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EXPLORATION LICENCE 30/86

C. W. DAVIS

ANNUAL REPORT 1987 - 88

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EXPLORATION LICENCE 30/86

C. W. DAVIS

CUPRONA AREA - N. W. TASMANIA

ANNUAL REPORT - 1987/88

By: C. H. WHITEHEAD.

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March 1988

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C. W. DAVIS EXPLORATION LICENCE 30/86 CUPRONA DISTRICT

ANNUAL REPORT 1987/88

SUMMARY

Exploration Licence 30/86 covers 43sq. kms. in the Cuprona- Natone district of N.W. Tasmania.

During the first year of exploration in the LIcence area, the overall objective was to make a preliminary assessment of the possible potential for gold, platinum, tin, tungsten and iron mineralisation within the area embraced by the E.L.

Work to date has consisted of a general literature review of past geologic/exploration work, photogeology, reconnaissance geologic examinations, geochemical sampling (bulk stream sediment, pan concentrates, soil sampling), previous drill core examination, resampling and analyses, plus localised geological evaluation of specific targets.

With regard gold and platinum potential, detailed investigations have been completed at two specific locations - namely the Natone pyrrhotite magnetite skarn zone in the SW of the E.L., and the Copper King mine location west of Cuprona. For the same metals, ground exposing pre-Tertiary geology has been examined both geochemically and geologically on a regional basis. The results of work at the Copper King Location were disappointing, but further work in the vicinity of the Natone skarn should be continued.

A regional geochemical approach has prevailed for assessing the possible tin and tungsten potential of the area, and although still in progress, work to date has indicated that future efforts should be concentrated in the southern sections of the E.L. (ie. Housetop Granite Intrusive and Camena).

Exploration work is currently in progress, and includes an assessment of the hematitic iron resources of the Blythe River District. Future proposed work, additional to that mentioned above, should include an assessment of any gold/platinum anomalism associated with the Cu Shear Zone at Natone.

To date an exploration expenditure in the order of $26,415 has been incurred.

EXPLORATION LICENCE 30/86 - C. W. DAVIS

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CUPRONA, N. W. TASMANIA

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Appendix 4.

Assay Record Sheets

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4D - E.L. 30/86, Regional Pan Concentrate Samples
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4E - Copper King Region Soil Samples
CK.SS1 - CK.SS14 (14 Samples) - As.

4F - Copper King Mine - Surface Rock Samples,
RS08, 10, 16 - (3 Samples) Cu, Au, Pt.

4G - Copper King Mine - Adit Samples,
CM 00.1.0, - 14.0-15.0, (15 Samples) - Cu, Au, Pt.

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A. OVER - REVIEW, E. L. 30/86 AREA

A. 1. LOCATION - LAND TENURE

Exploration licence 30/86 was granted to Mr. C. W. Davis, Warrandyte, Victoria, on the 29th April 1987, and originally covered an area of 35sq. kms within the Cuprona - Natone region, district of Devon.

On 23rd May 1987, application was made to extend the licence area by an additional 8sq. kms in the Natone district. Subsequent Department of Mines approval was given on the 22nd July 1987, and E.L. 30/86 now extends over a toal area of 43sq. kms. Please refer to Figure No. 1 and Plan 1/88.

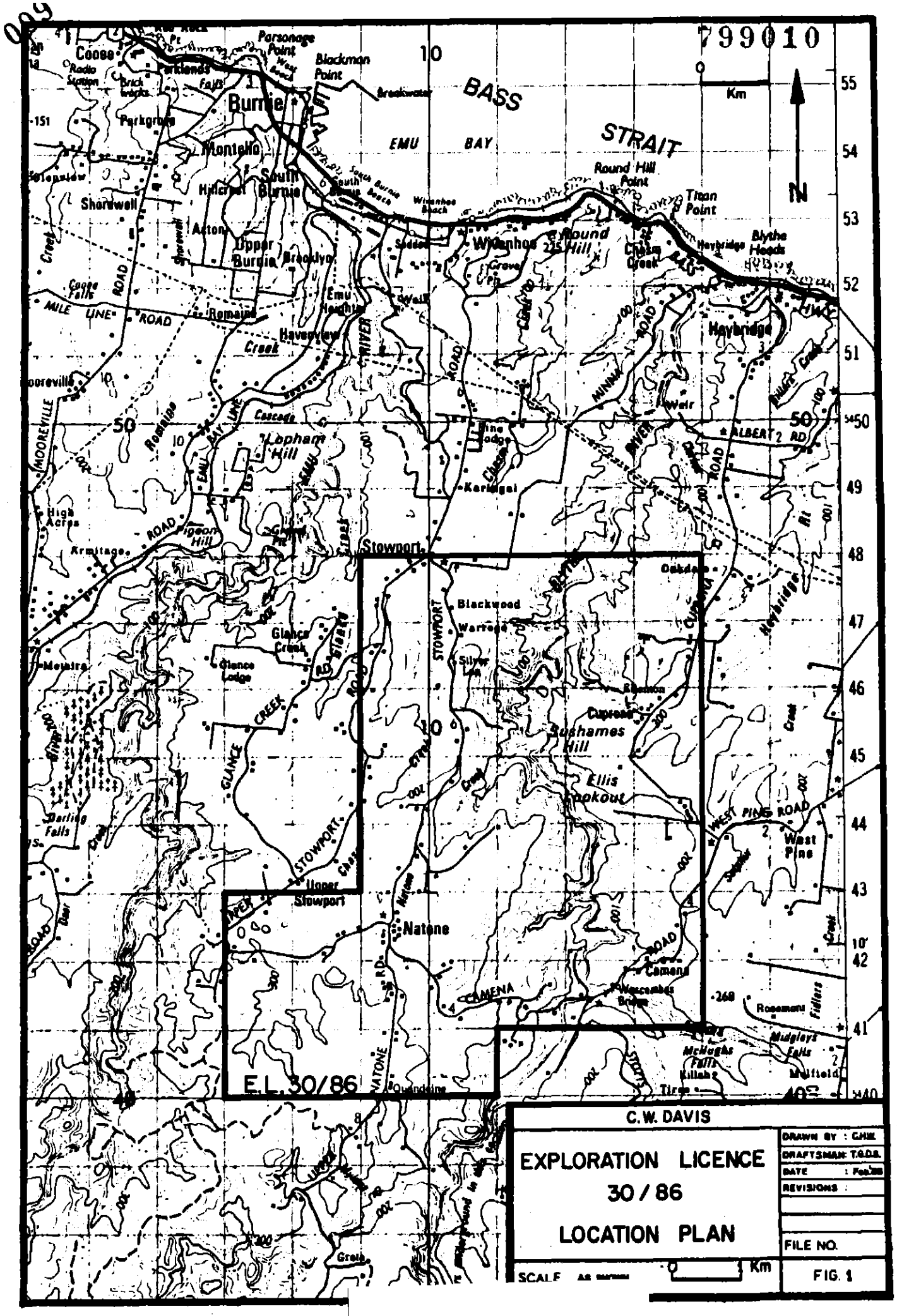
The overall area is within easy access of Burnie, the main townships of Cuprona (13kms), Camena (17kms) and Natone (12kms) being readily accessable by good sealed roads. The general district is well populated, supporting a prime dairy farming and vegetable producing community.

Topographically the area could be described as undulating, reaching up to 350m above S.L., but is predominantly characterised by the deeply incised Blythe River which trangresses the E.L. in a NNE - SSW direction. Tertiary basalt cover masks most of the ground, and except for within the Blythe River valley itself, outcrops are poor.

A. 2. PREVIOUS EXPLORATION/INVESTIGATIONS

Following the discovery of the Blythe River iron deposits, the Cuprona district first received attention at the turn of the present century.

In subsequent years, during the late 1950's - early 1960's, the iron deposits were spasmodically investigated by both the Tasmanian Department of Mines, and the Bureau of Mineral Resources.


799010
Km
N
BASS STRAIT
EMU BAY
Burnie
Montello
Parkgrove
Shorewell
South Burnie
Upper Burnie
Brooklyn
Romaine
Havenview
Cooee
Parsonage Point
Blackman Point
Round Hill Point
Titan Point
Wivenhoe
Round Hill
Haybridge
Blythe Heads
Lapham Hill
Stowport
Upper Stowport
Natone
Blackwood
Warrega
Glance Creek
Glance Lodge
Cuprona
Bushames Hill
Ellis Lookout
West Pine
Camena
Rosemani
Tiroa
Killafaddy
Mulfield
Midgleys Falls
McHughs Falls
Quandong
Karingal
Oakdale
Elemon
Armitage
High Acres
Pigeon Hill
Moorevillle
Mooreville
Cascade
Emu Heights
Havenview
Creek
Coopers Creek
Mule Line Road
Albert Rd
Stowport Road
West Pine Road
Camena Road
Natone Rd
Glance Rd
Coopers Creek Road
Minnie River
Emu Bay Line
Parklands
Falls
Brickworks
Radio Station
Breakwater
Wivenhoe Beach
Burnie Beach
Titan Point
Heybridge
Fullers Creek
Midgleys Falls
Darling Falls
Meander
E.L. 30/86
C.W. DAVIS
EXPLORATION LICENCE
30 / 86
LOCATION PLAN
DRAWN BY : C.W.D.
DRAFTSMAN: T.G.D.S.
DATE : Feb'86
REVISIONS
FILE NO.
SCALE
Km
FIG. 1
5 cm

Since 1966, a number of Companies actively involved in exploration work in N.W. Tasmania have investigated the Cuprona district, the most notable being Minops (1969), Tasminex (1970 - 72), Comalco (1977 - 80), Shell (1980 - 84) and Shell/C.R.A. (1985 - 86).

Mining in the area appears to have been restricted to small parcels of copper ore being won at the beginning of the century from the Copper King Mine, Cuprona (1314 tonnes @ 16.7%Cu) and Rutherfords Copper Show, Natone (100 tonnes @ 10% Cu).

A. 3. REGIONAL GEOLOGY.

The Cuprona - Natone district is embraced by the Housetop Devonian granite to the west, and the Proterozoic Ulverstone Metamorphics forming part of the Forth Nucleus to the east.

Plan No. 2/88 shows the regional geology of E.L. 30/86.

To the west of Dial Range are found the oldest rocks of the E.L. area, belonging to the Precambrian BURNIE FORMATION. This is essentially a flysch or turbidite sequence of sediments consisting of sandstones, siltstones and shales which contain conformable basic intrusives of dolerites and gabbros. The shales can often be graphitic and may contain syngenetic pyrite. They underwent multiple folding (five phases) during the Penguin Orogeny, resulting in a dominant regional NE - SW fold axial trend.

The above sequence is unconformably overlain by the Cambrian/ Precambrian OONAH FORMATION, a series of ferruginous sandstones, siltstones, shales, dolomites, dolomitic limestones and ironstones. The formation is gentle dipping (to the S.E.) striking NE across the E.L. area from the Housetop Granite, across the Blythe River valley, to Cuprona before pinching out near the northern coastline.

011 ORDOVICIAN conglomerates, sandstones and limestones overlay the Cambrian sequences, and again strike NE - SW with a SE dip. They suboutcrop beneath the Tertiary basalt in the Camena area of the E.L. (south eastern section).

The above succession is intruded by the DEVONIAN HOUSETOP GRANITE INTRUSIVE, predominantly a pink, medium to coarse grained biotite granite, although both porphyritic and fine grained varieties can occur. Geophysical gravity work (Shell, Oakes 1983) would suggest the intrusive is laccolith shaped with possible feeder zones located towards its SE and E margin.

During TERTIARY times, valleys infilled with sequences of sediments and basalt flows, the depth of cover being entirely variable.

A. 4. MINERALISATION

On a stratigraphical basis, mineralisation in the Cuprona district could be classified as follows (see Plan 2/88).

i. Chalcopyrite copper mineralisation occurring in quartz veins and shear zones hosted by the Precambrian Burnie Formation, slates and quartzites close to the interface between the Precambrian - Cambrian border. This type of mineralisation can be found at the Cuprona Copper King Mine, and the Rutherfords Copper Prospect near Natone.

ii. Siliceous hematitic ironstone zones associated with an interformational breccia along the unconformity between Precambrian quartzites and lower members of the Cambrian succession. The hematite deposits located SW of Cuprona on both flanks of the Blythe River valley, plus minor surface deposits at Natone, are examples of this mineralisation.

iii. Dolomites and/or calcareous sequences of the Oonah Formation were recently confirmed (Shell Metals 1981 -83) to be host to a large scale skarn zone at Natone in the south western extremity of the E.L. The skarn is extensively developed and portrays both calc-silicate assemblages and magnetite-pyrrhotite varieties.

Outside the E.L. 30/86 area, but within the immediate surrounding region, the following are also found.

- The Devonian Housetop granite intrusive contains associated tin bearing greisen veins (Cranes tin deposit, Upper Natone) and is intimately associated with magnetite/scheelite bearing skarn zones at Kara, near Hampshire, representing metasomatised metamorphic calcareous Ordovician sequences.

- Acid and basic volcanics of Cambrian age in the Penguin area of the Dial Range Trough show associated iron, copper and cobalt mineralisation.

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B. EXPLORATION OBJECTIVES/PROPOSED PROGRAMME

Although the prime aim of the proposed exploration programme within E.L. 30/86 was to thoroughly assess the overall economic potential of the 43sq. km area, emphasis was to be placed upon a full evaluation of the GOLD, PLATINUM, IRON, TIN and TUNGSTEN potential within the licence area.

A preliminary literature review and field assessment of the area had, prior to E.L. application, shown prospective targets and delineated favourable geologic environments which were considered to justify investigation for the above specific commodities.

The nature of exploration work proposed for the E.L. area was a combination of the following:-

- Detailed literature review, data assessment, photogeologic interpretation, relogging/sampling of previous drill samples, geochemical sampling (bulk stream sediment, pan concentrate sampling, rock, soil) ground magnetic surveys and geological examinations.
- The possibility of initiating drilling programmes would depend upon the results of the previously mentioned exploration.

