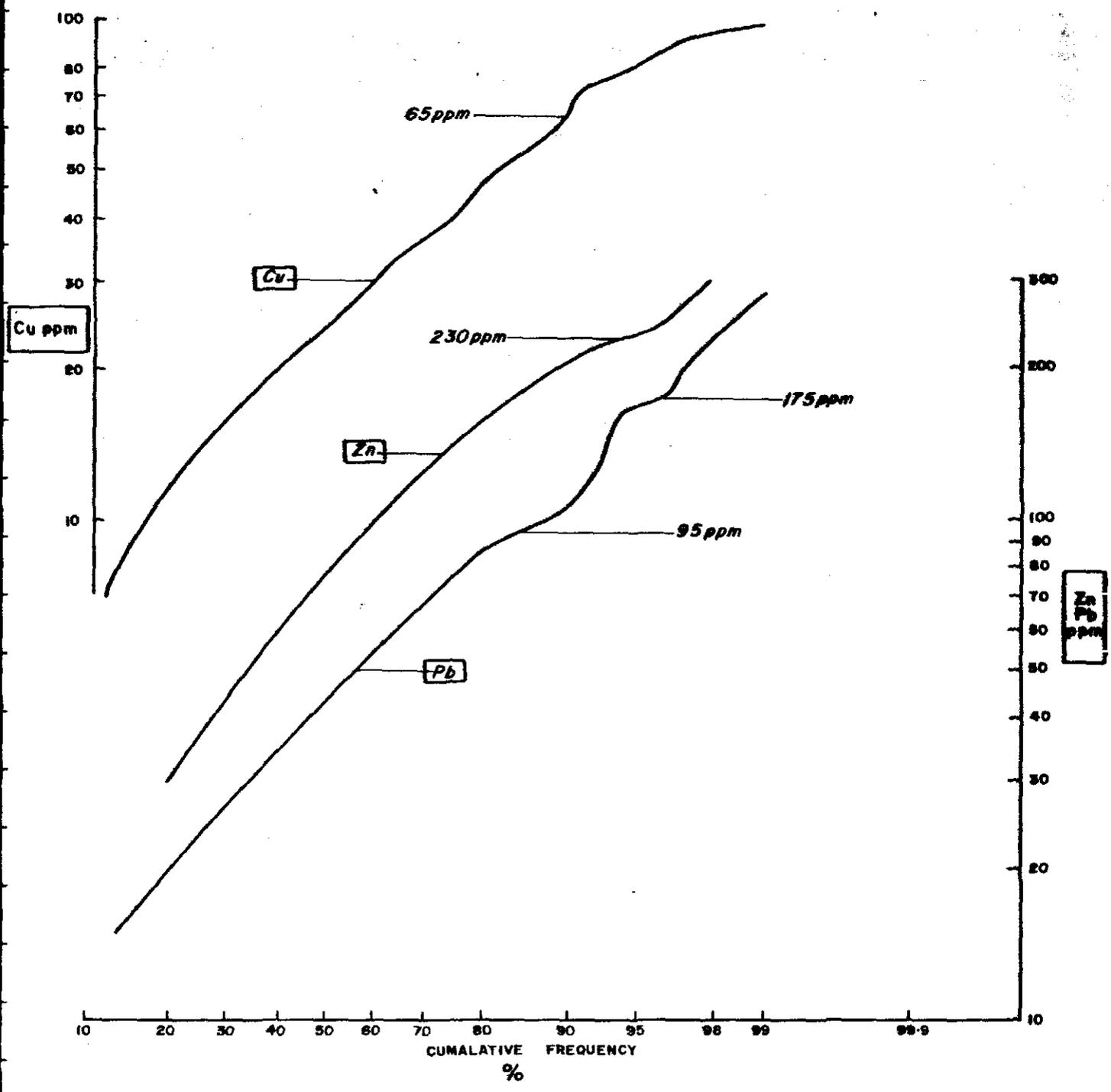


FIG. 6

	GEOPEKO
	A DIVISION OF PERK-WALLSEND OPERATIONS LTD
	DIAL RANGE
	CUMALATIVE PROBABILITY PLOTS OF -80 mesh STREAM SEDIMENT SAMPLES

DATE 6/9/82
GEOL P.A.W
DWN R.Tog
CHWD

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Adopting these figures for defining anomalous values the following areas are of interest:

Adit Creek (AMG 419600mE, 5433400mN)

Anomalous Pb values are present over a distance of 2km along Adit Creek. The Barrington chert and Radford's Creek Group are the principal lithologies in the catchment area. A Mn-Fe anomaly with maximum values of 1.5%Mn, 18%Fe and 1.45%Mn, 11.5%Fe is broadly coincident with the Pb values. Scavenging of Pb by the Fe/Mn is unlikely to be the cause of the anomaly because of the low zinc values (Pb/Zn range of 2-6).

Rock chip samples collected from the Barrington chert and adjacent mudstones furnished low Pb values.

Walloa Creek (AMG 419000mE, 5434000mN)

A Ag-Pb-Zn anomaly occurs in the headwaters of Walloa Creek in an area draining the Barrington chert. Both coincident Fe and Mn values are very low.

A Cu anomaly is present in the lower reaches of Walloa Creek (AMG 5433000mN, 419450mE) and probably corresponds to the old workings described in the preceeding section.

Hardstaff Creek (AMG 420000mE, 5437800mN)

Weakly anomalous copper values occur in Hardstaff Creek in an area draining the Barrington chert and sediments of the Cateena Group.

Milligan-Pine Creek System (AMG 417000mE, 5433000mN)

Stream sediment samples are consistently high in zinc in an area draining turbidites of the Radford's Creek Group and Ordovician conglomerates.

Upper Hardstaff Creek (AMG 4185000mE, 543670mN)

Sn values of 27ppm and 10ppm in the -80 mesh fraction are distinctly anomalous and occur about 400m downstream from a Zn (Pb) anomaly.

Panned Concentrate Results

Panned concentrate values were very low supporting the visual examination of the samples which were seen to be composed of broken rock fragments of quartzo-feldspathic and basaltic material.

Analytical results for Au, Ag, Sn and W are generally below the limits of detection (8ppb, 0.5ppm, 1ppm and 0.5ppm respectively). The only two exceptions are anomalous tin values of up to 70ppm in the lower part of Hardstaff Creek and 64ppm in the upper reaches of Walloa Creek. This latter anomaly can be downgraded due to the proximity of Tertiary sediments in the catchment area. Similarly the Hardstaff Creek anomaly is of low order when compared with the tin values reported by Large (1981) from the central part of the E.L. It is likely these values represent the fringe of the anomalous Lower Cateena Group.

4.6 Conclusions

The results from the panned concentrate drainage survey effectively downgrade the tin potential of the south-western quadrant of E.L. 24/73. This conclusion is reinforced by the geological mapping and rock chip sampling programs which illustrate the unsuitability of the Cambrian lithologies for skarn style mineralization. Moreover, the Mt Husetop granite does not outcrop in the E.L. as postulated by Burns (1964) and no thermal aureole or other contact effects (i.e. quartz or granitic veining etc) were evident in the field.

However a number of good base metal anomalies have emerged from the -80 mesh stream sediment survey and are recommended for follow up work.

026

5. DIAL MINE GRID

5.1 Introduction

Drilling of a Sn-Cu soil geochemical anomaly in the preceding field season resulted in an intersection of low grade tin bearing oxidised breccias (209ppm Sn/74m) overlying pyrite-chalcocite bearing siltstones (0.68% Cu/20m). A program of detailed soil sampling and costeaning was recommended as follow up techniques prior to the siting of another drill hole (Large, 1981).

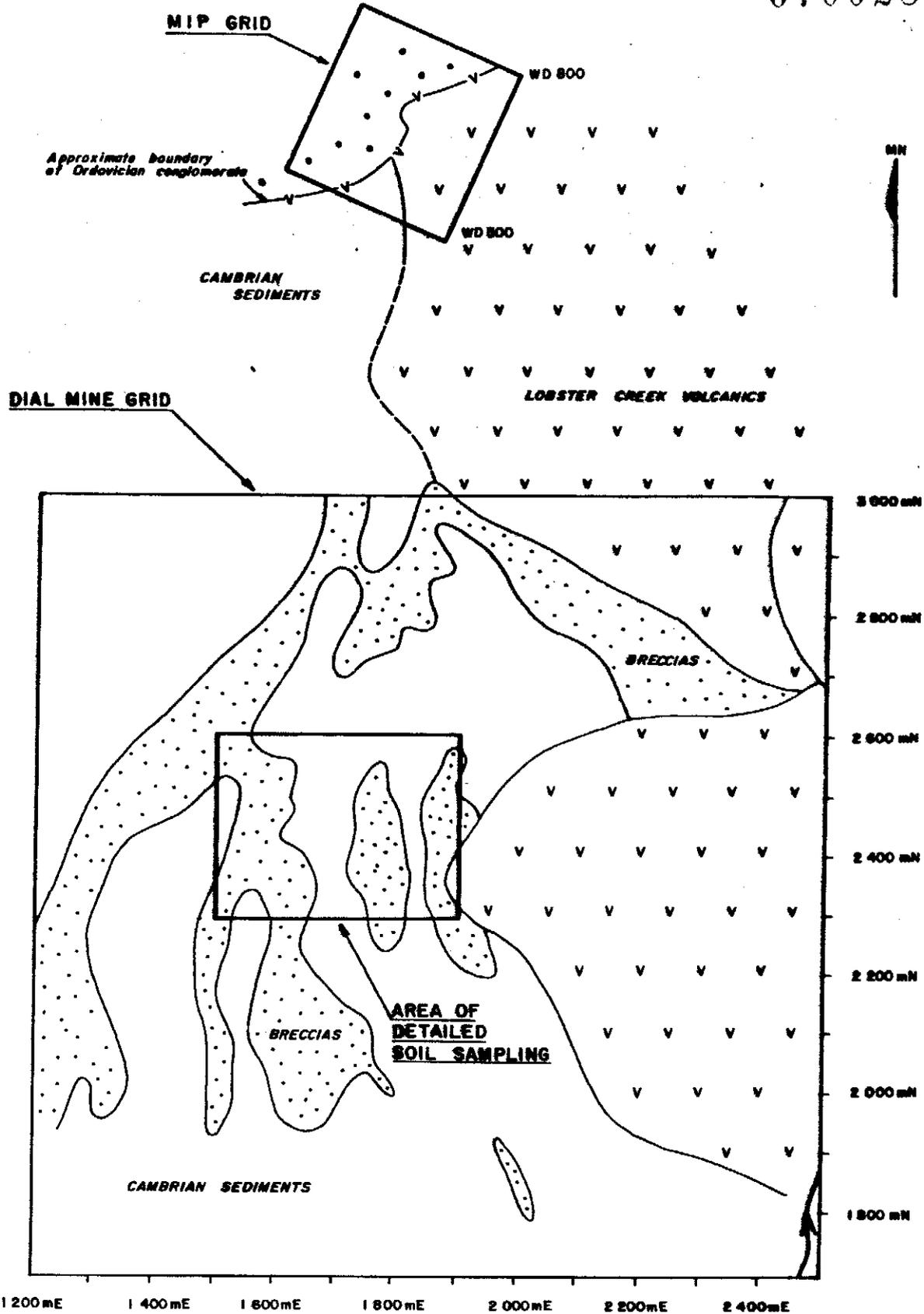
The grid in the vicinity of the DDH 10 collar was infilled to a 50m line spacing over an area of 400m x 300m. Samples were collected at 5m centres using the 'Mate' power auger, the average sample depth being between 1m and 2m.

5.2 Geology Around DDH 10

The area infilled occupies the central portion of the Dial Mine Grid and is an area of positive relief sloping steeply to the east. Outcrop is very poor and consequently the geological boundaries are conjectural being based on distribution of float and auger hole chips.

Dacites of the Lobster Creek Volcanics outcrop on the eastern margin of the gridded area. It consists of reddish-orange potash feldspar rich rocks with chloritised hornblende and biotite as major ferromagnesian minerals. The volcanics are overlain by mottled sandstones which vary in colour from purple-maroon-red through to grey. They are interbedded with coarse grits and ferruginous polymictic breccias.

027



1200E 1400E 1600E 1800E 2000E 2200E 2400E

3000N
2800N
2600N
2400N
2200N
2000N
1800N

5 cm

100 0 300 M
1:10000

FIG. 7

	GEOPEKO	
	A DIVISION OF PEKO-WALLBERG OPERATIONS LTD	
	DATE 1/8/82	
	GEOL. P.A.W.	
	<p style="text-align: center;">DIAL RANGE</p> <p style="text-align: center;">THE MIP GRID & AREA OF DETAILED SOIL SAMPLING IN RELATIONSHIP TO THE DIAL RANGE GRID</p>	
	<p>BYN R. Top</p> <p>CWKB R</p>	

028

These lithologies rarely outcrop. They attain their best development on line 1700E where they have a maximum inferred thickness of 70m. Overlying ? these breccias to the west are a group of grey fine-grained siliceous siltstones which are locally brecciated.

A road cutting in the NE portion of the gridded area exposes a thinly bedded sequence of purple sandstones/grits, green siltstones and thin breccias. Graded bedding is visible and indicates an easterly facing. Bedding varies from vertical to steep easterly dips. These lithologies are overlain by a massive fine-grained siltstone unit.

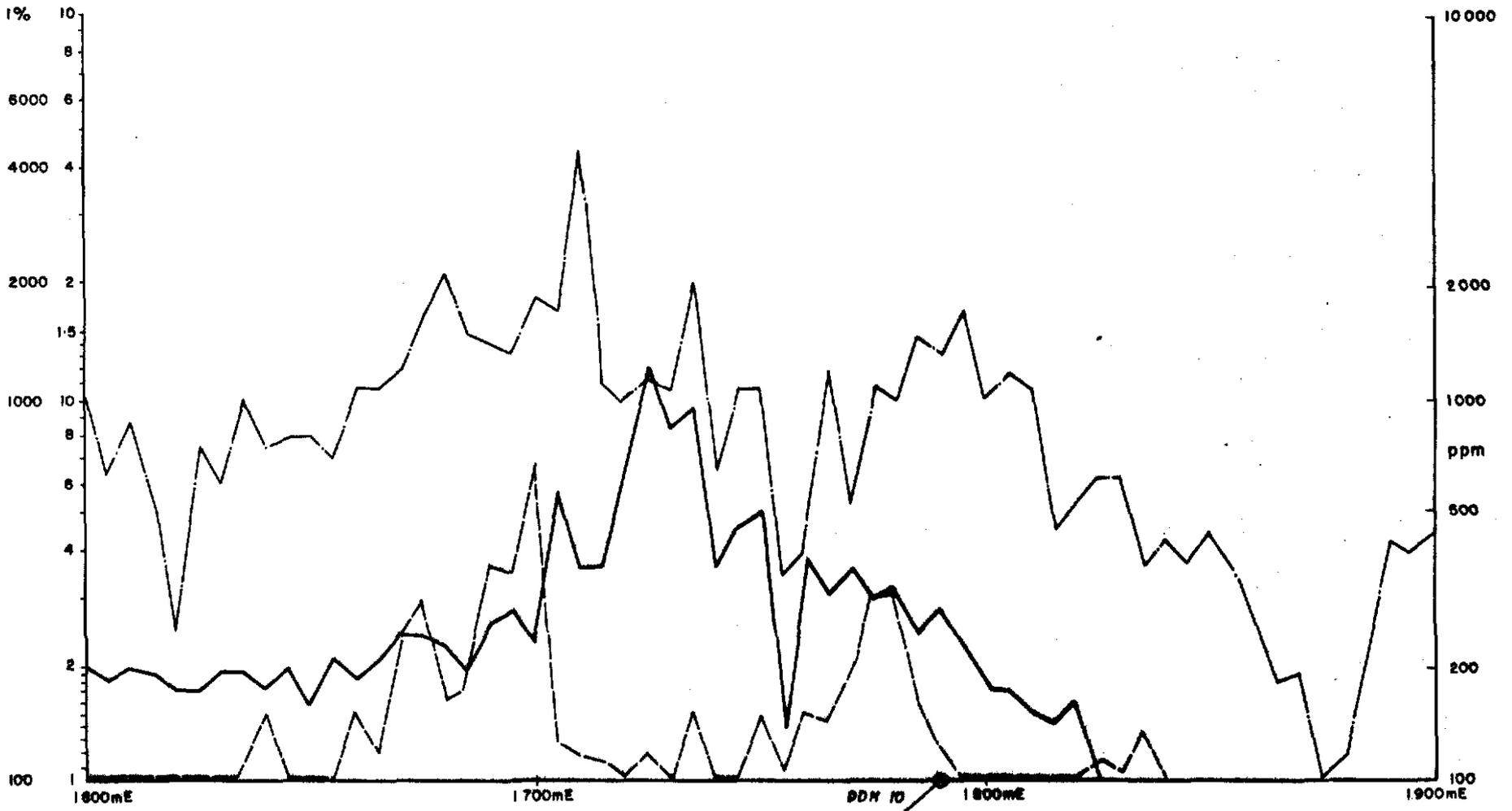
A NE trending fault is inferred along the pronounced negative feature and separates this northern sequence from the breccia-siltstone sequence to the south.

5.3 Rock Chip Samples

Rock samples from the gridded area were collected for analysis. Sample locations are shown in plan 11 and the results are tabulated below:

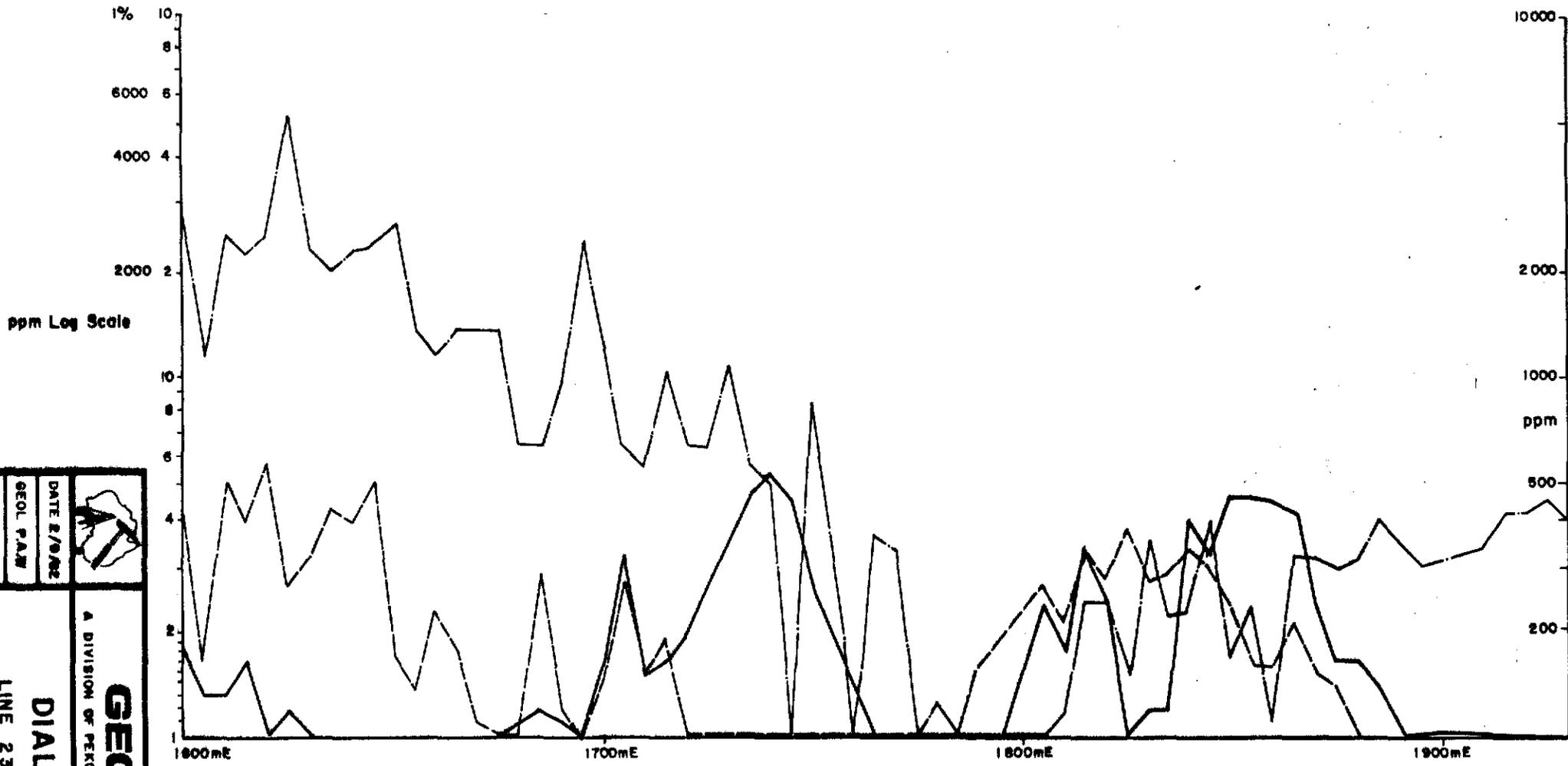
<u>Sample Number</u>	<u>Analytical Results (ppm)</u>									
	Mn	Ag	Au	Sn	W	Cu	Pb	Zn	Fe%	
KR 8251	54	X	X	10	15	10	25	15	5.4	
KR 8252	20	X	X	X	X	60	20	5	2.1	
KR 8253	70	X	X	30	X	50	15	10	5.8	
KR 8254*	155	0.8	X	420	20	450	45	90	38.5	
KR 8255	190	X	X	20	X	170	20	115	9.5	
KR 8256	40	X	X	200	20	20	X	5	0.34	
KR 8257	30	X	X	180	25	X	X	5	0.22	
KR 8258*	35	X	X	130	X	125	10	15	7.5	
KR 8259	50	0.1	X	110	15	15	X	5	1.5	
KR 8260	40	X	X	65	15	20	20	10	0.74	
KR 8261*	45	X	X	180	20	235	75	5	4.2	
KR 8262	105	0.1	X	260	55	35	5	X	2.2	
KR 8263*	25	X	X	15	X	10	10	X	0.75	
KR 8264*	25	X	X	260	15	70	30	X	1.9	

CHRD	DATE 2/9/72	
OWN R. Top	GEOLOGICAL P.A.W.	
GEOPPEKO A DIVISION OF PERKINS-WALKER OPERATIONS LTD		
DIAL RANGE LINE 2400MM AS, SN, CU VALUES IN SOILS		



..... As
 _____ Sn
 - - - - - Cu

FIG. 8



DATE 2/8/82	GEOL. P.A.W.	SWN. R.108	CMKD. 10
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GEORPEKO
A DIVISION OF PERKINS-WALKER OPERATIONS LTD

DIAL RANGE
LINE 2500m As, Sn, Cu
VALUES IN SOILS

FIG. 9



032

The tin contours highlight a 50m wide zone having >200ppm Sn which correlates with the main breccia zone on 1725E. Peak values of up to 1350ppm Sn occur and correlate with the zone of anomalous tin (100-600ppm) in the drill hole.

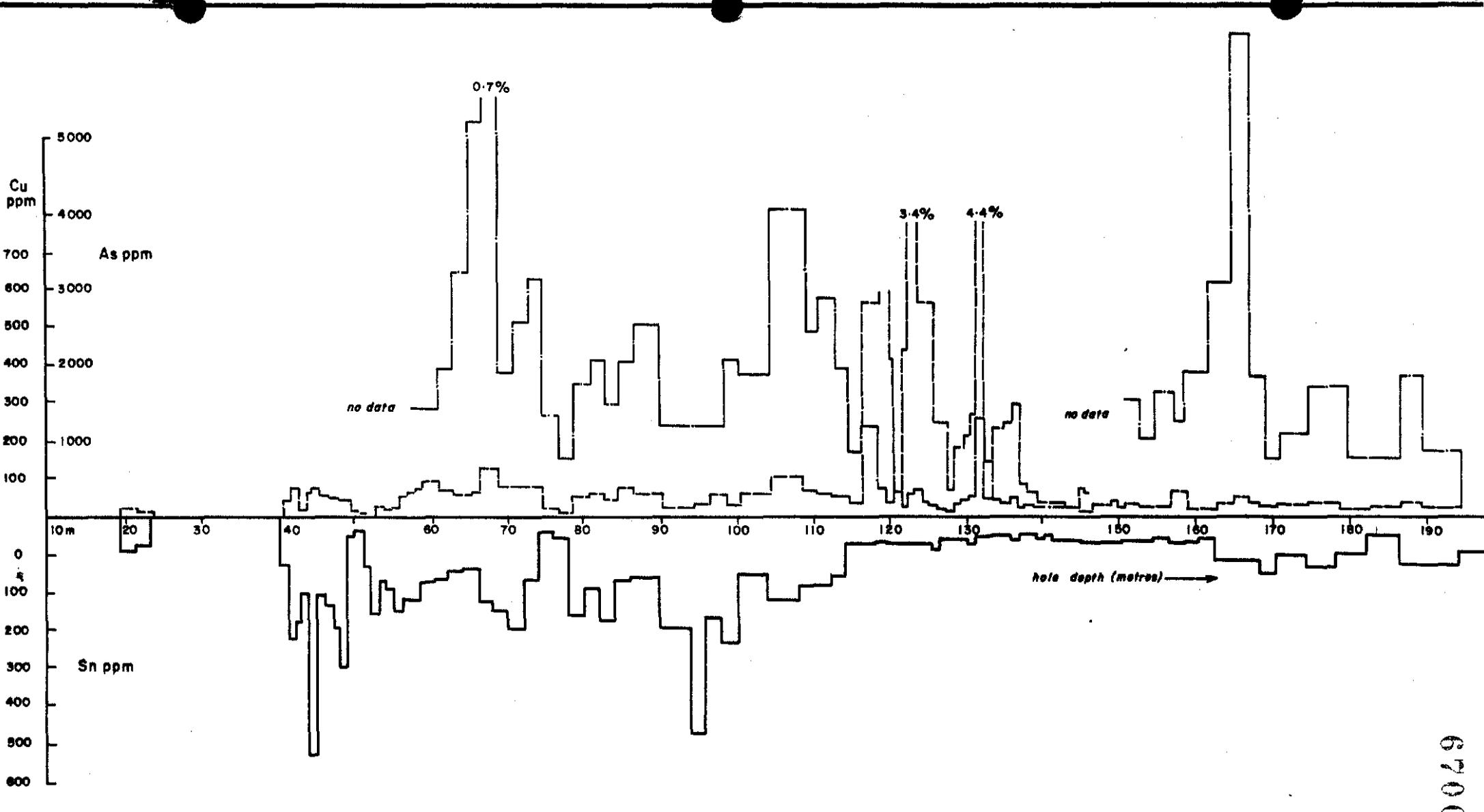
The copper contours define a narrow 25m wide N-S trending zone centred on 1700E immediately to the west of the main tin zone. Values at the centre of this anomaly are between 500ppm and 700ppm Cu. Assuming near verticality of the dips, then this zone correlates with the cupriferous sandstones in the drill hole.

A higher intensity copper soil anomaly is present in the south-western portion of the mini-grid and is open to the south and west.

Arsenic values in soils on lines 2300N and 2400N are highly anomalous as shown below:

	<u>Number</u>	<u>Mean (ppm)</u>	<u>Range</u>	<u>Standard Deviation</u>
Line 2400N	61	850	40-4300	685
Line 2300N	61	819	20-5100	924

Arsenic was also analysed in the split core from DDH 10 where it shows a strongly correlation with tin (fig 10). This relationship is less clear in the soils especially on line 2300N where the correlation with copper is quite good (fig 9).



- - - - - As
 _____ Sn
 - . - . - Cu

FIG. 10
DIAL RANGE
 As, Cu & Sn VALUES OF CORE SAMPLES
 FROM DDH 10
 GEOLOGIST: P.A. Wilson DRAWN: R.Tog, 3/9/82

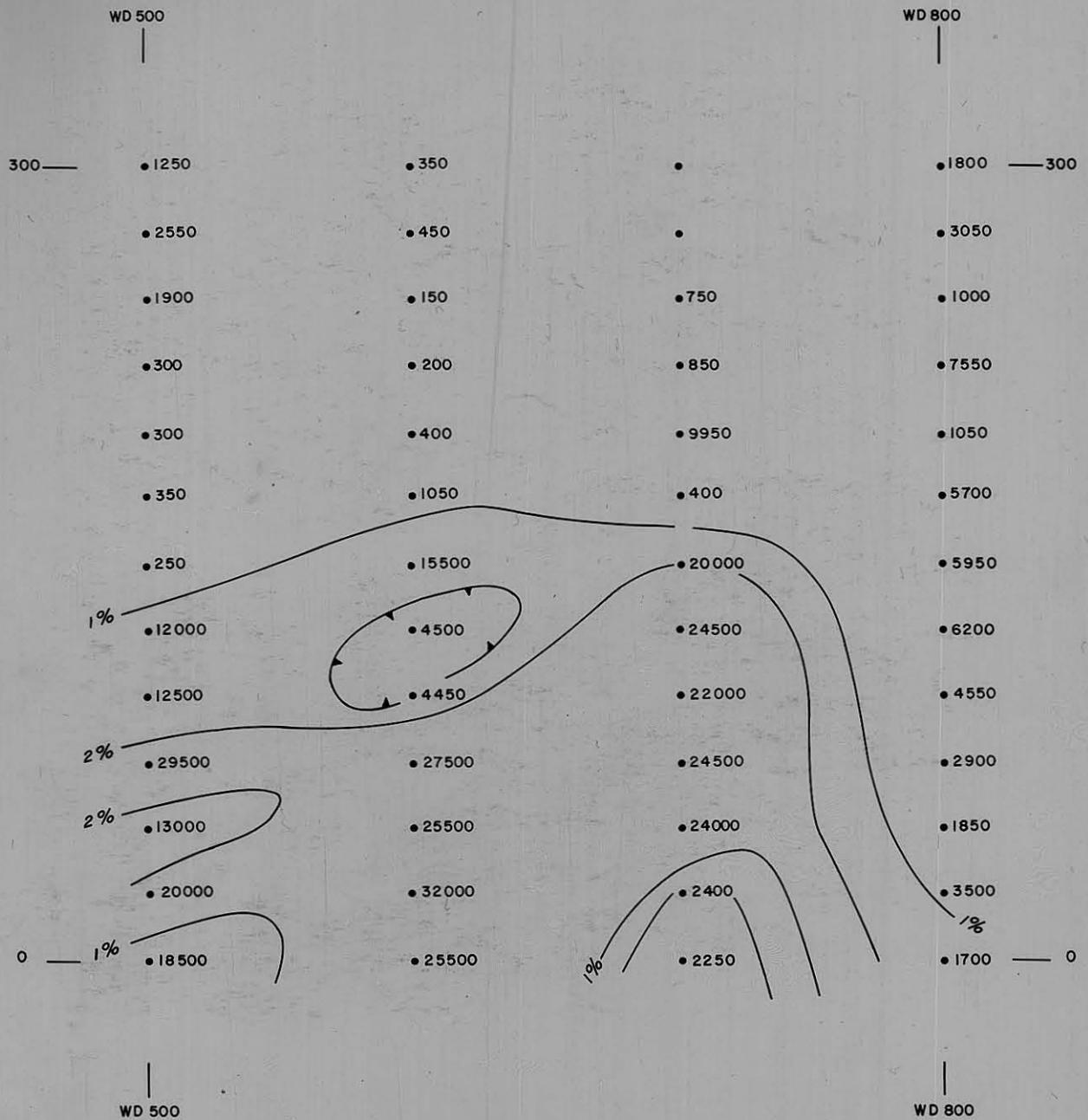
670034

5.5. Conclusions

C horizon soil geochemistry has proved to be a satisfactory technique for locating the cupriferous sediments and stanniferous breccias at surface. Outcrop on the mini grid is inadequate for the construction of a good geological base map and the relationship between the breccias and finer sediments is still problematical (i.e. whether the breccias are totally stratiform).