A work programme, anticipated to be completed within a one to two year time-frame, was originally categorised into the following phases:-

PHASE 1 - LITERATURE REVIEW

A detailed review and analyses of all published and unpublished literature, plus all open-file Mines Department reports/records of "other - Company" geological exploration activities in the Cuprona district.

PHASE 2 - NATONE SKARN ZONE.

An examination of the Natone pyrrhotite magnetite skarn area, to include:-

- An appraisal of completed airborne and ground geophysical data.
- An appraisal of past geochemical soil and drill core results/assays.
- Re-examine the Minops and Shell drill core from completed drilling.
- Undertake a ground geologic examination and geochemical sampling.

PHASE 3 - COPPER SHEAR ZONES.

A general geologic-geochemical field examination of the Cuprona Copper King and Natone Rutherfords Copper shear zones, plus an investigation of their geologic strike extension areas.

PHASE 4 - REGIONAL APPRAISALS.

An overall E.L. 30/86 regional appraisal, initially with emphasis upon:-

- Regional photogeological interpretation.
- Reconnaissance pan concentrate sampling of drainage within Tertiary "windows" exposing NE striking Oonah and Burnie Formations.
- An examination of the Housetop granite contact margin.

PHASE 5 - MISCELLANEOUS EXAMINATIONS.

These would include:-

- An appraisal of the Blythe River iron deposits.
- An examination of a reported Camena hematite zone.
- An examination of previously recognised airborne geophysical (INPUT) anamalies, and comparision with known observations of the Natone Skarn.

PHASE 6 - REVIEW

A general overall appraisal of the above phases 1 to 5 when completed.

C COMPLETED WORK PROGRAMME.

Of the proposed work phases 1 to 6 mentioned in the preceeding section, the following exploration/investigations have been completed to date during the first - year term of the E.L. tenancy.

C. 1. LITERATURE/DOCUMENTATION REVIEW

A thorough review of the results of past work within E.L. 30/86, and its surrounding geologic environment, has been undertaken. These results are well documented, both as published and unpublished reports of various Government agencies, (please refer to bibliography list, Appendix A. 1.), or in "Other Company" open-file reports of past exploration investigations in the region (listed Appendix A. 2).

Since 1966, an extremely large number of Exploration Companies have been involved in the search for minerals in the Cuprona area. These Companies (plus Government Agencies), and the minerals they sought, have been listed chronologically in Table No. 1 overleaf.

At first sight, past exploration work appears to have been very extensive - on closer scrutiny, investigations (although there are obvious exceptions, eg. Shell Metals investigations), have either been part of a larger regional evaluation, or involved with specific commodity appraisals, eg. Anzeco concentrated upon investigating the possible scheelite potential of the area, Shell - relacement sulphides in carbonate sequences, BHP - iron potential, and CRAE - lead and zinc mineralisation.

The literature review of past exploration, combined with a general field assessment of the E.L. area was instrumental in defining the presence or potential for a number of specific geologic environments, and/or prospective targets which could, or have been, identified within the area covered by E.L. 30/86. These environments/targets are believed to warrent investigation for the mineral commodities sought (ie. Au, Pt, Sn, WO_3 and Fe), and are as follows:-

TABLE NO. 1

CUPRONA DISTRICT PAST EXPLORATION ACTIVITIES/INVESTIGATIONS.

Period Involved	Companies/Government Agencies	Commodities Sought Area Of Interest
1903-1909	Dept. Of Mines, Tasmania.	Iron, Blythe River, Cuprona
1958-1962	Bureau of Mineral Resources.	Iron Potential.
1958	Rio Rinto Australian Exp. P/L.	Iron Potential.
1960's	Dept. Of Mines, Tasmania.	Fe, Mn, Cu.
1966	Quest Exploration.	Cu, Copper King Mine.
1967	Pickands Mather, E.L. 16/67.	Copper & General Exploration.
1968	B.H.P. Ltd.	Iron Potential.
1969	Minops Pty. Ltd. E.L.13/68 & 14/68.	Fe potential & Sulphides
1970-1972	Tasminex N.L. (E.L. 1/69) Hall Relph & Assoc. P/L	Copper.
1972	C.R.A.E.	General Exploration.
1972-1974	Anzeco, Union Carbide (E.L.1/69)	Tungsten.
1977-1980	Comalco (E.L. 1/69).	General.
1980-1984	Shell/Billiton (E.L. 8/77).	Replacement Sulphides in Carb.Rich Rocks.
1985-1986	Shell/CRAE. (E.L. 8/77)	Base Metal Pb/Zn Potential in Mt. Read Volcanic Equivalents.

i) Skarn Zones. The pyrrhotite magnetite skarn zone immediately south west of Natone, recognised/delineated by Shell Metals in 1981, could possess gold, platinum, tin, tungsten or silver potential.

ii) A number of INPUT survey anomalies, again delineated by Shell Metals, but in areas masked by Tertiary basalt cover, could represent buried prospective skarns similar to the above Natone skarn.

iii) Copper anomalies shear zones, such as known at the Copper King Mine and Rutherfords Prospect, could be host to possible associated gold, platinum or silver mineralisation.

iv) Metasomatic skarn zones, as possibly identified at the Camena area by Anzeco (1974) should be confirmed and examined for possible associated tungsten, and tin, mineralisation.

v) The margins and contact bordering zones of the Housetop granite intrusive have potential for greisenous zones and contact matamorphic zones respectively, and as such, should be inspected for possible associated Sn, Au, Pt, Ag or WO_3 mineralisation.

vi) The hematitic iron units, long since recognised in the area could present a potential source of open-pit high grade iron, minable on a small scale.

As a consequence of the definition of the above prospective targets/environments, plus the review of the nature and results of past work, the subsequent exploration programme proposed for E.L. 30/86 was more specifically defined.

C. 2 NATONE SKARN

A significant proportion of the 1987/88 exploration efforts within E.L. 30/86 was devoted to a study of the Natone Skarn zone located in the extreme SW of the licence area.

It is believed the previous detailed investigations of the Natone area by Shell Metals/CRAE (1980/85) were essentially orientated towards an investigation for sulphide replacement deposits. The current E.L. 30/86 programme, it was decided, would re-evaluate this recently recognised pyrrhotite-magnetite skarn, not only for its possible WO_3 and Zn potential, but in particular its possible gold and platinum association.

Work completed during the year involved:-

- Review and appraisal of previous exploration, geological, geophysical, and geochemical data.
- Re-examination of all Natone skarn drill core, with possible re-analyses of prospective zones for gold and platinum.
- Surface reconnaissance geological/geochemical survey of the skarn area and adjacent Housetop granite intrusive.

C. 2.1 Introduction

The Natone skarn is found SW of the Natone township (see Plan 2/88) - a location which was originally noted for its copper mineralisation (Rutherfords Copper Show) and the 'Natone iron deposits.' (actually siliceous hematitic mineralisation).

In 1969, Minops Pty. Ltd, on investigating the above hematite occurrences, drilled into an underlying calc-silicate pyrrhotite rich sequence. This was, in later years (1980-85), investigated and recognised by CRAE/SHELL METALS as the Natone pyrrhotite magnetite skarn.

The deposit itself is not exposed, but from drilling to date could be classified as a magnesian metamorphic-metasomatic skarn deposit which has developed along the NE (vertical) contact of the Devonian Housetop granite within dolomitic limestones of the Oonah Formation.

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Along a NE striking trend from the granite contact to the Natone township, five core holes were drilled into the deposit. Detailed ground magnetics would delineate a skarn of a size magnitude in the order of 1200m by 500m, with drill results indicating a thickness of metasomatised carbonate rocks in excess of 210m. Compiled and redrafted from past results are plans 5A/88 and 6/88. These show geology, ground magnetics and drill data of the Natone skarn.

C. 2.2 Past Exploration Work

The Natone "iron deposit" was clearly outlined by the 1959 BMR airborne magnetic survey coverage of N.W. Tasmania. Follow up ground magnetic surveys by BMR in the same year outlined a strong magnetic trend/anomaly SW of Natone.

In 1969 the above work prompted Minops Pty. Ltd. to conduct a ground McPhar I.P. survey. Their prime objective was to investigate the iron potential of the area, and eventually three core holes were drilled. The latter led to the identification of a pyrrhotite rich calc-silicate skarn beneath siliceous hematite.

During the period 1970/72, Hall, Relph & Associates Pty. Ltd. on behalf of Tasminex N.L., (E.L. 1/69) evaluated the possible copper potential of the area, completing detailed grid work (ground magnetic survey, soil sampling) plus geologic mapping, costeaning and shallow percussion drilling.

In 1980, as part of the E.L. 8/77 work (Riana LIcence), Shell Metals flew an aeromagnetic/radiometric survey,and the Natone area was selected as a priority follow-up target. This was further emphasised in 1982 on completion of an airborne input survey Follow up ground geophysical work was extensive by Shell, eventually supported by detailed soil sampling and completion of three diamond drill holes. Final evaluation of data by Shell made them indicate "there is little likelihood of an economic orebody present in the skarn", although it is believed their priority was locating sulphide replacement bodies.

C. 2.3 Appraisal Of Past Geological/Drill Data

The following observations are made subsequent to an appraisal of all previous (Minops, Shell, Hall Relph Associates) geological drill data.

- The skarn immediately borders the NNE contact of the Housetop granite and is hosted by dolomitic limestone of the Oonah Formation.
- Typical mineral assemblages of the skarn are bands of massive pyrrhotite and magnetite (up to 3m thick) and disseminated pyrrhotite/magnetite with associated calcium-magnesium and calc-silicates.
- A mineralogical zonation of the skarn exists showing pyrrhotite magnetite rich assemblages close to the granite, and calc-silicate skarn and minor sulphides predominating away from the intrusive.
- Skarn itself does not appear to outcrop, the area being predominantly Tertiary basalt covered (Plan 5A/88), with exposures of the "Natone ironstones-hematitic rock unit"with accompanying amounts of amorphous silicia including jasper. The ironstones appear spatially related to quartz shear zones hosting copper mineralisation in the Burnie Formation.
- The adjoining Housetop Granite is generally pink, a medium to coarse textured, biotite granite. Although regionally equigranular it can, adjacent to the skarn, be highly variable in grain size. No greisenous phases were apparent.
- The Oonah Formation dips shallowly to the SE and strikes NE
- Dolomites form the main host to skarn, and the calc-silicate magnetite-pyrrhotite assemblages are interbedded with andalusite-cordierite bearing shales (Shell Hole NT.3) and silicified sandstones.(Minops Hole NDDH 1).
- Ironstone and associated silicified sandstones overlay the dolomitic/skarn unit, and the ironstone vary from massive hematite variety to an iron-rich silicified sediment.
- The sequence of altered dolomites/limestones has not been closed off by drilling at depth.
- The skarn would best be described as part metamorphic, part metasomatic.
- A garnet facies is rare.

C. 2.4 Geophysical Appraisal.

Innumerable and variable geophysical (airborne and ground) surveys have been completed at the Natone skarn. The following attempts to document this work and the reasoning/consequences of the results.

- The 1959 BMR airborne and ground magnetic surveys outlined a number of broad and localised anomalies over and around the Natone iron.
- With the discovery of sulphides by Minops drilling (1969), an IP and resistivity survey was completed by McPhar Geophysics on behalf of Minops. These surveys revealed broad anomalies partly within the large Natone magnetic high, and several outside, the latter believed to be related to non-magnetic sulphides.
- A number of follow-up sulphide targets apparently outlined by Minops, and several IP zones associated with and removed from known iron and sulphide mineralisation were outlined - "anomalous depth ranging from zero to 600ft". Complete IP reports/plans were not acquired during the current appraisal.
- Hall, Relph & Associates P/L carried out detailed magnetic surveys over both the Rutherfords Copper Prospect and the "ironstone" area. Plans have just recently (March 1988) been acquired but the grid survey pattern has not as yet been accurately correlated with later (Shell) grid surveys.
- Shell Metals undertook detailed geophysical work both regionally and locally at the Natone skarn. The skarn body itself was selected as a priority one follow up target from both an aeromagnetic survey and airborne input survey, both of which gave marked responses. (magnetic anomaly, 3800 grammes).
- Localised ground surveys included:-
    - ground magnetics,
    - max-min E.M.,
    - VLF,
    - SIROTEM.

  All surveys were successful to certain degrees, showing strong responses and being able to delineate skarn through 40 metre cover of weathered Tertiary material.(although complicated by other magnetic, conductive and dense sources).

- SP detected sulphide at depth; IP detected disseminated and massive sulphide zones; a small gravity response was discernable over the skarn body.
- Ground magnetics appeared to prove the optimum geophysical tool for skarn definition, but this method can be complicated by a source of magnetic basalt or magnetic bearing Precambrian dolerites. Likewise conductors can be complicated by Burnie Fm graphitic schists, and clay bands beneath basalt cover, whereas density contrasts can be affected by thickness variations of basalt, and of course general lithological variations
- It was evaluated by Shell, that at the Natone location, a combination of ground magnetics and max-min EM for shallow conductors (100m), and IP for deeper conductors (150m), would be the best geophysical approach.

C, 2,5 Geochemical Appraisal

Three different ground grid surveys have been completed at the Natone Skarn, two of them (Hall-Relph and Shell Metals) including geochemical soil sampling.

- The Hall Relph geochemical plans have just been acquired, and as yet their grid pattern has not been correlated with that of Shell.
- Apparently Hall Relph completed 2 grids on 100' x 100' centres, collecting 797 soil samples using a hand auger and sampling the B horizon. Minus 80 mesh samples were assayed for Cu and Pb; every second sample was assayed for arsenic, and every fourth sample for WO_3.
- Shell soil sampling in the central section of their grid yielded "disappointing results", and except for an elevated stream sediment copper zone being recognised, but related to the Rutherfords Copper Prospect, it was stated there appeared to be no obvious geochemical signature. Soil geochemistry over non-basalt covered Oonah Formation reflected slightly elevated values over the Natone skarn, namely Sn-85ppm, WO_3 - 60ppm, and Zn - 130ppm.