Arsenic values in the soils and drill core confirm that the Dial Mine Grid is centred on a significant hydrothermal centre. Examination of thin sections of drill core (R. Large, pers comm) shows tourmaline to be present in the breccias, fine grained sediments and the volcanics. It appears the hydrothermal solutions have permeated through the sedimentary pile but tin precipitation has been more selectively restricted to the breccia horizons.

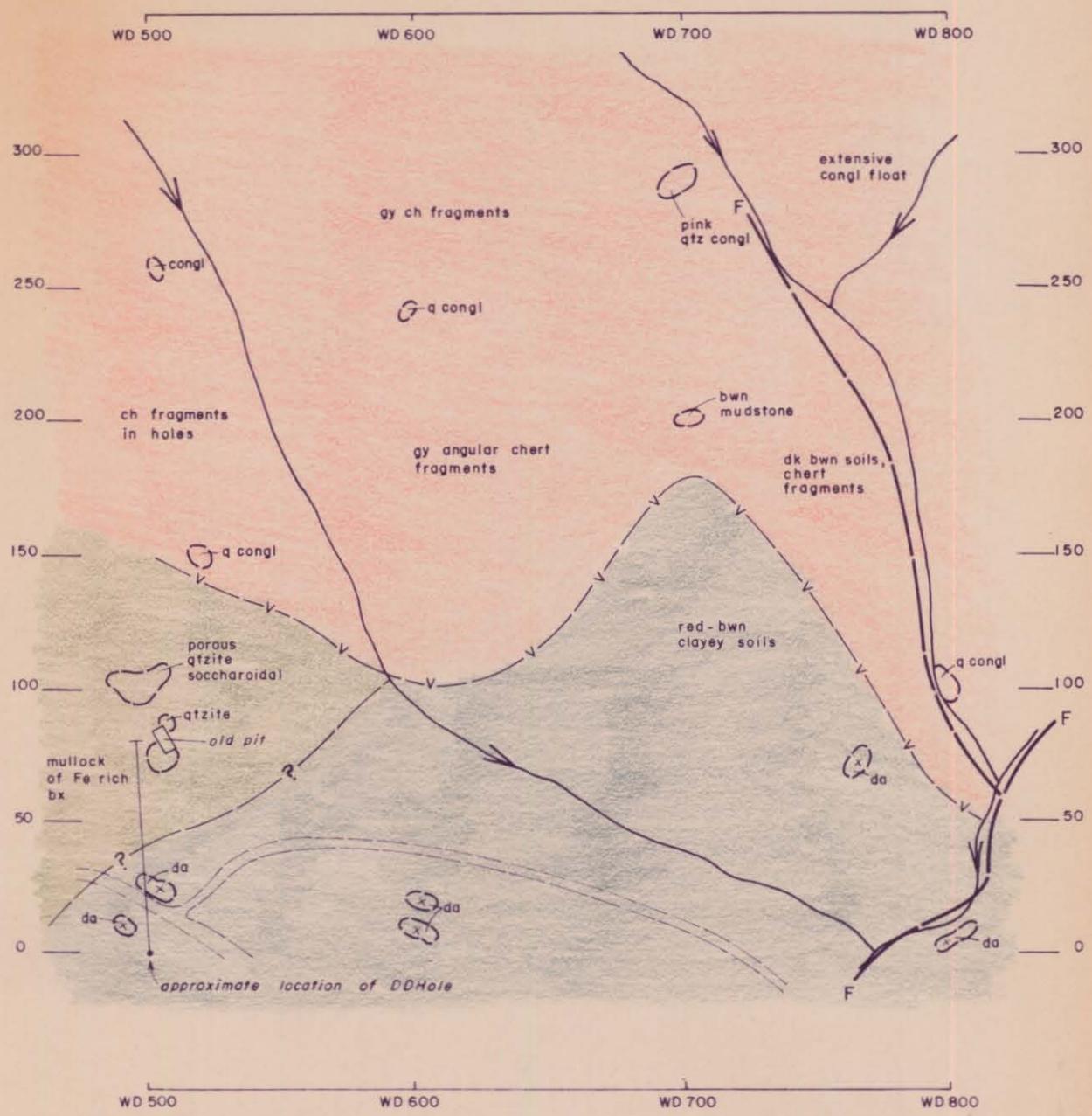
It is recommended that a deeper hole be drilled to intersect the DDH 10 stratigraphy at greater depth to assess primary tin grades. This work should follow a program of costeaning over geochemical anomalies on the grid to assess bulk grade and to provide better geological control.



, 12

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306° MN

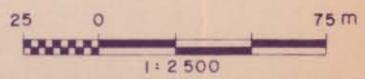
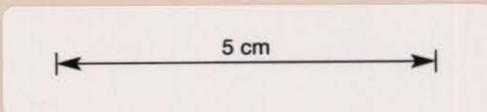
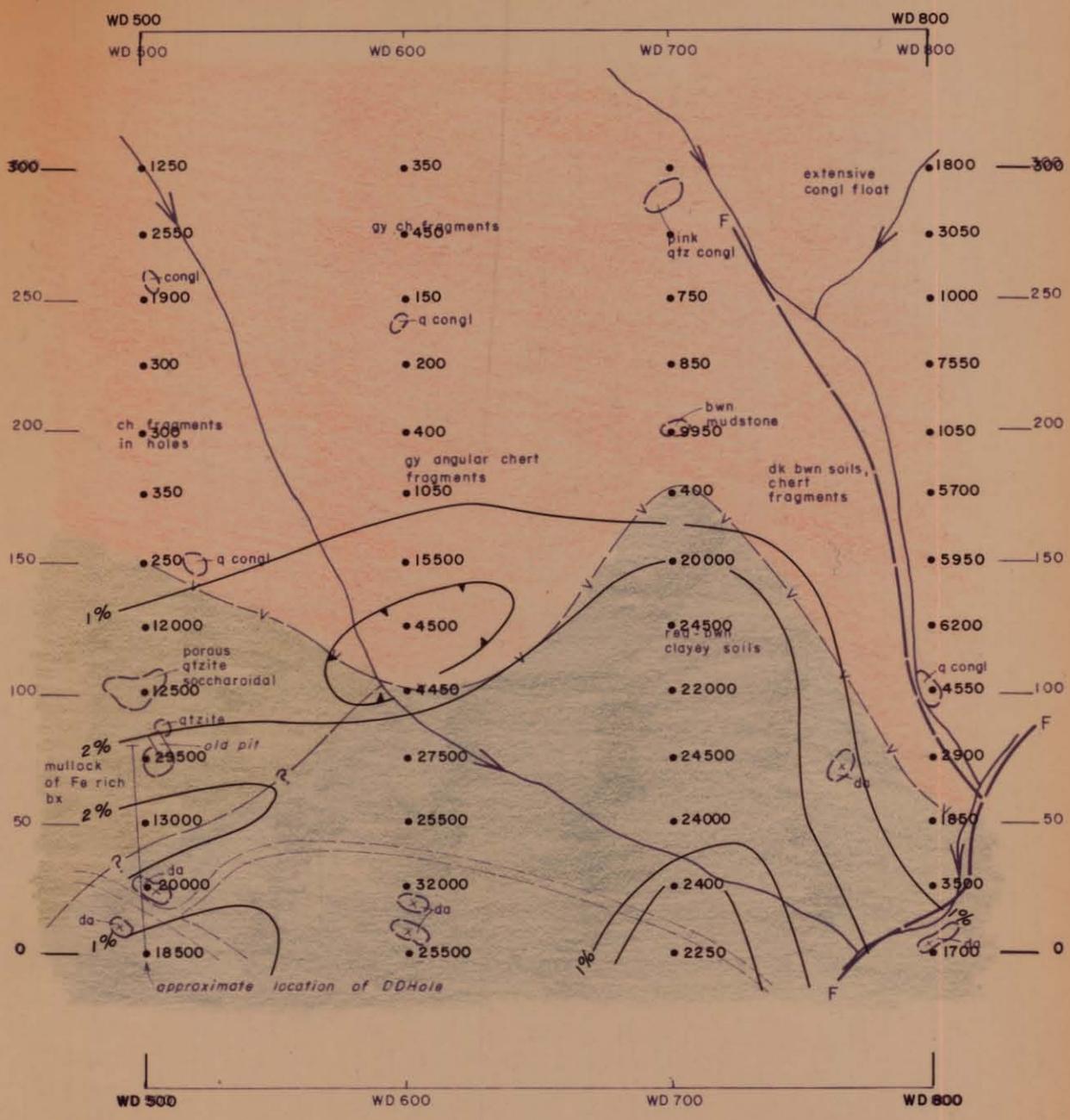


FIG. 11

	GEOPEKO	
	A DIVISION OF PEKO-WALLSEND OPERATIONS LTD	
	DIAL RANGE	
	MIP GRID GEOLOGICAL MAP	
DATE 6/9/82		
GEOLOGIST P.A.W		
DRAWN R.Tog		
CHECKED AS		

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035



306° MN

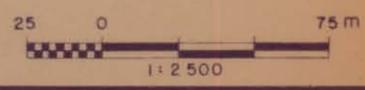
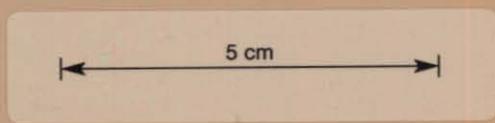


FIG. 11, 12

	GEOPEKO	
	A DIVISION OF PEKO-WALLSEND OPERATIONS LTD	
	DIAL RANGE	
	MIP GRID GEOLOGICAL MAP Fe ppm C-HORIZON GEOCHEMISTRY	
DATE 6/9/82		
GEOLOGIST P.A.W		
DRAWN R.Tog		
CHECKED AS		

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6. 'M.I.P.' GRID6.1 Introduction

The area referred to as the "M.I.P." grid lies immediately north of the Dial Mine Grid and is located on the Dial road. (fig 7).

A small mound of gossanous mullock by an old shaft provided the primary focus for the gridding of the area by Pennzoil in 1977 (Scott and Chapman, 1977). Two reconnaissance grid lines were cut, soil samples were collected and an M.I.P. survey completed. Base metal response in the soils was low, however a substantial chargeability anomaly (maximum of 4 milligamma/gamma) was recorded on both lines. The anomaly was interpreted to be at the contact between the Lobster Creek Keratophyre and the sediments of the Cateena Group.

A hole (DDH 6) was drilled to test the M.I.P. chargeable zone and intersected dacites for 155m before passing into a sequence of pyritic and calcareous sediments with thin intercalated tuff bands. Pyrite was recorded in the range of 2-5vol % and was considered sufficient to explain the chargeable zone. Base metal results were low.

It was decided to re-establish the two grid lines and expand the grid for the following reasons:

1. The calcareous/pyritic sediment/volcanic succession form a good environment for both Sn and Cu, Pb, Zn mineralization.
2. To confirm the M.I.P. chargeability anomaly with the more familiar dipole-dipole IP technique and to collect soil samples using a power auger for better depth penetration.

6.2 Gridding, Geology and Geochemistry

Lines WD500 and WD800 were not located and consequently a new line (WD500) was established on a bearing of 306° mN from the approximate position of the DDH 6 collar. 3 lines were gridded at 100m spacings to the east giving an effective grid coverage of 300m^2 .

Outcrop on the gridded area is extremely poor. Rustic weathering 'dacites' are exposed along the road and are well exposed in contact with sediments in a road section west of the grid. Boulders of a coarse polymictic conglomerate, containing rounded pebbles of pink and banded black chert, are common on the northern part of the grid. These conglomerate boulders represent scree of Ordovician rocks from the slopes of Mt Dial. It is possible to map the extent of the Ordovician but the actual position of the unconformity is only inferred since this could reflect the limit of the talus (fig 8).

The grid was sampled by use of the 'Mate' power auger. Samples were collected at 25m centres from an average depth of 1m and the -80 mesh fraction analysed for Cu, Pb, Zn, Ag and Fe. With the exception of Fe, which is enhanced in the dacites (1-2.5%) below the unconformity, the base metal values fall below the lower detection limits of A.A.S.

6.3 Geophysics

Dipole-dipole IP was read on line WD500 and partially completed on line WD800. A broad well defined chargeability high, ($> 25\text{mV/V}$) with a coincident resistivity low, is apparent on line WD500 (fig 1⁵). This corresponds broadly with the sedimentary succession which underlies the dacite and which was tested in DDH 6.

WD 500 WD 600 WD 700 WD 800

300
200
100
0

• 13514	• 13515	•	• 13542
• 13513	• 13516	•	• 13543
• 13512	• 13517	• 13540, 41	• 13544
• 13510, 11	• 13518	• 13539	• 13545
• 13509	• 13519	• 13538	• 13546
• 13508	• 13520, 21	• 13537	• 13547
• 13507	• 13522	• 13536	• 13548
• 13506	• 13523	• 13535	• 13549
• 13505	• 13524	• 13534	• 13550, 51
• 13504	• 13525	• 13533	• 13552
• 13503	• 13526	• 13532	• 13553
• 13502	• 13527	• 13530, 31	• 13554
• 13501	• 13528	• 13529	• 13555



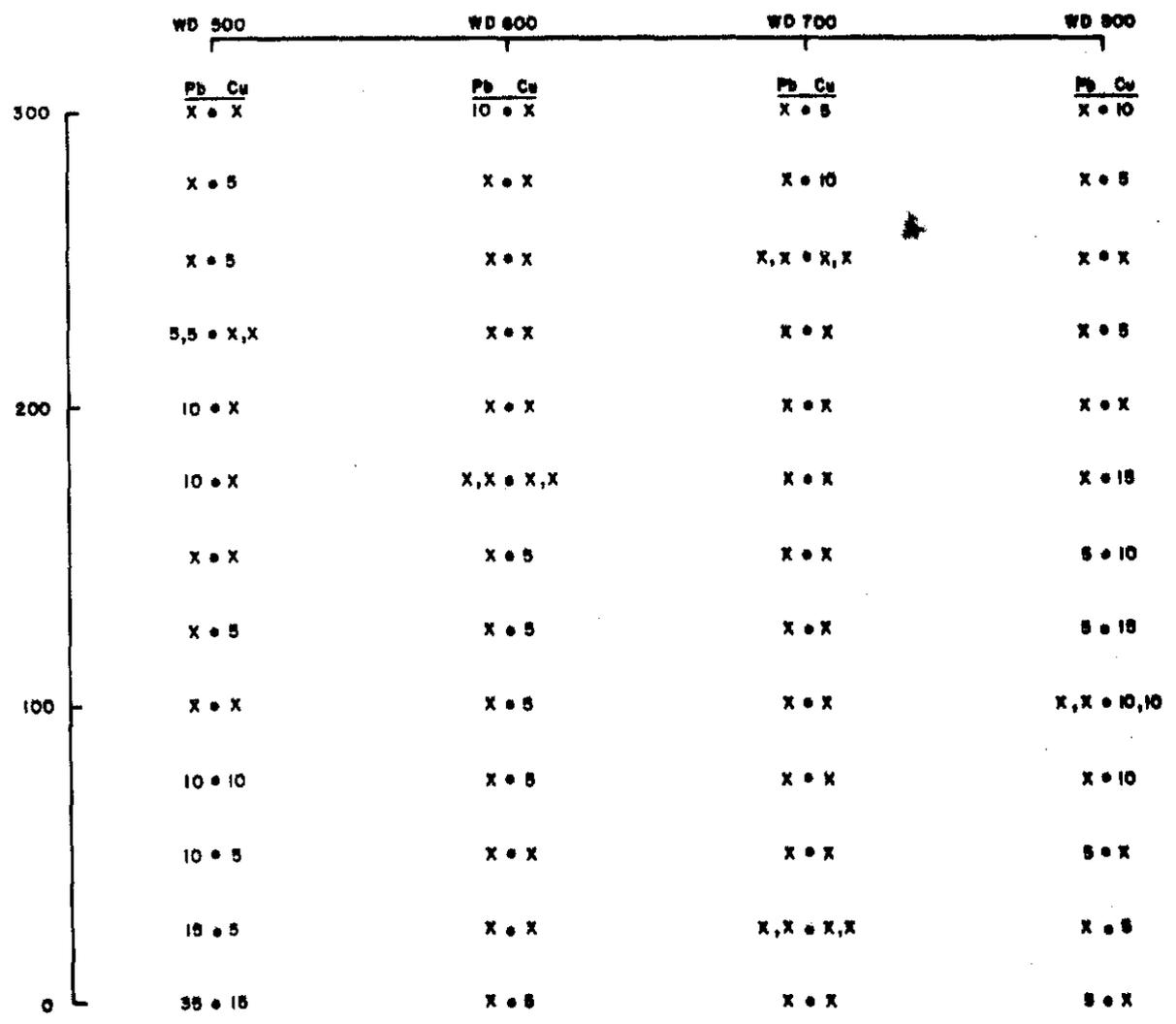
DATE 2/9/82
GEOL. P.A.W
DRAWN R.T.S
CHECKED (M)

GEOPERKO
A DIVISION OF PERCO-WALLSEND OPERATIONS LTD

DIAL RANGE

MIP GRID, C-HORIZON SOIL SAMPLE LOCATIONS

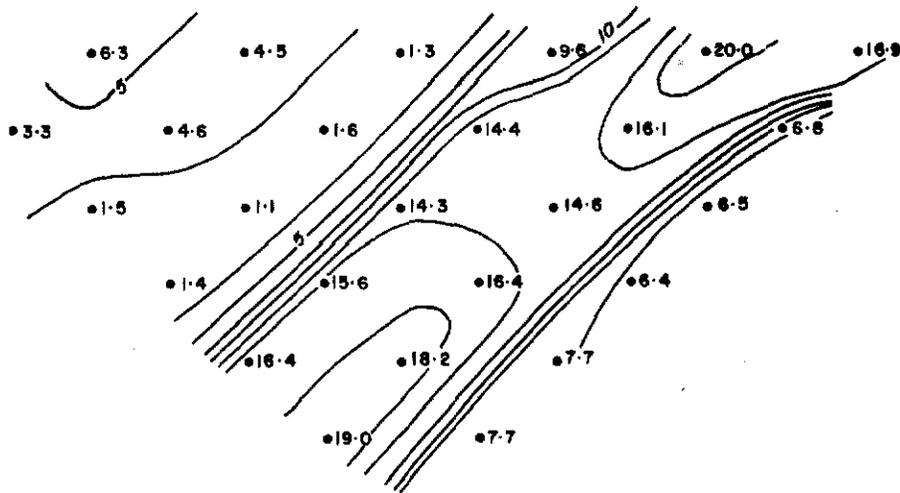
FIG. 13



	DATE RANGE	GEOPEKO A DIVISION OF PERO-MALLERND OPERATIONS LTD.
	GEOLOGICAL DATA RANGE	
OWN R.T.O. CMD	DIAL RANGE	MIP GRID, Pb/Zn SOIL GEOCHEMISTRY

FIG. 14

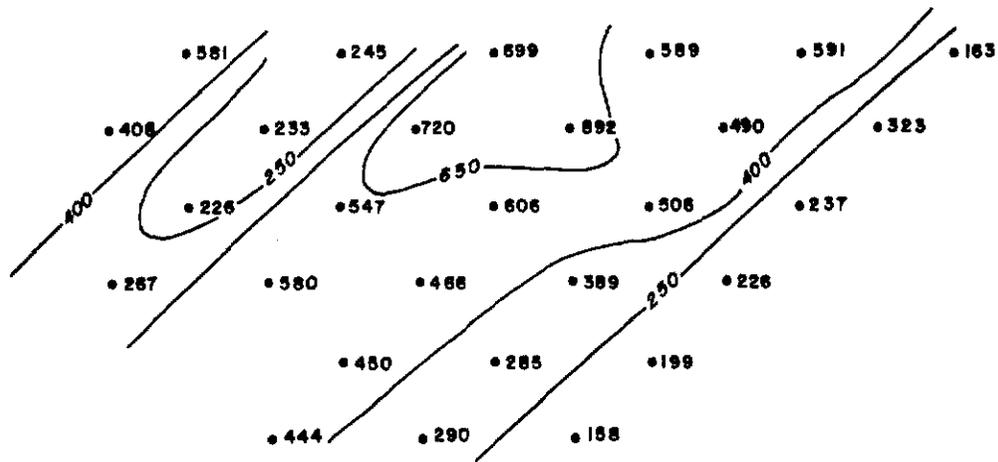
350 W 250 W 150 W 50 W 50 E



n = 1
 n = 2
 n = 3
 n = 4
 n = 5
 n = 6

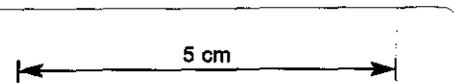
Apparent Chargeability
M 232
(mV/V)

350 W 250 W 150 W 50 W 50 E



n = 1
 n = 2
 n = 3
 n = 4
 n = 5
 n = 6

Apparent Resistivity
(Ohm.m)



PSEUDOSECTION OF DIPOLE-DIPOLE I.P/ RES. LINE WD 800

DIAL RANGE:
1: 2 500

670043 58.

Although the IP survey of line WD800 was not completed, due to technical difficulties, a better more chargeable zone is apparent. This zone also equates with the contact zone of the Lobster Creek Volcanics beneath possible Ordovician cover.

6.4 Conclusions

The pyritic calcareous sediments and tuffs which were intersected in DDH 6 are clearly traceable along strike by IP. The absence of soil geochemical response on the grid can be attributed to the talus cover of Ordovician conglomerate.

Base metal values in split core from DDH 6 were not anomalous, although there is some discrepancy in the analysis of tourmalinised dacite (samples KR 2954 and KR 2953 samples range from 400ppm-2.3%Sn, DDH 6 profile). Providing some metal anomalism can be confirmed in the DDH 6 core than it is recommended the IP on line WD800 be completed, magnetics read on the grid lines and a shallow hole drilled to test the IP zone.

APPENDICES

- 1. ~~Regional rock chip geochemical results.
(re plan 1 for location).~~
- 2. ~~Rock chip geochemistry of the Walloa Creek workings.
(re figure 2).~~
- 3. ~~Geochemical Result Listing~~

1. Dial Range rock chip geochemistry

2. (see vol. 2)

Regional panred concentrate samples geochem.

Regional -80 # drainage samples geochem.

Regional rock chip samples geochem.

Rock samples Walloa ck/DDH 10 geochem.

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670046

DIAL RANGE ROCK CHIP GEOCHEMISTRY

<u>Sample No</u>	<u>Lithology</u>	<u>Cu</u>	<u>Pb</u>	<u>Zn</u>	<u>Fe</u>	<u>Mn</u>	<u>Au</u>	<u>Ag</u>	<u>Sn</u>	<u>W</u>	<u>Ba</u>
KR 7802	Siltstone	X	115	150	14.0	3.5%	X	0.1	30	X	180
KR 7803*	Hematite breccia	X	X	35	18.5	780	17	0.2	800	25	10
KR 7804	Mudstone	X	10	45	1.9	2650	12	0.2	5	X	30
KR 7805*	Mudstone	X	170	15	1.4	1250	8	0.5	X	X	40
KR 7806	Siltstone	100	X	220	4.25	340	X	0.1	3	X	50
KR 7807	Sandstone	55	X	50	7.0	340	X	0.2	X	X	50
KR 7808	Sandstone	85	X	60	6.0	70	8	0.1	6	X	20
KR 7809	Dacite	105	X	295	3.15	450	X	1.5	5	X	150
KR 7810	Breccia	Not Analysed									
KR 7811	Chert	Not Analysed									
KR 7812	Banded chert	X	X	15	2.1	270	X	0.2	3	X	
KR 7813	Chert	5	X	10	2.15	105	X	0.2	7	X	40
KR 7814	'Andesite'	90	X	35	4.0	560	X	0.2	X	X	30
KR 7815	Sandstone	Not Analysed									
KR 7816*	Dacite (magnetite)	Not Analysed									
KR 7817	Sandstone	30	X	65	3.65	295	X	0.1	X	X	10
KR 7818	Grit	5	X	10	0.28	10	X	0.2	5	X	10
KR 7819	Chert	X	X	5	1.0	1400	X	0.2	X	X	220
KR 7820*	Greywacke'	20	X	35	3.4	1000	X	0.2	6	X	20
KR 7821*	Sandstone	25	20	115	3.8	955	X	0.2	X	X	40
KR 7822	Chert	10	45	5	0.7	160	X	0.3	3	X	20
KR 7823*	Chert	10	10	X	0.7	205	X	0.2	X	X	30
KR 7824*	Cherty mudstone	10	X	X	0.2	15	X	0.3	3	X	20
KR 7825*	Sandstone	175	X	50	3.1	390	17	0.2	7	X	60
KR 7826*	Siltstone	5	X	40	6.5	495	0.2	X	5	25	40
KR 7827	'Dacite'	10	X	15	1.45	80	X	0.3	4	X	20
KR 7828	'Dacite'	5	65	70	1.85	70		0.5	X	X	30
KR 7829	Siltstone	195	X	80	5.0	115	X	0.2	X	X	60
KR 7830*	Siltstone	95	X	50	5.8	155	X	0.2	X	X	70
KR 7831*	Conglomerate	10	X	35	2.1	80	X	0.2	X	X	1300
KR 7832	Basalt?	10	125	95	3.4	680	X	0.3	5	X	230
KR 7833	Grit	5	145	150	7.7	1750	X	0.2	X	10	280

* Denotes thin section taken

045

670047

<u>Sample No</u>	<u>Lithology</u>	<u>Cu</u>	<u>Pb</u>	<u>Zn</u>	<u>Fe%</u>	<u>Mn</u>	<u>Au</u>	<u>Ag</u>	<u>Sn</u>	<u>W</u>	<u>Ba</u>
KR 7834	Grit	5	X	55	1.3	1200	X	0.3	X	X	3500
KR 7835	Siltstone	65	X	230	5.2	1400	X	0.2	X	X	230
KR 7836	Pyritic siltstone	90	10	225	5.1	2050	X	0.2	4	X	700
KR 7837		10	70	185	4.6	1000	X	0.2	5	X	90
KR 7838	Siltstone	60	80	185	4.0	185	X	0.2	3	X	120
KR 7839	Siltstone	15	X	200	4.8	2400	X	0.2	5	X	310
KR 7840	Mudstone siltstone	5	X	50	3.4	370	X	0.2	5	X	70
KR 7841	Grit	10	5	50	2.1	3050	X	0.2	5	X	1150
KR 7842	Mudstone	5	X	25	1.95	1550	X	0.2	X	X	370
KR 7843	Pyritic sandstone	20	10	50	3.8	2050	X	0.2			1250
KR 7844*	Blue siltstone	40	35	60	4.5	790	X	0.5			320
KR 7845*	'Dacite'	10	75	40	2.3	355	X	0.2	6	X	50
KR 7846	Mudstone	165	X	145	8.2	925	X	0.2	X	X	
KR 7847	Pyritic chert	40	X	25	6.6	175	X	0.1	7	X	
KR 7848	Chert breccia	145	X	80	7.2	760	X	0.2	8	X	
KR 7849		45	X	35	3.4	80	X	0.1	8	X	
KR 7850	Dacite										
KR 9315	Chert	10	X	X	0.4	105	X	0.2	6	X	
KR 9316	Sandstone/breccia	X	X	20	0.93	460		0.2	5	X	
KR 9317	Blue mudstone	115	30	145	5.6	585		0.2	4	X	
KR 9318	Brown phyllite	105	45	145	6.95	220	X	0.4	4	X	
KR 9319	Lava	X	15	20	1.4	390	X	X	X	X	
KR 9320	Calc siltstone	110	X	30	5.15	950		0.1	3	X	
KR 9321	Grit	45	X	150	6.2	715	X	0.1	4	X	
KR 9322	Breccia	15	X	130	8.2	345	X	0.1	3	X	
KR 9323	Siltstones	50	X	90	3.6	180	X	0.1	X	10	
KR 9324	Mudstone	65	X	20	3.2	35	X	0.1	5	X	
KR 9325	Siltstone	90	X	30	5.80	70	X	0.1	7	X	
KR 9326	Pebbly grit	90	45	130	5.6	730	X	X	5	X	
KR 9327	Dacite	X	5	45	1.9	110	X	0.1	X	X	
KR 9328	Hematitic Conglomerate	20	10	45	19	715	X	X	6	X	
KR 9329	Pyrite breccia	55	15	30	1.8	1450	X	0.2	50	X	
KR 9330	Siltstone	75	X	250	5.6	2400		X	7	X	
KR 9331	Chert Breccia	20	X	20	9.8	1600	X	0.1	X	X	

670048

<u>Sample No</u>	<u>Lithology</u>	<u>Cu</u>	<u>Pb</u>	<u>Zn</u>	<u>Fe%</u>	<u>Mn</u>	<u>Au</u>	<u>Ag</u>	<u>Sn</u>	<u>W</u>	<u>Ba</u>
KR 9332	Banded siltstone	100	5	25	6.3	1400	X	X	X	X	
KR 9333	Sandstone	700	5	80	10	890	X	0.1	8	X	
KR 9334	Pyritic shale	260	35	25	4.6	130	X	1.4	4150	50	
KR 9335A	Silicified siltstone	65	5	5	0.92	290	X	0.1	200	25	
KR 9335B		15	85	50	0.73	140	X	0.2	300	65	

Results in ppm except gold (ppb) and iron (%).