- The Shell/Minops drill assay sheets could be summarised as showing the following geochemical values:-
  - Low grade Sn values of 80ppm maximum, and WO_3 values of 65ppm.
  - Slightly elevated values of copper (maximum 1600ppm) and zinc (140ppm max) were found in the pyrrhotite/ magnetite units of drill hole NT3.
  - There was a marginal increase in values of Mo (4 - 24ppm), Bi (65 - 210ppm) and As (115 - 7300ppm) in the skarn zone as it approached the granite contact.
  - Maximum Pb and Sb values recorded were 90ppm and 65ppm respectively.

C. 2.6 - Re-Examination Of Drill Core

- Shell Metals, Devonport (Mr. D. Hall) kindly provided access to all drill core, percussion chips, pulps, etc. of the three Shell drill holes, and those by Minops Pty. Ltd., drilled at the Natone Skarn area. These were:-

  Shell Holes - PDDH NT1, NT2, NT3, total metreage 595.89m.
  Minops Holes- NDDH 1, 2 and 3, total metreage 388.60m.

- Plan Nos. 5A/88 and 8/88 show the location of four of the Minops/Shell drill holes along strike of the Natone skarn, and relative to the Housetop Granite intrusive. The coordinates of one Shell hole, NT1, are conflicting and the hole has consequently been ommitted from the plan. An additional hole PDDH NT2 was drilled to the north of general skarn zones.
- All drill core, and other samples, were re-examined and an attempt made at categorising possible mineral assemblage zonation in the skarn with particular emphasis placed upon the identification of massive pyrrhotite horizons and pyroxene rich units.
- The Shell (1982) analytical work on drill samples showed analyses for tin, tungsten and general base metals. The Minops core had been acquired by Shell to re-assay sections for tin content. A few selected spot samples had at a later date been resubmitted by Shell for Au assay (AAS). No samples had previously been checked for possible platinum or PGM anomalism.

- It was decided, during the current term of E.L. 30/86, to resample certain possible prospective zones of the drilled Natone skarn, and reassay these samples for any gold/platinum content.
- In total 240 samples were submitted to Amdel and analysed for Au and Pt (Analysis Code PM4, fire assay, detection limits 0.005ppm) The samples consisted of 136 samples of 1/4 drill core, 76 pulps, and 28 split crushed core.
- Actual selection of samples for analysis was based upon obtaining broad representative samples of the main skarn lithological units and skarn mineralogical assemblages, and also to examine potentially prospective units within the skarn (eg. metasomatic alterations, shear zones, chloritic/amphibole alteration, enriched pyrrhotite/magnetite sections, etc.)
- Appendix No. 2 consists of assay data sheets for samples re-analysed from the six drill holes. As can be shown, results for Au and Pt were generally disappointing:-

    - Gold. Fire assay analyses showed no significant Au anomalism, maximum recorded values being in the order of 0.05 to 0.10g/tonne Au. (please refer to Table No. 2 overleaf for individual hole maximum values)
    - Platinum. Two samples recorded values above 0.005Pt, namely:-
        - Hole PDDH N.T. 3 DEpth 181.80 to 182.70 (0.90m) @ 0.03ppm Pt (Grey shale - siltstone - with minor andalusite, pyrrhotite)
        - Hole PDDH N.T. 3 Depth 182.70 to 184.50m (1.80m) @ 0.036ppm Pt (Lithologically a garnet rich zone in dolomitised limestone with amphibole veining).
- Plan No. 6/88 shows the section of drill core analysed for Au and Pt.
- Although results were disappointingly low, the drill holes closest to the granite contact, namely Shell Holes NT3 and NT1 (75m and 235m from the granite margin) show the optimum

TABLE NO. 2

AMDEL GOLD ASSAYS - NATONE SKARN - JUNE 1987

HOLE NO.	DRILLED BY	NO. OF SAMPLES	NO OF SAMPLES ABOVE 0.005 g/tonne	HIGHEST VALUE g/tonne	DEPTH (m)	INTERVAL (m)
PDH NT 1	Shell	35	10	0.055	128-130 +146-148	2.0 2.0
PDH NT 2	Shell	33	6	0.055	111.92-113.75	1.83
PDH NT 3	Shell	72	30	0.08	116-118	2.0
N DDH 1	Minops	22	Nil	-	-	-
N DDH 3	Minops	46	4	0.100	155.75-157.27	1.52
N DDH 3	Minops	23	3	0.02	26.21-29.26	3.05

developed Au "anomalism" (ie. above 0.01g/tonne Au). Likewise, the platinum values recording plus 0.005ppm Pt were in drill hole NT3, ie. nearest the granite contact.

- The low order Au values showed no definitive relationship with specific lithological units, nor were there any recognisable trends associated with alteration, shearing, fracture fills etc.
- The plus 0.01g/t Au samples were always contained in either pyrrhotite magnetite (or both) rich sections. However equally rich Po and Mag sections were also completely barren. Hole No. NT2 (Shell) was drilled on the northern flanks of the Natone skarn intersecting sulphide rich graphitic black shales - these showed similar low order (0.01g) Au values to those encountered in the skarn.

C3. COPPER KING MINE REGION

The Copper King Mine is located on the eastern flank of the Blythe River immediately due west of the township of Cuprona.

Mining activities are believed to have taken place between 1904-09 producing a recorded tonnage of 1331 tonnes of ore containing 221.8 tonnes of 16.7% Cu.

The deposit itself is enclosed in Precambrian Burnie Formation sequences, which locally consists of slates, quartzites, shales and siltstones. The ore was reputed to be principally chalcopyrite and native copper within a gangue of mixed quartz, pyrite and siderite, and appears to have been associated with a shear zone. The shear/deposit is subvertical, dyke-like, of approx 10m. width and has been worked over a strike distance stated to be 160 metres.

Copper prospects of a similar nature occur along strike, both to the N.E. (Jones's prospect) and to the SW of the E.L. as far as Rutherfords Copper Prospect - please refer to Plans 1/88 and 7/88.

Since 1966, the Copper King mine and surrounding area has been examined by a number of parties - namely, Quest Exploration, Pickands Mather, Tasminex N.L., and the Department of MInes, Tasmania.

The priority aim of current exploration work was to re-examine both the mine location and the region along strike to the north east for any possible associated gold or platinum content.

C3.1 Copper King Mine

The initial inspection of the mine location revealed that recent (1970-72) bulldozing work had extensively destroyed most of the old mine workingsand all evidence of even the Dept. Of Mines (1968-69) drilling programme. After extensive searching only one adit and one shaft could be relocated.

During the current work, a general survey of the mine and immediate vicinity included the following:-

- Completing a topographical survey of the mine area and preparation of base map, scale 1:1000.
- Systematic sampling of the above mentioned workings, namely adit (15 samples) and shaft (16 samples). - see Appendix 4G.
- Collection of miscellaneous surface rock samples/spoil heap samples from the general mine area (16 samples).
- Pan concentrate sampling of the Copper King creek and associated drainage (12 samples).
- Detailed geological mapping of the mine area, and preparation of Plan 8/88, scale 1:1000

Assay record sheets (Appendix No. 4) Nos. 4C. 4E, 4F and 4G tabulate the assay results of samples analysed.

During the course of this work, it was learnt that the Dept. Of Mines had actually drilled four core holes (Nos. CK1, CK2, CK3 and CK4 - total drilled depth 286.32m), at the mine site during late 1968 - early 1969, and core from this drilling was kindly provided to Mr. C. W. Davis for re-examination. It was ascertained this core had previously only been spasmodically assayed for copper content.

The entire core from the four holes was relogged and potentially prospective and/or mineralised sections of the core were sawn and representative samples collected and submitted for Au, Pt and Cu analyses.

In total 55 samples representing 112.99m of drilled metreage from the four holes were submitted to Analabs, Cooee - detection limit Au and Pt, 0.005ppm, Cu - 5ppm.

Drill hole data records, in the form of drill statistics, lithological logs, core recovery sheets and assay sheets have been completed and attached - Appendix No. 3.

Table No. 3 overleaf summarises assay result data.

As can be seen, assay results were disappointing, gold values being negligible (maximum value, Hole CK3 - 0.05ppm) and platinum values completely negative, with none of the 55 samples recording above detection limit values.

As previously stated, the drill site locations had been completely destroyed, and as all past records aligned the holes to an old Pickands Mather grid system, the actual plotting of drill collars has been difficult. As best ascertained,the drill site locations as shown on Plan 8/88 are with 1 to 4m accuracy.

Geological sections, coordinating drill results have been drawn and shown on Plan 9/88.

Geological mapping revealed and confirmed copper mineralsiation was associated with a well developed shear zone trending N30^{o}E, and dipping steeply 76^{o} SSE. The shear dips discordantly with its host rocks, shales, siltstones, flaggy sandstones and micaceous quartzites, and to the extreme south is quite transgressive to regional strike. At the immediate mine location, the slates/shales are extremely graphitic and contorted. These graphitic shales are apparent as far north as drill site CK3, but to the south of the mine the shear zone is associated with more micaceous sandstones/quartzites.

Unfortunately core recoveries from the Mines Dept. drilling were far from desirable, but nevertheless the received Au and Pt assay values could only be described as disappointing.

The collected rock samples from the mine location could not be described as representative of the shear zone. However the surface samples and adit samples submitted for analysis were likewise disappointing.

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TABLE NO. 3 799031

DEPT. OF MINES DRILLING

COPPER KING LOCATION - CUPRONA.

RELOG/SAMPLE DATA

Hole No.	Total Depth Drilled (m)	No. Of Samples Collected	Metres Sampled (m)	Analysis Max Au ppm	Analysis Max Pt ppm	Analysis Max Cu ppm
CK1	95.05	17	33.31	0.006	Nil	2550
CK2	73.17	12	19.76	0.016	"	250
CK3	57.45	14	30.14	0.050	"	2300
CK4	60.65	12	29.78	0.025	"	45
	286.32	55	112.99			
ADIT SAMPLES	-	15	-	0.045	Nil	29500
ROCK SAMPLES	-	3	-	0.035	"	46500

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C3.2 Copper King NE Strike Extension

To investigate the possible gold/platinum of the region NE along strike from the Copper King mine, the following geochemical sampling was undertaken along the drainage of the Copper King Creek and its tributaries.

- Collection of bulk (5Kg) stream sediment samples and submitted for cyanide leach Au tests (11 Samples),
- Collection of pan concentrate stream sediment samples, and analysis for As.

The sample site locations are shown on Plan No. 7/88, and analytical results tabulated on Assay Record Sheets No. 4A and 4C (Appendix No. 4). Results were negative.

In 1967 Pickands Mather conducted a grid survey over the region in question - as accurately as possible, this grid is shown on Plan 7/88. Not all their geochemical data has been superimposed on current base plans, except an arsenic anomaly which has been identified by Pickands Mather in the central sections of the Copper King Creek. Repeat soil samples were collected over this anomaly during the current programme, but anomalous values could not be repeated - see Assay data sheet No. 4E.

Other than transposing all Pickands Mather geochemical results onto current programme base plans, no further work is planned for the Copper King mine region in the immediate future.

C4. Regional Appraisals

A number of regional reconnaissance investigations were completed during the current exploration programme in E.L. 30/86. The regions to receive attention were: (please refer to Plan No. 2/88).

- The Blythe River valley - a pre Tertiary window exposing the Burnie Fm, Oonah Fms and Ordovician sequences, in the central sections of the E.L.
- The Housetop Granite Intrusive in the extreme SW of the licence area.
- SW of Camena in the southern section of the E.L.

C. 4.1 Blythe River Valley Region

This region was inspected geochemically, primarely to investigate the possible gold and/or platimum anomalism associated with the NNE-SSW striking Burnie/Oonah Fms, and in particular the Cu shear zone trend along the interface of the two formations.

All creeks draining into the Blythe River were sampled, both by bulk stream sediments, which were analysed by cyanide leach for gold content, and pan concentrate stream sediment samples, which were assayed for Au, Pt, WO_3 and Sn.

Bulk sample site locations are shown on Plan No. 3/88 and results of the cyanide leach gold tests are tabulated on Assay Record Sheets 4A and 4B (Appendix No. 4). Au values were very low, only seven of the samples recording above the detection limit of 0.05ppm (namely sample No.s C.B.CL 22, 23, 24, 101, 103, 108 and 110). These showed a Au value range from a minimum 0.13ppb to a maximum 0.86ppb.

The regional pan concentrate sample results were likewise negative. The results are tabulated on Assay Sheets 4C and 4D (Appendix No. 4) and sample site locations shown on Plan No.4/88. In summary:-

- None of the samples showed above detection limit Au or Pt.
- WO_3 values were generally low, only four recording above detection limit and ranging rom 26 to 363ppm WO_3. The latter value was recorded in sample CPC10 just NNW of Camena, an area highlighted by ANZECO for the presence of tungsten anomalous hematite. The exact site of this occurrence has not been identified.
- Sn values were negative, with a maximum value of 54ppm being recorded by sample number CPC 07. (draining from the Housetop Granite intrusive southwest of Camena).

C.4.2 Housetop Granite Intrusive

The intrusive in the southwest extremity of the E.L. was covered by reconnaissance geological examination in conjunction with the Natone Skarn Zone and observations were made in the preceeding section. The intrusive itself plus the contact zone with enveloped sediments were both examined, and the latter zone was also geochemically investigated by pan concentrate sampling to see if contact metamorphosed zones possessed associated Sn, WO_3, and Au mineralisation. Assay results for this sampling are shown on Assay Record 4D and sample locations shown on Plan No. 4/88. Results were negative with only one sample recording above detection limit gold values, namely sample CPC. 31 - 0.1ppm.

C. 4.3 Camena District

This district was singled out for examination since ANZECO (1974) made reference to a surface exposed hematitic zone with anomalous WO_3 values in the "immediate vicinity of Camena". The area is geologically favourable for possible skarn development within Ordovician sequences bordering near-by Housetop granite intrusive. Pan concentrate sampling of the Camena drainage has been completed (Plan NO. 4/88) and interestingly, sample No. CPC 10 immediately NW of Camena recorded 363ppm WO_3. This is worthy of follow up geochemical sampling and reconnaissance to identify the possible presence of hematite/iron? within Ordovician sequences of the Camena district.

D. - Proposed Work

Exploration is currently in progress and should should continue during a 2nd year term. Emphasis will be placed upon:-

- An evaluation of the Blythe River hematitic iron occurrencies exposed within Crown Land, SW of Cuprona. The possibility of the deposits supporting small scale (15,000 - 50,000 tonnes/annum) open pit operations of high grade non-siliceous iron ore should be studied. Work will consist of detailed geologic evaluations, sampling and economic evaluations.

- A continuation of work at the Natone skarn zone, with emphasis placed upon examination of the skarn zone immediately adjacent to the Housetop granite intrusive.

- An examination of the Au - Pt potential of the Rutherfords Copper Shear zone adjacent to Natone.

- A continuation of the WO_3 appraisal (and Au anomalism?) of minor hematitic zones at Camena and west of the Blythe River.

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E. E. L. 30/86 EXPLORATION EXPENDITURES

A breakdown of exploration expenditures incurred over E.L. 30/86 from April 29th 1987 to date is tabulated below:-

	$
Geology	8875
Geochemistry	12990
Geophysics	Nil
Drilling	Nil
Other Exploration	2815
Administration	1735
Total	$26,415

C. H. WHITEHEAD

25th March 1988.

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EXPLORATION LICENCE 30/86

ANNUAL REPORT 1987/88

APPENDICES 1 - 4

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799038

EXPLORATION LICENCE 30/86 - C. W. DAVIS

CUPRONA N. W. TASMANIA.

ANNUAL REPORT. 1987 - 1988

LIST OF APPENDICES.

Appendix 1.

1A - Literature REferences Applicable To E.L. 30/86 Area/Region.
1B - Dept. Of Mines 'Open-File' Reports Applicable To E.L. 30/86 Area/Region.

Appendix 2.

2 - Natone Skarn - Drill Assay REcords (1987 re-Analyses)
Shell Hole Nos. PDH NT1, NT2, NT3, Minops P/L.
Hole Nos. N.DDH 1, 2, and 3.
2A - Selected Core Samples Spec' Scan

Appendix 3.

3 - Copper King Mine Area. Dept. Of Mines Drill Hole Nos. CK1, CK2, CK3,and CK4. Assay Sheets, Lithological Sheets.

Appendix 4.

Assay Record Sheets

4A - Copper King Mine Region, Bulk Sample
Cyanide Leach Samples CK100 - CK111, 12 Samples, Au.
4B - E.L. 30/86, Regional Sampling, Bulk Sample
Cyanide Leach Samples C. BCL.20 - C.BCL.30, 11 SAmples Au.
4C - Copper King - Cuprona Region,
Pan Concentrate S/Sed CK50 to CK61 (12 Samples) - As.
4D - E.L. 30/86, Regional Pan Concentrate Samples
C.PC.01 - C.PC.34 (21 Samples) Au, Pt, WO_3, Sn.
4E - Copper King Region Soil Samples
CK.SS1 - CK.SS14 (14 Samples) - As.

4F - Copper King Mine - Surface Rock Samples,
RS08, 10, 16 - (3 Samples) Cu, Au, Pt.

4G - Copper King Mine - Adit Samples,
CM 00.1.0, - 14.0-15.0, (15 Samples) - Cu, Au, Pt.

040 APPENDIX "1A"

799040

LIST OF LITERATURE REFERENCES APPLICABLE

E.L. 30/86 AREA

Blake, F	(1958A)	Blythe River and Cuprona Iron Areas. Tas Dept. Mines Tech Report 2:25-33
Blake, F	(1958B)	Rutherford's Iron Area, Natone Tas Dept. Mines Tech Report 2:19-22
Boyd, Gibson, Young	(1919)	Report of Experts on the Blythe River Iron Deposits (Commonwealth Parliament). Tas Dept. Mines Open File Report Q28/4.
Clarke, D, Bainbridge, I	(1967)	The Blythe River Iron Deposits. Tas Dept. Mines Open File Report Q28/1.
Darby, J H	(1900)	Blythe River Iron Mines. Tas Dept. Mines Open File Report Q28/5.
Eadie, E N	(1964)	Natone Magnetic Survey, Tasmania, 1962. Bur. Min. Resources Aust. Rec. 1964/14.
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Hughes, T D	(1953B)	The Dial Range Mineral Field. Unpub. Trans. Tas Dept. Mines
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Manson, W St C, Liddy, J, James, P L	(1962)	Ore dressing investigation R386. Blythe River Iron ore beneficiation. Tas Dept. Mines Tech Report 6:214-222.
MacDonald, E H	(1965)	Blythe River Iron Ore Deposits for Kathleen Investments. Tas Dept. Mines Open File Report Q28/8.
Noldart, A J	(1966)	Cuprona Iron Deposit. Tas Dept Mines Tech Report 10:55-64 plus map.
Nye, P B	(1937)	Blythe River Iron Deposits. Tas Dept. Mines Open File Report Q28/6.
Twelvetrees, W H	(1901)	Report on the Blythe River Iron Ore Deposit. Rep. Soc. Mines Tas. 1900-91.

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APPENDIX "18"

799042

LIST OF EXPLORATION COMPANY "OPEN-FILE" REPORTS

APPLICABLE E.L. 30/86 AREA

DEPT. OF MINES, HOBART

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Banwell, L A	(1981)	Progress Report on Exploration Licence 8/77 - Riana, During the Period 1/1/80 to 31/7/81. Unpublished Shell Co Report No 08.1063
Brandt, R T	(1973)	Report on the Results of Exploration on EL 1/69 Jan 72 - Sept 73. Australia and New Zealand Exploration Co.
Brandt, R T	(1974A)	Report on the Results of Exploration on EL 17/68 Oct 71 - May 74. Australia & New Zealand Exploration Co.
Brandt, R T	(1974B)	Final Report on Exploration Licence 1/69 for the period Sept 73 - June 74. Australia & New Zealand Co.
Erdmanis, J	(1969)	Progress Report to 30 Sept 1969 on EL 13/68 and EL 14/68 Minops Pty Ltd. Tas Dept. Mines Open File Report Q28/16.

Goudie, M A Hallof, P G	(1969)	Report on the Induced Polarization & Resistivity Survey in the Natone area of Tasmania for Minops Pty Ltd, McPhar Geophysics Pty Ltd Tas Dept. Mines Open File Report Q28/13.
Grace, D P	(1972A)	Tasminex NL Natone Area Phase 1 Report. Tas Dept. Mines Open File Report Q28/22.
Grace, D P	(1972B)	Dial Range Area. Prospecting Report Tasminex NL, EL 9/72. Tas Dept. Mines Open File Report Q29/12.
Hewitt, W V	(1968)	Geophysical Survey Penguin Beach EL 15/65. BHP Co Ltd. Tas Dept. Mines Open File Report Q29/4.
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Pearson, A	(1927)	The Housetop Area, Laurel Creek & Blythe River Districts. Tas Dept. Mines Open File Report Q36/4.
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Quest Exploration Pty Ltd	(1966)	General Appraisal of Copper King Mine, Natona. Tas Dept Mines Open File Report Q28/12.

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Ruxton, P A (1983A) Progress Report on Exploration in EL 8/77, Riana, 2-7-82 to 1-9-83. Unpubl. Report Shell Co. No. 08.2061

Ruxton, P A (1983B) The Natone Pyrrhotite-Magnetite Skarn, NW Tasmania. Unpubl. Report Shell Co. No. 08.2060

Ruxton, P A (1984) Progress Report on Exploration in EL 8/77, Riana, 2-9-83 to 1-3-84. Unpubl. Shell Report No. 08.2264

Whiting, J D (1970) Tasminex NL Natone Copper/Iron Prospect, Tasmania by Hall Ralph & Assoc. P/L Dept. Mines Tas Open File Report Q28/23.

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799045

APPENDIX NO. 2

NATONE SKARN - DRILL ASSAY RECORDS

(1987 - REASSAYS)

Shell Holes PDDH NT 1
PDDH NT2
PDDH NT3

Minops P/L Holes N. DDH 1
N. DDH 2
N. DDH 3

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C. W. DAVIS.

EXPLORATION LICENCE 30/86.

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DRILL SAMPLE ASSAY RECORD.

HOLE. N° P.D.H. N.T.1.

DRILLED BY :- SHELL.

DEPTH DRILLED. 173.59m.

ASSAYED BY AMDEL.

PAGE. N°. 1/2.

SAMPLE NUMBER.	DEPTH DRILLED FROM (m)	DEPTH DRILLED TO (m)	INTERVAL DRILLED (m)	ACTUAL CORE (m)	CORE RECOVERY. %	SAMPLE TYPE.	ASSAYS	
							Au	Pt
5323	50	52	2	—	—	CRUSHED & AMPLE SPLIT-RIFFLED	<0.005	<0.005
5324	52	54	2	—	—	PERCUSSION CHIPS SPLIT/RIFFLED	0.045	<0.005
5325	54	56	2	—	—	"	0.035	<0.005
P.D.H. N.T.1./5329	62	64	2	—	—	"	<0.005	<0.005
P.D.H. N.T.1./5330	64	66	2	—	—	"	0.005	<0.005
P.D.H. N.T.1./5331	66	68	2	—	—	"	0.005	<0.005
5332	68	70	2	—	—	"	<0.005	<0.005
5333	70	72	2	—	—	"	<0.005	<0.005
P.D.H. N.T.1./5334	72	74	2	—	—	"	0.005	<0.005
P.D.H. N.T.1./5335	74	76.	2	—	—	"	0.005	<0.005
5336.	76	78	2	—	—	"	<0.005	<0.005
5338	80	82	2	—	—	"	<0.005	<0.005
5340.	84	86	2	—	—	"	<0.005	<0.005
5341.	86	88	2	—	—	"	<0.005	<0.005
5342.	88	90	2	—	—	"	<0.005	<0.005
5343	90	92	2	—	—	"	0.015	<0.005
5344	92	94	2	—	—	"	<0.005	<0.005
5345	94	96	2	—	—	"	0.005	<0.005
P.D.H. N.T.1. 5346	96	98	2	—	—	"	0.025	<0.005
5347	98	100	2.	—	—	"	<0.005	<0.005

DRILL SAMPLE ASSAY RECORD. HOLE Nº PDH.NT1 PAGE Nº 2/2

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SHELL

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SAMPLE NUMBER.	DEPTH DRILLED FROM (m)	DEPTH DRILLED TO (m)	INTERVAL DRILLED (m)	ACTUAL CORE (m)	CORE RECOVERY %	SAMPLE TYPE	ASSAYS Au	ASSAYS Pt.
PDH.NT1. 5348	100	102	2	—	—	AIRC CHPS SPLIT RIFFLED	0·030	<0·005
5349	102	104	2	—	—	"	<0·005	<0·005
5350	104	106	2	—	—	"	<0·005	<0·005
5351	106	108	2	—	—	"	<0·005	<0·005
5352	108	110	2	—	—	"	<0·005	<0·005
PDH.NT1. 5355	110	112	2	—	—	"	<0·005	<0·005
PDH.NT1.5358	120	122	2	—	—	"	0·010	<0·005
PDH.NT.1.5361	128	130	2	—	—	"	0·055	<0·005
PDH.NT.1.5362	130	132	2	—	—	"	0·005	<0·005
PDH.NT.1.5363	132	134	2	—	—	"	0·005	<0·005
PDH.NT.1.5364	134	136	2	—	—	"	0·010	<0·005
5366	140	142	2	—	—	"	<0·005	<0·005
5368	142	144	2	—	—	"	<0·005	<0·005
5370	146	148	2	—	—	"	0·055	<0·005
5371	148	150	2	—	—	"	0·010	<0·005
5374	154	156	2	—	—	"	0·005	<0·005

C. W. DAVIS. EXPLORATION LICENCE 30/86.

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DRILL SAMPLE ASSAY RECORD.

HOLE. N° PDH. NT.2 DRILLED BY :- SHELL

DEPTH DRILLED. 152·88m ASSAYED BY AMDEL. PAGE. N°. 1/2.

SAMPLE NUMBER.	DEPTH DRILLED FROM (m)	DEPTH DRILLED TO (m)	INTERVAL DRILLED (m)	ACTUAL CORE (m)	CORE RECOVERY. %	SAMPLE TYPE.	ASSAYS	
							Au	Pt
PDH. NT.2/6406	12·00	15·00	3·00	—	—		0·015	<0·005.
PDH. NT2./5407	15·00	18·00	3·00	—	—		0·005	<0·005
PDH. NT3/5408	18·00	21·00	3·00	—	—		<0·005	<0·005
PDH. NT2/6409	21·00	24·00	3·00	—	—		<0·005	<0·005
PDH. NT2/5410	24·00	27·00	3·00	—	—		<0·005	<0·005
PDH. NT2./6411	27·00	30·00	3·00	—	—		0·030	<0·005
PDH. NT2/6412	30·00	33·00	3·00	—	—		<0·005	<0·005
PDH. NT2./6413	47·83	49·80	1·97	1·97	100%	1/2 CORE.	0·005	<0·005
PDH. NT2./6414	72·26	73·63	1·37	1·37	100	1/2 CORE	0·035	<0·005
PDH. NT.2/6415	95·83	97·00	1·17	1·17	100	"	<0·005	<0·005
PDH. NT.2/5416	97·00	99·26	2·26	2·26	100	"	<0·005	<0·005
PDH. NT.2/6417	99·26	100·00	0·74	0·74	100		<0·005	<0·005
PDH. NT.2/5418	104·70	106·05	1·35	1·35	100	"	<0·005	<0·005
PDH. NT2/1	106·50	108·53	2·02	2·02	100	"	0·005	<0·005
PDH. NT2/2	108·53	110·57	2·04	2·04	100	1/2 CORE.	0·016	<0·005
PDH. NT.2/3.	110·57	111·92	1·35	1·35	100	"	0·006	<0·005
PDH. NT.2/4	111·92	113·75	1·83	1·83	100	"	0·055	<0·005
PDH. NT2/5	113·75	116·83	3·08	3·08	100	"	0·015	<0·005
PDH. NT2/6	116·83	119·83	3·00	3·00	100	"	<0·005	<0·005
PDH. NT2/7	119·83	122·83	3·00	3·00	100	1/2 CORE.	<0·005	<0·005

DRILL SAMPLE ASSAY RECORD. HOLE N° PDH/NT.2. PAGE N°: 2/2.