047

670049

<u>Sample No</u>	<u>Cu</u>	<u>Pb</u>	<u>Zn</u>	<u>Fe</u>	<u>Co</u>	<u>Ag</u>	<u>Mo</u>	<u>Au</u>	<u>Sn</u>	<u>W</u>
KR 9336	70	X	55	9.0	90	0.1	4	X	5	20
KR 9337	155	X	50	14.0	145	0.1	2	X	15	30
KR 9338	215	X	35	6.0	40	X	2.5	X	15	15
KR 9339	380	5	30	5.9	80	0.1	X	X	10	25
KR 9340	1700	X	35	8.5	125	0.1	2.5	X	6	20
KR 9341	40	X	35	6.1	60	X	X	X	5	X
KR 9342	45	X	35	7.4	100	0.1	2.0	X	8	20
KR 9343	25	X	40	5.8	50	0.1	0.5	X	7	10
KR 9344	2350	X	40	7.5	50	0.1	1.0	X	9	20
KR 9345	160	120	55	4.3	35	0.9	X	X	3	X
KR 9346	45	X	20	2.0	15	0.1	1.0	X	X	X
KR 9347	10	5	40	3.5	25	X	1.0	X	4	X
KR 9348	5	15	30	3.5	20	0.1	0.5	X	4	X
KR 9349	30	X	35	5.8	95	0.2	4.0	X	4	X
KR 9350	95	X	40	4.4	30	0.1	1.0	X	8	10

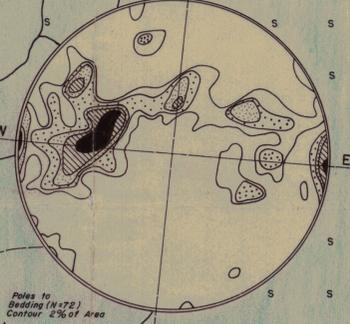
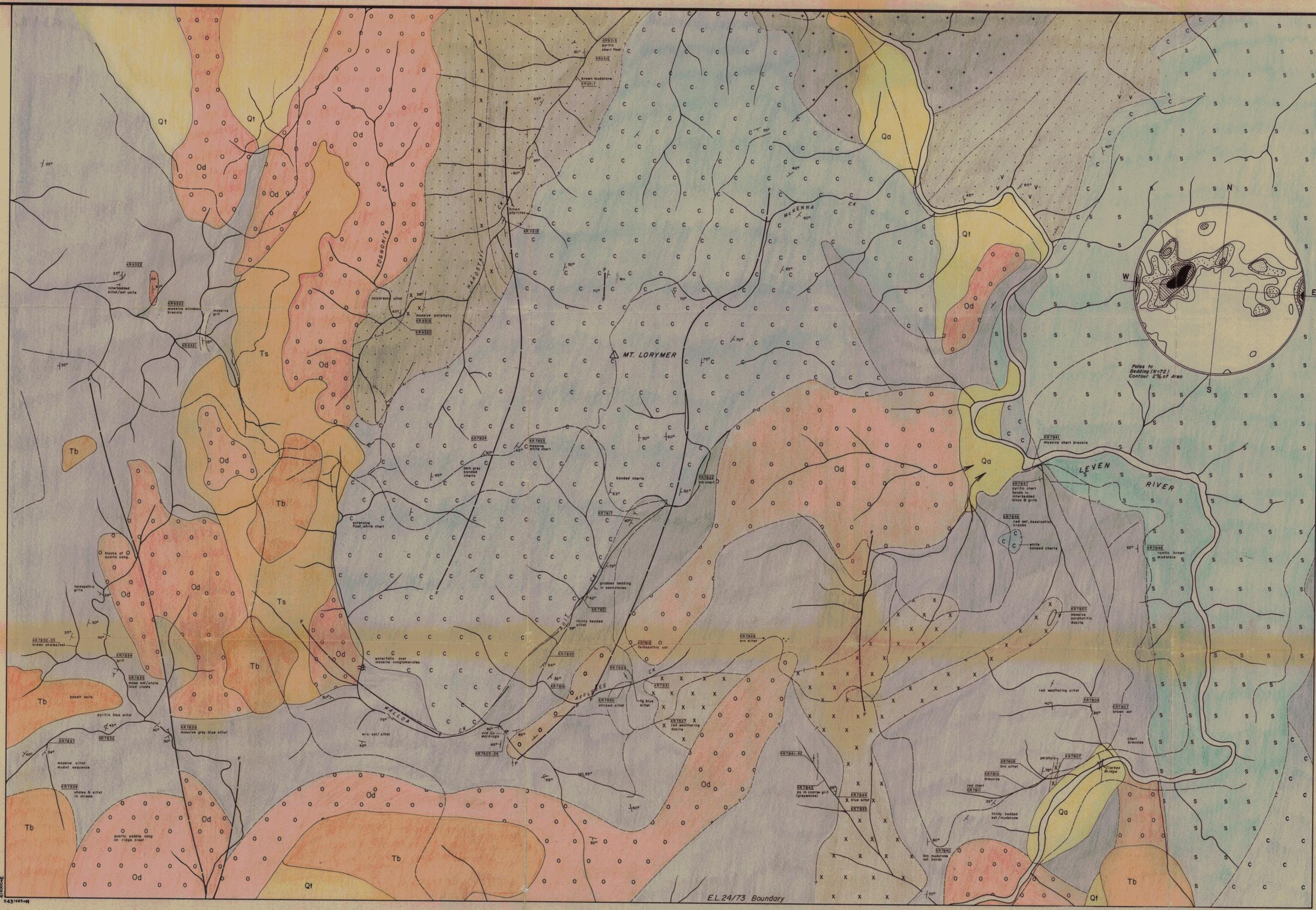
Table 2:

Old workings Walloa Creek

Geochemical results from 1m channel samples

REFERENCES

Burns, K.L. (1964)	Geological Survey Explanatory Report Devonport. Tas. Dept. Mines.
Chapman, J.R. (1976)	Report on Exploration Progress on E.L. 24/73.
Large, R.R. (1981)	Progress Report E.L. 24/73 1980 Field Season.
Large, R.R. and Herrmann, W (1980)	Progress Report on E.L. 24/73 to December 1979.
Scott, T and Chapman J.R. (1977)	Progress Report to 30-4-1977 E.L. 24/73.
Twelvetrees, W.H. (1903)	Report on Dial Range and some other mineral districts on the north-west Coast of Tasmania. Dept. Min. Tas. Publ.



GEOLOGY:

QUATERNARY	Qa	Alluvium
TERTIARY	Ts	Basalt Sediments
ORDOVICIAN	Od	Conglomerate sandstone
CAMBRIAN	S	Spirite — MOTTON SPILLITE
	C	Banded cherts — BARRINGTON CHERT
	44	Sediments - mainly sandstones, siltstones, mudstones, turbidites, tuffaceous units — RADFORDS CREEK GROUP

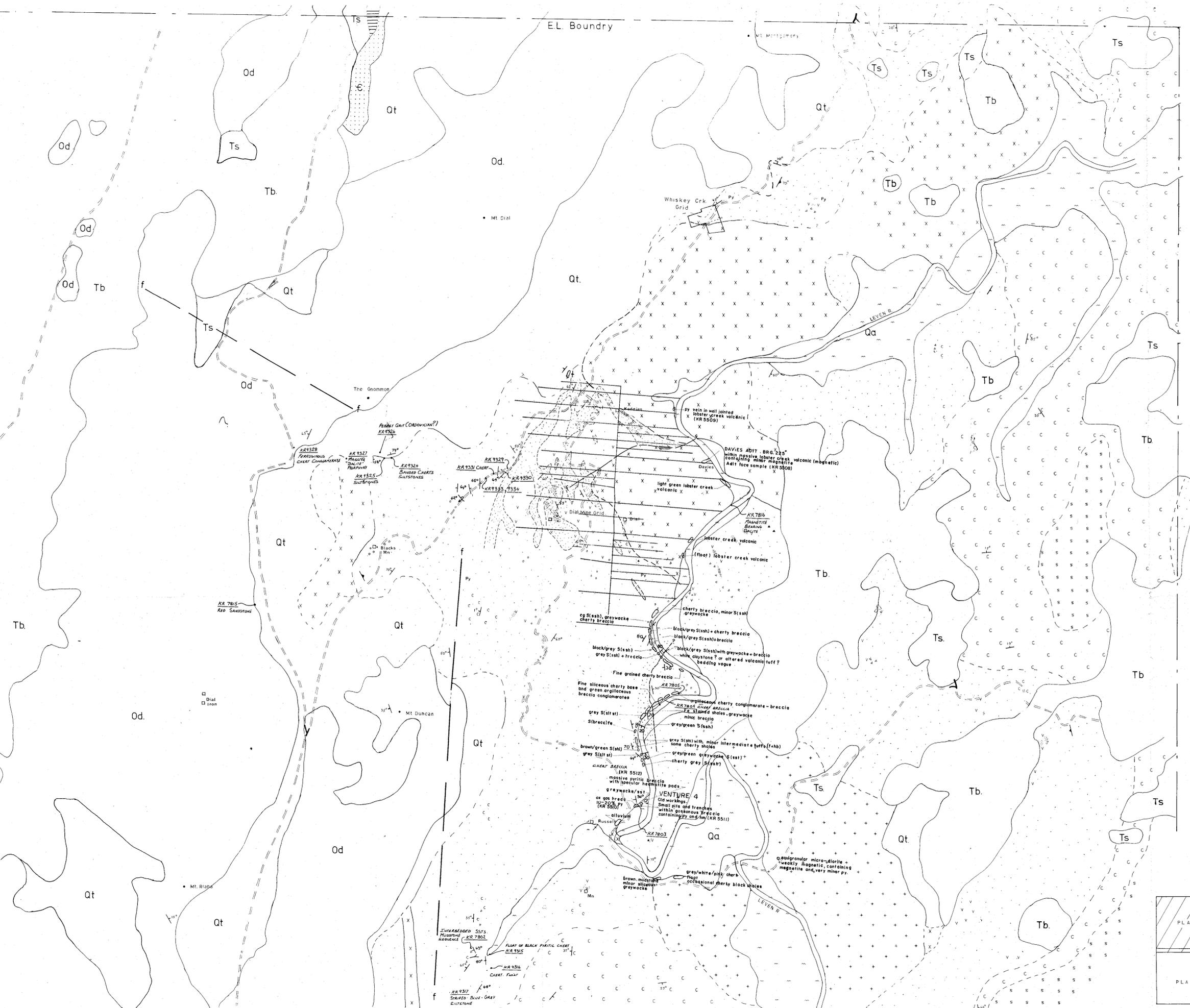
CAMBRIAN	30	Sediments - breccias, mudstones, claystones, etc. — CATEENA GROUP
IGNEOUS ROCKS	X	Potassic 'dacite' possibly intrusive
	44	Massive 'dacite' — LOBSTER CREEK VOLCANICS

STRATIGRAPHY:

—	Strike & dip of cleavage	—	Track
—	Strike & dip of overturned beds	—	Creek
—	Strike & dip of beds	—	Geological boundary
—	Strike & dip of vertical beds	—	Fault
X	Younging direction	—	Rock-chip sample

SCALE: 1:50,000
 DATE: 24/3/82
 GEOL: C.O.S., P.A.W.
 DRAWN: R. 104
 CHECKED: [Signature]

GEOPEKO
 A DIVISION OF PEKO-WALLBEND OPERATIONS LTD — DEVONPORT
 FILE No TS 24/73-34 PLAN No 1
E.L. 24/73 DIAL RANGE, TASMANIA.
 REGIONAL GEOLOGY
 5 cm
 670051 102



LEGEND

Quat.	Qa	Alluvium
	Qt	Talus
Tert.	Ts	Sand & gravel
Ord.	Od	Terrigenous seds
Cambrian	S S	Motton Spillite
	C C	Barrington Chert
	C C C	Cateena 'Mudstone'
	C C C	Mainly fine to medium grained seds
	C C C	Chert & siliceous siltstone
	C C C	Conglomerate
Pre-camb.	V V V	Volcanics - acid to intermediate lavas coarse gr pyroclastics & tuffs
	U U U	Undifferentiated
Igneous Rocks	I I I	Iron Cliffs Limonite
	Tb	Basalt
Cambrian	X X X	Lobster Creek Volcanics
	+	

* - Mineralized or gossanous rocks
 + - Breccia
 □ - Abandoned prospect

670052

5cm

SCALE 1 : 10,344

100 0 200 400 600 METRES

PLATE 1

PLATE 2

82-1875

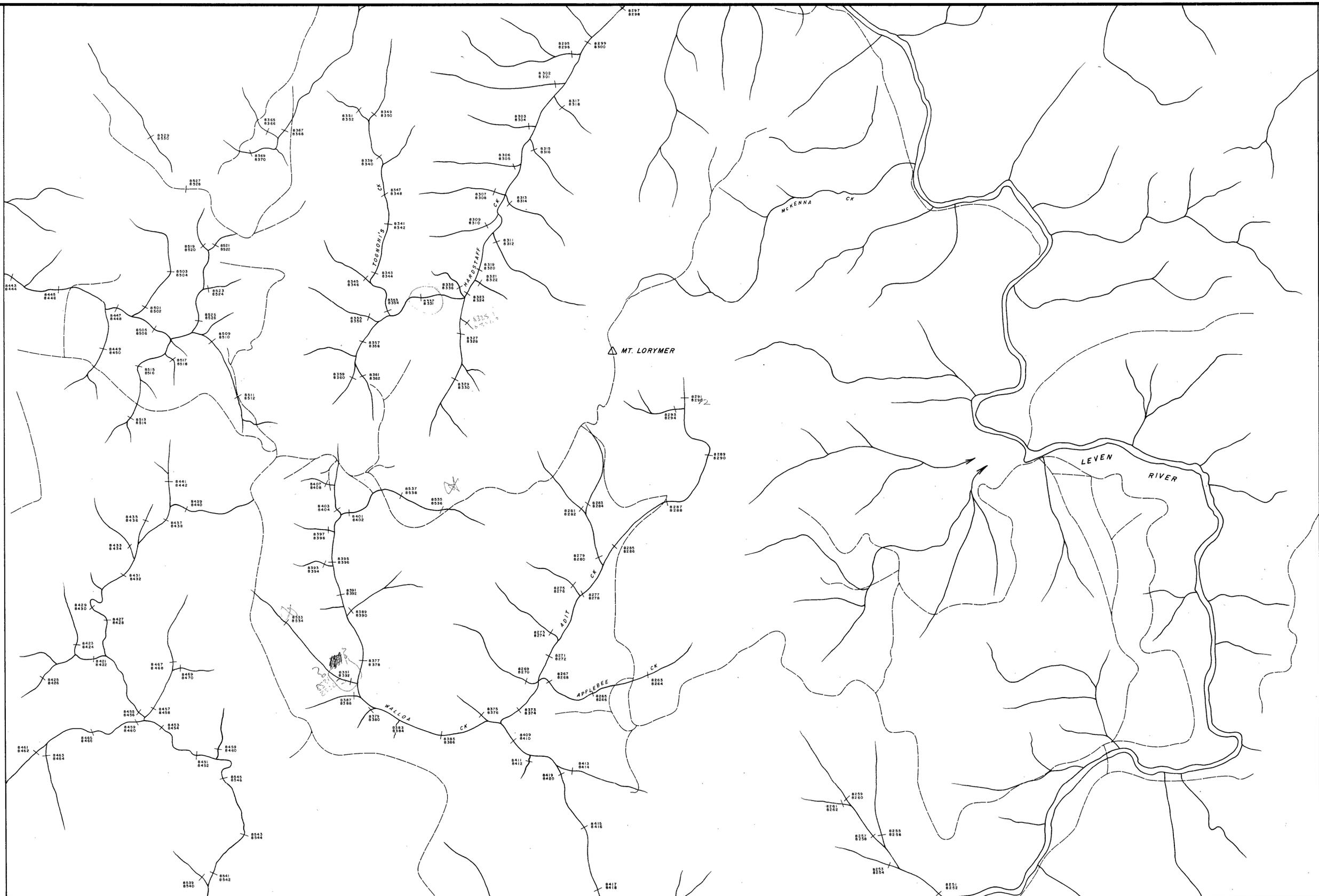
GEOPEKO LIMITED

No. 7524/7

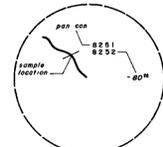
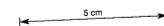
DIAL RANGE E.L.24/73

REGIONAL GEOLOGY

Taken from Devonport 1 inch to 1 mile Geol. (Burns 1964)



67053



1.
2.

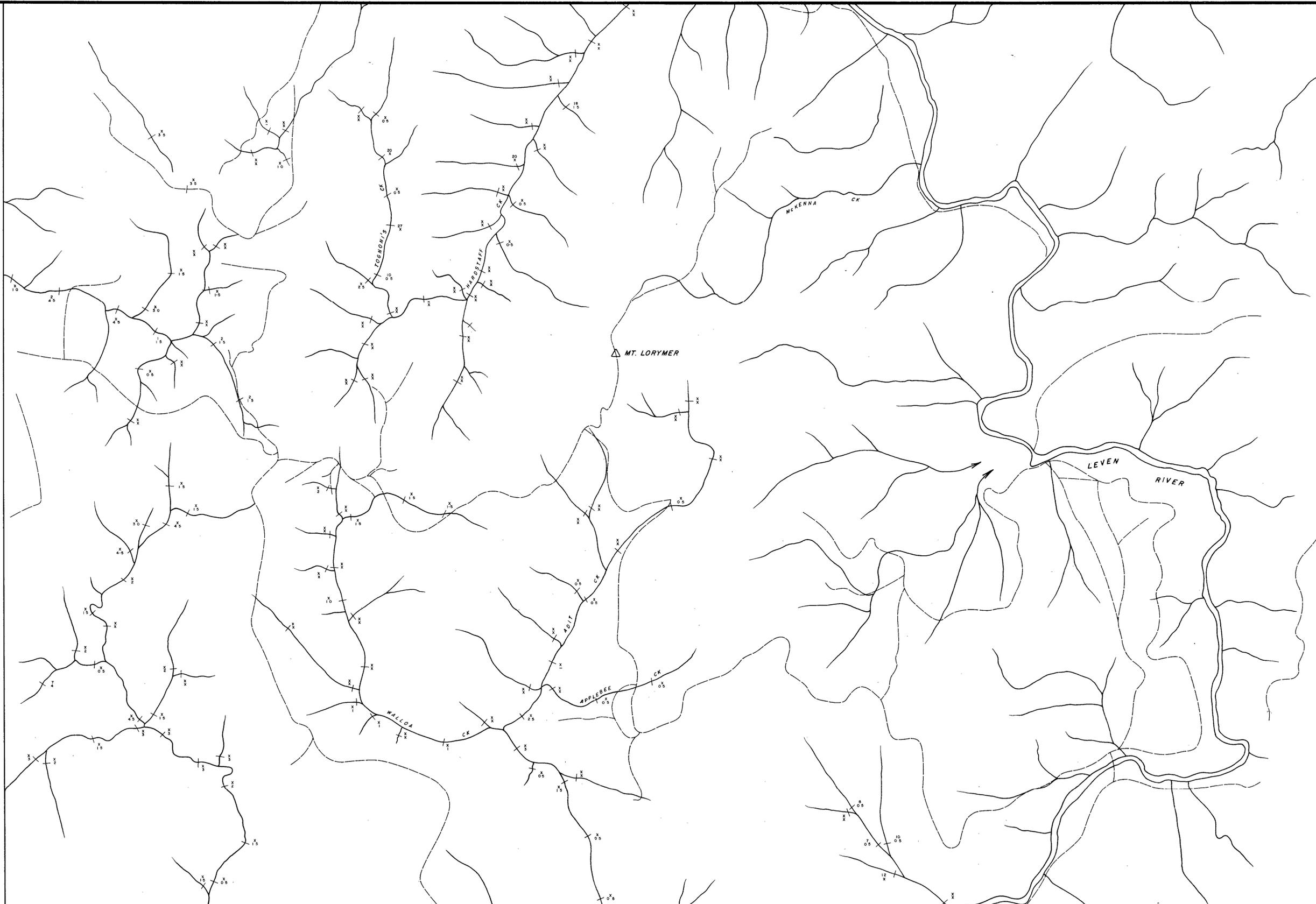
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DATE: 9/9/82
GEOLOGICAL: C.S., P.A.W.
DRAWN BY: T.S.
CHECKED:

GEOPEKO
 A DIVISION OF PEKO-WALLSEND OPERATIONS LTD - DEVONPORT

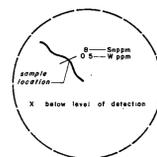
FILE No TS 24/73-26 PLAN No **3**

E.L. 24/73 DIAL RANGE, TASMANIA.

PANNED CONCENTRATE & -80^µ DRAINAGE SAMPLE LOCATIONS



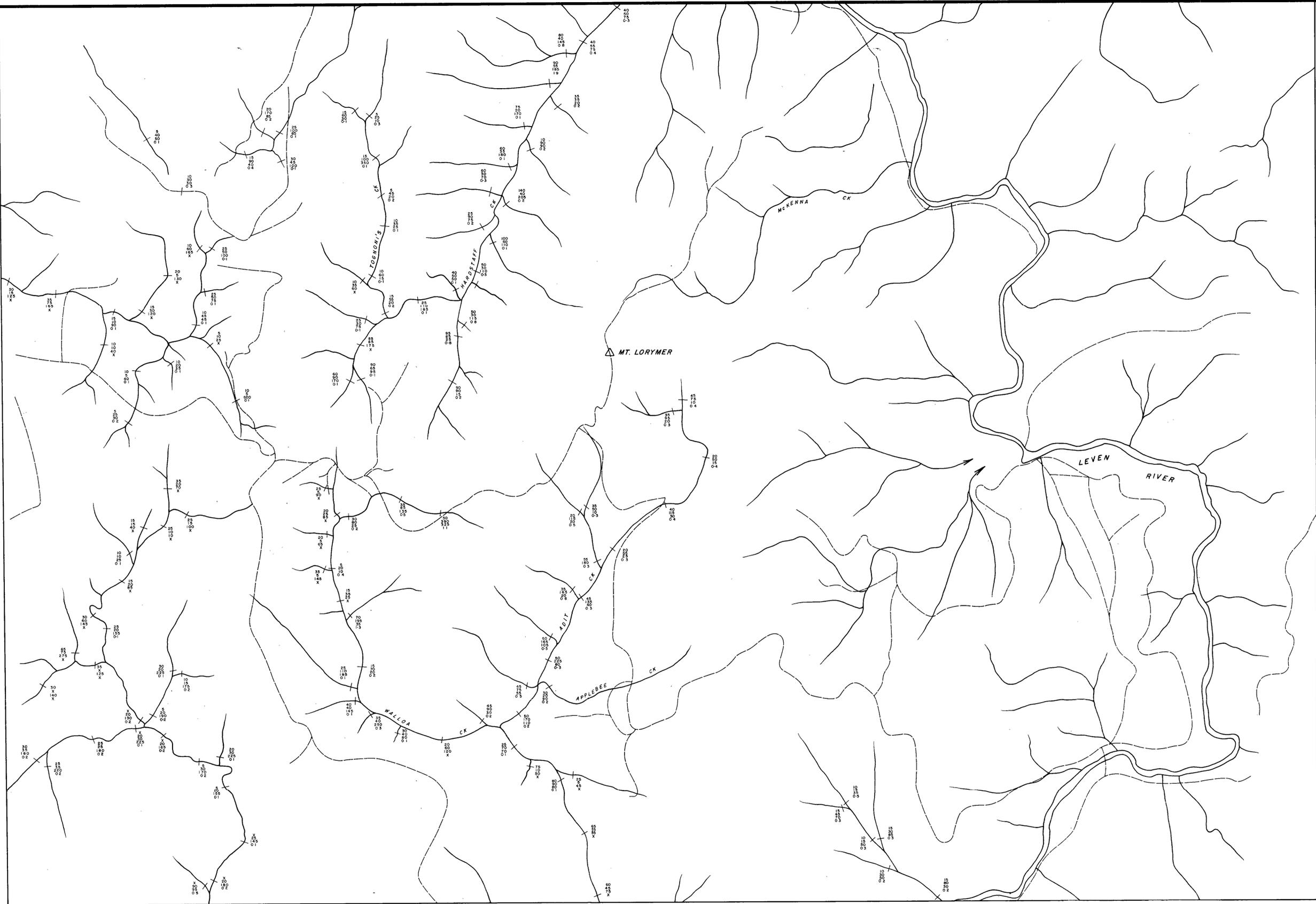
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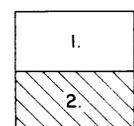
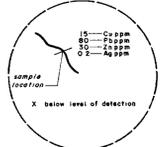
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2.

SCALE	0:000
DATE	9/9/82
GEOLOGICAL	COB, PAW
DRAWN BY	THE
CHECKED	PAW

GEOPEKO A DIVISION OF PEKO-WALLSEND OPERATIONS LTD - DEVONPORT			
FILE No	TS 24/73 - 27	PLAN No	4.
E.L. 24/73 DIAL RANGE, TASMANIA.			
-80# DRAINAGE RESULTS Sn & W			



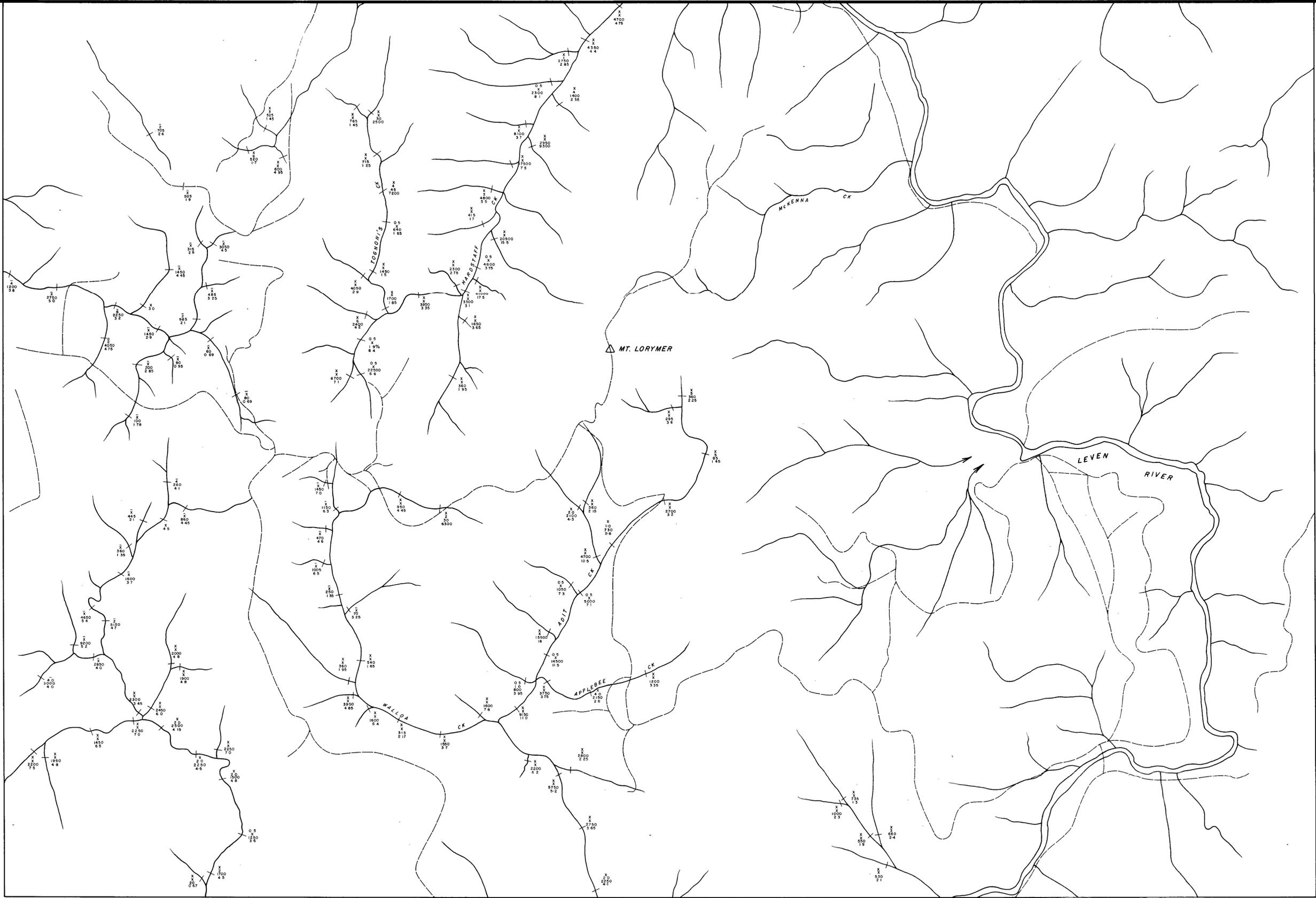
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SCALE	1:500
DATE	10/9/82
GEOLOGICAL	C.S.P.A.W.
DRAWN BY	P.S.
CHECKED	[Signature]

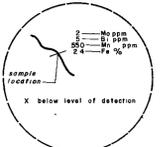
GEOPEKO
A DIVISION OF PEKO-WALLSEND OPERATIONS LTD - DEVONPORT

FILE No	TS 24/73-28	PLAN No	5.
E.L.24/73 DIAL RANGE, TASMANIA.			
-80# DRAINAGE RESULTS Cu, Pb, Zn & Ag			



670050

5 cm



1.
2.

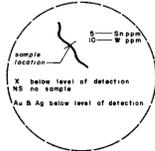
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 DATE 10/9/82
 GEOL. G.S.P.A.W.
 DRAWN R.T.G.
 CHECKED R.U.

GEOPEKO
 A DIVISION OF PEKO-WALLSEND OPERATIONS LTD - DEVONPORT

FILE No	TS 24/73-29	PLAN No	6
E.L.24/73 DIAL RANGE, TASMANIA.			
-80# DRAINAGE RESULTS Mo, Bi, Mn & Fe			



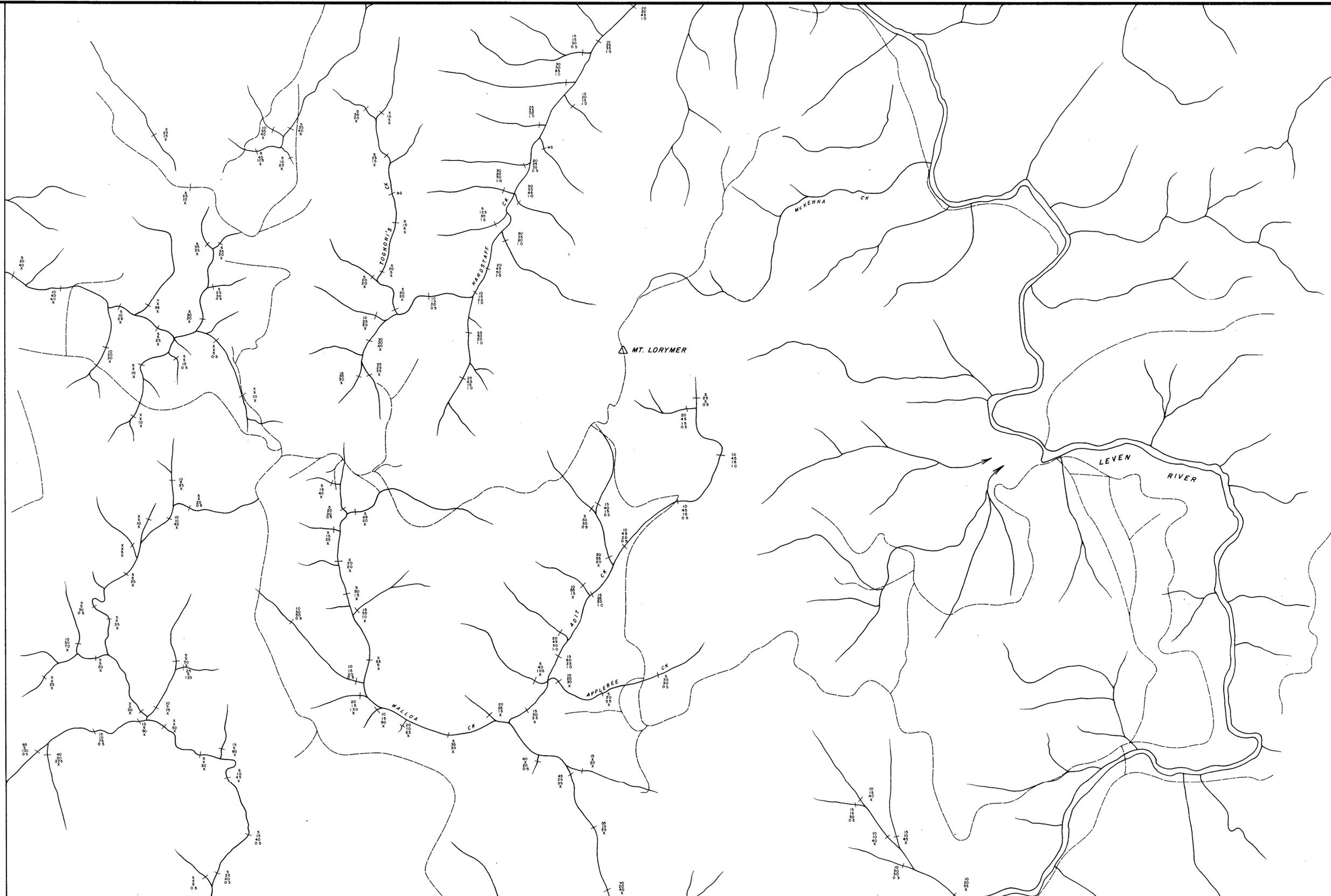
070057



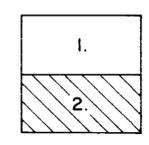
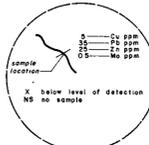
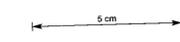
1.
2.