049

SHELL.

799049

SAMPLE NUMBER.	DEPTH DRILLED FROM (m)	DEPTH DRILLED TO (m)	INTERVAL DRILLED (m)	ACTUAL CORE (m)	CORE RECOVERY %	SAMPLE TYPE	ASSAYS. Au	ASSAYS. Pt.
PDH. NT/2/8	122·83	124·82	1·99	1·99	100	1/2 CORE	<0·005	<0·005
PDH. NT/2/9	124·82	127·47	2·65	2·65	100	"	<0·005	<0·005
PDH. NT2/10	127·47	129·88	2·41	2·41	100	"	<0·005	<0·005
PDH. NT2/11	129·88	132·38	2·50	2·50	100	"	<0·005	<0·005
PDH. NT2/12.	132·38	134·40	2·02	2·02	100	"	<0·005	<0·005
PDH. NT2/13	134·30	136·59	1·19	1·19	100	"	<0·005	<0·005
PDH. NT.2./14	136·59	139·36	2·77	2·77	100	1/2 CORE	<0·005	<0·005
PDH. NT.2/5419	138·00	139·36	1·36	1·36.	—	—	<0·005	<0·005
PDH. NT2/15	139·36	142·82	3·46	3·46	100	1/2 CORE.	<0·005	<0·005
PDH. NT.2/16	142·82	144·96	2·14	2·14	100	"	<0·005	<0·005
PDH. NT2/17	144·96	147·20	2·44	2·44	100	"	<0·005	<0·005
PDH. NT2/5420	145·68	147·20	1·72	1·72	—	1/2 CORE	<0·005	0·005
PDH NT2/18	147·40	150·00	2·60	2·60	100	"	<0·005	<0·005
PDH. NT2/19.	150·00	152·88	2·88	2·88	100	"	<0·005	<0·005.

050

C.W. DAVIS. EXPLORATION LICENCE 30/86.

799050

DRILL SAMPLE ASSAY RECORD.

HOLE. N° - PDH. NT.3. DRILLED BY :- SHELL.

DEPTH DRILLED. - 269.50m. ASSAYED BY - AMDEL. PAGE. N°. 1/4

SAMPLE NUMBER.	DEPTH DRILLED FROM (m)	DEPTH DRILLED TO (m)	INTERVAL DRILLED (m)	ACTUAL CORE (m)	CORE RECOVERY. %	SAMPLE TYPE.	ASSAYS	
							Au	Pt
PDH. NT.3/4	63.60	65.50	1.90			1/4 DRILL CORE	<0.005	<0.005
PDH. NT.3/5	69.40	69.80	0.40			1/4 DRILL CORE	<0.005	<0.005
29190	69.80	71.40	1.60			PULP	<0.005	<0.005
29191	71.40	72.50	1.10			PULP	0.005	<0.005
29192	72.50	74.90	2.40			PULP	<0.005	<0.005
29194	76.20	77.00	0.80			PULP.	<0.005	<0.005
29195	77.00	78.50	1.50			PULP	0.050	<0.005
29196	78.50	79.80	1.30			PULP	0.005	<0.005
29198	80.50	81.70	1.20			PULP	<0.005	<0.005
29199	81.70	83.50	1.80			PULP	<0.005	<0.005
PDH. NT. 3/6	83.50	84.00	0.50			1/4 DRILL CORE	<0.005	<0.005
29201	84.00	86.90	1.90			PULP.	<0.001	<0.005
PDH.NT. 3/7	85.90	86.40	0.60			1/4 DRILL CORE	0.080	<0.005
29204	87.20	89.10	1.90			PULP	<0.005	<0.005
29205/06/07	89.10	91.20	2.10			PULP.	0.060	<0.005
29208	91.20	92.00	0.80			PULP.	0.075	<0.005
PDH.NT. 3/8	92.00	93.60	1.60			1/4 DRILL CORE.	0.005	<0.005
PDH.NT. 3/9	93.60	96.00	2.40			1/4 DRILL CORE	0.035	<0.005
29211/212	96.00	97.60	1.60			PULP	0.025	<0.005
29212.	97.60	99.10	1.50			PULP.	<0.005	<0.005

DRILL SAMPLE ASSAY RECORD. HOLE PDH. NT3. PAGE No. 2/4

051

799051

SAMPLE NUMBER.	DEPTH DRILLED		INTERVAL DRILLED (m)	ACTUAL CORE (m)	CORE RECOVERY %	SAMPLE TYPE	ASSAYS.	
	FROM (m)	TO (m)					Au	Pt.
29213	99.10	101.10	2.00			PULP	<0.005	<0.005
29214	101.10	102.70	1.60			PULP	0.015	<0.005
29215	102.70	103.00	0.30			PULP	0.025	<0.005
29216	103.00	103.90	0.90			PULP	<0.005	<0.005
PDH.NT 3/10	104.90	105.90	1.00			1/4 DRILL CORE.	0.015	<0.005
PDH. NT3/11	105.90	107.30	1.40			1/4 DRILL CORE.	0.005	<0.005
PDH. NT.3./12	107.30	108.80	1.50			1/4 DRILL CORE.	0.005	<0.005
PDH. NT3/14	109.20	110.70	1.50			1/4 DRILL CORE	0.060	<0.005
29224	111.30	111.50	0.20			PULP	0.020	<0.005
29225/26	111.50	115.30	3.80			PULP.	0.045	<0.005
29227	115.30	116.00	0.70			PULP.	0.020	<0.005
29228	116.0	118.00	2.00			PULP.	0.080	<0.005
29229/30	118.2	119.50	1.30			PULP	0.010	<0.005
29231	119.50	122.40	2.90			PULP	0.025	<0.005
29232	122.40	123.60	1.20			PULP	0.030	<0.005
29238	123.60	125.10	1.50			PULP	0.060	<0.005
PDH.NT.3./15	125.10	128.00	2.90			1/4 DRILL CORE	0.015	<0.005
29237	130.90	133.60	2.70			PULP.	<0.005	<0.005
29238	133.60	133.90	0.30			PULP.	0.005	<0.005
PDH. NT.3/16	133.90	134.70	0.80			1/4 DRILL CORE	0.025	<0.005
PDH.NT.3/17	134.70	135.30	0.60			1/4 DRILL CORE.	0.065	<0.005
PDH.NT.3/18	135.30	136.30	1.00			1/4 DRILL CORE.	0.005	<0.005
29244/45	140.20	141.70	1.50			PULP.	0.025	<0.005

DRILL SAMPLE ASSAY RECORD.

052

SHELL.

799052

SAMPLE NUMBER.	DEPTH DRILLED FROM (m)	DEPTH DRILLED TO (m)	INTERVAL DRILLED (m)	ACTUAL CORE (m)	CORE RECOVERY %	SAMPLE TYPE	ASSAYS Au	ASSAYS Pt.
29246	141·70	142·40	0·70			PULP.	<0·005	<0·005
29250	148·70	150·70	2·00			PULP	0·010	<0·005
29251.	150·70	152·70	2·00			PULP.	<0·005	<0·005
29255	161·50	163·50	2·00			PULP.	<0·005	<0·005
29259/60	171·00	176·50	5·50			PULP.	<0·005	<0·006
29261	176·50	177·80	1·30			PULP.	0·075	<0·005
29262	177·80	179·70	1·90			PULP	0·075	<0·005
PDH NT3/22	179·70	181·80	2·10			1¼ DRILL CORE.	<0·005	<0·005
PDH·NT3/23	181·80	182·70	0·90			1¼ DRILL CORE	0·020	0·030
PDH·NT3/24	182·70	184·50	1·80			1¼ DRILL CORE.	0·025	0·035
29268	184·50	186·20	1·70			PULP	<0·005	<0·005
29269	186·20	187·60	1·40			PULP.	<0·005	<0·005
29270	187·60	189·00	1·40			PULP.	<0·005	<0·005
PDH·NT3/25	189·00	190·70	1·70			1¼ DRILL CORE	<0·005	<0·005
PDH·NT3/26	190·70	191·90	1·20			1¼ DRILL CORE.	<0·005	<0·005
29276/77	192·90	194·70	1·80			PULP.	<0·005	<0·006
29281	198·60	198·90	0·30			PULP.	<0·005	<0·005
29282/83	198·90	201·50	1·60			PULP.	<0·005	<0·005
29284	201·50	204·30	2·80			PULP.	<0·005	<0·005
PDH·NT3/27	204·30	206·00	1·70			1¼ DRILL CORE.	0·050	<0·005
PDH·NT3/28	206·00	207·00	1·00			1¼ DRILL CORE	0·020	<0·005
PDH·NT3/29	207·00	208·10	1·10			1¼ DRILL CORE.	0·020	<0·005
29291	212·10	214·30	2·20			PULP.	<0·005	<0·005

DRILL SAMPLE ASSAY RECORD. [illegible] DDH-N1-3 PAGE N°: 414

SHELL.

053

799053

SAMPLE NUMBER.	DEPTH DRILLED		INTERVAL DRILLED (m)	ACTUAL CORE (m)	CORE RECOVERY %	SAMPLE TYPE	ASSAYS.	
	FROM (m)	TO (m)					Au	Pt.
29294/95	219·10	221·10	3·00			PULP.	<0·005	<0·005
29296	222·10	222·80	0·70			PULP.	<0·005	<0·005
29297	222·80	225·00	2·20			PULP	<0·005	<0·005
29300/301	226·00	230·30	4·30			PULP.	<0·005	<0·005
29302.	230·30	233·20	0·90			PULP.	<0·005	<0·005
29308/09/10	242·30	249·50	7·20			PULP.	<0·005	<0·005
29314/15/16	256·60	259·40	2·80			PULP.	<0·005	<0·005
29317.	259·00	261·90	2·90			PULP.	<0·005	<0·005
29319/20/21	263·50	269·50	6·00			PULP.	<0·005	<0·005

054 C.W. DAVIS. EXPLORATION LICENCE 30/86.

799054

DRILL SAMPLE ASSAY RECORD.

HOLE. N° N. DDH. 1. DRILLED BY :- MINOPS.

DEPTH DRILLED. 105·0 m. ASSAYED BY AMDEL. PAGE. N°. 1/2

SAMPLE NUMBER.	DEPTH DRILLED FROM (m)	DEPTH DRILLED TO (m)	INTERVAL DRILLED (m)	ACTUAL CORE (m)	CORE RECOVERY. %	SAMPLE TYPE.	ASSAYS	
							Au	Pt
N.DDH 1/1	21·79	26·21.	4·42	2·89	65·38	1/4 DRILL CORE	<0·005	<0·005.
N.DDH 1/2	26·21	29·26	3·05	0·914	29·97	"	<0·005	<0·005
N.DDH 1/3	29·26	32·76	3·50	1·280	36·57	"	<0·005	<0·005
N.DDH 1/4	32·76	36·73	3·97	2·926	73·70	"	<0·005	<0·005.
N.DDH. 1/5	36·73	40·23	3·50	1·685	46·29	"	<0·005	<0·005
N.DDH 1/6	40·23	44·50	4·27	0·945	22·13	"	<0·005	<0·005
N.DDH 1/7	44·50	47·70	3·20	1·646	51·43	"	<0·005	<0·005
N.DDH 1/8	47·70	54·86	7·16	2·058	28·74	1/4 DRILL CORE.	<0·005	<0·005
N.DDH 1/9	54·86	57·91	3·05	3·06	100	"	<0·005	<0·005
N.DDH 1/10	57·91	61·26	3·35	3·35	100	"	<0·005	<0·005
N.DDH 1/11	61·26	65·53	4·27	4·27	100	"	<0·005	<0·005
N.DDH 1/12	65·53	67·03	1·50	1·50	100	"	<0·005	<0·005
N.DDH 1/13	67·03	71·62	4·59	4·59	100	"	<0·005	<0·005
N.DDH 1/14	71·62	73·02	1·40	1·40	100	"	<0·005	<0·005
N.DDH 1/15	73·02	76·02	3·18	2·74	86·26	"	<·005	<0·005
N.DDH 1/16	76·20	78·93	2·73	2·73	100	1/4 DRILL CORE	<0·005	<0·005
N.DDH. 1/17	78·93	81·07	2·14	2·14	100	"	<0·005	<0·005
N.DDH 1/18	81·07	83·50	2·44	2·44	100	"	<0·005	<0·005
N.DDH 1/19	83·60	85·64	2·14	2·14	100	"	<0·005	<0·005
N.DDH 1/20	85·64	89·30	3·66	3·66	100	"	<0·005	<0·005

DRILL SAMPLE ASSAY RECORD. HOLE N DDH 1 PAGE No. 2/2

055

799055

SAMPLE NUMBER.	DEPTH DRILLED FROM (m)	DEPTH DRILLED TO (m)	INTERVAL DRILLED (m)	ACTUAL CORE (m)	CORE RECOVERY %	SAMPLE TYPE	ASSAYS. Au	ASSAYS. Pt.
N. DDH 1/21	89.30	91.86	2.56	2.56	100	¼ DRILL CORE.	<0.005	<0.005
N. DDH. 1/22	91.86	95.09	3.23	3.23	100	¼ "	<0.005	<0.005
N. DDH. 1/23	95.09	96.00	0.91	0.91	100	"	<0.005	<0.005.

C.W. DAVIS — EXPLO. N LICENCE 30180.

056

SAMPLE ASSAY RECORD.

799056

MINOPS — HOLE N° N. DDH 2.