SCALE 1:10 000
DATE 8/9/82
GEOLOGIST P.A.W.
DRAWN: R.Tog
CHECKED: <i>R.Tog</i>

GEOPEKO A DIVISION OF PEKO-WALLSEND OPERATIONS LTD - DEVONPORT		
FILE No	TS 24/73 - 25	PLAN No 7
E.L.24/73 DIAL RANGE, TASMANIA. PANNED CONCENTRATE RESULTS Sn & W		



670058



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DATE	7/9/82
SEAL	C.S.S. P.A.W
DRAWN	P. T. S.
CHECKED	[Signature]

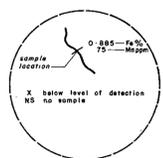
GEOPEKO
A DIVISION OF PEKO-WALLSEND OPERATIONS LTD - DEVONPORT

FILE No	TS 24/73-23	PLAN No	8.
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E.L. 24/73 DIAL RANGE, TASMANIA.
PANNED CONCENTRATE RESULTS
 Cu, Pb, Zn & Mo



670059



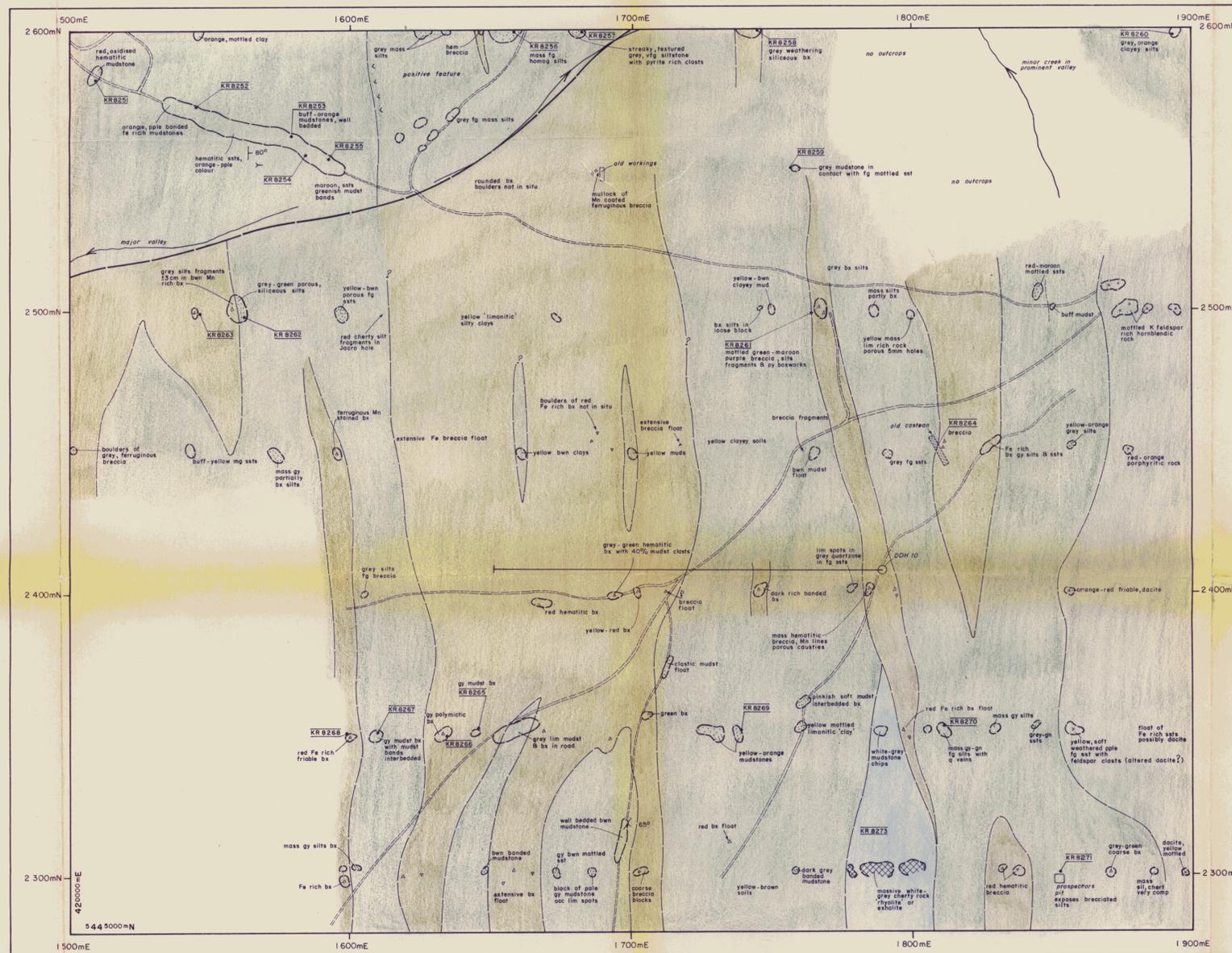
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2.

SCALE 1:10000
 DATE: 8/9/82
 GEOL. CDS, P.A.W.
 DRAWN: R.T.G.
 CHECKED: [Signature]

GEOPEKO
 A DIVISION OF PEKO-WALLSEND OPERATIONS LTD - DEVONPORT

FILE No TS 24/73-24	PLAN No 9
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E.L.24/73 DIAL RANGE, TASMANIA.
PANNED CONCENTRATE RESULTS
Fe & Mn



DIAL MINE GRID



670060

82-1875

GEOLOGY:

	42 Siltstones, sandstones, claystones
	70 Oxidised breccias
	33 Volcanics

CATEENA GROUP

Dolomite

LOBSTER CREEK VOLCANICS

STRATIGRAPHY:

	Strike & dip of cleavage		Track
	Strike & dip of overturned beds		Creek
	Strike & dip of beds		Geological boundary
	Strike & dip of vertical beds		Fault
	Younging direction		Rock-chip sample

Scale 1:1000

DATE 1/9/82

GEOLOGIST P.A.W.

DRAWN R.Tog

CHECKED [Signature]

GEOPEKO
A DIVISION OF PEKO-WALLSEND OPERATIONS LTD.

SCALE 1:1000

No.TS 24/73-22

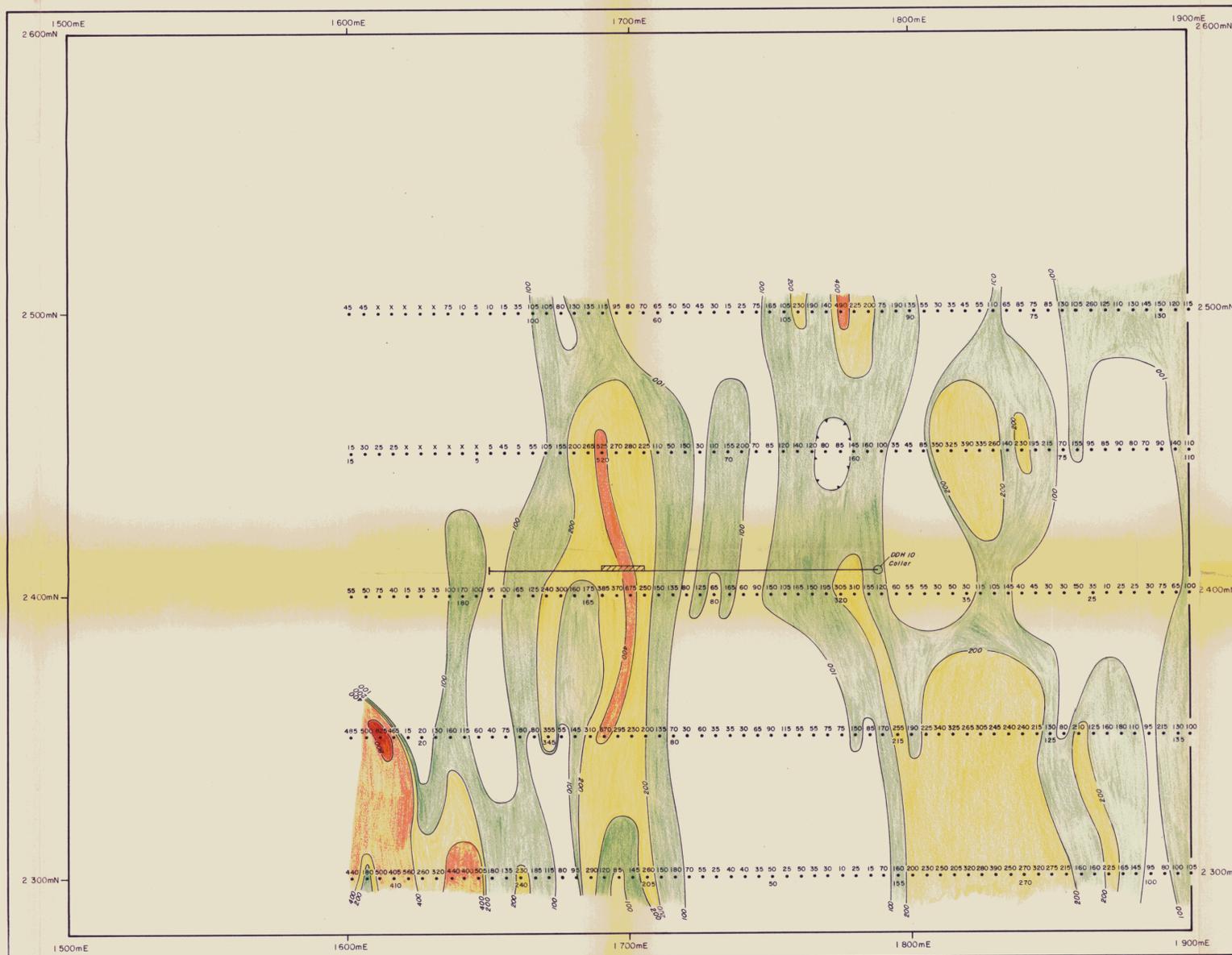
REP.No. 10.

E.L.24/73 DIAL RANGE, T.A.S.

DIAL MINE GRID

DETAILED GEOLOGY AROUND DDH 10

111

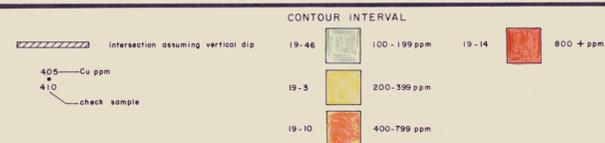


10 20 30 40 50 60 70 80 90
metres
1:1000

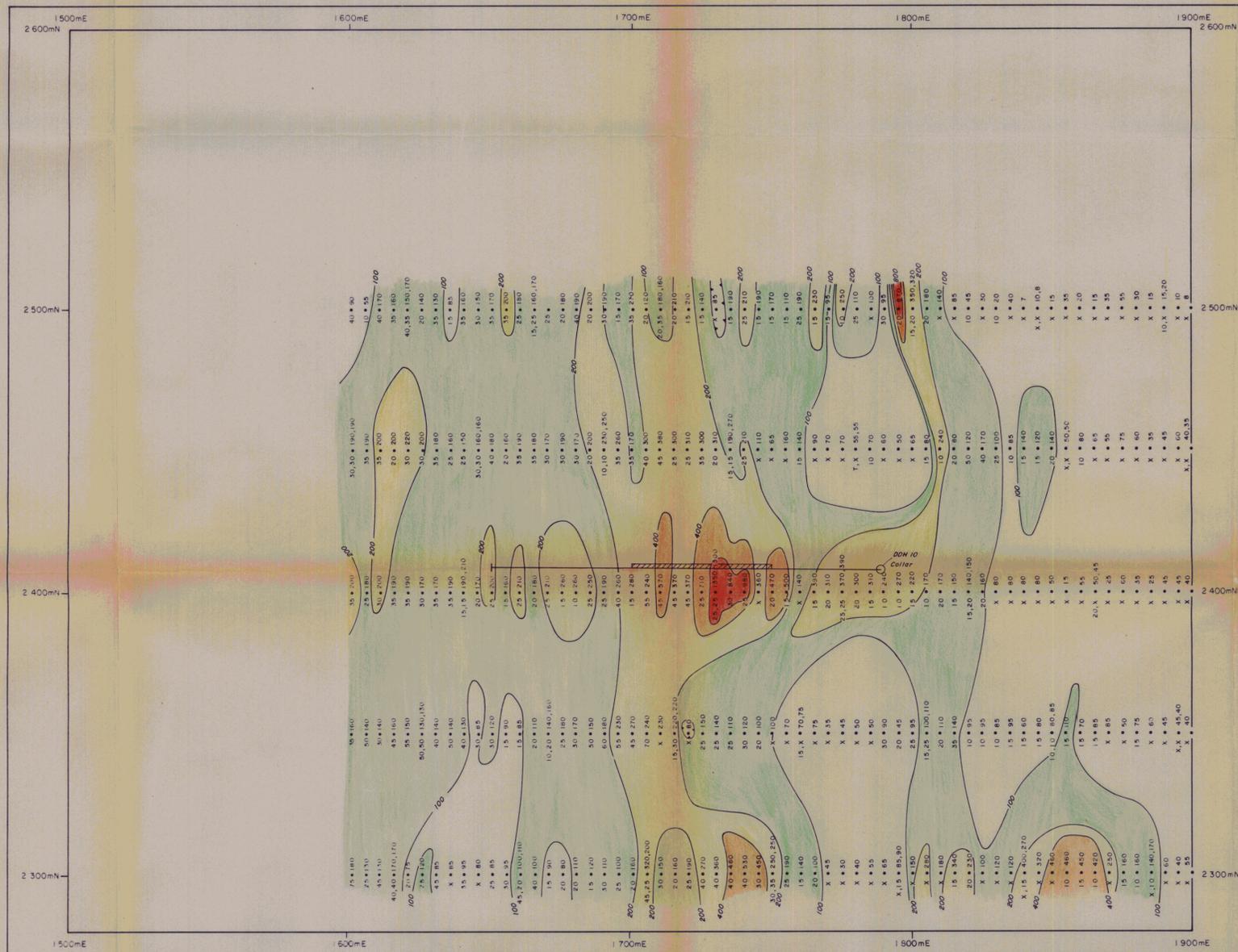
DIAL MINE GRID

670061

5 cm

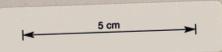


GEOPEKO
A DIVISION OF PEKO-WALLSEND OPERATIONS LTD.
SCALE 1:1000
No.TS 24/73-33 REP.No. //.
DATE 15/9/82
E.L.24/73 DIAL RANGE, TAS.
DIAL MINE GRID
C-HORIZON GEOCHEMICAL RESULTS
Cu Contours
112



0 5 10 20 30 40 50 60 70 80 90
metres
1:1000

DIAL MINE GRID



670062

zone of 100-600ppm
5m clear hole

Wppm — 40, 40 — 170, 170 — 5m ppm
check samples

CONTOUR INTERVAL

19-46	100 - 199 ppm	19-12	800 + ppm
19-3	200 - 399 ppm		
19-10	400 - 799 ppm		

GEOPEKO
A DIVISION OF PEK-ALL-SEND OPERATIONS LTD

1:1000

No. TS 24/73-32 REP. No. 12.

E.L. 24/73 DIAL RANGE, T.A.S.
DIAL MINE GRID
C-HORIZON GEOCHEMICAL RESULTS
Sn Contours

113

PROGRESS REPORT E.L. 24/73 1981 - 1982 SEASON

APPENDIX

GEOCHEMICAL RESULT LISTING

U of M	A.O.	C.G.	E.O.	D.S.M.E.
				Registrar
Received Answered				16 DEC 1982
DEPT. OF MINES				E & IL
REF. No. 10,614/82				

- TS - Prefix for soil samples
- TD - Prefix for drainage samples
- KR - Prefix for rock and core samples

- Regional panned concentrate samples
- Regional -80mesh drainage samples
- Regional rock chip samples
- Rock samples Walloa Creek/DDH 10

**REGIONAL PANNED CONCENTRATE
DRAINAGE SAMPLES.**

002

670065

ANALABS

A DIVISION OF MACDONALD HAMILTON & CO. PTY. LTD.

52 Murray Road, Welshpool, W.A. 6106
Phone (09) 458 7999

K1197

Dial Range

D. Wilson

83.108565

ANALYTICAL REPORT

This report must be read in conjunction with the results given for JOB No.

Client: Geopets Ltd

(1) Devonport

Order No. KP2742 Date Received 16/9/81

Reference..... Results Required.....

Delivered by..... Total No. of Samples 56

(2) SAMPLE NUMBERS	STATE OF SAMPLES	Average Weight	PRETREATMENT								ANALYSIS				
	Refer to section (5) for terminology		Dry	Crush	Split	Pulverize	Sieve	Evaporate	Other (See remarks)	None	Refer to section (5) for terminology			Preparation	Method
<u>TD 8409 - 69</u>	<u>So</u>			<u>1</u>	<u>2</u>							<u>Cu Pb Zn Fe Mn</u>	<u>A1/1</u>		
<u>TD 8501 - 49</u>												<u>Ag</u>	<u>A1/2</u>		
												<u>Mo</u>	<u>A1/6</u>		
												<u>Sn W</u>	<u>XRF</u>		
												<u>Au</u>	<u>LA10</u>		

(3) Number of pages of results: 6
 Date Reported: 21/9/81
 Results to: (1) As, Ag, Au, S (2).....
 Per: Telex, mail
 Number of Copies: 3

(4) Remarks:

DIAL RANGE
REGIONAL
PANNELED CONC
SAMPLES

(5) STATE OF SAMPLES	ANALYSIS - PREPARATION	ANALYSIS - METHOD
whole core WC	perchloric acid A1	atomic absorption AAS
split core SC	hydrochloric acid A2	x-ray fluorescence XRF
cutting CU	nitric acid A3	spectrophotometry SPEC
rock Ro	aqua regia A4	colorimetry COL
soil SO	nitric-perchloric A5	chromatography CHR
pulp PU	HF mixture A6	titration TTN
water WA	HF under pressure A7	other chemicals means CHEM
tissue TI	fusion A8	miscellaneous MISC
stream sediment SS		fluorescence FLUOR
heavy mineral HM		

Authorized Officer: B. Doran

ATTENTION Please advise us regarding the disposal of your samples.

JOB No.

- DISCARD IMMEDIATELY KEEP UNTIL ADVISED (A STORAGE CHARGE WILL BE MADE)
- DISCARD AFTER 2 MONTHS RETURN TO:.....

(PLEASE TICK APPROPRIATE BOX)

003

670066

ANALABS

A division of MacDonald Hamilton & Co. Pty. Ltd.
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

Phone (09) 458 7999

Code No. 83.1 08 565

Division Cooee, Tasmania

Phone 316837

Rack No. R-13 / 39

Page No. 1

Order No. KP 2742

RESULT SHEET

TUBE No.	SAMPLE No.		Cu	Pb	Zn	Fe	Mn	Ag	Mo
1	TD	8409	10	15	20	1.35%	315	0.2	x
2		11	40	x	20	1.8%	395	0.3	0.5
3		13	15	x	20	1.45%	805	0.2	x
4		15	55	15	35	2.65%	535	0.2	x
5		17	70	20	40	3.35%	825	0.1	x
6		19	45	25	35	2.5%	710	0.1	x
7		21	x	5	20	1.05%	665	0.1	x
8		23	10	30	70	4.35%	935	0.3	x
9		25	x	x	25	7650	575	x	x
10		27	5	5	35	2.35%	420	0.1	x
11		29	5	5	30	1.5%	340	0.2	0.5
12		31	5	5	25	1.95%	300	0.2	x
13		33	x	x	5	4050	40	0.1	x
14		35	x	x	10	6400	60	x	x
15		37	10	10	40	3.55%	395	0.1	x
16		39	5	x	25	1.65%	175	0.2	0.5
17		41	10	5	35	3.3%	115	0.1	x
18		43	5	20	40	5.25%	210	0.2	x
19		45	10	40	60	12.5%	300	0.1	x
20	TD	8447	5	10	25	2.4%	340	0.2	x
21		49	10	20	30	5.65%	120	0.1	x
22		51	5	x	30	1.1%	365	x	x
23		53	x	x	30	8700	395	0.1	x
24		55	x	x	20	8750	425	x	x
25		57	10	5	75	2.2%	720	x	x
26		59	15	5	90	3.2%	845	0.1	x
27		61	85	5	100	4.35%	980	0.1	0.5
28		63	40	30	225	5.65%	1350	0.2	x
29		65	15	10	75	3.0%	935	0.1	0.5
30		67	5	5	30	1.55%	165	0.1	x
31		69	25	5	125	5.75%	940	0.1	x
32	TD	8501	5	x	55	4.3%	995	0.2	x
33		03	10	35	40	8.0%	340	0.1	x
34		05	5	5	25	3.3%	150	0.1	x
35		07	x	x	10	3900	25	0.1	x
36		09	x	x	5	1900	10	0.1	0.5
37		11	x	x	10	1650	10	0.1	x
38		13	x	x	10	1.7%	30	x	x
39		15	5	x	10	9800	30	x	x
40	TD	8517	5	5	15	1.6%	40	x	0.5
Detection			5	5	5	50	5	0.1	0.5
Standard	ASSS		445	340	100	35.0%	250	0.8	4.5
Repeat--	TD	8409	10	15	20	1.45%	320	0.2	x
Repeat--	TD	8447	5	10	25	2.4%	340	0.2	x
Method			A1/1					A1/2	A1/6

RESPONSIBLE OFFICER
B. D. ...
 21.9.81

Results in ppm unless otherwise specified
 T = element present, but concentration too low to measure
 X = element concentration is below detection limit
 - = element not determined

004

670067

ANALABS

A division of MacDonald Hamilton & Co. Pty. Ltd.
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

Phone (09) 458 7999

Code No.

83.1 08 565

Division Coors, Tasmania

Phone 316837

Rack No.

R-18B/14

Page No.

2

Order No.

KP 2742

RESULT SHEET

TUBE No.	SAMPLE No.		Cu	Pb	Zn	Fe	Mn	Ag	Mo
1	TD	8519	5	35	35	1.25%	50	0.3	x
2		21	5	35	30	1.8%	390	0.2	x
3		23	5	25	30	1.8%	275	0.2	0.5
4		25	x	30	20	9400	280	0.2	x
5		27	x	35	10	4800	45	0.3	x
6		29	x	25	15	6800	90	0.2	x
7		31	x	20	10	6500	45	0.3	x
8		33	10	30	50	4.15%	650	0.2	0.5
9		35	15	55	10	3400	15	0.2	x
10		37	5	40	25	3650	20	0.3	x
11		39	x	5	5	1900	10	x	0.5
12		41	5	25	40	1.55%	390	0.2	0.5
13		43	5	15	40	1.45%	460	0.1	0.5
14		45	5	10	45	1.4%	375	0.1	x
15		47	25	25	270	4.7%	1150	0.2	x
16	TD	8549	x	5	25	6600	115	0.2	x
17									
18									
19									
20									
21									
22									
23									
24									
25									
26									
27									
28									
29									
30									
31									
32									
33									
34									
35									
36									
37									
38									
39									
40									
Detection			5	5	5	50	5	0.1	0.5
Standard	ASS5		450	340	100	34.5%	270	0.8	4.0
Repeat-	TD	8519	5	30	30	1.35%	50	0.2	x
Repeat-									
Method			A/1					A/2	M/6

RESPONSIBLE OFFICER B. Dan
21/9/81

Results in ppm unless otherwise specified
 T = element present; but concentration too low to measure
 X = element concentration is below detection limit
 - = element not determined

005

670068

ANALABS

A division of MacDonald Hamilton & Co. Pty. Ltd.
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

Dial P. Wilson

Division Coore, Tasmania

Phone (09) 458 7999

Phone 316837

Code No.

83.1 08 565

Rack No.

Page No.

3

Order No.

KP2742

RESULT SHEET

TUBE No.	SAMPLE No.		Au	Wt Assayed where less (g)	than 40.0g
1	TD	8409	x		
2		11	x		
3		13	x		
4		15	x		
5		17	x		
6		19	x		
7		21	x		
8		23	x		
9		25	x		
10		27	x		
11		29	x	35.0	
12		31	x		
13		33	x		
14		35	x	30.0	
15		37	x		
16		39	x		
17		41	x		
18		43	x		
19		45	x		
20	TD	8447	x		
21		49	x		
22		51	x		
23		53	x		
24		55	x		
25		57	x		
26		59	x		
27		61	x		
28		63	x		
29		65	x	5.0	
30		67	x		
31		69	x		
32	TD	8501	x	30.0	
33		03	x		
34		05	x		
35		07	x		
36		09	x		
37		11	x		
38		13	x		
39		15	x		
40	TD	8517	x		
Detection			0.008		
Standard					
Repeat-					
Repeat-					
Method			LL40		

DIAL RANGE
REGIONAL
PANED CONC
SAMPLES.

RESPONSIBLE OFFICER B. Dora
24 / 9 / 81

Results in ppm unless otherwise specified
T = element present; but concentration too low to measure
X = element concentration is below detection limit
- = element not determined

006

670069

ANALABS

A division of MacDonald Hamilton & Co. Pty. Ltd.
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

Phone (09) 458 7999

Code No. 83.1 08 565

Division Coors, Tasmania

Phone 316837

Rack No. _____

Page No. 4

Order No. KP 2742

RESULT SHEET

TUBE No.	SAMPLE No.		Au	wt assayed where less (g) than 40.0g		
1	TD 8519		X	25.0		
2	21		X	25.0		
3	23		X	15.0		
4	25		X			
5	27		X			
6	29		X	15.0		
7	31		X	25.0		
8	33		X	30.0		
9	35		X			
10	37		X			
11	39		X			
12	41		X			
13	43		X			
14	45		X			
15	47		X	35.0		
16	TD 8549		X			
17						
18						
19						
20						
21						
22						
23						
24						
25						
26						
27						
28						
29						
30						
31						
32						
33						
34						
35						
36						
37						
38						
39						
40						
Detection			0.008			
Standard						
Repeat -						
Repeat -						
Method			LC 40			

RESPONSIBLE OFFICER B. Brown
23/9/81

Results in ppm unless otherwise specified
T = element present; but concentration too low to measure
X = element concentration is below detection limit
- = element not determined

007

670070

Dial Range P. Wilson

ANALABS

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Code No. 83.1 08 565

Division Cooee, Tasmania

Phone 316837

Rack No. _____

Page No. 5

Order No. KP 2742

K497

RESULT SHEET

TUBE No.	SAMPLE No.		Sn	W					
1	TD	8409	4	X					
2		11	5	15					
3		13	X	X					
4		15	X	X					DIAL RANGE REGIONAL
5		17	X	X					
6		19	X	X					PANNED CONCENTRATED SAMPLES.
7		21	30	X					
8		23	5	X					
9		25	10	X					
10		27	3	X					
11		29	5	10					
12		31	5	X					
13		33	X	X					
14		35	X	X					
15		37	X	10					
16		39	3	X					
17		41	5	X					
18		43	X	15					
19		45	7	X					
20	TD	8447	6	X					
21		49	5	X					
22		51	X	X					
23		53	5	10					
24		55	9	X					
25		57	X	X					
26		59	X	X					
27		61	5	X					
28		63	X	X					
29		65	X	X					
30		67	6	X					
31		69	3	X					
32	TD	8501	3	X					
33		03	9	X					
34		05	4	X					
35		07	X	X					
36		09	X	X					
37		11	3	X					
38		13	6	X					
39		15	X	10					
40	TD	8517	X	X					
Detection			3	10					
Standard									
Repeat -									
Repeat -									
Method			VRF						

RESPONSIBLE OFFICER B. D. ...
29/9/81

Results in ppm unless otherwise specified
T = element present; but concentration too low to measure
X = element concentration is below detection limit
- = element not determined

670071

ANALABS

A division of MacDonald Hamilton & Co. Pty. Ltd.
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

Phone (09) 458 7999

Code No. 83-108 565

Division..... Cooee, Tasmania

Phone... 316837

Rack No. _____

Page No. 6

Order No. KP 2742

RESULT SHEET

TUBE No.	SAMPLE No.		Sn	W					
1	TD	8519	X	X					
2		21	X	X					
3		23	3	X					
4		25	X	X					
5		27	X	X					
6		29	3	X					
7		31	X	X					
8		33	X	X					
9		35	X	X					
10		37	X	X					
11		39	X	X					
12		41	7	X					
13		43	5	X					
14		45	4	X					
15		47	5	X					
16	TD	8549	4	X					
17									
18									
19									
20									
21									
22									
23									
24									
25									
26									
27									
28									
29									
30									
31									
32									
33									
34									
35									
36									
37									
38									
39									
40									
Detection			3	10					
Standard									
Repeat-									
Repeat-									
Method			XRF						

Results in ppm unless otherwise specified
 T = element present; but concentration too low to measure
 X = element concentration is below detection limit
 - = element not determined

RESPONSIBLE CER

B. D. ...
 29 / 9 / 81

009

ANALABS

A DIVISION OF MACDONALD HAMILTON & CO. PTY. LTD.
52 Murray Road, Welshpool, W.A. 6106
Phone (09) 458 7999

Dial Range

670072

ANALYTICAL REPORT

This report must be read in conjunction with the results given for JOB No. 83.1 08 536

Client GEORGE LTD

(1) DEVONPORT

Order No. KP 2718 Date Received 28/8/81

Reference..... Results Required.....

Delivered by..... Total No. of Samples 79

(2) SAMPLE NUMBERS	STATE OF SAMPLES	Average Weight	PRETREATMENT							ANALYSIS					
	Refer to section (5) for terminology		Dry	Crush	Split	Pulverize	Sieve	Evaporate	Other (see remarks)	None	Refer to section (5) for terminology			Preparation	Method
TD 8251-8407	SO					1						Cu Pb Zn Fe Mn	A1/1		
[000 NUMBERS]												Ag	A1/2		
												Mo	A1/6		
												Sn W	XRF		
												Au	LC40		

(3) Number of pages of results: 6
 Date Reported: 3/9/81
 Results to: (1) As Above (2).....
 Per: Telex, Mail
 Number of Copies: 3

(4) Remarks:

DIAL RANGE
PANDED CONCENTRATE
DRAINAGE SAMPLES.

(5) STATE OF SAMPLES		ANALYSIS - PREPARATION				ANALYSIS - METHOD	
whole core	WC	perchloric acid	A1	cold acid	CA	atomic absorption	AAS
split core	SC	hydrochloric acid	A2	specific sulphide,	SS	x-ray fluorescence	XRF
cutting	CU	nitric acid	A3	other mixed acids	Ma	spectrophotometry	SPEC
rock	RO	aqua regia	A4	alkaline attack	AA	colorimetry	COL
soil	SO	nitric-perchloric	A5	volatilization	VO	chromatography	CHR
pulp	PU	HF mixture	A6	ignition	IG	titration	TTN
water	WA	HF under pressure	A7	pressed powder (XRF)	PP	other chemical means	CHEM
tissue	TI	fusion	A8	glass fusion (XRF)	GF	miscellaneous	MISC
stream sediment	SS					fluorescence	FLUOR
heavy mineral	HM						

Authorized Officer B. Dan

ATTENTION Please advise us regarding the disposal of your samples.

JOB No. 83.1 08 536

- DISCARD IMMEDIATELY KEEP UNTIL ADVISED (A STORAGE CHARGE WILL BE MADE)
- DISCARD AFTER 2 MONTHS RETURN TO:.....