DEPTH DRILLED = 200·0 m

SAMPLE NUMBER.	DEPTH FROM (m)	DEPTH TO (m)	INTERVAL (m)	ACTUAL (m)	CORE RECOVERY %	SAMPLE TYPE.	ASSAYS 1 Au	ASSAYS Pt.
NDDH 2/48	22·86	28·95	6·09			1/4 DRILL CORE	<0·005	<0·005
" 2/47	28·95	35·05	6·10			1/4 " "	<0·005	<0·005
" 2/46	35·05	42·37	7·32			1/4 " "	<0·005	<0·005
" 2/45	42·37	45·11	2·74			1/4 " "	<0·005	<0·005
" 2/44	45·11	48·77	3·66			1/4 " "	<0·005	<0·005
" 2/43	48·77	53·03	4·26			1/4 " "	<0·005	<0·005
" 2/42	53·03	56·08	3·05			1/4 " "	<0·005	<0·005
" 2/41	56·08	69·43	3·35			1/4 DRILL CORE	<0·005	<0·005
" 2/40	59·43	71·93	12·50			1/4 " "	<0·005	<0·005
" 2/39	71·93	78·82	6·89			1/4 " "	0·005	<0·005
" 2/38	78·82	81·99	3·67			1/4 " "	0·015	<0·005
" 2/37	81·99	86·25	4·26			1/4 " "	<0·005	<0·005
" 2/36	86·25	88·99	2·74			1/4 " "	<0·005	<0·005
" 2/35	88·99	91·74	2·75			1/4 " "	<0·005	<0·005
" 2/34	91·74	94·48	2·70			1/4 " "	<0·005	<0·005
" 2/33	94·48	97·23	2·75			1/4 DRILL CORE	<0·005	<0·005
" 2/32	97·23	99·97	2·74			1/4 " "	<0·005	<0·005
" 2/31	99·97	102·72	2·75			1/4 " "	<0·005	<0·005
" 2/30	102·72	105·46	2·74			1/4 " "	<0·005	<0·005
" 2/29	105·46	108·22	2·76			1/4 " "	<0·005	<0·005
" 2/28	108·22	110·94	2·74			1/4 " "	<0·005	<0·005
" 2/27	110·94	113·68	2·74			1/4 DRILL CORE	<0·005	<0·005
" 2/26	113·68	116·42	2·74			1/4 " "	<0·005	<0·005
" 2/16	116·42	117·34	0·92	0·92	100	1/4 " "	<0·005	<0·005
" 2/17	117·34	120·39	3·05	3·05	100	1/4 " "	<0·005	<0·005
" 2/18	120·39	128·44	8·05	8·05	100	1/4 " "	<0·005	<0·005

C. W. DAVIS.

057

SAMPLE ASSAY RECORD.

799057

MINOPS. HOLE N° N. DDH. N°2.

DEPTH DRILLED = 200.0 m

PAGE:- 2/2

SAMPLE NUMBER.	DEPTH FROM (m)	DEPTH TO (m)	INTERVAL (m)	ACTUAL (m)	CORE RECOVERY %	SAMPLE TYPE.	ASSAYS Au	ASSAYS Pt.
N.DDH 2/19	123.44	126.49	3.05	3.05	100	¼ DRILL CORE	<0.005	<0.005
N.DDH.2/20	126.49	129.53	3.04	3.04	100	¼ " "	<0.005	<0.005
N.DDH.2/21	129.53	132.59	3.06.	3.06	100	¼ " "	<0.005	<0.005
N.DDH 2/22	132.59	135.63	3.04.	3.04	100	¼ " "	<0.005	<0.005
N.DDH.2/23	135.68	138.68	3.05	3.05	100	¼ " "	<0.005	<0.005
N.DDH 2/24	138.68	141.57	2.89	2.89	100	¼ " "	<0.005	<0.005
N.DDH.2/25.	141.57	145.62	4.05.	4.05	100	¼ DRILL CORE	<0.005	<0.005
N.DDH 2/1	145.62	147.67	2.05	2.05	100	¼ " "	<0.005	<0.005
N.DDH 2/2	147.67	150.26	2.59	2.59	100	¼ " "	<0.005	<0.005
N.DDH.2/3	150.26	153.00	2.74	2.74	100	¼ " "	<0.005	<0.005
N.DDH.2/4.	153.00	154.22	1.22.	1.22	100	¼ " "	<0.005	<0.005
N.DDH.2/5	154.22	155.75	1.53	1.53	100	¼ " "	<0.005	<0.005
N.DDH.2/6	155.75	157.27	1.52	1.36	89.74.	¼ DRILL CORE	0.100	<0.005
N.DDH.2/7	157.27	159.10	1.83.	1.83	100	¼ " "	<0.005	<0.005
N.DDH.2/8	159.10	160.93	1.83.	1.83	100	¼ " "	<0.005	<0.005
N.DDH.2/9	160.93	162.76	1.83	1.83	100	¼ " "	<0.005	<0.005
N.DDH.2/10	162.76	164.28	1.52	1.52	100	¼ " "	0.010	<0.005
N. DDH 2/11	164.28	165.85	4.57.	4.57	100	¼ DRILL CORE	<0.005	<0.005
N.DDH.2/12	165.85	170.87	1.52	1.52	100	¼ " "	<0.005	<0.005
N.DDH.2/13	170.87	171.89	1.52.	1.52	100	¼ " "	<0.005	<0.005
N.DDH.2/14	171.89	174.34	2.45	2.09	85.30	¼ " "	<0.005	<0.005
N.DDH.2/15	174.34	189.87	8.53	2.29	26.84.	¼ " "	<0.005	<0.005

C. W. DAVIS.

058

SAMPLE ASSAY RECORD.

799058

MINOPS. HOLE N° N. DDH. 3.

DEPTH DRILLED = 123.0 m

PAGE:- 1/1

SAMPLE NUMBER.	DEPTH FROM (m)	DEPTH TO (m)	INTERVAL (m)	ACTUAL (m)	CORE RECOVERY %	SAMPLE TYPE.	ASSAYS Au	ASSAYS Pt.	
N. ODH 3/1	6.095	15.24	9.14	0.87	4.82.	1/4 DRILL CORE	<0.005	<0.005	
" 3/2	15.24	19.81	4.57	2.51	54.92	1/4 "	<0.005	<0.005	
" 3/3	19.81	23.61	3.80	0.98	25.79	1/4 "	<0.005	<0.005	
" 3/4	23.61	26.21	2.60	0.92	35.38	1/4 "	0.015	<0.005	
" 3/5	26.21	29.26	3.05	1.07	35.08	1/4 "	0.020	<0.005	
" 3/6	29.26	35.36	6.10	0.99	16.22	1/4 "	0.005	<0.005	
" 3/7	35.36	38.40	3.04	0.92	30.26	1/4 DRILL CORE	0.015	<0.005	
" 3/8	36.40	41.45	3.05	2.13	69.83	1/4 "	0.005	<0.005	
" 3/9	41.45	43.89	2.44	2.26	92.62	1/4 "	0.005	<0.005	
" 3/10	43.89	47.55	3.66	1.83	50.00.	1/4 "	<0.005	<0.005	
" 3/11	47.55	48.77	1.22	1.22	100.	1/4 "	<0.005	<0.005	
" 3/12	48.77	51.20	2.43	1.88	77.36	1/4 "	<0.005	<0.005	
" 3/13	51.20	53.34	2.14	1.22	57.01	1/4 "	<0.005	<0.005	
" 3/14	53.34	56.39	3.05	0.88	28.85	1/4 "	<0.005	<0.005	
" 3/15	56.39	60.04	3.65	1.60	43.84.	1/4 DRILL CORE	<0.005	<0.005	
" 3/16	60.04	62.48	2.44	1.45	59.43	1/4 "	<0.005	<0.005	
" 3/17	62.48	64.00	1.52	1.22	80.26.	1/4 "	<0.005	<0.005	
" 3/18	64.00	66.75	2.75	1.62	58.91	1/4 "	<0.005	<0.005	
" 3/19	66.15	67.97	1.22	0.32	26.23	1/4 "	<0.005	<0.005	
" 3/20	67.97	72.23	4.26	0.75	17.61	1/4 "	<0.005	<0.005	
" 3/21	72.28	82.29	10.06	0.69	6.86	1/4 DRILL CORE	<0.005	<0.005	
" 3/22	82.29	95.09	12.80	14.78	11.54	1/4 "	<0.005	<0.005	
" 3/23	95.09	97.23	2.14	1.48	69.16	1/4 "	<0.005	<0.005	
" 3/24.	97.23	98.45.	1.22	1.22	100.	1/4 "	<0.005.	<0.005.	

APPENDIX NO. 2A

NATONE SKARN - DRILL ASSAY RECORDS

SPEC SCAN ANALYSES

Hole No.	PDHNT 3,	Sample No.	3/22,	Depth	179.70- 181.80
" "	" "	" "	3/23	"	181.80- 182.70
" "	" "	" "	3/24	"	182.70- 184.50
" "	" "	" "	29268	"	184.50- 186.20
" "	" "	" "	29269	"	186.20- 187.60

amdel

APPENDIX 2A.

799060

Report AC 4004/87
Page 1

060

HOLE. N° SHELL. PDHNT 3.

SAMPLE N° 3/22 DEPTH 179.70 - 181.80m.

ANALYSIS

ATOMIC NO.	ELEMENT	SAMPLE NO. PDHNT 3/22
33	As - Arsenic	T
34	Se - Selenium	ND
35	Br - Bromine	ND
37	Rb - Rubidium	T
38	Sr - Strontium	T
39	Y - Yttrium	ND
40	Zr - Zirconium	T
41	Nb - Niobium	ND
42	Mo - Molybdenum	ND
49	In - Indium	ND
50	Sn - Tin	ND
51	Sb - Antimony	ND
52	Te - Tellurium	ND
53	I - Iodine	ND
55	Cs - Caesium	ND
56	Ba - Barium	M
57	La - Lanthanum	ND
58	Ce - Cerium	ND
72	Hf - Hafnium	ND
73	Ta - Tantalum	ND
74	W - Tungsten	ND
80	Hg - Mercury	ND
81	Tl - Thallium	ND
82	Pb - Lead	ND
83	Bi - Bismuth	ND
90	Th - Thorium	ND
92	U - Uranium	ND

T = Trace
M = Minor Constituent
ND = Not Detected

amdel

APPENDIX 2H.

799061

061

Report AC 4004/87
Page 2

HOLE N° - SHELL - P.DHNT. 3.

SAMPLE N° 3/23

DEPTH. 181.80 - 182.70m.

ANALYSIS

ATOMIC NO.	ELEMENT	SAMPLE NO. PDHNT 3/23
33	As - Arsenic	M
34	Se - Selenium	ND
35	Br - Bromine	ND
37	Rb - Rubidium	T
38	Sr - Strontium	T
39	Y - Yttrium	ND
40	Zr - Zirconium	T
41	Nb - Niobium	ND
42	Mo - Molybdenum	ND
49	In - Indium	ND
50	Sn - Tin	ND
51	Sb - Antimony	ND
52	Te - Tellurium	ND
53	I - Iodine	ND
55	Cs - Caesium	ND
56	Ba - Barium	M
57	La - Lanthanum	ND
58	Ce - Cerium	ND
72	Hf - Hafnium	ND
73	Ta - Tantalum	ND
74	W - Tungsten	ND
80	Hg - Mercury	ND
81	Tl - Thallium	ND
82	Pb - Lead	ND
83	Bi - Bismuth	ND
90	Th - Thorium	ND
92	U - Uranium	ND

T = Trace
M = Minor Constituent
ND = Not Detected

amdel

APPENDIX 4H.

062

HOLE N° - SHELL PDH NT. 3.
SAMPLE N° 3/24
DEPTH. 182·70 - 184·60m.

799062

ANALYSIS

ATOMIC NO.	ELEMENT	SAMPLE NO. PDHNT 3/24
33	As - Arsenic	M
34	Se - Selenium	ND
35	Br - Bromine	ND
37	Rb - Rubidium	T
38	Sr - Strontium	T
39	Y - Yttrium	ND
40	Zr - Zirconium	T
41	Nb - Niobium	ND
42	Mo - Molybdenum	ND
49	In - Indium	ND
50	Sn - Tin	ND
51	Sb - Antimony	ND
52	Te - Tellurium	ND
53	I - Iodine	ND
55	Cs - Caesium	ND
56	Ba - Barium	M
57	La - Lanthanum	ND
58	Ce - Cerium	ND
72	Hf - Hafnium	ND
73	Ta - Tantalum	ND
74	W - Tungsten	ND
80	Hg - Mercury	ND
81	Tl - Thallium	ND
82	Pb - Lead	ND
83	Bi - Bismuth	ND
90	Th - Thorium	ND
92	U - Uranium	ND

T = Trace
M = Minor Constituent
ND = Not Detected

amdel

APPENDIX 2A.

063

HOLE N° SHELL PDH.NT.3.

SAMPLE N° 29268

DEPTH - 184.50 - 186.20.

799063

ANALYSIS

ATOMIC NO.	ELEMENT	SAMPLE NO. 29268
33	As - Arsenic	M
34	Se - Selenium	ND
35	Br - Bromine	ND
37	Rb - Rubidium	T
38	Sr - Strontium	T
39	Y - Yttrium	ND
40	Zr - Zirconium	T
41	Nb - Niobium	ND
42	Mo - Molybdenum	ND
49	In - Indium	ND
50	Sn - Tin	ND
51	Sb - Antimony	ND
52	Te - Tellurium	ND
53	I - Iodine	ND
55	Cs - Caesium	ND
56	Ba - Barium	M
57	La - Lanthanum	ND
58	Ce - Cerium	ND
72	Hf - Hafnium	ND
73	Ta - Tantalum	ND
74	W - Tungsten	ND
80	Hg - Mercury	ND
81	Tl - Thallium	ND
82	Pb - Lead	ND
83	Bi - Bismuth	ND
90	Th - Thorium	ND
92	U - Uranium	ND

T = Trace
M = Minor Constituent
ND = Not Detected

amdel

APPENDIX. Nº 2A.

064

HOLE Nº PDH.NT.3.

SAMPLE Nº 29269

DEPTH. 186.20 - 187.60m.