(PLEASE TICK APPROPRIATE BOX)

010

670073

ANALABS

A division of MacDonald Hamilton & Co. Pty. Ltd.
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

Phone (09) 458 7999

Code No. 83.1 08 536

Division Copper, Tasmania

Phone 316837

Rack No. R-10 / 34^{1/2}

Page No. 1

Order No. KP 2718

RESULT SHEET

TUBE No.	SAMPLE No.		Cu	Pb	Zn	Fe	Mn	Ag	Mo
1	TD	8251	10	20	55	2.2%	320	0.3	x
2		53	10	30	50	3.8%	280	0.3	x
3		55	15	10	45	2.15%	570	0.2	x
4		57	10	10	40	2.5%	405	0.2	x
5		59	10	15	40	2.6%	645	0.1	x
6		61	15	15	50	2.3%	635	0.2	0.5
7		63	5	35	30	1.05%	120	0.2	0.5
8		65	5	20	25	1.0%	285	0.4	x
9		67	10	20	30	1.0%	175	0.2	x
10		69	15	60	25	1.15%	90	0.2	1.0
11		71	15	60	25	1.6%	395	0.3	1.0
12		73	20	45	30	2.35%	785	0.2	1.0
13		75	10	55	15	4500	30	0.4	x
14		77	15	55	20	1.35%	190	0.4	1.0
15		79	20	55	20	1.7%	250	0.5	x
16		81	5	30	30	2800	45	0.4	0.5
17		83	15	40	15	7800	20	0.4	0.5
18		85	10	45	20	8850	75	0.3	0.5
19		87	10	45	15	6700	65	0.4	0.5
20	TD	8289	10	45	15	5750	15	0.4	1.0
21		91	5	25	5	4800	15	0.4	0.5
22		93	20	45	15	1.1%	35	0.3	0.5
23		95	15	15	30	8850	140	0.5	0.5
24		97	20	20	45	5.8%	1900	0.3	1.0
25		99	15	25	35	2.5%	620	0.5	1.5
26	TD	8301	30	50	65	9.0%	5300	2.2	1.0
27		03	25	25	50	2.9%	745	0.5	1.0
28		05	20	25	35	2.45%	755	0.3	0.5
29		07	30	20	50	4.1%	590	0.3	1.0
30		09	5	125	25	6250	115	0.5	1.5
31		11	50	35	60	8.1%	3650	0.3	1.0
32		13	50	35	45	3.6%	1250	0.3	1.0
33		15	SAMPLE NOT SUBMITTED						
34		17	15	20	15	3.75%	255	0.2	1.0
35		19	20	45	50	2.0%	650	0.4	1.5
36		21	65	35	55	6.0%	5900	0.3	1.0
37		23	10	15	20	1.25%	320	0.3	1.0
38		25	10	15	40	1.2%	290	0.3	1.0
39		27	55	50	20	3.05%	580	0.3	1.0
40	TD	8329	25	65	15	1.05%	45	0.3	1.0
Detection			5	5	5	5	5	0.1	0.5
Standard	ASSS		450	335	105	29.0%	245	0.8	5.0
Repeat-	TD	8251	10	20	60	2.15%	315	0.2	0.5
Repeat-	TD	8289	10	40	15	5700	15	0.4	0.5
Method			A/1					A/2	A/6

RESPONSIBLE OFFICER B. Dean
3.9.81

Results in ppm unless otherwise specified
T = element present; but concentration too low to measure
X = element concentration is below detection limit
- = element not determined

ANALABS

A division of MacDonald Hamilton & Co. Pty. Ltd.
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

Phone (09) 458 7999

Code No. 83.1 08 536

Division Cooper, Tasmania

Phone 316837

Rack No. R-10 / 34

Page No. 2

Order No. KP 2718

RESULT SHEET

TUBE No.	SAMPLE No.		Cu	Pb	Zn	Fe	Mn	Ag	Mo
1	TD	8331	10	15	20	1.4%	815	0.3	0.5
2		33	5	30	20	1.0%	125	0.3	X
3		35	10	50	25	1.45%	370	0.3	X
4		37	X	10	10	8200	35	0.2	X
5		39	5	25	15	4500	30	0.2	X
6		41	X	15	5	3400	65	0.1	X
7		43	X	20	5	4700	190	0.2	X
8		45	5	20	20	7750	755	0.2	X
9		47	SAMPLE NOT SUBMITTED						
10		49	X	15	5	2700	20	0.1	X
11		51	5	55	20	3650	30	0.2	X
12		53	5	20	30	2.1%	1150	0.2	X
13		55	10	25	20	1.25%	330	0.3	X
14		57	30	20	40	1.3%	1150	0.2	X
15		59	15	20	30	1.05%	960	0.2	X
16		61	55	25	35	4.1%	1750	0.2	X
17		63	5	15	15	3450	25	0.2	X
18		65	10	55	40	7850	45	0.4	X
19		67	5	35	40	4700	45	0.3	X
20	TD	8369	5	40	105	3000	30	0.3	X
21		71	5	10	20	1.8%	130	0.2	X
22		73	15	30	35	2.0%	565	0.2	X
23		75	20	55	15	2.3%	180	0.3	X
24		77	X	65	5	3750	35	0.2	X
25		79	10	15	90	2.5%	315	0.2	X
26		81	5	30	20	1.7%	175	0.2	X
27		83	20	10	65	2.0%	115	0.2	X
28		85	5	35	30	2.3%	235	0.2	X
29		87	20	15	120	7.0%	480	0.2	X
30		89	15	55	10	1.05%	25	0.4	X
31		91	5	50	15	6200	35	0.2	X
32		93	20	30	85	6.0%	420	0.1	X
33		95	X	20	20	1900	15	0.2	X
34		97	X	15	25	1.5%	135	0.2	X
35		99	X	65	15	7150	105	0.3	X
36		8401	5	45	20	2800	20	0.3	X
37		03	5	20	30	1.7%	160	0.2	0.5
38		05	5	20	35	3.0%	140	0.2	0.5
39	TD	8407	5	15	40	2.5%	740	0.1	X
40									
Detection			5	5	5	5	5	0.1	0.5
Standard	ASSS		455	320	105	28.5%	260	0.7	4.0
Repeat—	TD	8331	5	25	20	1.4%	805	0.2	X
Repeat—	TD	8369	10	35	100	2900	30	0.3	X
Method			A1/1					A1/2	A1/6

RESPONSIBLE OFFICER B. D. ... 3.19.81

Results in ppm unless otherwise specified
T = element present; but concentration too low to measure
X = element concentration is below detection limit
- = element not determined

012

Dial Range P. 11

ANALABS

A division of MacDonald Hamilton & Co. Pty. Ltd.
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

Phone (09) 458 7999

Code No. 83.1 08 536

Division Cooper, Tasmania

Phone 316837

Rack No. _____

Page No. 3

Order No. KP2718

670075

RESULT SHEET

TUBE No.	SAMPLE No.		Au						
1	TO	8251	x						
2		53	x						
3		55	x						
4		57	x						
5		59	x						
6		61	x						
7		63	x						
8		65	x						
9		67	x						
10		69	x						
11		71	x						
12		73	x						
13		75	x						
14		77	x						
15		79	x						
16		81	x						
17		83	x						
18		85	x						
19		87	x						
20	TO	8289	x						
21		91	x						
22		93	x						
23		95	x						
24		97	x						
25		99	x						
26	TO	8301	x						
27		03	x						
28		05	x						
29		07	x						
30		09	x						
31		11	x						
32		13	x						
33		17	x						
34		19	x						
35		21	x						
36		23	x						
37		25	x						
38		27	x						
39		29	x						
40	TO	8331	x						
Detection			0.02						
Standard									
Repeat-									
Repeat~									
Method			6410						

DIAL RANGE
REGIONAL
DANNED CONCENTRATED
DRAINAGE SAMPLES

RESPONSIBLE OFFICER B. Bar
14/9/81

Results in ppm unless otherwise specified
T = element present; but concentration too low to measure
X = element concentration is below detection limit
- = element not determined

013

ANALABS

A division of MacDonald Hamilton & Co. Pty. Ltd.
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

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Code No. 83.1 08 536

Division Copper, Tasmania

Phone 316837

Rack No. _____

Page No. 4

Order No. KP 2718

670076

RESULT SHEET

TUBE No.	SAMPLE No.		Au							
1	TD	8333	x							
2		35	x							
3		37	x							
4		39	x							
5		41	x							
6		43	x							
7		45	x							
8		49	x							
9		51	x							
10		53	x							
11		55	x							
12		57	x							
13		59	x							
14		61	x							
15		63	x							
16		65	x							
17		67	x							
18		69	x							
19		71	x							
20		73	x							
21		75	x							
22		77	x							
23		79	x							
24		81	x							
25		83	x							
26		85	x							
27		87	x							
28		89	x							
29		91	x							
30		93	x							
31		95	x							
32		97	x							
33		99	x							
34	TD	8401	x							
35		03	x							
36		05	x							
37		07	x							
38										
39										
40										
Detection			0.02							
Standard										
Repeat—										
Repeat—										
Method			LG10							

RESPONSIBLE OFFICER B. Don
14 / 9 / 81

Results in ppm unless otherwise specified
T = element present; but concentration too low to measure
X = element concentration is below detection limit
-- = element not determined

014

K494

P.W.

ANALABS

A division of MacDonald Hamilton & Co. Pty. Ltd.
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

Phone (09) 458 7999

Code No. 83.1 08 536

Division Cooee, Tasmania

Phone 316837

Rack No. _____

Page No. 5

Order No. KP 2718

670077

RESULT SHEET

TUBE No.	SAMPLE No.	Sn	W				
1	TD 8251	INSUFFICIENT SAMPLE					
2	53	H	X				
3	55	X	X				
4	57	X	X				
5	59	X	X				
6	61	X	X				
7	63	X	X				DIAL RANGE
8	65	X	X				REGIONAL
9	67	X	X				HEAVY
10	69	X	X				MINERAL
11	71	INSUFFICIENT SAMPLE					CONCENTRATES
12	73	X	X				
13	75	X	X				
14	77	INSUFFICIENT SAMPLE					
15	79	INSUFFICIENT SAMPLE					
16	81	INSUFFICIENT SAMPLE					
17	83	X	X				
18	85	X	X				
19	87	X	X				
20	TD 8289	X	X				
21	91	INSUFFICIENT SAMPLE					
22	93	X	X				
23	95	70	X				
24	97	49	X				
25	99	X	X				
26	301	25	X				
27	03	4	X				
28	05	X	X				
29	07	4	X				
30	09	X	X				
31	11	8	X				
32	13	X	X				
33	17	41	X				
34	19	X	X				
35	21	X	X				
36	23	X	X				
37	25	X	X				
38	27	X	X				
39	29	X	X				
40	TD 8331	X	X				
Detection		4	4				
Standard							
Repeat-							
Repeat-							
Method		RF					

RESPONSIBLE OFFICER B. Don
 S. 10, 1, 81

Results in ppm unless otherwise specified
 T = element present; but concentration too low to measure
 X = element concentration is below detection limit
 - = element not determined

015

ANALABS

A division of MacDonald Hamilton & Co Pty Ltd
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

Phone (09) 458 7999

Code No. 83.108536

Division Cooee, Tasmania

Phone 316837

Rack No. _____

Page No. 6

Order No. KP 2718

670078

RESULT SHEET

TUBE No.	SAMPLE No.		Sn	W					
1	TD 8333		X	X					
2	35		X	X					
3	37		X	X					
4	39		X	X					
5	41		X	X					
6	43		X	X					
7	45		X	X					
8	49		X	X					
9	51		X	X					
10	53		X	X					
11	55		X	X					
12	57		X	X					
13	59		X	X					
14	61		X	X					
15	63		X	X					
16	65		X	X					
17	67		X	X					
18	69		X	X					
19	71		X	X					
20	TD 8373		X	X					
21	75		X	X					
22	77		X	X					
23	79		X	X					
24	81		X	X					
25	83		X	X					
26	85		X	X					
27	87		X	X					
28	89		X	X					
29	91		X	X					
30	93		X	X					
31	95		X	X					
32	97		X	X					
33	99		X	X					
34	TD 8401		X	X					
35	03		X	X					
36	05		X	X					
37	TD 8407	64	X						
38									
39									
40									
Detection			4	4					
Standard									
Repeat--									
Repeat--									
Method			XRF						

SOL TANK
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SOL TANK

RESPONSIBLE OFFICER B. D. ...
S No. 81

Results in ppm unless otherwise specified
T = element present; but concentration too low to measure
X = element concentration is below detection limit
- = element not determined

DRAINAGE SAMPLES 80#

017

ANALABS (W.A.) PTY. LTD.

52 Murray Road, Welshpool, W.A. 6106
 44 Lane Street, Kalgoorlie, W.A. 6430

Phone (09) 458 7999
 Phone (090) 21 1416

670080

ANALYTICAL REPORT

This report must be read in conjunction with the results given for JOB No. 531

Client Waples Ltd
 (1) Waples + Order No. KP 376 Date Received 2/9/81
 Reference R 932 Results Required
 Delivered by Total No. of Samples

(2) SAMPLE NUMBERS	STATE OF SAMPLES	Average Weight	PRETREATMENT								ANALYSIS				
	Refer to section (5) for terminology		Dry	Crush	Split	Pulverize	Sieve	Evaporate	Other (see remarks)	None	Refer to section (5) for terminology		Preparation	Method	Coefficient of variation (%)
<u>2510-8450</u>	<u>SO</u>		<u>1</u>			<u>3</u>	<u>2</u>					<u>PL</u>	<u>GF</u>		
<u>2512-8534</u>												<u>PL</u>	<u>GF</u>		
<u>NUMBERS ONLY</u>												<u>PL</u>	<u>GF</u>		

(3) Number of pages of results: 4
 Date Reported: 2/9/81
 Results to: (1) As Above (2) As Above
 Per: T. J. ...
 Number of Copies: 3

(4) Remarks:

(5) STATE OF SAMPLES	ANALYSIS - PREPARATION				ANALYSIS - METHOD	
whole core WC	perchloric acid	A1	cold acid	CA	atomic absorption	AAS
split core SC	hydrochloric acid	A2	specific sulphide	SS	x-ray fluorescence	XRF
cutting CU	nitric acid	A3	other mixed acids	Ma	spectrophotometry	SPEC
rock Ro	aqua regia	A4	alkaline attack	AA	colorimetry	COL
soil SO	nitric-perchloric	A5	volatilization	VO	chromatography	CHR
pulp PU	HF mixture	A6	ignition	IG	titration	TTN
water WA	HF under pressure	A7	pressed powder (XRF)	PP	other chemicals means	CHEM
tissue TI	fusion	A8	glass fusion (XRF)	GF	miscellaneous	MISC

Authorized Officer.....

018

ANALABS

A division of MacDonald Hamilton & Co. Pty. Ltd.
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

Phone (09) 458 7999

Code No. 83-1 08 528

Division Cooee, Tasmania

Phone 316837

Rack No. R-13 / 10^{1/2}

Page No. 1

Order No. _____

670081

RESULT SHEET

TUBE No.	SAMPLE No.		Cu	Pb	Zn	Fe	Mn	Ag	Bi
1	TD	8390	70	195	35	3.25%	70	1.3	x
2		92	15	35	25	1.35%	250	x	x
3		94	35	5	145	6.5%	1005	x	x
4		96	5	20	10	3800	30	0.4	x
5		98	20	5	65	4.60%	470	x	x
6	TD	8400	10	30	30	1.10%	275	0.2	x
7		02	30	80	25	2.10%	170	0.2	2
8		04	20	25	85	6.3%	1150	x	x
9		06	25	15	95	10.0%	905	0.1	x
10		08	25	5	90	7.0%	1450	x	x
11		10	25	70	70	3.40%	2650	0.1	x
12		12	75	10	50	4.20%	2200	x	x
13		14	25	5	45	2.25%	2800	x	x
14		16	65	55	55	3.65%	2750	x	x
15		18	60	40	75	4.10%	2250	x	2
16		20	80	90	80	5.20%	5750	0.1	x
17		22	35	x	125	4.00%	2850	x	x
18		24	65	75	275	5.20%	9200	x	x
19		26	30	x	140	4.00%	3000	x	x
20	TD	8428	25	20	155	4.70%	5150	0.1	2
21		30	30	60	145	5.4%	4650	x	x
22		32	15	20	85	3.70%	1600	x	x
23		34	10	10	25	1.35%	360	0.1	x
24		36	15	15	40	2.10%	445	x	x
25		38	25	10	110	4.85%	3300	x	x
26		40	25	15	100	4.45%	860	x	x
27		42	35	20	70	4.10%	260	x	4
28		44	30	15	125	3.85%	1200	x	4
29		46	35	75	165	5.00%	2750	x	x
30		48	15	10	90	3.20%	2250	0.1	6
31		50	10	10	40	1.60%	310	x	x
32	TD	8502	15	30	120	4.75%	4050	x	2
33		04	20	5	130	4.45%	1450	x	x
34		06	15	25	65	2.90%	1450	0.1	x
35		08	10	25	115	1.25%	155	0.1	x
36		10	5	10	25	6900	60	x	x
37		12	10	5	600	6900	80	0.1	x
38		14	5	25	30	1.78%	100	0.2	x
39		16	10	5	40	2.85%	200	0.1	x
40	TD	8518	10	20	35	9500	90	0.1	x
Detection			5	5	5	5	5	0.1	2
Standard	ASS 5		455	310	105	31.9%	210	0.8	2
Repeat	TD	8390	70	185	35	3.40%	75	1.0	x
Repeat	TD	8428	25	25	155	4.65%	4950	x	x
Method			A1/1					A1/2	

RESPONSIBLE OFFICER B. Deane 2/9/81

Results in ppm unless otherwise specified
 T = element present; but concentration too low to measure
 X = element concentration is below detection limit
 - = element not determined

019

ANALABS

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 52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

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Code No. 83108528

Division Cooee, Tasmania

Phone 316837

Rack No. R-28/19^{1/2}

Page No. 2

Order No. _____

670082

RESULT SHEET

TUBE No.	SAMPLE No.		Cu	Pb	Zn	Fe	Mn	Ag	Bi
1	TD	8520	10	60	165	2.60%	315	0.1	X
2		22	25	50	100	4.50%	3050	0.1	X
3		24	25	50	75	3.25%	485	0.1	X
4		26	10	45	45	2.10%	985	0.2	2
5		28	10	30	30	1.90%	505	0.3	X
6		30	5	40	50	2.60%	705	0.1	2
7		32	20	5	40	4.65%	190	X	X
8	TD	8534	35	45	170	11.5%	3550	0.1	X
9									
10									
11									
12									
13									
14									
15									
16									
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35									
36									
37									
38									
39									
40									
Detection			5	5	5	5	5	0.1	2
Standard	Agss		430	325	100	29.5	235	0.7	X
Repeat—	TD	8520	10	50	160	2.65	315	X	X
Repeat—									
Method			A11					A12	

RESPONSIBLE OFFICER B. D. ...
2.9.81

Results in ppm unless otherwise specified
 T = element present; but concentration too low to measure
 X = element concentration is below detection limit
 — = element not determined

020

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Division Cooper, Tasmania

Phone 316837

Rack No. _____

Page No. 3

670083

RESULT SHEET

Order No. KP 2716

TUBE No.	SAMPLE No.		Sn	W					
1	TD	8390	X	X					
2		92	X	1.0					
3		94	X	X					
4		96	X	X					
5		98	X	X					
6	TD	8400	X	1.5					DIAL RANGE
7		02	X	1.5					FL 2473
8		04	X	X					
9		06	X	1.5					SOIL STREAM
10		08	X	2.0					SEDIMENTS
11		10	X	3.0					
12		12	X	0.5					
13		14	X	X					
14		16	X	0.5					
15		18	X	0.5					
16		20	X	1.5					
17		22	X	0.5					
18		24	X	2.0					
19		26	7	4.0					
20	TD	8428	X	X					
21		30	X	1.5					
22		32	X	2.0					
23		34	X	4.5					
24		36	X	3.0					
25		38	X	4.5					
26		40	X	1.5					
27		42	X	1.5					
28		44	X	1.0					
29		46	2	4.5					
30		48	X	4.5					
31		50	X	1.5					
32	TD	8502	X	3.0					
33		04	X	1.5					
34		06	1	1.5					
35		08	2	0.5					
36		10	2	1.5					
37		12	2	1.5					
38		14	X	X					
39		16	X	0.5					
40	TD	8518	X	X					
Detection			1	0.5					
Standard									
Repeat—									
Repeat—									
Method			Au/2	Al/4					

Results in ppm unless otherwise specified
 T = element present; but concentration too low to measure
 X = element concentration is below detection limit
 - = element not determined

RESPONSIBLE OFFICER

B. Dora
14/9/81

DIAL RANGE

FL 2473

SOIL STREAM
 SEDIMENTS

Au/2 Al/4

021

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Code No 83108528

Division Cooee, Tasmania

Phone 316837

Rack No. _____

Page No. 4

Order No. KP 2716

670084

RESULT SHEET

TUBE No.	SAMPLE No.		Sn	W					
1	TD	8520	X	X					
2		22	X	X					
3		24	X	1.5					
4		26	X	X					
5		28	X	3.5					
6		30	X	3.5					DIA 80.2
7		32	X	X					EL 24177
8	TD	8534	X	X					
9									
10									
11									
12									
13									
14									
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17									
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31									
32									
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35									
36									
37									
38									
39									
40									
Detection			11	0.5					
Standard									
Repeat-									
Repeat-									
Method			11/12	16/4					

RESPONSIBLE OFFICER B. D. ...
14.9.81

Results in ppm unless otherwise specified
T = element present; but concentration too low to measure
X = element concentration is below detection limit
- = element not determined

ANALABS

A DIVISION OF MACDONALD HAMILTON & CO. PTY. LTD.
52 Murray Road, Welshpool, W.A. 6106
Phone (09) 458 7999

670085

K496

Dial Range
P. Wilson

ANALYTICAL REPORT

This report must be read in conjunction with the results given for JOB No. 83.1 08 556

Client Geopetco Ltd

(1) Devonport Order No. KP 2736 Date Received 9/9/81
Reference..... Results Required.....
Delivered by..... Total No. of Samples 18

(2) SAMPLE NUMBERS	STATE OF SAMPLES	Average Weight	PRETREATMENT								ANALYSIS				
	Refer to section (5) for terminology		Dry	Crush	Soil	Pulverize	Sieve	Evaporate	Other (see remarks)	None	Refer to section (5) for terminology			Preparation	Method
TD 8536-50	SS		1			3	2					Cu Pb Zn Fe Mn	A1/1		
TD 8452-70												Ag Bi	A1/2		
[EVEN NUMBERS ONLY]												Mo	A1/6		
												Sn	A11/2		
												W	A6/4		

(3) Number of pages of results: 2
Date Reported: 14/9/81
Results to: (1) As Above (2).....
Per: Telex, mail
Number of Copies: 3

(4) Remarks: DIAL RANGE
-80# STREAM
SEDIMENT SAMPLES

(5) STATE OF SAMPLES	ANALYSIS - PREPARATION				ANALYSIS - METHOD	
whole core WC	perchloric acid A1	cold acid CA	atomic absorption AAS			
split core SC	hydrochloric acid A2	specific sulphide SS	x-ray fluorescence XRF			
cutting CU	nitric acid A3	other mixed acids Ma	spectrophotometry SPEC			
rock Ro	aqua regia A4	alkaline attack AA	colorimetry COL			
soil SO	nitric-perchloric A5	volatilization VO	chromatography CHR			
pulp PU	HF mixture A6	ignition IG	titration TTN			
water WA	HF under pressure A7	pressed powder (XRF) PP	other chemicals means CHEM			
tissue TI	fusion A8	glass fusion (XRF) GF	miscellaneous MISC			
stream sediment SS			fluorescence FLUOR			
heavy mineral HM						

Authorized Officer: B. Doran

ATTENTION Please advise us regarding the disposal of your samples. JOB No.

DISCARD IMMEDIATELY KEEP UNTIL ADVISED (A STORAGE CHARGE WILL BE MADE)
 DISCARD AFTER 2 MONTHS RETURN TO:

(PLEASE TICK APPROPRIATE BOX)

0.3

ANALABS

A division of MacDonald Hamilton & Co. Pty. Ltd.
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

Phone (09) 458 7999

Code No. 83-108556

Division Cooper, Tasmania

Phone 316837

Rack No. R-37/112

Page No. 1

Order No. KP 2736

670086

RESULT SHEET

TUBE No.	SAMPLE No.		Cu	Pb	Zn	Fe	Mn	Ag	Bi	Mo
1	TD	8536	30	390	325	6300	30	1.1	2	x
2		38	35	85	135	4.45%	950	0.5	x	x
3		40	x	90	95	6700	20	0.5	x	x
4		42	x	20	180	4.5%	1700	0.2	2	x
5		44	x	25	145	3.6%	1250	0.1	x	0.5
6		46	5	20	155	4.8%	1500	0.1	2	x
7		48	10	20	400	3.75%	3350	0.2	x	x
8		50	x	20	105	6.5%	1050	0.1	x	x
9	TD	8452	5	30	170	4.5%	2250	0.2	2	x
10		54	x	20	165	4.15%	2500	0.2	2	x
11		56	x	20	130	3.45%	2300	0.2	x	x
12		58	5	20	190	6.0%	2450	0.2	x	x
13		60	20	30	225	7.0%	2250	0.1	x	x
14		62	30	35	180	7.5%	2200	0.2	x	x
15		64	25	35	220	4.8%	1950	0.2	x	x
16		66	25	25	180	6.5%	1450	0.2	x	x
17		68	20	30	225	4.8%	2000	0.1	x	x
18	TD	8470	10	15	175	4.8%	1900	0.2	x	x
19										
20										
21										
22										
23										
24										
25										
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34										
35										
36										
37										
38										
39										
40										
Detection			5	5	5	50	5	0.1	2	0.5
Standard	ASS5		460	310	100	28.5%	250	0.7	x	3.5
Repeat-	TD	8536	30	385	320	6100	25	1.0	2	x
Repeat-										
Method			A/1					A/2		A/6

RESPONSIBLE OFFICER B. Dora
14/9/81

Results in ppm unless otherwise specified
 T = element present; but concentration too low to measure
 X = element concentration is below detection limit
 - = element not determined

024

K496 P. Wilson

ANALABS

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52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

Phone (09) 458 7999

Code No. 83.108556

Division Cooee, Tasmania

Phone 316837

Rack No. _____

Page No. 2

Order No. KP 2736

670087

RESULT SHEET

TUBE No.	SAMPLE No.		Sn	W					
1	TD 8536		X	1.5					
2	38		X	1.5					
3	40		X	1.5					
4	42		X	0.5					DIAL RANGE
5	44		X	1.5					DRAINAGE
6	46		X	2.0					SAMPLES.
7	48		X	1.5					- 80#
8	50		X	2.0					
9	TD 8452		X	3.0					
10	54		X	3.0					
11	56		X	4.5					
12	58		X	1.5					
13	60		X	3.0					
14	62		X	3.0					SAMPLES
15	64		X	2.0					
16	66		X	1.5#					
17	68		X	2.0					
18	TD 8470		X	X					
19									
20									
21									
22									
23									
24									
25									
26									
27									
28									
29									
30									
31									
32									
33									
34									
35									
36									
37									
38									
39									
40									
Detection			1	0.5					
Standard									
Repeat—									
Repeat—									
Method			Au/2	Ag/4					

RESPONSIBLE OFFICER B. Brown
25 / 9 / 81

Results in ppm unless otherwise specified
T = element present; but concentration too low to measure
X = element concentration is below detection limit
— = element not determined

025

ANALABS (W.A.) PTY. LTD.

52 Murray Road, Welshpool, W.A. 6106
 44 Lane Street, Kalgoorlie, W.A. 6430

Phone (09) 458 7999
 Phone (090) 21 1416

670088

ANALYTICAL REPORT

This report must be read in conjunction with the results given for JOB No.

Client Geopko Ltd
 (1) Devonport Order No. KP 2693 Date Received.....
 Reference K A 91 Results Required.....
 Delivered by..... Total No. of Samples.....

(2) SAMPLE NUMBERS	STATE OF SAMPLES	Average Weight	PRETREATMENT								ANALYSIS				
	Refer to section (5) for terminology		Dry	Crush	Split	Pulverize	Sieve	Evaporate	Other (see remarks)	None	Refer to section (5) for terminology	Preparation	Method	Coefficient of variation (%)	
<u>08252 - 8388</u>	<u>SO</u>		<u>1</u>						<u>2</u>			<u>Cu Pb Zn Fe Mn</u>			
<u>WT (CONTINUOUS)</u>												<u>Ag Bi</u>			
												<u>Mo</u>			

(3) Number of pages of results: 2
 Date Reported: 11/8/81
 Results to: (1) As Above (2).....
 Per: Telen, Mail
 Number of Copies: 3

(4) Remarks: Dial down
 - 80#

(5) STATE OF SAMPLES	ANALYSIS - PREPARATION				ANALYSIS - METHOD		
whole core	WC	perchloric acid	A1	cold acid	CA	atomic absorption	AAS
split core	SC	hydrochloric acid	A2	specific sulphide	SS	x-ray fluorescence	XRF
cutting	CU	nitric acid	A3	other mixed acids	Ma	spectrophotometry	SPEC
rock	Ro	aqua regia	A4	alkaline attack	AA	colorimetry	COL
soil	SO	nitric-perchloric	A5	volatilization	VO	chromatography	CHR
pulp	PU	HF mixture	A6	ignition	IG	titration	TTN
water	WA	HF under pressure	A7	pressed powder (XRF)	PP	other chemicals means	CHEM
tissue	TI	fusion	A8	glass fusion (XRF)	GF	miscellaneous	MISC

Authorized Officer.....

026

ANALABS

A division of MacDonald Hamilton & Co. Pty. Ltd.
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

Phone (09) 468 7999

Code No. 83.1 08 459

Division Copper, Tasmania

Phone 316837

Rack No. R-29 / 35

Page No. 1

Order No. KP 2693

670089

RESULT SHEET

TUBE No.	SAMPLE No.		Cu	Pb	Zn	Fe	Mn	Ag	Bi	Mo
1	TD	8252	15	80	130	2.5%	1350	0.2	1	x
2		54	10	30	50	2.1%	530	0.2	x	x
3		56	15	30	85	2.4%	660	0.3	3	x
4		58	10	15	50	1.9%	550	0.3	x	x
5		60	10	15	35	1.3%	735	0.5	x	x
6		62	15	45	70	2.3%	1000	0.3	x	x
7		64	10	20	60	3.35%	1200	0.2	x	x
8		66	20	20	45	2.6%	2150	0.3	4	x
9		68	30	20	90	3.75%	3750	0.2	x	x
10		70	45	75	55	3.95%	800	0.5	1	0.5
11		72	50	225	80	11.5%	1.45%	0.3	x	0.5
12		74	50	165	105	18.0%	1.55%	0.3	x	x
13		76	35	165	20	7.3%	1050	0.8	x	0.5
14		78	45	135	40	7.1%	5000	0.3	x	0.5
15		80	55	180	30	10.5%	4700	0.3	x	x
16		82	20	115	20	4.3%	2100	0.4	2	x
17		84	35	50	10	2.15%	360	0.3	1	x
18		86	20	55	25	2.8%	730	0.3	1	x
19		88	40	115	30	3.2%	2700	0.4	x	x
20	TD	8290	20	50	15	1.45%	85	0.4	5	x
21		92	45	75	10	2.25%	360	0.3	5	x
22		94	35	95	20	3.6%	295	0.2	x	x
23		96	80	40	145	2.85%	2750	0.8	1	x
24		98	40	50	75	4.75%	4700	0.3	x	x
25	TD	8300	40	55	75	4.4%	4350	0.4	x	x
26		02	90	55	185	8.1%	2.3%	1.9	x	0.5
27		04	75	25	170	3.7%	8100	0.1	x	x
28		06	60	35	180	7.5%	1.75%	0.1	x	x
29		08	60	30	70	5.15%	4800	0.3	3	x
30		10	25	90	75	1.7%	415	0.2	x	x
31		12	100	60	110	15.5%	2.05%	0.1	x	x
32		14	140	40	205	11.5%	2.1%	0.3	x	0.5
33		15	25	45	15	2.1%	570	0.2	2	x
34		16	10	90	90	9300	2950	0.2	x	x
35		18	35	35	20	2.35%	1400	0.2	4	x
36		20	50	30	110	3.75%	4600	0.3	x	0.5
37		22	130	55	190	17.5%	6.1%	x	x	x
38		24	30	45	40	3.1%	3300	0.2	x	x
39		26	50	30	115	4.35%	3150	0.3	x	x
40	TD	83 28	95	85	25	3.65%	1650	0.8	x	x
Detection			5	5	5	5	5	0.1	1	0.5
Standard	ASS5		460	310	105	28.0%	245	0.6	x	40
Repeat-	TD	8252	15	80	125	2.6%	1300	0.1	x	x
Repeat-	TD	8290	20	40	15	1.5%	85	0.4	3	x
Method			A/1					A/2		A/6

RESPONSIBLE OFFICER B. Darr 11.8.81

Results in ppm unless otherwise specified
 T = element present; but concentration too low to measure
 X = element concentration is below detection limit
 - = element not determined

ANALABS

A division of MacDonald Hamilton & Co. Pty. Ltd.
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

Phone (09) 458 7999

Code No. 83.108459

Division Copper, Tasmania

Phone 316827

Rack No. R-48/51^{1/2}

Page No. 2

Order No. KP 2693

670090

RESULT SHEET

TUBE No.	SAMPLE No.		Cu	Pb	Zn	Fe	Mn	Ag	Bi	Mo
1	TD	8330	50	90	15	1.95%	360	0.2	x	x
2		32	25	110	185	3.35%	3950	0.1	x	x
3		34	25	50	75	4.55%	4900	x	1	x
4		36	40	50	50	2.75%	2300	0.1	x	x
5		38	10	30	30	1.55%	100	x	6	x
6		40	15	100	350	1.25%	715	0.1	x	x
7		42	10	35	25	1.65%	640	0.1	x	0.5
8		44	10	60	15	1.5%	1450	0.1	x	x
9		46	10	35	60	2.9%	4050	x	x	x
10		47	x	30	10	5600	35	x	x	x
11		48	5	45	20	7200	45	0.2	4	x
12		50	5	25	10	2500	30	0.3	x	x
13		52	15	60	30	1.45%	765	0.1	x	x
14		54	15	55	20	1.85%	1700	0.2	x	x
15		56	25	30	75	4.2%	2400	0.1	6	x
16		58	85	85	175	8.4%	1.9%	x	x	0.5
17		60	60	90	170	7.1%	6700	0.1	x	x
18		62	90	65	95	6.6%	2.25%	0.1	x	0.5
19		64	5	30	15	4500	45	0.1	x	0.5
20	KR	8366	20	170	85	1.45%	525	0.2	3	x
21		68	25	100	85	3.1%	1550	0.1	x	x
22		70	15	95	40	1.7%	520	0.4	6	x
23		72	30	45	100	4.95%	600	0.1	x	x
24		74	50	170	110	11.0%	9150	0.2	x	x
25		76	45	90	30	7.8%	1600	0.2	x	x
26		78	15	70	20	1.65%	540	0.2	x	x
27		80	35	40	250	6.4%	1600	0.3	x	x
28		82	20	90	90	6.1%	2650	0.1	x	x
29		84	30	40	80	2.7%	315	0.1	x	x
30		86	20	60	120	3.7%	1550	x	x	x
31	KR	8388	40	40	145	4.85%	3950	0.1	x	x
32										
33										
34										
35										
36										
37										
38										
39										
40										
Detection			5	5	5	5	5	0.1	1	0.5
Standard	ASSS		445	345	110	28.5%	230	0.8	x	4.0
Repeat-	TD	8330	45	80	15	2.0%	380	0.3	x	x
Repeat-	TD	8366	20	175	70	1.6%	530	0.2	4	x
Method			A/1					A/2		A/6

Results in ppm unless otherwise specified
T = element present; but concentration too low to measure
X = element concentration is below detection limit
- = element not determined

RESPONSIBLE OFFICER

B. De...
11.1.81

027

028

ANALABS

A division of MacDonald Hamilton & Co. Pty. Ltd.
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

Phone (09) 458 7999

Code No. 83.1 08 459

Division Cooee, Tasmania

Phone 316837

Rack No. _____

Page No. 3

670091

RESULT SHEET

Order No. KP 2693

P. Wilson
Dial Range

TUBE No.	SAMPLE No.		Sn	W				
1	TD	8252	X	X				
2		54	12	X				
3		56	10	0.5				
4		58	7	0.5				
5		60	8	0.5				
6		62	X	X				
7		64	X	0.5				
8		66	X	0.5				
9		68	X	X				
10		70	X	X				
11		72	X	INSUFFICIENT SAMPLE				
12		74	X	X				
13		76	X	0.5				
14		78	X	0.5				DIAL RANGE
15		80	X	X				-80#
16		82	X	X				STREAM
17		84	X	X				SEDIMENTS
18		86	X	X				REGIONAL
19		88	X	0.5				
20	TD	8290	X	X				
21		92	X	X				
22		94	X	X				
23		96	X	X				
24		98	X	X				
25	TD	8300	X	X				
26		02	X	X				
27		04	X	X				
28		06	20	X				
29		08	X	X				
30		10	X	X				
31		12	X	0.5				
32		14	X	0.5				
33		15	X	X				
34		16	X	X				
35		18	18	1.5				
36		20	X	X				
37		22	X	X				
38		24	X	X				
39		26	X	X				
40	TD	8328	X	X				
Detection			1	0.5				
Standard								
Repeat-								
Repeat-								
Method			A1/2	A6/4				

RESPONSIBLE OFFICER B. Dora
14/9/81

Results in ppm unless otherwise specified
 T = element present; but concentration too low to measure
 X = element concentration is below detection limit
 - = element not determined

029

ANALABS

A Division of MacDonald Hamilton & Co. Pty. Ltd.
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

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Division Cooper, Tasmania

Phone 316837

Rack No. _____

Page No. 4

670092

RESULT SHEET

Order No. KP 2693

TUBE No.	SAMPLE No.	SN	W						
1	TD 8330	X	X						
2	32	X	X						
3	34	X	X						
4	36	X	X						
5	38	X	X						
6	40	20	X						
7	42	27	X						
8	44	10	0.5						
9	46	X	2.5						
10	47	X	X						
11	48	X	0.5						
12	50	X	0.5						
13	52	X	X						
14	54	X	X						
15	56	X	X						
16	58	X	X						
17	60	X	X						
18	62	X	X						
19	64	X	1.0						
20	TD 8366	X	INSUFFICIENT SAMPLE						
21	68	X	X						
22	70	X	X						
23	72	X	1.0						
24	74	X	2.5						
25	76	X	X						
26	78	X	X						
27	80	X	1.0						
28	82	X	1.0						
29	84	X	X						
30	86	X	1.0						
31	TD 8388	X	1.0						
32									
33									
34									
35									
36									
37									
38									
39									
40									
Detection			1 0.5						
Standard									
Repeat-									
Repeat-									
Method			Au/2 Au/4						

RESPONSIBLE OFFICER B. Dora
14/9/81

Results in ppm unless otherwise specified
 T = element present; but concentration too low to measure
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 - = element not determined

Dine Range
 - 100 H
 - 100 NT
 - 100 AL

DIAL MINE GRID/'MIP' GRID
SOIL SAMPLES.

031

ANALABS

A DIVISION OF MACDONALD HAMILTON & CO. PTY. LTD.
52 Murray Road, Welshpool, W.A. 6106
Phone (09) 458 7999

P. Wilson
Did Range

670094

ANALYTICAL REPORT

This report must be read in conjunction with the results given for JOB No. 83.1 08 588

Client Cespeks Ltd

(1) Devonport

Order No. KP 2755 Date Received 29/9/81

Reference..... Results Required.....

Delivered by..... Total No. of Samples 150

(2) SAMPLE NUMBERS	STATE OF SAMPLES Refer to section (5) for terminology	Average Weight	PRETREATMENT								ANALYSIS					
			Dry	Crush	Split	Pulverize	Sieve	Evaporate	Other (see remarks)	None	Refer to section (5) for terminology			Preparation	Method	Coefficient variation (%)
TS 13613-762	SO		1			3	2						Cu Pb Zn Fe	A1/1		
													Ag	A1/2		
													Sn W	XRF		

(3) Number of pages of results: 8
 Date Reported: 6/10/81
 Results to: (1) As Above (2).....
 Per: Telex, mail
 Number of Copies: 3

(4) Remarks: DIAL MINE GRID SOIL SAMPLES

(5) STATE OF SAMPLES		ANALYSIS - PREPARATION				ANALYSIS - METHOD	
whole core	WC	perchloric acid	A1	cold acid	CA	atomic absorption	AAS
split core	SC	hydrochloric acid	A2	specific sulphide,	SS	x-ray fluorescence	XRF
cutting	CU	nitric acid	A3	other mixed acids	Ma	spectrophotometry	SPEC
rock	Ro	aqua regia	A4	alkaline attack	AA	colorimetry	COL
soil	SO	nitric-perchloric	A5	volatilization	VO	chromatography	CHR
pulp	PU	HF mixture	A6	ignition	IG	titration	TTN
water	WA	HF under pressure	A7	pressed powder (XRF)	PP	other chemicals means	CHEM
tissue	TI	fusion	A8	glass fusion (XRF)	GF	miscellaneous	MISC
stream sediment	SS					fluorescence	FLUOR
heavy mineral	HM						

Authorized Officer B. Dean

ATTENTION Please advise us regarding the disposal of your samples. JOB No.

DISCARD IMMEDIATELY KEEP UNTIL ADVISED (A STORAGE CHARGE WILL BE MADE)

DISCARD AFTER 2 MONTHS RETURN TO:

(PLEASE TICK APPROPRIATE BOX)

032

ANALABS

A division of MacDonald Hamilton & Co Pty Ltd
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

Phone (09) 458 7999

Code No

831 58 588

Division.....

Phone.....

Rack No.

R-51 / 21

Page No.

1

Order No.

KP 2754

670095

RESULT SHEET

TUBE No.	SAMPLE No.		Cu	Pb	Zn	Fe	Ag			
1	TS	13613	130	35	30	4.05%	x			
2		14	105	20	25	4.7%	x			
3		15	260	15	30	8.0%	x			
4		16	125	20	55	7.1%	x			
5		17	110	20	90	6.65%	x			
6		18	130	35	100	10.5%	x			
7		19	145	10	25	9.15%	x			
8		20	150	25	35	6.75%	x			
9		21	130	25	40	6.95%	x			
10		22	120	30	40	8.4%	x			
11		23	115	15	70	7.15%	x			
12		24	335	80	20	4.1%	x			
13		25	260	35	15	3.8%	x			
14		26	140	25	10	2.05%	x			
15		27	230	40	25	3.8%	x			
16		28	195	50	20	3.7%	x			
17		29	215	30	35	4.25%	x			
18		30	70	15	10	1.55%	x			
19		31	75	15	15	1.55%	0.2			
20	TS	13632	155	15	25	2.7%	x			
21		33	95	30	20	2.4%	x			
22		34	85	45	25	1.95%	0.1			
23		35	90	35	20	2.4%	x			
24		36	80	25	35	2.4%	0.1			
25		37	70	20	15	2.4%	x			
26		38	90	20	20	2.4%	x			
27		39	140	60	15	1.85%	x			
28		40	110	55	25	3.95%	x			
29		41	110	25	30	4.2%	x			
30		42	390	70	10	4.4%	0.2			
31		43	325	80	5	3.45%	x			
32		44	350	80	15	4.75%	0.2			
33		45	85	55	5	1.5%	0.1			
34		46	45	30	15	1.05%	0.2			
35		47	35	25	10	8900	0.1			
36		48	100	35	10	1.0%	x			
37		49	160	45	20	2.15%	0.1			
38		50	145	35	15	2.4%	0.1			
39		51	160	40	15	2.5%	0.2			
40	TS	13652	85	40	10	1.5%	0.1			
Detection			5	5	5	50	0.1			
Standard	ASSS		440	320	100	33.5%	0.8			
Repeat-	TS	13643	130	30	25	4.05%	x			
Repeat-	TS	13632	150	20	25	2.75%	x			
Method			A/1				A/2			

RESPONSIBLE OFFICER *B. Dora*
6.1.10.81

Results in ppm unless otherwise specified
T = element present, but concentration too low to measure
X = element concentration is below detection limit
- = element not determined

033

ANALABS

A division of MacDonald Hamilton & Co. Pty. Ltd.
 52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

Phone (09) 458 7999

Code No. 83.1 08 588
 Rack No. R-39 / 37
 Page No. 2
 Order No. KP 2754

Division.....

Phone.....

670096

RESULT SHEET

TUBE No.	SAMPLE No.		Cu	Pb	Zn	Fe	Ag			
1	TS	13653	80	35	10	1.45%	x			
2		54	120	35	10	1.45%	x			
3		55	140	35	5	1.75%	x			
4		56	120	15	10	1.65%	x			
5		57	85	25	10	1.35%	x			
6		58	70	10	10	1.95%	x			
7		59	200	50	20	3.85%	x			
8		60	155	30	15	4.65%	x			
9		61	70	5	15	2.95%	x			
10		62	110	20	5	3.35%	x			
11		63	30	5	5	2.0%	x			
12		64	150	20	10	4.0%	x			
13		65	50	5	10	1.85%	x			
14		66	110	20	10	2.7%	x			
15		67	225	20	5	5.5%	x			
16		68	280	30	15	4.0%	x			
17		69	270	50	10	4.65%	x			
18		70	525	80	10	6.0%	x			
19		71	520	80	15	6.15%	x			
20	TS	13672	265	60	10	5.8%	x			
21		73	200	60	15	4.95%	x			
22		74	155	40	10	3.55%	x			
23		75	105	30	15	2.85%	x			
24		76	55	5	10	2.15%	x			
25		77	5	x	5	6900	x			
26		78	45	35	5	1.95%	x			
27		79	5	15	5	4300	x			
28		80	x	x	x	4800	x			
29		81	5	x	x	5350	x			
30		82	x	5	5	3550	x			
31		83	x	x	15	2800	x			
32		84	x	55	5	4450	x			
33		85	x	25	5	5450	x			
34		86	x	10	10	1.55%	x			
35		87	25	5	5	2.25%	x			
36		88	25	x	10	2.7%	x			
37		89	30	30	15	3.0%	x			
38		90	15	10	10	2.3%	x			
39		91	15	95	10	2.3%	x			
40	TS	13692	55	15	10	4.5%	x			
Detection			5	5	5	50	0.1			
Standard	ASSS		425	335	105	34.0%	0.6			
Repeat-	TS	13653	80	40	10	1.5%	x			
Repeat-	TS	13672	265	60	10	5.8%	x			
Method			A/1				A/2			

RESPONSIBLE OFFICER B. D. ...
6.10.81

Results in ppm unless otherwise specified
 T = element present; but concentration too low to measure
 X = element concentration is below detection limit
 - = element not determined

ANALABS

A division of MacDonald Hamilton & Co. Pty. Ltd.
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

Phone (09) 458 7999

Code No. 83.1 08 588
Rack No. R-36 / 40
Page No. 3
Order No. KP 2754

Division.....

Phone.....

670097

RESULT SHEET

TUBE No.	SAMPLE No.		Cu	Pb	Zn	Fe	Ag			
1	TS	13693	50	15	10	3.8%	x			
2		94	75	65	10	4.05%	x			
3		95	40	60	20	3.3%	x			
4		96	15	x	10	1.7%	x			
5		97	35	5	10	2.6%	x			
6		98	35	35	15	1.95%	x			
7		99	100	10	10	2.4%	x			
8	TS	13700	170	10	20	2.7%	x			
9		01	180	70	10	2.9%	x			
10		02	100	10	20	2.55%	x			
11		03	95	90	10	2.4%	x			
12		04	100	40	10	2.55%	x			
13		05	165	40	5	3.35%	x			
14		06	125	20	15	2.7%	x			
15		07	240	25	20	4.05%	x			
16		08	300	40	20	5.0%	0.1			
17		09	160	20	25	3.35%	x			
18		10	175	10	10	3.25%	x			
19		11	165	10	10	3.25%	x			
20	TS	13712	385	30	15	5.1%	x			
21		13	370	25	15	4.25%	x			
22		14	675	30	10	9.85%	x			
23		15	250	30	10	3.0%	x			
24		16	150	40	15	2.7%	x			
25		17	135	25	10	2.75%	x			
26		18	80	25	10	3.05%	0.2			
27		19	125	40	15	4.55%	x			
28		20	65	30	15	1.5%	0.1			
29		21	80	25	30	1.6%	x			
30		22	165	30	15	2.15%	x			
31		23	60	15	10	1.0%	x			
32		24	40	16	20	1.4%	x			
33		25	150	25	25	2.25%	x			
34		26	105	20	15	1.6%	x			
35		27	165	25	25	2.1%	x			
36		28	150	50	25	2.0%	x			
37		29	195	55	20	3.0%	x			
38		30	305	65	30	4.1%	x			
39		31	320	85	20	4.5%	x			
40	TS	13732	310	40	20	3.6%	x			
Detection			S	S	S	50	0.1			
Standard	ASS5		430	340	100	33.5%	0.6			
Repeat-	TS	13693	50	15	10	3.75%	x			
Repeat-	TS	13712	385	30	15	5.3%	x			
Method			A/1				n/2			

RESPONSIBLE OFFICER B. D. 6.10.81

Results in ppm unless otherwise specified
T = element present; but concentration too low to measure
X = element concentration is below detection limit
- = element not determined

035

ANALABS

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52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

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Division.....

Phone.....

Rack No. R-38/12

Page No. 4

Order No. KP 2754

670098

RESULT SHEET

TUBE No.	SAMPLE No.		Cu	Pb	Zn	Fe	Ag			
1	TS	13733	155	25	25	2.65%	x			
2		34	120	25	25	2.0%	0.3			
3		35	60	15	10	1.4%	0.2			
4		36	55	15	20	1.65%	0.1			
5		37	55	15	10	1.95%	0.1			
6		38	30	20	10	2.3%	0.3			
7		39	50	20	30	2.0%	0.2			
8		40	30	15	20	1.3%	0.1			
9		41	35	20	30	1.6%	0.2			
10		42	115	25	5	2.75%	x			
11		43	105	15	10	1.85%	x			
12		44	145	20	10	2.35%	0.1			
13		45	40	15	10	1.6%	x			
14		46	45	10	10	2.55%	0.1			
15		47	30	5	20	3.1%	0.1			
16		48	30	5	25	3.7%	0.2			
17		49	50	5	20	2.5%	x			
18		50	35	10	30	2.45%	x			
19		51	25	5	30	2.4%	0.1			
20	TS	13752	10	x	40	2.7%	x			
21		53	25	5	20	2.05%	x			
22		54	25	10	45	2.7%	x			
23		55	30	5	40	2.7%	x			
24		56	75	x	50	3.0%	x			
25		57	65	5	35	2.8%	x			
26		58	100	5	25	3.25%	x			
27		59	100	5	25	3.7%	x			
28		60	130	10	40	2.7%	x			
29		61	135	10	35	2.6%	x			
30	TS	13762	215	15	20	2.45%	x			
31										
32										
33										
34										
35										
36										
37										
38										
39										
40										
Detection			S	S	S	S ₀	0.1			
Standard	ASSS		440	330	100	34.0%	0.6			
Repeat-	TS	13733	150	20	25	2.65%	x			
Repeat-	TS	13752	10	x	35	2.65%	x			
Method			A/1				A/2			

RESPONSIBLE OFFICER B.D.
6.10.81

Results in ppm unless otherwise specified
 T = element present; but concentration too low to measure
 X = element concentration is below detection limit
 - = element not determined

036

ANALABS

A division of MacDonald Hamilton & Co. Pty. Ltd.
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

Division Coober, Tasmania

670099

RESULT SHEET

Dial Range

Paul Wilson

K409

Phone (09) 458 7999

Code No. 831 08 588

Phone 316837

Rack No. _____

Page No. 5

Order No. KP 2754

TUBE No.	SAMPLE No.		Sn	W					
1	TS	13613	35	X					
2		14	20	X					
3		15	15	X					
4		16	35	X					
5		17	55	X					
6		18	30	X					
7		19	15	X					
8		20	15	10					
9		21	20	X					
10		22	10	X					
11		23	8	X					
12		24	170	40					
13		25	100	25					
14		26	85	10					
15		27	140	15					
16		28	120	15					
17		29	140	20					
18		30	50	X					
19		31	50	X					
20	TS	13632	80	10					
21		33	65	X					
22		34	55	X					
23		35	75	X					
24		36	60	X					
25		37	35	X					
26		38	50	X					
27		39	60	X					
28		40	40	X					
29		41	35	X					
30		42	120	50					
31		43	80	20					
32		44	240	10					
33		45	80	15					
34		46	65	X					
35		47	50	X					
36		48	60	X					
37		49	70	10					
38		50	55	T					
39		51	55	X					
40	TS	13652	70	X					
Detection			3	10					
Standard									
Repeat-									
Repeat-									
Method			XRF						

DIAL MINE GRID SOIL SAMPLES

RESPONSIBLE OFFICER B. Don
13.10.81

Results in ppm unless otherwise specified
T = element present; but concentration too low to measure
X = element concentration is below detection limit
- = element not determined

037

ANALABS

A division of MacDonald Hamilton & Co. Pty. Ltd.
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

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Code No. 83.1 08 588

Division Cooee, Tasmania

Phone 316837

Rack No. _____

Page No. 6

Order No. KP 2754

670100

RESULT SHEET

TUBE No.	SAMPLE No.		Sn	W					
1	TS	13653	70	X					
2		54	90	X					
3		55	140	15					
4		56	160	X					
5		57	65	X					
6		58	110	X					
7		59	210	25					
8		60	190	15					
9		61	270	15					
10		62	310	20					
11		63	300	35					
12		64	310	25					
13		65	300	25					
14		66	380	45					
15		67	300	40					
16		68	170	35					
17		69	260	35					
18		70	230	10					
19		71	250	10					
20	TS	13672	200	20					
21		73	170	30					
22		74	190	30					
23		75	170	30					
24		76	180	35					
25		77	190	35					
26		78	160	20					
27		79	180	40					
28		80	160	30					
29		81	160	30					
30		82	150	25					
31		83	160	25					
32		84	180	35					
33		85	200	30					
34		86	220	30					
35		87	200	20					
36		88	200	35					
37		89	190	35					
38		90	190	30					
39		91	190	30					
40	TS	13692	200	35					
Detection			3	10					
Standard									
Repeat-									
Repeat-									
Method			XRF						

RESponsible Officer B. Dora
13.1.81

Results in ppm unless otherwise specified
T = element present; but concentration too low to measure
X = element concentration is below detection limit
- = element not determined

038

ANALABS

A division of MacDonald Hamilton & Co. Pty. Ltd.
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

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Code No. 83.1 08 588

Division Coors, Tasmania

Phone 316837

Rack No. _____

Page No. 7

Order No. KP 2754

670101

RESULT SHEET

TUBE No.	SAMPLE No.		Sn	W					
1	TS	13693	180	25					
2		94	200	30					
3		95	190	35					
4		96	190	35					
5		97	170	30					
6		98	170	35					
7		99	190	35					
8	TS	13700	190	15					
9		01	210	15					
10		02	170	20					
11		03	200	25					
12		04	160	15					
13		05	210	25					
14		06	180	20					
15		07	210	25					
16		08	260	15					
17		09	260	10					
18		10	250	25					
19		11	250	15					
20	TS	13712	190	25					
21		13	260	40					
22		14	280	15					
23		15	240	55					
24		16	570	45					
25		17	370	45					
26		18	370	45					
27		19	710	25					
28		20	1350	25					
29		21	1300	25					
30		22	840	30					
31		23	980	25					
32		24	360	X					
33		25	470	20					
34		26	500	15					
35		27	140	X					
36		28	390	15					
37		29	310	20					
38		30	370	25					
39		31	390	25					
40	TS	13732	300	20					
Detection			3	10					
Standard									
Repeat-									
Repeat-									
Method			XRF						

RESPONSIBLE OFFICER B. Dav
13.10.81

Results in ppm unless otherwise specified
 T = element present; but concentration too low to measure
 X = element concentration is below detection limit
 - = element not determined

039

ANALABS

A division of MacDonald Hamilton & Co. Pty. Ltd.
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

Phone (09) 458 7999

Code No. 83.1 08 588

Division Cooee, Tasmania

Phone 316837

Rack No. _____

670102

RESULT SHEET

Page No. 8

Order No. KP 2754

TUBE No.	SAMPLE No.	Sn	W						
1	TS 13733	310	15						
2	34	240	10						
3	35	270	10						
4	36	220	15						
5	37	170	10						
6	38	170	20						
7	39	150	15						
8	40	140	15						
9	41	150	20						
10	42	160	20						
11	43	80	X						
12	44	80	X						
13	45	80	X						
14	46	80	X						
15	47	50	X						
16	48	15	X						
17	49	55	X						
18	50	50	20						
19	51	45	X						
20	TS 13752	25	X						
21	53	60	X						
22	54	35	X						
23	55	25	X						
24	56	45	X						
25	57	45	X						
26	58	40	X						
27	59	40	X						
28	60	45	X						
29	61	40	X						
30	TS 13762	45	X						
31									
32									
33									
34									
35									
36									
37									
38									
39									
40									
Detection		3	10						
Standard									
Repeat-									
Repeat-									
Method		XRF							

RESPONSIBLE OFFICER B. Dora
13.1.10.181

Results in ppm unless otherwise specified
T = element present; but concentration too low to measure
X = element concentration is below detection limit
- = element not determined

OAC

ANALABS

A DIVISION OF MACDONALD HAMILTON & CO. PTY. LTD.

52 Murray Road, Welshpool, W.A. 6106

Phone (09) 458 7999

KSS2

Dial Range

P. Wilson

83.1 08 597

670103

ANALYTICAL REPORT

This report must be read in conjunction with the results given for JOB No.

Client: Geopeko Ltd

(1) Devonport

Order No. Date Received: 1/10/81

Reference Results Required.....

Delivered by Total No. of Samples: 132

(2) SAMPLE NUMBERS	STATE OF SAMPLES Refer to section (5) for terminology	Average Weight	PRETREATMENT								ANALYSIS				
			Dry	Crush	Split	Pulverize	Sieve	Evaporate	Other (see remarks)	None	Refer to section (5) for terminology	Preparation	Method	Coefficient of variation (%)	
TS 13763-894	SO		1			3	2					Cu Pb Zn Fe	A1/1		
												Ag	A1/2		
												SN W	XRF		

(3) Number of pages of results: 8
 Date Reported: 9/10/81
 Results to: (1) As Above (2)
 Per: Telex, Mail
 Number of Copies: 3

(4) Remarks:

DIAL RANGE
DIAL MINE
GRID
SOIL SAMPLES

(5) STATE OF SAMPLES	ANALYSIS - PREPARATION				ANALYSIS - METHOD		
whole core	WC	perchloric acid	A1	cold acid	CA	atomic absorption	AAS
split core	SC	hydrochloric acid	A2	specific sulphide	SS	x-ray fluorescence	XRF
cutting	CU	nitric acid	A3	other mixed acids	Ma	spectrophotometry	SPEC
rock	Ro	aqua regia	A4	alkaline attack	AA	colorimetry	COL
soil	SO	nitric-perchloric	A5	volatilization	VO	chromatography	CHR
pulp	PU	HF mixture	A6	ignition	IG	titration	TTN
water	WA	HF under pressure	A7	pressed powder (XRF)	PP	other chemical means	CHEM
tissue	TI	fusion	A8	glass fusion (XRF)	GF	miscellaneous	MISC
stream sediment	SS					fluorescence	FLUOR
heavy mineral	HM						

Authorized Officer: B. O'Connell

ATTENTION Please advise us regarding the disposal of your samples.

JOB No.

- DISCARD IMMEDIATELY KEEP UNTIL ADVISED (A STORAGE CHARGE WILL BE MADE)
 DISCARD AFTER 2 MONTHS RETURN TO:

(PLEASE TICK APPROPRIATE BOX)

041

ANALABS

A division of MacDonald Hamilton & Co. Pty. Ltd.
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

Phone (09) 458 7999

Code No. 83.1 08 597
Rack No. R-34/24¹¹²
Page No. 1
Order No. KP 2759

Division Cocoa, Tasmania

Phone 316837

670104

RESULT SHEET

TUBE No.	SAMPLE No.		Cu	Pb	Zn	Fe(%)	Ag		
1	TS	13763	95	15	40	2.50	0.2		
2		64	110	10	40	2.65	0.2		
3		65	80	5	30	2.25	0.3		
4		66	160	5	30	2.70	0.1		
5		67	125	x	25	2.55	0.1		
6		68	210	15	45	3.30	0.2		
7		69	80	x	30	1.90	0.2		
8		70	130	5	10	2.05	0.3		
9		71	125	10	15	2.05	0.2		
10		72	215	5	25	2.85	x		
11		73	240	x	15	2.80	x		
12		74	240	5	30	2.70	x		
13		75	245	10	15	2.70	x		
14		76	305	15	45	3.70	0.1		
15		77	265	10	25	2.85	0.2		
16		78	325	10	30	4.45	0.3		
17		79	340	10	10	5.10	0.2		
18		80	225	5	20	3.10	0.1		
19		81	215	x	25	3.00	x		
20	TS	13782	190	5	25	3.10	0.1		
21		83	255	10	30	4.00	0.1		
22		84	170	5	10	1.50	0.1		
23		85	85	x	15	1.95	0.1		
24		86	150	x	15	2.90	0.1		
25		87	75	5	15	2.60	0.1		
26		88	75	5	15	2.70	0.1		
27		89	55	x	15	1.95	0.1		
28		90	55	5	15	2.65	0.2		
29		91	55	5	15	2.55	x		
30		92	115	5	15	2.65	0.1		
31		93	90	5	10	2.35	0.1		
32		94	65	5	25	2.20	0.1		
33		95	30	5	10	2.60	0.2		
34		96	35	10	10	1.45	0.3		
35		97	35	x	10	1.15	0.1		
36		98	60	5	15	1.10	0.2		
37		99	30	5	10	0.80	x		
38	TS	13800	70	x	10	1.50	0.4		
39		01	80	x	10	1.80	0.1		
40	TS	13802	135	5	10	2.55	0.1		
Detection			S	S	S	S	0.1		
Standard	A555		425	320	105	305	0.6		
Repeat-	TS	13763	100	15	40	2.40	0.3		
Repeat-	TS	13782	170	5	25	3.30	0.1		
Method			A/1				A/2		

RESPONSIBLE OFFICER B. Dora
9/10/81

Results in ppm unless otherwise specified
 T = element present; but concentration too low to measure
 X = element concentration is below detection limit
 - = element not determined

ANALABS

A division of MacDonald Hamilton & Co. Pty. Ltd.
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

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Code No.

83.1 08 597

Division Coore, Tasmania

Phone 316837

Rack No.

R-38 / 51

Page No.

2

Order No.