799064

ANALYSIS

ATOMIC NO.	ELEMENT	SAMPLE NO. 29269
33	As - Arsenic	T
34	Se - Selenium	ND
35	Br - Bromine	ND
37	Rb - Rubidium	T
38	Sr - Strontium	T
39	Y - Yttrium	ND
40	Zr - Zirconium	T
41	Nb - Niobium	ND
42	Mo - Molybdenum	ND
49	In - Indium	ND
50	Sn - Tin	ND
51	Sb - Antimony	ND
52	Te - Tellurium	ND
53	I - Iodine	ND
55	Cs - Caesium	ND
56	Ba - Barium	M
57	La - Lanthanum	ND
58	Ce - Cerium	ND
72	Hf - Hafnium	ND
73	Ta - Tantalum	ND
74	W - Tungsten	ND
80	Hg - Mercury	ND
81	Tl - Thallium	ND
82	Pb - Lead	ND
83	Bi - Bismuth	ND
90	Th - Thorium	ND
92	U - Uranium	ND

T = Trace
M = Minor Constituent
ND = Not Detected

065

799065

APPENDIX NO. 3

COPPER KING MINE AREA

DEPT. OF MINES DRILL HOLES NOS. CK1, CK2, CK3 & CK4.

REANALYSIS AND RELOGS

066

799066

C. W. DAVIS

EXPLORATION LICENCE 30/86

CUPRONA, N. W. TASMANIA

RELOG DATA - DRILL CORE

DEPARTMENT OF MINES DRILLING PROGRAMME

COPPER KING MINE - HOLE NO. CK.1

DISTRICT	-	CUPRONA
LOCATION	-	COPPER KING MINE
SITE	-	100'N 41° (Grid North) From 82' L Adit
R.L.	-	Approx 82' level
COORDINATES	-	43'E 190'S Pickand Grid
BEARING	-	Grid West
INCLINATION	-	56°
DEPTH OF HOLE	-	95.05m
DRILL/DRILLER	-	F25, A. S. James Pty. Ltd.
CORE SIZE	-	NX 18.29m, BX 18.29 to 95.05
DRILL DATES	-	13/12/68 - 16/1/69
DRILL TARGET	-	To test depth extensions of the Copper King mineralisation
DRILL CORE RELOGGED	-	9th - 11 Sept 1987
DRILL CORE SAWN	-	14th - 16th Sept 1987
SAMPLES SUBMITTED TO	-	Analabs
DATE	-	17th SEpt 1987
ELEMENTS	-	Cu, Au, Pt.

067

C. W. DAVIS

799067

EXPLORATION LICENCE 30/86

CUPRONA, N. W. TASMANIA

RELOG DATA - DRILL CORE

DEPARTMENT OF MINES DRILLING PROGRAMME

COPPER KING MINE - HOLE NO. CK.2

DISTRICT	-	CUPRONA
LOCATION	-	COPPER KING MINE
SITE	-	7'S 36° E From 82'L Adit
R.L.	-	Approx 82' Level
COORDINATES	-	22'E 328'S Pickands Grid
BEARING	-	Grid West
INCLINATION	-	55°
DEPTH OF HOLE	-	73.17m
DRILL/DRILLER	-	F25,A.S. James Pty. Ltd.
CORE SIZE	-	BQX
DRILL DATES	-	21/1/69 - 30/1/69
DRILL TARGET	-	To test depth extensions of the Copper King mineralisation
DRILL CORE RELOGGED	-	9th - 11th Sept 1987
DRILL CORE SAWN	-	14th - 16th Sept 1987
SAMPLES SUBMITTED TO	-	Analabs
DATE	-	17th Sept 1987
ELEMENTS	-	Cu, Au, Pt.

068

799068

C. W. DAVIS

EXPLORATION LICENCE 30/86

CUPRONA, N. W. TASMANIA

RELOG DATA - DRILL CORE

DEPARTMENT OF MINES DRILLING PROGRAMME

COPPER KING MINE - HOLE NO. CK. 3

DISTRICT	-	CUPRONA
LOCATION	-	COPPER KING MINE
SITE	-	376' N 17° E Grid North Form 82'L Adit
R.L.	-	Approx 90' Level
COORDINATES	-	86'E, 94'N Pickands Grid
BEARING	-	?
INCLINATION	-	55°
DEPTH OF HOLE	-	57.45m
DRILL/DRILLER	-	F25, A. S. James Pty. Ltd.
CORE SIZE	-	BQ
DRILL DATES	-	30/1/69 - 17/2/69
DRILL TARGET	-	To test for mineralisation NE of the Copper King Mine
DRILL CORE RELOGGED	-	9th -11th SEpt 1987
DRILL CORE SAWN	-	14th - 16th Sept 1987
SAMPLES SUBMITTED TO	-	Analabs
DATE	-	17th Sept 1987
ELEMENTS	-	Cu, Au, Pt.

069

799069

C. W. DAVIS

EXPLORATION LICENCE 30/86

CUPRONA, N. W. TASMANIA

RELOG DATA - DRILL CORE

DEPARTMENT OF MINES DRILLING PROGRAMME

COPPER KING MINE - HOLE NO. CK. 4

DISTRICT	-	CUPRONA
LOCATION	-	COPPER KING MINE
SITE	-	111' N 40°E (Grid N) from 82' L. Adit
R.L.	-	Approx 82' L
COORDINATES	-	48'E, 181'S, Pickand Grid
BEARING	-	Grid East
INCLINATION	-	-55°
DEPTH OF HOLE	-	60.65m
DRILL/DRILLER	-	F25, A. S. James Pty. Ltd.
CORE SIZE	-	BQ
DRILL DATES	-	20/2/69 to 26/2/69
DRILL TARGET	-	To test for mineralisation east of the Copper King shaft
DRILL CORE RELOGGED	-	9th - 11th Sept 1987
DRILL CORE SAWN	-	14th - 16th Sept 1987
SAMPLES SUBMITTED TO	-	Analabs
DATE	-	17th Sept 1987
ELEMENTS	-	Cu, Au, Pt.

799070

070

DRILL SAMPLE ASSAY RECORD.

COPPER KING MINE.

MINES DEPT.
HOLE. N° DDH. Ck.N°1.

DRILLED BY :- MINES DEPT.

DEPTH DRILLED. 95.06m. ASSAYED BY ANALABS. PAGE. N°. 1/1.

SAMPLE NUMBER.	DEPTH DRILLED FROM (m)	DEPTH DRILLED TO (m)	INTERVAL DRILLED (m)	ACTUAL CORE (m)	CORE RECOVERY %	ASSAYS Cu	Au	Pt
Ck. 1/1.	11.62	12.86	0.89	0.64	66.06	1500	0.005	<0.005
Ck. 1/2	12.35	13.35	1.00	0.90	90.00	670	<0.005	<0.005.
Ck. 1/3	13.35	14.33	0.98	0.90	91.84	2560	<0.005	<0.005
Ck. 1/4.	14.33	15.62	1.19	0.76	6387.	2460	<0.005	<0.005
Ck. 1/5	17.64	18.90	1.06	0.90	84.91	2100	0.005	<0.005
Ck. 1/6	21.04	22.87	1.83	1.61	82.62	30	<0.005	<0.005.
Ck. 1/7	22.87	26.83	3.96	1.75	44.19	30	<0.005	<0.005
Ck 1/8	33.92	37.12	3.20	1.36	42.68	20	<0.005	<0.005.
Ck 1/9	37.20	42.24	3.04	1.02	33.60	30	<0.005	<0.005
Ck 1/10	40.24	43.40	3.16	2.04	64.56	30	0.005	<0.005
Ck 1/11	71.88	72.66	0.78	0.69	88.46	25	<0.005	<0.005.
Ck 1/12	72.66	75.14	2.48	2.26.	91.13	75	<0.005	<0.005.
Ck 1/13	75.14	76.27	1.13	1.13	100	65	0.005	<0.005
Ck 1/14.	82.76	84.70	1.94	1.77	91.24	285	<0.005	<0.005
Ck. 1/15	84.70	86.59	1.89	1.77	93.65	625	<0.005	<0.005.
Ck. 1/16.	90.24	92.76	2.52	0.99	39.29	20	<0.005	<0.005
Ck. 1/17	92.76	95.08	2.32	1.02	43.97	20	<0.005	<0.005
				DETECTION LIMIT.		ppm 5	ppm 0.005	ppm 0.005
				ANALABS. ANALYTICAL METHOD.		101.	313	337

C. W. DAVIS. EXPLORATION LICENCE 30/86.

071

799071

DRILL SAMPLE ASSAY RECORD. COPPER KING MINE.

HOLE. N° Ck. N°2. DRILLED BY :- MINES DEPT.

DEPTH DRILLED. 73·17m ASSAYED BY ANALABS. PAGE. N°. 1/1

SAMPLE NUMBER.	DEPTH DRILLED FROM (m)	DEPTH DRILLED TO (m)	INTERVAL DRILLED (m)	ACTUAL CORE (m)	CORE RECOVERY. %	ASSAYS Cu	Au	Pt
Ck 2/1	14·18	16·00	1·82	1·82	100	40	0·006	<0·005.
Ck 2/2	16·00	17·69	1·69	1·03	60·95	35	0·016	<0·005
Ck 2/3	17·69	19·14	1·45	0·63	43·45	25	<0·005	<0·005
Ck 2/4	19·14	19·65	0·51	0·51	100	10	<0·005	<0·005
Ck 2/5	19·65	23·11.	3·46	0·84	24·28	15	0·015	<0·005
Ck 2/6	48·02	49·70	1·68	1·68	100	20	<0·005	<0·005
Ck 2/7	49·70	51·45	1·75	1·75	100	25	<0·005	<0·005
Ck 2/8	65·24	67·07	1·83	1·83	100	50	<0·005	<0·005
Ck 2/9.	67·07	68·27	1·20	1·20	100	250	<0·005	<0·005
Ck 2/10	68·27	69·82	1·02	1·02	100	105	<0·005	<0·005
Ck 2/11	69·82	71·59	1·77	1·65	93·22.	40	<0·005	<0·005
Ck 2/12	71·59.	73·17.	1·58	0·58	36·71.	20.	<0·005	<0·005
				DETECTION LIMIT.		ppm 5	ppm 0·005	ppm 0·005
				ANALABS. ANALYTICAL METHOD.		101	313	387.

C. W. DAVIS. EXPLORATION LICENCE 30/86.

072

799072

DRILL SAMPLE ASSAY RECORD. COPPER KING MINE.

HOLE. N° Ck. N° 3. DRILLED BY :- DEPT. OF MINES

DEPTH DRILLED. 67.45m. ASSAYED BY ANALABS. PAGE. N° 1/1

SAMPLE NUMBER.	DEPTH DRILLED FROM (m)	DEPTH DRILLED TO (m)	INTERVAL DRILLED (m)	ACTUAL CORE (m)	CORE RECOVERY %	ASSAYS Cu	Au	Pt
Ck 3/1	3.66	7.62	3.96	2.41	60.86	240	0.015	<0.005
Ck 3/2.	7.62	16.01	8.39	0.82	9.77	225	0.050	<0.005
Ck 3/3	16.01	16.60	0.69.	0.50	84.75	90	<0.005	<0.005.
Ck 3/4	16.60	17.58	0.98	0.96	97.96	65	<0.005	<0.005
Ck 3/5	17.58	18.99	1.41	1.10	78.01	120	0.005	<0.005
Ck 3/6	18.99	21.27	2.28	1.59	69.74	325	0.020	<0.005
Ck 3/7	21.27	22.87	1.60	1.57	98.13	50	<0.005	<0.005
Ck. 3/8	22.87	24.47	1.60	1.49	93.13	60	<0.005	<0.005
Ck. 3/9	24.47	25.91	1.44	1.39	96.53	45	<0.005	<0.005
Ck. 3/10	25.91	27.45	1.54	1.52	98.70	255	<0.005	<0.005
Ck. 3/11.	27.45	29.31	1.86	1.86	100	2300	<0.005	<0.005
Ck. 3/12	29.31	30.79	1.48	1.48	100	25	<0.005	<0.005
Ck. 3/13	34.03	34.60	0.57	0.57	100	45	<0.005	<0.005
Ck. 3/14	34.60	37.04	2.44	1.74	71.31	40	<0.005	<0.005
DETECTION LIMIT.						ppm 5	ppm 0.005	ppm 0.005
ANALABS. ANALYTICAL METHOD.						101	313	237

073 C.W. DAVIS E.L. 30/86 CUPRONA, N.W. TASMANIA.

799073

RELOG - DEPT OF MINES DRILL HOLE.

HOLE N° - CK. N° 1

DEPTH - 95.05 m

DEPTH (m) FROM	TO	RUN (m)	LITHOLOGICAL DESCRIPTION.
0.00	5.49	5.49	NO CORE.
5.49	7.87	2.38	QUARTZITIC SANDSTONE. WEATHERED, LIGHT ORANGE BROWN CLEAVED. 5.48 - 6.40 - MORE INDURATED 6.40 - 7.54 - SOFT, WEATHERED, RUBBLY.
7.87	11.66.	3.79.	GRAPHITIC SHALES MEDIUM GREY, FINELY LAMINATED CLEAVAGES/LAMINATIONS REGULAR 50-55° FINE QUARTZ VEINING, MINOR PYRITE.
11.66	12.35.	0.69.	QUARTZITE RUBBLE/SHALE.
12.35	15.49	3.14.	QUARTZITE LIGHT/MEDIUM GREY. HARD, INDURATED. 2 PHASES QUARTZ VEINING, LATER STAGE BETTER DEVELOPED AND FERRUGINOUS. LITTLE PYRITE, CHALCOPYRITE, SIDERITE.
15.49	17.84	2.35	N/c. MEDIUM GREY SILT/SAND SLUDGE.
17.84	18.06.	0.22	QUARTZITE/GRAPHITIC SHALE. ZONE. INDURATED. DISSEMINATED PYRITE, CHALCOPYRITE
18.06	18.90	0.84.	QUARTZITE MATERIAL + QUARTZ VEIN RUBBLE POOR CORE RECOVERY. SULPHIDES PRESENT
18.90	21.03	2.13	SLUDGE. LIGHT/MEDIUM GREY SILT/SAND
21.03	22.87.	1.84	SHALE/QUARTZITE UNIT, LATTER PREDOMINATES. MEDIUM TO DARK GREY. SHALE MATERIAL WELL CLEAVED QUARTZITIC BANDS NARROW (6") WITH QTZ VEINING.

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074

HOLE. N° CK N° 1.