KP2759

670105

RESULT SHEET

TUBE No.	SAMPLE No.		Cu	Pb	Zn	Fe(p)	Ag			
1	TS	13803	200	30	20	3.30	x			
2		04	230	25	15	2.55	x			
3		05	295	20	10	3.30	x			
4		06	670	35	25	5.55	x			
5		07	310	30	10	3.45	x			
6		08	145	30	10	2.70	x			
7		09	55	30	10	1.45	0.1			
8		10	355	45	15	4.50	x			
9		11	345	40	15	4.45	x			
10		12	80	25	10	1.90	x			
11		13	180	30	20	2.40	x			
12		14	75	15	5	1.35	x			
13		15	40	20	25	0.96	x			
14		16	60	15	10	1.70	0.1			
15		17	115	15	15	2.30	x			
16		18	160	30	15	2.60	0.1			
17		19	130	20	10	2.00	0.1			
18		20	20	5	15	0.97	x			
19		21	20	5	10	0.87	0.1			
20	TS	13822	15	x	40	1.10	0.1			
21		23	465	35	35	4.75	x			
22		24	825	90	45	7.90	0.2			
23		25	500	40	30	6.40	x			
24		26	485	70	30	6.00	x			
25		27	440	25	20	7.40	x			
26		28	180	45	15	3.00	0.2			
27		29	500	40	10	6.90	x			
28		30	405	40	10	5.15	0.1			
29		31	410	40	10	5.75	0.1			
30		32	560	105	15	9.55	x			
31		33	260	65	20	4.35	x			
32		34	320	35	15	3.90	x			
33		35	440	55	20	4.70	0.1			
34		36	400	60	20	4.45	x			
35		37	505	100	20	5.40	x			
36		38	180	25	20	4.10	x			
37		39	135	15	5	2.30	x			
38		40	230	30	10	2.75	x			
39		41	240	25	15	2.75	x			
40	TS	13842	185	25	5	2.90	x			
Detection			5	5	5		0.1			
Standard	ASSS		435	335	105	30.0	0.8			
Repeat-	TS	13803	195	30	25	3.20	x			
Repeat-	TS	13822	15	x	30	1.25	x			
Method			AI/1				AI/2			

Results in ppm unless otherwise specified
T = element present; but concentration too low to measure
X = element concentration is below detection limit
- = element not determined

RESPONSIBLE OFFICER

B. Dora

9 / 10 / 81

042

043

ANALABS

A division of MacDonald Hamilton & Co. Pty. Ltd.
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

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Code No.

83.1 08 597

Division Cooee, Tasmania

Phone 315837

Rack No.

R-27/57

Page No.

3

670106

RESULT SHEET

Order No.

KP 2759

TUBE No.	SAMPLE No.		Cu	Pb	Zn	Fe(%)	Ag		
1	TS	13843	115	15	10	1.80	x		
2		44	80	15	10	1.70	x		
3		45	95	15	5	1.90	x		
4		46	290	30	10	4.45	x		
5		47	120	10	5	2.15	x		
6		48	85	5	5	1.90	x		
7		49	145	5	5	2.20	x		
8		50	260	5	15	2.95	x		
9		51	205	10	10	2.50	x		
10		52	150	10	10	2.50	x		
11		53	180	5	10	2.60	x		
12		54	70	5	5	1.85	x		
13		55	55	5	10	1.65	0.1		
14		56	25	x	5	1.20	x		
15		57	40	x	15	2.60	0.1		
16		58	40	10	10	1.70	x		
17		59	35	5	15	1.25	x		
18		60	50	15	15	2.50	x		
19		61	50	10	15	2.50	x		
20	TS	13862	25	10	35	1.30	x		
21		63	50	5	15	2.15	x		
22		64	35	5	20	1.50	x		
23		65	30	10	20	1.80	x		
24		66	10	10	35	0.41	x		
25		67	25	5	20	1.25	x		
26		68	15	5	20	0.44	x		
27		69	70	x	10	1.30	x		
28		70	160	5	10	2.65	0.1		
29		71	155	5	15	2.65	x		
30		72	200	5	10	2.95	0.1		
31		73	230	20	15	3.95	x		
32		74	250	10	10	3.20	x		
33		75	205	5	15	3.00	0.2		
34		76	320	15	20	4.80	0.1		
35		77	280	15	25	3.00	x		
36		78	390	15	35	3.65	0.1		
37		79	250	15	20	3.10	x		
38		80	270	20	35	3.60	x		
39		81	270	10	25	3.60	x		
40	TS	13882	320	10	30	4.10	x		
Detection			5	5	5		0.1		
Standard	AGSS		440	320	100	30.0	0.7		
Repeat-	TS	13843	115	15	10	1.90	x		
Repeat-	TS	13862	25	5	35	1.40	0.1		
Method			A/1				A/2		

RESPONSIBLE OFFICER B. D. ...
9.10.81

Results in ppm unless otherwise specified
T = element present; but concentration too low to measure
X = element concentration is below detection limit
- = element not determined

044

ANALABS

A division of MacDonal Hamilton & Co. Pty. Ltd.
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

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Code No. 83.1 08 597

Division Cooper, Tasmania

Phone 316837

Rack No. R-10C / 112 / 13C

Page No. 4

670107

RESULT SHEET

Order No. KP 2759

TUBE No.	SAMPLE No.		Cu	Pb	Zn	Fe(%)	Ag			
1	TS	13883	275	20	20	3.70	X			
2		84	215	15	25	4.00	0.1			
3		85	160	20	35	3.70	0.5			
4		86	160	15	25	3.50	0.1			
5		87	225	15	40	3.00	0.1			
6		88	165	15	55	3.15	0.1			
7		89	145	15	50	2.80	0.1			
8		90	95	15	40	3.20	0.1			
9		91	100	15	40	3.05	0.2			
10		92	80	10	45	2.90	X			
11		93	100	20	45	2.95	0.1			
12	TS	13894	105	15	35	3.00	0.1			
13										
14										
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33										
34										
35										
36										
37										
38										
39										
40										
Detection			S	S	S		0.1			
Standard	ASSS		420	300	105	31.5	0.7			
Repeat-	TS	13883	270	20	25	3.70	X			
Repeat-										
Method			A/1				A/2			

RESPONSIBLE OFFICER B. D. ...
9 / 10 / 81

Results in ppm unless otherwise specified
T = element present; but concentration too low to measure
X = element concentration is below detection limit
- = element not determined

045

10852
Dial Range

ANALABS

A division of MacDonald Hamilton & Co. Pty. Ltd.
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

Phone (09) 458 7999
Phone 316837

Code No. 831 08 597
Rack No. _____
Page No. 5
Order No. KP 2759

Division Coore, Tasmania

670108 RESULT SHEET

TUBE No.	SAMPLE No.		Sn	W					
1	TS	13763	60	X					
2		64	75	15					
3		65	50	X					
4		66	85	X					
5		67	85	15					
6		68	70	15					
7		69	110	15					
8		70	80	10					
9		71	85	10					
10		72	80	15					
11		73	60	15					
12		74	95	15					
13		75	85	10					
14		76	95	10					
15		77	95	10					
16		78	140	35					
17		79	110	20					
18		80	100	15					
19		81	110	25					
20	TS	13782	95	25					
21		83	45	20					
22		84	90	30					
23		85	50	X					
24		86	50	X					
25		87	45	X					
26		88	35	X					
27		89	75	X					
28		90	70	15					
29		91	75	X					
30		92	70	X					
31		93	100	X					
32		94	100	20					
33		95	120	30					
34		96	110	25					
35		97	140	25					
36		98	150	25					
37		99	80	X					
38	TS	13800	220	15					
39		01	220	30					
40	TS	13802	230	X					
Detection			1	10					
Standard									
Repeat-									
Repeat-									
Method			A11/2						

DIAL MINE GRID

SOIL SAMPLES

RESponsible OFFICER B. D. [Signature]
16/10/81

Results in ppm unless otherwise specified
T = element present; but concentration too low to measure
X = element concentration is below detection limit
- = element not determined

046

ANALABS

A division of MacDonald Hamilton & Co. Pty. Ltd.
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

Phone (09) 458 7999

Code No. 83.1 08 597

Division Cooee, Tasmania

Phone 316857

Rack No. _____

670109

RESULT SHEET

Page No. 6

Order No. KP 2759

TUBE No.	SAMPLE No.		Sn	W					
1	TS	13803	240	70					
2		04	270	45					
3		05	230	55					
4		06	180	60					
5		07	150	50					
6		08	170	30					
7		09	180	25					
8		10	140	10					
9		11	160	20					
10		12	110	20					
11		13	85	15					
12		14	90	15					
13		15	120	30					
14		16	85	30					
15		17	130	40					
16		18	140	50					
17		19	140	40					
18		20	140	50					
19		21	130	50					
20	TS	13822	150	55					
21		23	160	45					
22		24	140	30					
23		25	140	50					
24		26	160	35					
25		27	180	75					
26		28	130	25					
27		29	130	45					
28		30	170	40					
29		31	170	40					
30		32	75	20					
31		33	120	25					
32		34	85	45					
33		35	85	X					
34		36	95	35					
35		37	80	X					
36		38	85	25					
37		39	95	30					
38		40	100	45					
39		41	110	20					
40	TS	13842	100	40					
Detection			1	10					
Standard									
Repeat-									
Repeat-									
Method			Flu/2						

RESPONSIBLE OFFICER B. D. ...
16 / 10 / 81

Results in ppm unless otherwise specified
T = element present; but concentration too low to measure
X = element concentration is below detection limit
- = element not determined

047

ANALABS

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Code No. 83-1 08 597

Division Cooee, Tasmania

Phone 316837

Rack No. _____

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Order No. KP 2759

670110

RESULT SHEET

TUBE No.	SAMPLE No.		Sn	W					
1	TS 13843		90	15					
2		44	80	20					
3		45	110	20					
4		46	120	15					
5		47	110	30					
6		48	100	25					
7		49	160	20					
8		50	320	45					
9		51	200	25					
10		52	150	30					
11		53	160	20					
12		54	190	25					
13		55	270	40					
14		56	360	40					
15		57	460	40					
16		58	530	40					
17		59	450	30					
18		60	250	30					
19		61	250	35					
20	TS 13862		190	25					
21		63	140	15					
22		64	100	20					
23		65	45	X					
24		66	30	X					
25		67	40	X					
26		68	55	X					
27		69	65	X					
28		70	85	X					
29		71	90	15					
30		72	150	X					
31		73	280	X					
32		74	180	X					
33		75	340	15					
34		76	230	20					
35		77	100	X					
36		78	120	X					
37		79	120	X					
38		80	400	X					
39		81	270	15					
40	TS 13882		320	X					
Detection			1	10					
Standard									
Repeat-									
Repeat-									
Method			Au/2						

RESPONSIBLE OFFICER B. Down
16.10.81

Results in ppm unless otherwise specified
 T = element present; but concentration too low to measure
 X = element concentration is below detection limit
 - = element not determined

048

ANALABS

A division of MacDonald Hamilton & Co. Pty. Ltd.
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

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Code No. 831 08 597

Division Cooee, Tasmania

Phone 316837

Rack No. _____

Page No. 8

Order No. KP 2759

670111

RESULT SHEET

TUBE No.	SAMPLE No.		Sn	W					
1	TS	13883	460	X					
2		84	460	10					
3		85	450	15					
4		86	420	10					
5		87	250	X					
6		88	160	15					
7		89	160	10					
8		90	140	X					
9		91	170	10					
10		92	60	X					
11		93	40	X					
12	TS	13894	55	X					
13									
14									
15									
16									
17									
18									
19									
20									
21									
22									
23									
24									
25									
26									
27									
28									
29									
30									
31									
32									
33									
34									
35									
36									
37									
38									
39									
40									
Detection			1	10					
Standard									
Repeat-									
Repeat-									
Method			Am/2						

RESONSIBLE OFFICER B. Deane
16.1.81

Results in ppm unless otherwise specified
 T = element present; but concentration too low to measure
 X = element concentration is below detection limit
 - = element not determined

049

ANALABS

A DIVISION OF MACDONALD HAMILTON & CO. PTY. LTD.
52 Murray Road, Welshpool, W.A. 6106
Phone (09) 458 7999

KS00
Dial Range
P. Wilson

670112

ANALYTICAL REPORT

This report must be read in conjunction with the results given for JOB No. 83.1 08 569

Client Geopoko Ltd

(1) Devonport

Order No. KP 2743 Date Received 18/9/81

Reference Results Required

Delivered by Total No. of Samples 112

(2) SAMPLE NUMBERS	STATE OF SAMPLES	Average Weight	PRETREATMENT										ANALYSIS				
	Refer to section (5) for terminology		Dry	Crush	Split	Pulverize	Sieve	Evaporate	Other (see remarks)	None	Refer to section (5) for terminology	Preparation	Method	Coefficient of variation (%)			
TS 13501-612	So		1			3	2							Cu Pb Zn Fe	AI/1		
														Ag	AI/2		
														SN W	XRF		

(3) Number of pages of results: 6
 Date Reported: 25/9/81
 Results to: (1) As Above (2)
 Per: Telex, Mail
 Number of Copies: 3

(4) Remarks: DIAL MINE GRID SOILS

(5) STATE OF SAMPLES		ANALYSIS - PREPARATION				ANALYSIS - METHOD	
whole core	WC	perchloric acid	A1	cold acid	CA	atomic absorption	AAS
split core	SC	hydrochloric acid	A2	specific sulphide,	SS	x-ray fluorescence	XRF
cutting	CU	nitric acid	A3	other mixed acids	Ma	spectrophotometry	SPEC
rock	Ro	aqua regia	A4	alkaline attack	AA	colorimetry	COL
soil	SO	nitric-perchloric	A5	volatilization	VO	chromatography	CHR
pulp	PU	HF mixture	A6	ignition	IG	titration	TTN
water	WA	HF under pressure	A7	pressed powder (XRF)	PP	other chemicals means	CHEM
tissue	TI	fusion	A8	glass fusion (XRF)	GF	miscellaneous	MISC
stream sediment	SS					fluorescence	FLUOR
heavy mineral	HM						

Authorized Officer: B. Dan

ATTENTION Please advise us regarding the disposal of your samples. **JOB No.**

DISCARD IMMEDIATELY KEEP UNTIL ADVISED (A STORAGE CHARGE WILL BE MADE)

DISCARD AFTER 2 MONTHS RETURN TO:

(PLEASE TICK APPROPRIATE BOX)

050

ANALABS

A division of MacDonald Hamilton & Co. Pty. Ltd.
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

Phone (09) 458 7999

Code No.

83.1 08 569

Division Cooee, Tasmania

Phone 316837

Rack No.

R-12 / 35

Page No.

1

Order No.

KP 2743

670113

RESULT SHEET

TUBE No.	SAMPLE No.		Cu	Pb	Zn	Fe	Ag		
1	TS	13501	15	35	20	1.85%	0.3		
2		02	5	15	20	2.0%	0.2		
3		03	5	10	25	1.3%	0.3		
4		04	10	10	30	2.95%	0.3		
5		05	x	x	35	1.25%	0.2		
6		06	5	x	15	1.2%	0.2		
7		07	x	x	5	250	0.2		
8		08	x	10	10	350	0.2		
9		09	x	10	5	300	0.5		
10		10	x	5	10	300	1.0		
11		11	x	5	15	350	0.2		
12		12	5	x	15	1900	x		
13		13	5	x	20	2550	0.8		
14		14	x	x	5	1250	1.2		
15		15	x	10	15	350	0.8		
16		16	x	x	10	450	0.3		
17		17	x	x	5	150	0.1		
18		18	x	x	5	200	0.8		
19		19	x	x	5	400	0.5		
20	TS	13520	x	x	10	1050	0.3		
21		21	x	x	10	1150	0.3		
22		22	5	x	20	1.55%	0.2		
23		23	5	x	15	4500	0.5		
24		24	5	x	15	4450	0.9		
25		25	5	x	25	275%	0.1		
26		26	x	x	30	2.55%	0.1		
27		27	x	x	20	3.2%	0.2		
28		28	5	x	20	2.55%	0.2		
29		29	x	x	5	2250	0.7		
30		30	x	x	10	2400	0.2		
31		31	x	x	25	2700	0.4		
32		32	x	x	25	2.4%	0.3		
33		33	x	x	60	2.45%	0.2		
34		34	x	x	35	2.2%	0.2		
35		35	x	x	25	2.45%	0.4		
36		36	x	x	20	2.0%	0.2		
37		37	x	x	x	400	0.3		
38		38	x	x	20	9950	0.2		
39		39	x	x	15	850	0.2		
40	TS	13540	x	x	5	750	0.2		
Detection			5	5	5	50	0.1		
Standard	ASS5		435	320	105	34.52	0.8		
Repeat-	TS	13501	15	30	25	1.90%	0.2		
Repeat-	TS	13520	x	x	10	1250	0.3		
Method			A1/1				A1/2		

RESponsible OFFICER B. D.
28 / 9 / 81

Results in ppm unless otherwise specified
T = element present; but concentration too low to measure
X = element concentration is below detection limit
- = element not determined

ANALABS

A division of MacDonald Hamilton & Co. Pty. Ltd.
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

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Code No.

Division Copper, Tasmania

Phone 316837

Rack No.

670114

Page No.

Order No.

83.1 08 569

R-10 / 179

2

KP 2743

RESULT SHEET

TUBE No.	SAMPLE No.		Cu	Pb	Zn	Fe	Ag			
1	TS	13541	X	X	15	1050	0.2			
2		42	10	X	15	7800	1.4			
3		43	5	X	10	3050	0.3			
4		44	X	X	X	1000	0.5			
5		45	5	X	10	7550	0.3			
6		46	X	X	10	1050	0.3			
7		47	15	X	10	5700	0.3			
8		48	10	5	60	5950	0.5			
9		49	15	5	50	6200	2.1			
10		50	10	X	15	4550	1.2			
11		51	10	X	20	4800	1.5			
12		52	10	X	10	2900	0.2			
13		53	X	5	50	1850	0.2			
14		54	5	X	10	3500	1.0			
15		55	X	5	15	1.7%	0.1			
16		56	45	10	10	2.25%	0.1			
17		57	45	25	10	16.0%	0.1			
18		58	X	X	X	4300	0.2			
19		59	X	X	X	4650	0.2			
20	TS	13560	X	X	X	2850	0.2			
21		61	X	X	X	3150	0.2			
22		62	X	15	5	1150	1.7			
23		63	X	X	5	3550	0.2			
24		64	75	35	10	4.45%	0.2			
25		65	10	15	5	2.25%	0.1			
26		66	5	15	10	3450	0.3			
27		67	10	35	X	3050	0.2			
28		68	15	25	5	1.20%	0.8			
29		69	35	20	5	3.00%	0.1			
30		70	105	25	10	5.35%	X			
31		71	100	25	10	5.15%	X			
32		72	105	40	10	5.19%	0.1			
33		73	80	30	20	3.45%	X			
34		74	130	30	10	3.45%	0.1			
35		75	135	40	10	3.80%	0.1			
36		76	115	35	20	5.35%	0.3			
37		77	95	25	15	2.75%	0.2			
38		78	80	20	10	2.60%	0.1			
39		79	70	15	15	2.25%	0.2			
40	TS	13580	65	250	10	3.15%	0.7			
Detection			5	5	5	50	0.1			
Standard	ASS 5		440	325	105	35.5%	0.8			
Repeat-	TS	13541	X	X	15	900	0.1			
Repeat-	TS	13560	X	X	5	2900	0.1			
Method			A1/4				A1/2			

RESPONSIBLE OFFICER B. Owen
28/9/81

Results in ppm unless otherwise specified
 T = element present; but concentration too low to measure
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 - = element not determined

ANALABS

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52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

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Code No.

Division Copper, Tasmania

Phone 316837

Rack No.

Page No.

Order No.

83-108569

R-44/51

3

KP2743

670115

RESULT SHEET

TUBE No.	SAMPLE No.		Cu	Pb	Zn	Fe	Ag		
1	TS	13581	60	25	10	3.40%	0.1		
2		82	50	50	5	2.95%	0.2		
3		83	50	65	15	2.80%	0.1		
4		84	45	20	10	2.70%	0.1		
5		85	30	15	5	1.15%	0.1		
6		86	15	10	5	1.20%	0.2		
7		87	25	35	X	1.55%	0.1		
8		88	75	35	5	2.70%	X		
9		89	165	45	10	5.10%	0.2		
10		90	105	175	10	2.35%	0.4		
11		91	105	35	5	2.30%	0.2		
12		92	230	125	20	5.60%	0.1		
13		93	190	45	10	2.90%	0.1		
14		94	140	35	15	3.30%	0.1		
15		95	490	110	20	6.65%	X		
16		96	225	115	10	3.70%	0.2		
17		97	200	35	5	3.45%	0.1		
18		98	75	15	10	1.70%	0.1		
19		99	190	25	5	3.30%	0.2		
20	TS	13600	135	10	5	3.60%	0.3		
21		01	90	5	10	2.45%	0.3		
22		02	55	10	5	1.50%	0.1		
23		03	30	10	X	8500	0.2		
24		04	35	10	5	8050	0.2		
25		05	45	15	5	1.10%	0.1		
26		06	55	10	X	9700	0.2		
27		07	110	15	10	2.85%	0.2		
28		08	65	5	15	2.80%	0.2		
29		09	85	10	25	3.45%	0.2		
30		10	75	5	5	1.95%	0.2		
31		11*	75	15	5	1.90%	0.2		
32	TS	13612	85	5	10	3.45%	0.3		
33									
34									
35									
36									
37									
38									
39									
40									
Detection			5	5	5	50	0.1		
Standard	ASS5		425	305	95	31.0%	0.7		
Repeat--	TS	13581	60	20	5	3.40%	0.2		
Repeat--	TS	13600	135	15	5	3.55%	0.2		
Method			A/1				A/2		

RESPONSIBLE OFFICER B. Dan
28/9/81

Results in ppm unless otherwise specified
 T = element present; but concentration too low to measure
 X = element concentration is below detection limit
 - = element not determined

053

ANALABS

A division of MacDonald Hamilton & Co. Pty. Ltd.
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

Dial Range P. Wilson

Phone (09) 458 7999

Code No. 83.1 08 569

Division Coore, Tasmania

Phone 316837

Rack No. _____

670116

RESULT SHEET

Page No. 4

Order No. KP 2743

TUBE No.	SAMPLE No.		Sn	W					
1	TS 13501		9	X					
2		02	X	X					
3		03	45	X					
4		04	10	10					
5		05	6	X					
6		06	4	X					
7		07	6	10					
8		08	3	X					
9		09	5	X					
10		10	8	15					
11		11	X	25					DIAL MINE
12		12	9	X					GRID
13		13	4	X					SOIL SAMPLES.
14		14	5	X					
15		15	3	X					
16		16	5	X					
17		17	X	X					
18		18	3	X					
19		19	6	X					
20	TS 13520		5	X					
21		21	4	X					
22		22	9	X					
23		23	3	10					
24		24	8	X					
25		25	15	X					
26		26	8	X					
27		27	3	X					
28		28	20	X					
29		29	7	X					
30		30	6	X					
31		31	4	X					
32		32	8	X					
33		33	3	X					
34		34	5	X					
35		35	6	X					
36		36	X	X					
37		37	4	10					
38		38	7	X					
39		39	7	15					
40	TS 13540		4	X					
Detection			3	10					
Standard									
Repeat-									
Repeat-									
Method			XRF						

RESPONSIBLE OFFICER B. D. ... 29 / 9 / 81

Results in ppm unless otherwise specified
T = element present, but concentration too low to measure
X = element concentration is below detection limit
- = element not determined

054

ANALABS

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52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

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Code No. 83.1 08 569

Division Coore, Tasmania

Phone 316837

Rack No. _____

Page No. 5

Order No. KP 2743

670117

RESULT SHEET

TUBE No.	SAMPLE No.		Sn	W					
1	TS	13541	4	X					
2		42	6	10					
3		43	3	10					
4		44	3	X					
5		45	6	X					
6		46	X	X					
7		47	6	10					
8		48	10	10					
9		49	10	X					
10		50	8	X					
11		51	8	X					
12		52	6	X					
13		53	8	X					
14		54	8	X					
15		55	5	X					
16		56	90	40					
17		57	55	10					
18		58	170	40					
19		59	160	35					
20	TS	13560	150	40					
21		61	170	35					
22		62	140	20					
23		63	130	35					
24		64	85	15					
25		65	160	35					
26		66	150	30					
27		67	170	35					
28		68	200	35					
29		69	180	25					
30		70	160	15					
31		71	170	25					
32		72	170	25					
33		73	180	20					
34		74	190	40					
35		75	200	20					
36		76	190	30					
37		77	170	15					
38		78	220	35					
39		79	120	20					
40	TS	13580	180	20					
Detection			3	10					
Standard									
Repeat—									
Repeat—									
Method			XRF						

DAL MINE
SID
STL MAMES.

RESPONSIBLE OFFICER B. Dora
29/9/81

Results in ppm unless otherwise specified
T = element present; but concentration too low to measure
X = element concentration is below detection limit
- = element not determined

055

ANALABS

A division of MacDonald Hamilton & Co. Pty. Ltd.
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

Phone (09) 458 7999

Code No. 83-108569

Division Cooee, Tasmania

Phone 31837

Rack No. _____

Page No. 6

Order No. KP 2743

670118

RESULT SHEET

TUBE No.	SAMPLE No.		Sn	W					
1	TS 13581		160	35					
2		82	210	20					
3		83	210	15					
4		84	140	15					
5		85	85	X					
6		86	190	15					
7		87	210	25					
8		88	190	15					
9		89	170	15					
10		90	110	15					
11		91	100	X					
12		92	190	25					
13		93	230	15					
14		94	95	15					
15		95	250	10					
16		96	110	25					
17		97	100	X					
18		98	95	30					
19		99	870	20					
20	TS 13600		350	15					
21		01	320	20					
22		02	180	20					
23		03	140	X					
24		04	85	X					
25		05	45	10					
26		06	30	X					
27		07	20	10					
28		08	40	X					
29		09	7	X					
30		10	10	X					
31		11	8	X					
32	TS 13612		15	X					
33									
34									
35									
36									
37									
38									
39									
40									
Detection			3	10					
Standard									
Repeat-									
Repeat-									
Method			XRF						

RESPONSIBLE OFFICER B. D. [Signature]
29 / 9 / 81

Results in ppm unless otherwise specified
 T = element present; but concentration too low to measure
 X = element concentration is below detection limit
 - = element not determined

056

670119

REGIONAL ROCK CHIP SAMPLES

058

ANALABS

Division of MacDonald Hamilton & Co. Pty. Ltd.

ANALYTICAL DATA

670121

SAMPLE PREFIX REPORT NUMBER REPORT DATE CLIENT ORDER No. PAGE

KR
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TUBE No.	SAMPLE No.	Mn	Fe	Cu	Zn	Hg	Pb	Cd	Cr	Ni	Co	Mg	Al	Si	K	Na	Ca	S	P	Cl	Br	I	F	O	N	C	H		
KR		83.1 06 697					30.11.61		KP 2813					1 OF 2															
1	8272	120	2.25%	20	120	X	X																						
2	8273	90	1.35%	30	5	0.2	X																						
3	8274	470	2.20%	10	70	0.1	X																						
4	8275	110	8200	X	10	X	X																						
5	8276	195	3.05%	X	40	0.1	X																						
6	8277	10	1250	15	10	1.3	X																						
7	8278	10	1450	X	10	0.8	X																						
8	8279	45	8550	40	435	1.8	X																						
9	8280	23	5150	40	535	0.7	X																						
10																													
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Results in ppm unless otherwise specified
 T = element present, but concentration too low to measure
 X = element concentration is below detection limit
 - = element not determined

AUTHORISED OFFICER *B. Don*

59

ANALABS

Division of MacDonnell Hamilton & Co. Pty. Ltd.

670122

ANALYTICAL DATA

SAMPLE PREFIX REPORT NUMBER REPORT DATE CLIENT ORDER No. PAGE

KR 83.1 08 697 30.11.81 KP 2813 2 OF 2

TUBE No.	SAMPLE No.	Pb	Fe	Cu	Zn	Ag	Au	Pb		
1	FS4	625	8.00%	305	720	1.5		110		
2	8272	115	2.20%	15	115	X		20		
3										
4										
5										
6										
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19										
20										
21										
22										
23	DETECTION	5	50	5	5	0.1	0.008	5		
24	DIGESTION	A1	A1	A1	A1	A1		A1		
25	METHOD	A1/1	A1/1	A1/1	A1/1	A1/2	LG40	A1/1		

Results in ppm unless otherwise specified
 1 = element present but concentration too low to measure
 X = element concentration is below detection limit
 - = element not determined

AUTHORISED OFFICER *B. Down*

670123

ANALABS

Dral Long Hg

Phone (09) 458 7999

A division of MacDonald Hamilton & Co. Pty. Ltd.
52 Murray Road, Welshpool, W.A. 6106

Telex AA92560

ANALYTICAL REPORT No.

83.1 08 698

THIS REPORT MUST BE READ IN CONJUNCTION WITH THE ACCOMPANYING ANALYTICAL DATA

Geopaka Ltd
PO Box 598
Devonport
Tasmania 7310

ORDER No.	PROJECT
KR 2812	K 602
DATE RECEIVED	RESULTS REQUIRED
23.11.81	

NO. OF PAGES OF RESULTS	DATE REPORTED	NO. OF COPIES	TOTAL NO. OF SAMPLES
	30.11.81	3	21

STATE OF SAMPLES	SAMPLE NUMBERS	PRE-TREATMENT							ANALYSIS		
		DRY	CRUSH	SPLIT	PULVERISE	SIEVE	OTHER SEE REMARKS	NONE	REFER TO ANALYSIS SECTION	PREPARATION	METHOD
ROCK	KR 8251-71		1	3	2 4				Cu Pb Zn Fe Mn Ag Au Sn W	A1 A1	AAS AAS LG40 XRF

As Above

RESULTS TO

RESULTS TO

REMARKS
ROCK SAMPLES

STATE OF SAMPLES	ANALYSIS — PREPARATION				ANALYSIS — METHOD		
whole core	WC	perchloric acid	A1	cold acid	CA	atomic absorption	AAS
split core	SC	hydrochloric acid	A2	specific sulphide	SS	x-ray fluorescence	XRF
cutting	CU	nitric acid	A3	other mixed acids	MA	spectrophotometry	SPEC
rock	RO	aqua regia	A4	alkaline attack	AA	colorimetry	COL
soil	SO	nitric perchloric	A5	volatilization	VO	chromatography	CHR
pulp	PU	HF mixture	A6	ignition	IG	titration	TTN
water	WA	HF under pressure	A7	pressed powder (XRF)	PP	other chemical means	CHEM
sludge	SL	fusion	A8	glass fusion (XRF)	GF	miscellaneous	MISC
stream sediment	SS					fluorescence	FLUOR
heavy mineral	HM					inductively coupled plasma	ICP

AUTHORISED OFFICER *[Signature]*

670124

ANALABS

A Division of MacDonell Hamilton & Co. Pty. Ltd.

ANALYTICAL DATA

SAMPLE PREFIX

REPORT NUMBER

REPORT DATE

CLIENT ORDER No.

PAGE

KR		83.1 08 698				9.12.81		KP 2812		1 OF 2	
TUBE No.	SAMPLE No.	Mn	Pb	Cu	Zn	Ag	Sn	W	Ru	Pb	
1	8251	54	5.40%	10	15	X	10	15	X	25	
2	8252	20	2.13%	60	5	X	X	X	X	20	
3	8253	70	5.85%	50	10	X	30	X	X	15	
4	8254	155	38.5%	450	90	0.8	420	20	X	45	
5	8255	190	9.55%	170	115	X	20	X	X	20	
6	8256	40	3450	20	5	X	200	20	X	X	
7	8257	30	2250	X	5	X	180	25	X	X	
8	8258	35	7.50%	125	15	X	130	X	X	10	
9	8259	50	1.55%	15	5	0.1	110	15	X	X	
10	8260	40	7400	20	10	X	65	15	X	20	
11	8261	45	4.20%	235	5	X	180	20	X	75	
12	8262	105	2.25%	35	X	0.1	260	55	X	5	
13	8263	25	7500	10	X	X	15	X	X	10	
14	8264	25	1.90%	70	X	X	260	15	X	30	
15	8265	30	4.05%	265	10	X	120	50	X	20	
16	8266	40	2.81%	165	5	X	70	45	X	25	
17	8267	60	1.40%	25	5	X	140	35	X	X	
18	8268	65	5.45%	480	5	X	120	25	X	40	
19	8269	20	1.55%	70	X	X	75	35	X	20	
20	8270	1250	3.14%	265	5	X	230	40	X	75	
21	8271	50	4.55%	200	5	0.1	180	25	X	25	
22											
23											
24											
25											

Results in ppm unless otherwise specified
 X = element present, but concentration too low to measure
 * = element concentration is below detection limit
 - = element not determined

 AUTHORIZED
 OFFICER
 

670125

ANALABS

Division of MacDonnell Hamilton & Co. Pty. Ltd.

ANALYTICAL DATA

SAMPLE PREFIX

REPORT NUMBER

REPORT DATE

CLIENT ORDER No.

PAGE

KR	83.1 08 698	9.12.81	KP 2812	2 OF 2
----	-------------	---------	---------	--------

TUBE No.	SAMPLE No.	Mn	Fe	Cu	Zn	Pb	Sn	H	Al	Pb
1	STD FS4	685	8.00%	305	720	1.4	-	-	-	110
2	RPT 8251	55	5.45%	10	15	X	-	-	-	25
3	RPT 8270	1300	3.14%	270	10	X	-	-	-	75
4										
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21										
22										
23	DETECTION	5	50	5	5	0.1	10	10	0.008	5
24	DIGESTION	A1	A1	A1	A1	A1				A1
25	METHOD	A1/1	A1/1	A1/1	A1/1	A1/2	XRF	XRF	LG40	A1/1

Results reported unless otherwise specified
 - element present but concentration not determined
 X - element concentration is below detection limit
 - element not determined

AUTHORISED OFFICER *[Signature]*

003

ANALABS

A DIVISION OF MACDONALD HAMILTON & CO. PTY. LTD.
52 Murray Road, Welshpool, W.A. 6106
Phone (09) 458 7999

K498
Dial
P. Wilson
83.1 08 582

670126

ANALYTICAL REPORT

This report must be read in conjunction with the results given for JOB No.

Client Geopelco Ltd

(1) Order No. KP 2750 Date Received 24/9/81
..... Reference Results Required
..... Delivered by Total No. of Samples 26

(2) SAMPLE NUMBERS	STATE OF SAMPLES	Average Weight	PRETREATMENT								ANALYSIS			
	Refer to section (5) for terminology		Div	Crush	Split	Pulverize	Sieve	Evaporate	Other (see remarks)	Name	Refer to section (5) for terminology	Preparation	Method	Coefficient of variation (%)
<u>KR 7846-50</u>	<u>Ro</u>			<u>1</u>	<u>2</u>						<u>Cu Pb Zn Fe Mn</u>	<u>A1/1</u>		
<u>KR 9315-35</u>											<u>Ag</u>	<u>A1/2</u>		
<u>KR 9355B</u>											<u>Sn W</u>	<u>XRF</u>		

(3) Number of pages of results: 2
Date Reported: 5/10/81
Results to: (1) As Above (2)
Per: Telex, Mail
Number of Copies: 3

(4) Remarks:

DIAC RANGE
REGIONAL
ROCK CHIP
SAMPLES

(5) STATE OF SAMPLES	ANALYSIS - PREPARATION				ANALYSIS - METHOD		
whole core	WC	perchloric acid	A1	cold acid	CA	atomic absorption	AAS
split core	SC	hydrochloric acid	A2	specific sulphide	SS	x-ray fluorescence	XRF
cutting	CU	nitric acid	A3	other mixed acids	Ma	spectrophotometry	SPEC
rock	Ro	aqua regia	A4	alkaline attack	AA	colorimetry	COL
soil	SO	nitric-perchloric	A5	volatilization	VO	chromatography	CHR
pulp	PU	HF mixture	A6	ignition	IG	titration	TTN
water	WA	HF under pressure	A7	pressed powder (XRF)	PP	other chemical means	CHEM
tissue	TJ	fusion	AB	glass fusion (XRF)	GF	miscellaneous	MISC
stream sediment	SS					fluorescence	FLUOR
heavy mineral	HM						

Authorized Officer B. Doe

ATTENTION Please advise us regarding the disposal of your samples.

JOB No.

- DISCARD IMMEDIATELY KEEP UNTIL ADVISED (A STORAGE CHARGE WILL BE MADE)
 DISCARD AFTER 2 MONTHS RETURN TO:

(PLEASE TICK APPROPRIATE BOX)

064

ANALABS

A division of MacDonald Hamilton & Co. Pty. Ltd.
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

Phone (09) 458 7999

Code No. 831 08 582

Division Cooper, Tasmania

Phone 316837

Rack No. R-34/55

Page No. 1

670127

RESULT SHEET

Order No. KP 2750

TUBE No.	SAMPLE No.		Cu	Pb	Zn	Fe(%)	Mn	Ag		
1	KR	7846	165	x	145	8.20	925	0.2		
2		47	40	x	25	6.60	175	0.1		
3		48	145	x	80	7.20	760	0.2		
4		49	45	x	35	3.40	80	0.1		
5		50	x	x	40	1.85	560	0.2		
6	KR	9315	10	x	x	0.47	105	0.2		
7		16	x	x	20	0.93	460	0.2		
8		17	115	30	145	5.60	585	0.2		
9		18	105	45	145	6.95	220	0.4		
10		19	x	15	20	1.40	390	x		
11		20	110	x	30	5.15	950	0.1		
12		21	45	x	150	6.20	715	0.1		
13		22	15	x	130	8.20	345	0.1		
14		23	50	x	90	3.60	180	0.1		
15		24	65	x	20	3.20	35	0.1		
16		25	90	x	30	5.80	70	0.1		
17		26	90	45	130	5.60	730	x		
18		27	x	5	45	1.90	110	0.1		
19		28	20	10	45	19.0	715	x		
20	KR	9329	55	15	30	1.80	1450	0.2		
21		30	75	x	260	5.60	2400	x		
22		31	20	x	20	9.85	1600	0.1		
23		32	100	5	125	6.30	1400	x		
24		33	700	5	80	10.0	890	0.1		
25		34	260	35	25	4.65	130	1.4		
26		35A	65	5	5	0.92	290	0.1		
27	KR	9355B	15	85	50	0.73	140	0.2		
28										
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31										
32										
33										
34										
35										
36										
37										
38										
39										
40										
Detection			S	S	S		5	0.1		
Standard	ASS5		450	330	100	35.0	250	0.7		
Repeat-	KR	7846	170	x	140	8.50	920	0.1		
Repeat-	KR	9329	45	10	30	1.70	1450	0.2		
Method			A/1					A/2		

RESPONSIBLE OFFICER B. Brown
 5.10.81

Results in ppm unless otherwise specified
 T = element present; but concentration too low to measure
 X = element concentration is below detection limit
 - = element not determined

065

ANALABS

A division of MacDonal Hamilton & Co. Pty. Ltd.
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

Division Cooee, Tasmania

Phone (09) 458 7999

Phone 316837

Code No. 83.1 08 582

Rack No. _____

Page No. 2

Order No. KP 2750

670128

RESULT SHEET

TUBE No.	SAMPLE No.		Sn	W					
1	KR	7846	X	X					
2		47	7	X					
3		48	8	X					
4		49	8	X					
5	KR	7850	X	X					
6	KR	9315	6	X					
7		16	5	X					
8		17	4	X					
9		18	4	X					
10		19	X	X					
11		20	3	X					
12		21	4	X					
13		22	3	X					
14		23	X	10					
15		24	5	X					
16		25	7	X					
17		26	5	X					
18		27	X	X					
19		28	6	X					
20	KR	9329	50	X					
21		30	7	X					
22		31	X	X					
23		32	X	X					
24		33	8	X					
25		34	4150	50					
26	KR	9335A	200	25					
27	KR	9355B	300	65					
28									
29									
30									
31									
32									
33									
34									
35									
36									
37									
38									
39									
40									
Detection			3	10					
Standard									
Repeat—									
Repeat—									
Method			XRF						

DIAL RANGE
REGIONAL
ROCK CHIP
SAMPLER

RESPONSIBLE OFFICER B. Dora
14.10.81

Results in ppm unless otherwise specified
T = element present; but concentration too low to measure
X = element concentration is below detection limit
— = element not determined

066

ANALABS

A DIVISION OF MACDONALD HAMILTON & CO PTY LTD
52 Murray Road, Welshpool, W.A. 6106
Phone (09) 458 7999

K495
P Wilson
Dial Range

670129

ANALYTICAL REPORT

This report must be read in conjunction with the results given for JOB No. 83.1 08 557

Client Geopeks Ltd

(1) Devonport Order No. KP 2737 Date Received 9/9/81

Reference..... Results Required.....

Delivered by..... Total No. of Samples.....

(2) SAMPLE NUMBERS	STATE OF SAMPLES Refer to section (5) for terminology	Average Weight	PRETREATMENT								ANALYSIS					
			Dry	Crush	Split	Pulverize	Sieve	Evaporate	Other (see remarks)	None	Refer to section (5) for terminology				Preparation	Method
KR 7802-09	Ro			1		200						Cu Pb Zn Fe Mn	AI/1			
7812-14					3	4						Ag	AI/2			
7817-45												Ba	AI/A			
NO NUMBER												Au	LA40			
												Sn W	XRF			

(3) Number of pages of results: 4
 Date Reported: 12/9/81
 Results to: (1) As Above (2).....
 Per: Telex, mail
 Number of Copies: 3

(4) Remarks:

DIAL RANGE
ROCK SAMPLES.
REGIONAL.

(5) STATE OF SAMPLES	ANALYSIS - PREPARATION	ANALYSIS - METHOD
whole core WC	perchloric acid A1	atomic absorption AAS
split core SC	hydrochloric acid A2	x-ray fluorescence XRF
cutting CU	nitric acid A3	spectrophotometry SPEC
rock Ro	aqua regia A4	colorimetry COL
soil SO	nitric-perchloric A5	chromatography CHR
pulp PU	HF mixture A6	titration TTN
water WA	HF under pressure A7	other chemicals means CHEM
tissue TI	fusion A8	miscellaneous MISC
stream sediment SS		fluorescence FLUOR
heavy mineral HM		

Authorized Officer B. Darn

ATTENTION Please advise us regarding the disposal of your samples.

JOB No.

- DISCARD IMMEDIATELY KEEP UNTIL ADVISED (A STORAGE CHARGE WILL BE MADE)
- DISCARD AFTER 2 MONTHS RETURN TO:.....

(PLEASE TICK APPROPRIATE BOX)

067

ANALABS

A division of MacDonald Hamilton & Co. Pty. Ltd.
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

Phone (09) 458 7999

Code No. 83.1.08.557

Division Copper, Tasmania

Phone 316337

Rack No. R-18/131

Page No. 1

Order No. KP 2737

670130

RESULT SHEET

TUBE No.	SAMPLE No.		Cu	Pb	Zn	Fe	Mn	Ag		
1	KR	7802	x	115	150	14.0%	3.5%	0.1		
2		03	x	x	35	18.5%	780	0.2		
3		04	x	10	45	1.9%	2650	0.2		
4		05	x	170	15	1.4%	1250	0.5		
5		06	100	x	220	4.25%	340	0.1		
6		07	55	x	50	7.0%	340	0.2		
7		08	85	x	60	6.0%	70	0.1		
8		09	105	x	295	3.15%	450	1.5		
9		12	x	x	15	2.1%	270	0.2		
10		13	5	x	10	2.15%	105	0.2		
11		14	90	x	35	4.0%	560	0.2		
12		17	30	x	65	3.65%	295	0.1		
13		18	5	x	10	2800	10	0.2		
14		19	x	x	5	1.0%	1400	0.2		
15		20	20	x	35	3.4%	1000	0.2		
16		21	25	20	115	3.8%	955	0.2		
17		22	10	45	5	7100	160	0.3		
18		23	10	10	x	7800	205	0.2		
19		24	10	x	x	2000	15	0.3		
20	KR	7825	175	x	50	3.1%	390	0.2		
21		26	5	x	40	6.5%	495	0.2		
22		27	10	x	15	1.45%	80	0.3		
23		28	5	65	70	1.85%	70	0.5		
24		29	195	x	80	5.0%	115	0.2		
25		30	95	x	50	5.8%	155	0.2		
26		31	10	x	35	2.1%	80	0.2		
27		32	10	125	95	3.4%	680	0.3		
28		33	5	145	150	7.7%	1750	0.2		
29		34	5	x	55	1.3%	1200	0.3		
30		35	65	x	230	5.2%	1400	0.2		
31		36	90	10	225	5.1%	2050	0.2		
32		37	10	70	185	4.6%	1000	0.2		
33		38	60	80	185	4.0%	185	0.2		
34		39	15	x	200	4.8%	2400	0.2		
35		40	5	x	50	3.4%	370	0.2		
36		41	10	5	50	2.1%	3050	0.2		
37		42	5	x	25	1.95%	1550	0.2		
38		43	20	10	50	3.8%	2050	0.2		
39		44	40	35	60	4.5%	790	0.5		
40	KR	7845	10	75	40	2.3%	355	0.2		
Detection			5	5	5	50	5	0.1		
Standard	ASS5		420	305	100	29.5%	240	0.6		
Repeat-	KR	7802	x	120	150	14.5%	3.5%	x		
Repeat-	KR	7825	170	x	50	3.1%	405	0.1		
Method			A1/1					A1/2		

RESPONSIBLE OFFICER B. Deane
14/9/81

Results in ppm unless otherwise specified
T = element present; but concentration too low to measure
X = element concentration is below detection limit
- = element not determined

068

ANALABS

A division of MacDonald Hamilton & Co. Pty. Ltd.
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

Phone (09) 458 7999

Code No. 83.1 08 557

Division Coee Tasmania

Phone 316837

Rack No. R-188 / 138

Page No. 2

Order No. KP2737

670131

RESULT SHEET

TUBE No.	SAMPLE No.	Cu	Pb	Zn	Fe	Mn	Ag		
1	NO NUMBER	5	45	75	3.95%	545	0.1		
2									
3									
4									
5									
6									
7									
8									
9									
10									
11									
12									
13									
14									
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34									
35									
36									
37									
38									
39									
40									
Detection		S	S	S	50	S	0.1		
Standard									
Repeat-									
Repeat-									
Method		A/I					A/I		

RESPONSIBLE OFFICER B. Don
14 / 9 / 81

Results in ppm unless otherwise specified
T = element present; but concentration too low to measure
X = element concentration is below detection limit
- = element not determined

069

Dial Range P. W.

ANALABS

A division of MacDonald Hamilton & Co. Pty. Ltd.
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

Phone (09) 458 7999

Code No. 83.1 8557

Division Coore, Tasmania

Phone 316837

Rack No. _____

Page No. 3

Order No. KP 2737

670132

RESULT SHEET

TUBE No.	SAMPLE No.	Au							
1	KR 7802	x							
2	03	0.017							
3	04	0.012							
4	05	0.008							
5	06	x							
6	07	0.012							
7	08	0.008							
8	09	x							
9	12	x							
10	13	0.008							
11	14	x							
12	17	x							
13	18	x							
14	19	x							
15	20	x							
16	21	x							
17	22	x							
18	23	x							
19	24	x							
20	25	0.017							
21	26	x							
22	27	x							
23	28	x							
24	29	x							
25	30	x							
26	31	x							
27	32	x							
28	33	x							
29	34	x							
30	35	x							
31	36	x							
32	37	x							
33	38	x							
34	39	x							
35	40	x							
36	41	x							
37	42	x							
38	43	x							
39	44	x							
40	KR 7845	x							
Detection		0.008							
Standard									
Repeat -									
Repeat -									
Method		LC40							

DIAL RANGE
REGIONAL
ROCK SAMPLES

RESPONSIBLE OFFICER B. Darn
15 / 9 / 81

Results in ppm unless otherwise specified
T = element present; but concentration too low to measure
X = element concentration is below detection limit
- = element not determined

070

ANALABS

A division of MacDonal Hamilton & Co. Pty. Ltd.
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

Phone (09) 458 7999

Code No. 83.1 08557

Division Cooper, Tasmania

Phone 316837

Rack No. _____

Page No. 4

Order No. KP 2737

670133

RESULT SHEET

TUBE No.	SAMPLE No.		Au						
1	NO NUMBER		X						
2									
3									
4									
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40									
Detection			0.88						
Standard									
Repeat—									
Repeat—									
Method			640						

RESPONSIBLE OFFICER B. Dora
15.9.81

Results in ppm unless otherwise specified
T = element present; but concentration too low to measure
X = element concentration is below detection limit
— = element not determined

071

ANALABS

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Division Cooee, Tasmania

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Rack No. R-27A

Page No. 5

Order No. KP 2737

670134

RESULT SHEET

TUBE No.	SAMPLE No.		Ba						
1	KR	7802	180						
2		03	10						
3		04	30						
4		05	40						
5		06	50						
6		07	50						
7		08	20						
8		09	150						
9		12	10						
10		13	40						
11		14	30						
12		17	10						
13		18	10						
14		19	220						
15		20	20						
16		21	40						
17		22	20						
18		23	30						
19		24	20						
20	KR	7825	60						
21		26	40						
22		27	20						
23		28	30						
24		29	60						
25		30	70						
26		31	1300						
27		32	230						
28		33	280						
29		34	3500						
30		35	230						
31		36	700						
32		37	90						
33		38	120						
34		39	310						
35		40	70						
36		41	1150						
37		42	370						
38		43	1250						
39		44	320						
40	KR	7845	50						
Detection			10						
Standard	ISS2		260						
Repeat-	KR	7802	170						
Repeat-	KR	7825	50						
Method			A14						

DIAL RANGE
REGIONAL ROCK
SAMPLES

B. J. ...
18.1.81

RESPONSIBLE OFFICER

Results in ppm unless otherwise specified
T = element present; but concentration too low to measure
X = element concentration is below detection limit
- = element not determined

072

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Code No. 83.108557

Division Copec, Tasmania

Phone 316837

Rack No. R-27B

Page No. 6

Order No. KP 2737

670135

RESULT SHEET

TUBE No.	SAMPLE No.																			
1	NO NUMBER	Ba	60																	
2																				
3																				
4																				
5																				
6																				
7																				
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37																				
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39																				
40																				
Detection			10																	
Standard																				
Repeat-																				
Repeat-																				
Method			A/4																	

DATA RANGE
10-2000
2000

RESponsible OFFICER B. S. ...
8.1.81

Results in ppm unless otherwise specified
T = element present, but concentration too low to measure
X = element concentration is below detection limit
- = element not determined

073

ANALABS

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52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

Division Cooee, Tasmania

Dial Range

P. Wilson

K 495

Phone (09) 458 7999

Code No. 83.108557

Phone 316837

Rack No. _____

Page No. 7

Order No. KP 2737

670136

RESULT SHEET

TUBE No.	SAMPLE No.		Sn	W					
1	KR 7802		30	X					
2		03	800	25					
3		04	5	X					
4		05	X	X					
5		06	3	X					
6		07	X	X					
7		08	6	X					
8		09	5	X					
9		12	3	X					
10		13	7	X					
11		14	X	X					
12		17	X	X					
13		18	5	X					
14		19	X	X					
15		20	6	X					
16		21	X	X					
17		22	3	X					
18		23	X	X					
19		24	3	X					
20	KR 7825	25	7	X					
21		26	5	25					
22		27	4	X					
23		28	X	X					
24		29	X	X					
25		30	X	X					
26		31	X	X					
27		32	5	X					
28		33	X	10					
29		34	X	X					
30		35	X	X					
31		36	4	X					
32		37	5	X					
33		38	3	X					
34		39	5	X					
35		40	5	X					
36		41	5	X					
37		42	X	X					
38		43	X	X					
39		44	4	X					
40	KR 7845	45	6	X					
Detection									
Standard									
Repeat-									
Repeat-									
Method									

"DIAL RANGE REGIONAL"

ROCK SAMPLES

RESPONSIBLE OFFICER B. Dore
25 / 9 / 81

Results in ppm unless otherwise specified
T = element present; but concentration too low to measure
X = element concentration is below detection limit
- = element not determined

074

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Code No. 83-1 08 557

Division Coffee, Tasmania

Phone 316837

Rack No. _____

Page No. 8

Order No. KP 2737

670137

RESULT SHEET

TUBE No.	SAMPLE No.	Sn	W						
1	NO NUMBER	8	X						
2									
3									
4									
5									
6									
7									
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Detection									
Standard									
Repeat—									
Repeat—									
Method									

RESPONSIBLE OFFICER B. Don
25 / 8 / 81

Results in ppm unless otherwise specified
T = element present; but concentration too low to measure
X = element concentration is below detection limit
— = element not determined

075

670138

ROCK SAMPLES

WALLOA CREEK

DDH 10

076

ANALABS

A DIVISION OF MACDONALD HAMILTON & CO. PTY. LTD.
52 Murray Road, Welshpool, W.A. 6106
Phone (09) 458 7999

RSS
D. Wilson
Dial

ANALYTICAL REPORT

670139

This report must be read in conjunction with the results given for JOB No. 83.1 08 589

Client Geopeko Ltd

(1) Devonport

Order No. KP 2757 Date Received 29/9/81

Reference Results Required

Delivered by Total No. of Samples 15

(2) SAMPLE NUMBERS	STATE OF SAMPLES	Average Weight	PRETREATMENT								ANALYSIS				
	Refer to section (5) for terminology		Dry	Crush	Split	Pulverize	Slave	Evaporate	Other (see remarks)	None	Refer to section (5) for terminology	Preparation	Method	Coefficient of variation (%)	
KR 9336-50	Ro			1		24						Cu Pb Zn Fe Co	A1/1		
						34						Ag	A1/2		
												Mo	A1/6		
												SW W	XRF		
												Au	LLAO		

(3) Number of pages of results: 3
 Date Reported: 5/10/81
 Results to: (1) As Above (2)
 Per: Telex, mail
 Number of Copies: 3

(4) Remarks:

DIAL RANGE
WALLOA CK
ADITS
CHANNEL SAMPLES

(5) STATE OF SAMPLES	ANALYSIS - PREPARATION	ANALYSIS - METHOD
whole core WC	perchloric acid A1	atomic absorption AAS
split core SC	hydrochloric acid A2	x-ray fluorescence XRF
cutting CU	nitric acid A3	spectrophotometry SPEC
rock Ro	aqua regia A4	colorimetry COL
soil SO	nitric-perchloric A5	chromatography CHR
pulp PU	HF mixture A6	titration TTN
water WA	HF under pressure A7	other chemical means CHEM
tissue TI	fusion A8	miscellaneous MISC
stream sediment SS		fluorescence FLUOR
heavy mineral HM		

Authorized Officer B. Dora

ATTENTION Please advise us regarding the disposal of your samples.

JOB No.

- DISCARD IMMEDIATELY KEEP UNTIL ADVISED (A STORAGE CHARGE WILL BE MADE)
- DISCARD AFTER 2 MONTHS RETURN TO:

(PLEASE TICK APPROPRIATE BOX)

077

ANALABS

A division of MacDonald Hamilton & Co. Pty. Ltd.
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

Phone (09) 458 7999

Code No. 83-108589

Division Coode, Tasmania

Phone 31837

Rack No. R-25/13

Page No. 1

Order No. KP 2757

670140

RESULT SHEET

TUBE No.	SAMPLE No.		Cu	Pb	Zn	Fe(%)	Co	Ag	Mo
1	KR	9336	70	X	SS	9.05	90	0.1	4.0
2		37	155	X	50	14.0	145	0.1	2.0
3		38	215	X	35	6.00	40	X	2.5
4		39	380	S	30	5.95	80	0.1	X
5		40	1700	X	35	9.55	125	0.1	2.5
6		41	40	X	35	6.15	60	X	X
7		42	45	X	35	7.45	100	0.1	2.0
8		43	25	X	40	5.80	50	0.1	0.5
9		44	2350	X	40	7.50	50	0.1	1.0
10		45	160	120	SS	4.30	35	0.9	X
11		46	45	X	20	2.00	15	0.1	1.0
12		47	10	S	40	3.55	25	X	1.0
13		48	5	15	30	3.50	20	0.1	0.5
14		49	30	X	35	5.80	95	0.2	4.0
15	KR	9350	95	X	40	4.40	30	0.1	1.0
16									
17									
18									
19									
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40									
Detection			S	S	S		S	0.1	0.5
Standard	ASSS		465	335	105	26.0	40	0.7	4.5
Repeat -	KR	9336	70	X	50	8.85	90	0.1	4.0
Repeat -									
Method			A/1					A/2	A/6

RESPONSIBLE OFFICER B. Dorman
 S. 10 / 81

Results in ppm unless otherwise specified
 T = element present; but concentration too low to measure
 X = element concentration is below detection limit
 - = element not determined

078

ANALABS

A division of MacDonald Hamilton & Co. Pty. Ltd.
52 Murray Road, Welshpool, W.A. 6106 (Reg. Office)

KSSI
Dial Range

P. Wilson

Division Cooee, Tasmania

Phone (09) 458 7999

Code No. 83-1 08589

Phone 316837

Rack No. _____

Page No. 2

Order No. KP 2757

670141

RESULT SHEET

TUBE No.	SAMPLE No.		Sn	W					
1	KR	9336	5	20					
2		37	15	30					
3		38	15	15					
4		39	10	25					
5		40	6	20					
6		41	5	X					
7		42	8	20					
8		43	7	10					
9		44	9	20					
10		45	3	X					
11		46	X	X					
12		47	4	X					
13		48	4	X					
14		49	4	X					
15	KR	9350	8	10					
16									
17									
18									
19									
20									
21									
22									
23									
24									
25									
26									
27									
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29									
30									
31									
32									
33									
34									
35									
36									
37									
38									
39									
40									
Detection			3	10					
Standard									
Repeat—									
Repeat—									
Method			XRF						

DIAL RANGE
ADITS
WALLOA CREEK

B. Dora
8, 10, 81

RESPONSIBLE OFFICER

Results in ppm unless otherwise specified
T = element present; but concentration too low to measure
X = element concentration is below detection limit
- = element not determined

079

KSSI P. Wilson

ANALABS

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Code No. 83.1 08 589

Division Coee, Tasmania

Phone 316837

Rack No. _____

Page No. 2

Order No. KP 2757

670142

RESULT SHEET

TUBE No.	SAMPLE No.		Au							
1	KR 9336		x							
2		37	x							
3		38	x							
4		39	x							
5		40	x							
6		41	x							
7		42	x							
8		43	x							
9		44	x							
10		45	x							
11		46	x							
12		47	x							
13		48	x							
14		49	x							
15	KR 9350		x							
16										
17										
18										
19										
20										
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40										
Detection			0.008							
Standard										
Repeat-										
Repeat-										
Method			LC40							

RESPONSIBLE OFFICER B. Dora
8.1.10.81

Results in ppm unless otherwise specified
T = element present; but concentration too low to measure
X = element concentration is below detection limit
- = element not determined

080

ANALABS (AUST.) PTY. LTD.

52 Murray Road, Welshpool, W.A. 6106
 44 Lane Street, Kalgoorlie, W.A. 6430
 15 Traders Way, Mt. Isa, Qld. 4825
 SUVA FIJI

Phone (09) 458 7999
 Phone (090) 21 1416
 Phone (077) 43 6837
 Phone SUVA 361712

Core 151110

670143

ANALYTICAL REPORT

This report must be read in conjunction with the results given for JOB No. 17366

Client Geopelco Ltd

P O Box 598

DEVONPORT TAS

Order No. Date Received 13.81

Reference Results Required

Delivered by Total No. of Samples 28

(2) SAMPLE NUMBERS	STATE OF SAMPLES	Average Weight	PRETREATMENT								ANALYSIS			
	Refer to section (5) for terminology		Dry	Crush	Split	Pulverize	Sieve	Evaporate	Other (see remarks)	None	Refer to section (5) for terminology	Preparation	Method	Coefficient of variation (%)
KR 6786 8318					12	3						AL/1	AAS	
												DP	XRF	

(3) Number of pages of results:

Date Reported:

Results to: (1) as above (2)

Per:

Number of Copies: 3

(4) Remarks:

(5) STATE OF SAMPLES		ANALYSIS - PREPARATION				ANALYSIS - METHOD	
whole core	WC	perchloric acid	A1	cold acid	CA	atomic absorption	AAS
split core	SC	hydrochloric acid	A2	specific sulphide	SS	x-ray fluorescence	XRF
cutting	CU	nitric acid	A3	other mixed acids	Ma	spectrophotometry	SPEC
rock	Ro	aqua regia	A4	alkaline attack	AA	colorimetry	COL
soil	SO	nitric-perchloric	A5	volatilization	VO	chromatography	CHR
pulp	PU	HF mixture	A6	ignition	IG	titration	TTN
water	WA	HF under pressure	A7	pressed powder (XRF)	PP	other chemical means	CHEM
tissue	TI	fusion	A8	glass fusion (XRF)	GF	miscellaneous	MISC
stream sediment	SS					fluorescence	FLUOR
heavy mineral	HM						

Authorized Officer

ANALABS

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 Phone (077) 43 6837
 Phone SUVA 361512

Code No. 83.1 01 17366
 Rack No. 101
 Page No. 1
 Order No. _____

650144 GEOCHEMICAL RESULT SHEET

TUBE No.	SAMPLE No.		Cu	Zn	Ag	Pb	Sn	W		
1	KR	6786	4150	65	x	5	50	25		
2		87	2900	90	x	10	35	x		
3		88	4400	65	x	5	50	x		
4		89	3.4%	205	0.5	10	50	x		
5	KR	6790	5700	275	x	10	35	15		
6		91	5600	60	x	5	50	x		
7		92	2500	55	x	x	70	10		
8		93	2450	45	x	x	55	x		
9		94	710	70	x	x	35	x		
10		95	1850	65	x	x	30	x		
11		96	2150	85	x	x	30	x		
12		97	2750	170	x	5	55	x		
13		98	1.0%	95	0.5	5	45	x		
14		99	1450	20	x	x	35	x		
15	KR	6800	2300	15	x	x	35	x		
16		8301	2500	20	x	5	35	x		
17		02	3050	10	x	x	45	x		
18		03	900	10	0.5	x	30	x		
19		04	645	15	x	x	30	x		
20		05	350	15	x	x	30	x		
21		06	435	15	2.0	x	45	x		
22		07	365	10	1.5	x	30	10		
23		08	390	10	1.0	5	45	10		
24		09	200	10	1.0	5	35	x		
25	KR	8310	90	10	x	10	55	x		
Detection								10		
Standard										
Digestion										
Method										XRF

RESPONSIBLE OFFICER DAVID
19/3/81
 * Results in ppm unless otherwise specified
 T = element present, but concentration too low to measure
 X = element concentration is below detection limit
 - = element not determined

ANALABS

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Code No. 83.1 0117366
 Rack No. _____
 Page No. _____
 Order No. _____

670515 GEOCHEMICAL RESULT SHEET

TUBE No.	SAMPLE No.		Cu	Zn	Ag	Pb	Sn	W		
1	KR	8311	330	5	X	10	65	10		
2		12	425	15	X	20	50	X		
3	KR	8313	210	30	X	15	55	10		
4										
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22										
23										
24	Repeat KR	6786	4150	65	X	5				
25	Repeat KR	8311	340	10	X	10				
Detection			5	5	0.5	5		10		
Standard	FS	4	290	700	0.5	100				
Digestion			AI							
Method			AI/I					XIF		

* Results in ppm unless otherwise specified
 T = element present; but concentration too low to measure
 X = element concentration is below detection limit
 - = element not determined

RESPONSIBLE OFFICER
 19/3/81

082