PAGE 2/3

799074

DEPTH (m) FROM	TO	RUN (m)	LITHOLOGICAL DESCRIPTION.
22.87 -	26.82	3.95.	SHALES MEDIUM TO DARK GREY. FINE GRAINED., NOT TOO WELL CLEAVED VERY MINOR PYRITE.
26.82	30.79	3.97.	QUARTZITE, LIGHT, MEDIUM GREY. MINOR QUARTZ VEINING. NO MINERALISATION.
30.79	31.98	1.19.	SLUDGE. LIGHT GREY SAND, SILT.
31.98	33.93	1.95	90% SLUDGE +'FOREIGN' PEBBLES.
33.93	35.98	2.05.	SHALES LIGHT/MEDIUM GREY CLEAVED (15°) LITTLE PYRITE ALONG BEDDING.
35.98	41.60	77.58.	SHALES EXTREMELY WELL LAMINATED LIGHT/MEDIUM GREY., SOFT, OXIDISED. SLUDGE/SAND ZONES COMMON - 37.5 - 38.72m.
41.60	43.32	1.72	GREY SHALES. AS ABOVE, BUT SLIGHTLY LESS CLEAVED + MORE MASSIVE CARBONATE VEINING. LITTLE PYRITE
43.32 -	43.90	0.58.	SLUDGE - GREY SAND - SILT.
43.90	50.00	6.10.	SHALES. LAMINATED, DARK GREY. WEATHERED IN SECTIONS. SLUDGE HORIZON - 46.91 - 47.56. LITTLE CARBONATE VEINING
50.00 -	71.88	21.88	SLUDGE SILT/SAND, LIGHT, MEDIUM GREY.
71.88 -	72.63	0.75	GRAPHITIC SHALES/SLATES. INDURATED, SILICIFIED MEDIUM TO DARK GREY BANDED FOLIATED 33°., BUT SLIGHTLY CONTORTED GRADES LITHOLOGICALLY TO UNDERLYING ARENACEOUS UNIT

075

HOLE N° CK N° 1

PAGE 3/3

799075

DEPTH (m) FROM	TO	RUN (m)	LITHOLOGICAL DESCRIPTION.
72.63	73.92.	1.29.	SANDSTONE HARD, INDURATED FERRUGINOUS. VARIEGATED COLORATION, BUT PURPLISH-BROWN PREDOMINATES FINE/MEDIUM GRAIN TEXTURE.
73.92	76.98.	3.06.	SANDSTONE LIGHT BROWN/FAWN, POROUS. SLIGHT DISCOLORATION OTHERWISE LITHOLOGICALLY SIMILAR TO ABOVE.
76.98	77.67	0.69	SANDSTONE. INDURATED, FERRUGINOUS, PURPLISH BROWN. @ 77.67 to 77.82, FAULTED CONTACT ALONG CORE AXIS
77.67	82.85	5.18	GRAPHITIC SHALE LIGHT GREY INDURATED, BUT EXT. WELL BANDED. 35-45° LINEATION - CORE AXIS REGULAR BANDING + CONSISTENTLY DEVELOPED LIGHT/GREY QUARTZITIC MEMBERS. NO VEINING
82.85 -	84.22.	1.37	QUARTZITE HARD, LIGHT GREY. CARBONATE/QUARTZ VEINING INTERMITTENT LITTLE PYRITE
84.22	84.76	0.54	QUARTZ VEIN DEVELOPMENT IN QUARTZITE. TWO STAGES. QUARTZ SIDERITE AND SOME DISSEMINATED PYRITE/CHALCOPYRITE
84.76	95.05.	10.29	QUARTZITE LIGHT GREY, MEDIUM. SOME QUARTZ-CARBONATE VEINING, MOST PRONOUNCED OVER LAST 3m OF HOLE. NO VISIBLE SULPHIDES HARD INDURATED

END OF HOLE = 95.05m

PAGE N° 3/3

076

C.W. DAVIS E.L. 30/86 CUPRONA, N.W. TASMANIA.

799076

RELOG - DEPT OF MINES DRILL HOLE.

HOLE N° - Ck. N° 2.

DEPTH - 73.17m.

DEPTH (m) FROM	TO	RUN (m)	LITHOLOGICAL DESCRIPTION
0.00	6.098	6.098	RUBBLE, CONTAINS A FEW FRAGMENTS/PEBBLES OF QUARTZ VEIN MATERIAL REMAINDER QUARTZITE/GRAPHITIC SLATE RUBBLE.
6.098.	10.21	4.112.	SHALES. FINELY LAMINATED, PARTIALLY WEATHERED DARK TO MEDIUM GREY SHALES WELL CLEAVED, 75-90° LINEATION. GRAPHITIC IN SECTIONS. NO QUARTZ VEINING.
10.21	10.29	0.08	QUARTZ VEIN IRON STAINED, FINE GRAINED, PYRITE
10.29	10.77.	0.48	SHALES AS ABOVE DARK TO MEDIUM GREY SHALES FINELY LAMINATED.
10.77	12.24	1.47	SHALES AND BANDED SHALES WITH GREY QUARTZITES, FAIRLY WELL LAMINATED STUDDED WITH NARROW (< 1/4") QUARTZ STRINGER, IMPREGNATED WITH IRON NO DOMINANT VEIN DIRECTION.
12.24	14.18	1.93.	GRAPHITIC SHALES. DARK GREYISH/BLACK, WELL LAMINATED, GRAPHITIC, SOFT FINE GRAINED. ONLY A LITTLE QUARTZITIC BANDING NO QUARTZ VEINING. GRADUALLY BECOMING LESS WELL LAMINATED WITH DEPTH OF RUN

077

HOLE N° Ck N°2

PAGE N° 2/4

799077

DEPTH (m) FROM	TO	RUN (m)	LITHOLOGICAL DESCRIPTION.
14·18	17·69	3·51.	GRAPHITIC SHALES + SILTS. POOR REC AFTER 15·69m MED/DARK GREY MORE HOMOGENEOUS AND INDURATED THAN PREVIOUS CRISS-CROSSING QUARTZ VEINS, NARROW, ⅛" IMPREGNATION
17·69	19·14	1·45	PYRITE RICH SHALES - QUARTZITES., GRADING INTO UNDERLYING MED TO LIGHT GREY HOMOGENEOUS QUARTZITES. VEINLETS OF FINE PYRITE ALONG FRACTURES AND CLEAVAGE. INCLUDED ARE SOFT SHATTER ZONES - WITH SULPHIDE.
19·14	19·65	0·51.	FINE GRAINED HOMOGENEOUS LIGHT GREY QUARTZITE. RIDDLED WITH PYRITE RICH STRINGERS + BLEBS FINE QUARTZ STRINGER COMMON - ALSO ASSOC SULPHIDE. LAST 0·08m - QUARTZ VEIN.
19·65	23·11	3·46	SHALES/QUARTZITE MEDIUM GREY, MORE ARENACEOUS THAN SHALEY FEW CRISS-CROSS QUARTZ VEINS NO PYRITE VISIBLE, ALTHOUGH QUARTZ VEINING (1/16-1/2") COMMON.
23·11	24·70	1·59.	FINELY LAMINATED BLACK GRAPHITIC SHALES.
24·70	29·57	4·87.	SLUDGE BLACK / MEDIUM TO DARK GREY SILTY SLUDGE
29·57	36·28	6·71.	AS ABOVE, MAINLY DARKISH COLOURED SLUDGE, REPRESENTING DECOMPOSED ALTERED SHALES

078

HOLE N° CK N°2

PAGE N° 3/4

799078

DEPTH (m) FROM	TO	RUN (m)	LITHOLOGICAL DESCRIPTION.
36.28	41.62	5.34.	GRAPHITIC SHALES. FINELY LAMINATED DARK GREY/BLACKISH SHALES WITH SOME MINOR SILT/SAND UNITS (EG. 39.63 TO. 40.32m) ONLY LITTLE QUARTZ VEINING/STRINGERS. SHALES HIGHLY CONTORTED.
41.62	48.02.	6.40.	SHALES MORE HOMOGENEOUS, LESS LAMINATED BLACK, SOME CONTORTED FINE GRAIN BANDING APPARENT. NO QUARTZ VEINING.
48.02	51.45.	3.43.	AS ABOVE, HOMOGENEOUS SHALES, BUT WITH QUARTZ STRINGERS ALONG CONTORTIONS/FRACTURES. NO PYRITE VISIBLE.
51.45	52.41	0.96.	BLACK/DARK GREY LAMINATED SHALES CLEAVED 70/75°, GRAPHITIC.
52.41	55.30	2.89	SHALES. BLACKISH/DARK GREY HOMOGENEOUS VERY NARROW, WIDELY DIST QUARTZ VEIN MATERIAL 53.20 - 53.81 m QUARTZ VEINING, NO SULPHIDES
55.30	61.59	6.29.	SLUDGE FINE, MEDIUM GREY SAND/SILT
61.59	65.24	3.65	NO CORE/SLUDGE ONLY.

079

HOLE N° CR N°2

PAGE N° 4/4.

799079

DEPTH (m) FROM	TO	RUN (m)	LITHOLOGICAL DESCRIPTION.
65.24	68.90	3.66	QUARTZITE MED/LIGHT GREY, HARD INDURATED. HOMOGENEOUS, NOT CLEAVED, LAMINATED TWO PERIODS OF QUARTZ VEINING.
68.90	70.43	1.53.	SLATES/QUARTZITES HARD INDURATED CONTORTED LIGHT/MED GREY BANDING CONTORTED, BUT OVERALL 45° DIP. QUARTZ STRINGERS - DISTORTED
70.43	71.59.	1.16.	QUARTZITE, MASSIVE, LIGHT GREY, HOMOGENEOUS
71.59	73.17	1.58.	SLATES/QUARTZITES.

END OF HOLE 73.17m.

PAGE N° 4/4

080

C.W. DAVIS. E.L. 30/86. CUPRONA, N.W. TASMANIA.

799080

RELOG - DEPT OF MINES DRILL HOLE.

HOLE N° - CK N° 3.

DEPTH - 57.45m

DEPTH (m) FROM	TO	RUN (m)	LITHOLOGICAL DESCRIPTION.
0.00	3.66	3.66.	NO RECOVERY.
3.66	7.62	3.96.	SHALES, GRAPHITIC FINE LAMINATED, BLACK + GREY. INTERBEDDED WITH THIN QUARTZITIC ZONES.
7.62	16.59	8.97	SHALES. AS ABOVE, BUT MORE INDURATED CONTORTED SOME QUARTZ/CARBONATE INFILLINGS/FRACTURES. FEW SULPHIDES
16.59	19.03	2.44	QUARTZOSE ZONE. HARD QUARTZITE WITH QUARTZ/CARBONATE VEINS, CONTAINING PYRITE/CHALCOPYRITE.
19.03	21.20	2.17	QUARTZITE AS ABOVE, BUT MORE ABUNDANT CARBONATE + QUARTZ VEINING. MINOR SULPHIDES PRESENT - PYRITE, CHALCOPYRITE, BORNITE.
21.20	22.87	1.67	SHALES + QUARTZITES. MEDIUM GREY COLOUR. QUITE INDURATED AND BANDED, BUT SOME ZONES BRECCIATED + FRACTURED. TRACES OF CHALCOPYRITE AND PYRITE.
22.87	23.64	0.77.	QUARTZITE BANDED, MEDIUM GREY, WITH SHALE PARTINGS
23.64	24.47	0.83	QUARTZITE CONTORTED, BRECCIATED, ALTERED. QUARTZ/CARBONATE VEINING, LITTLE SULPHIDES
24.47	26.19	1.72	QUARTZITE. LIGHT GREY, MASSIVE, WITH MINOR SHALE PARTINGS AND CAVITIES. CARBONATE/QUARTZ STRINGERS. LEACHING COMMON.
26.19 -	29.31	3.12.	SHALES. MEDIUM GREY, MODERATELY INDURATED, BUT CONTORTED SHALES. CARBONATE VEINING ALONG BANDING, WITH OCCASIONAL TO COMMON PYRITES.

081

HOLE N° CK N° 3.

799081

DEPTH (m) FROM	TO	RUN (m)	LITHOLOGICAL DESCRIPTION
29.31	34.22	4.91	QUARTZITE GREY, HOMOGENEOUS, MASSIVE QUARTZ VEINING AT 29.31 – 29.56m
34.22	36.51	2.29.	SHALES LIGHT/MEDIUM GREY BANDED SHALES LINEATIONS 55-65° CORE AXIS SOME MINOR QUARTZITIC LAYERS
36.51	40.08	3.57	QUARTZITE LIGHT/MEDIUM GREY QUARTZITE WITH MINOR SHALE PARTINGS CARBONATE/QUARTZ VEINING, ESPECIALLY 37.04 TO 37.35m. NO SULPHIDES.
40.08	40.24	0.16.	SHALE UNIT LAMINATED
40.24	42.73	2.49	GREY QUARTZITE CARBONATE/QUARTZ VEINS.
42.73	44.85	2.12	SHALE ZONE SOMEWHAT CONTORTED/BRECCIATED
44.85	45.78	0.93.	QUARTZITE MASSIVE, HOMOGENEOUS.
45.78	46.97.	1.19.	GRAPHITIC SHALE. LIGHT GREY.
46.97	48.05	1.08	BRECCIATED QUARTZITE.
48.05	49.27	1.22	NO CORE
49.27	52.36	3.07	SHALES/SLATE. WELL BANDED, VARIEGATED COLOURS 75°-85° LINEATIONS., ALTHOUGH CONTORTED LOCALLY
52.36	52.59	0.23	QUARTZITE, GREY, MASSIVE.
52.59	57.45	4.86.	SHALES/SLATES, BANDED, CONTORTED NO SULPHIDES

END OF HOLE – 57.45m

082

HOLE N° Ck N°4.

PAGE 2/2.

799082

DEPTH (m) FROM	TO	RUN(m)	LITHOLOGICAL DESCRIPTION.
27.52	32.01	4.49.	SHALE VERY SLABBY AND FRAGMENTARY. DARK GREY. PYRITE ALONG BEDDING.
32.01	32.24	0.23.	VEINED QUARTZ/SIDERITE.
32.24.	35.98.	3.74	SHALES. VERY SLABBY, FRAGMENTARY, BLACK, LAMINATED. NO STRINGERS, VEINING
35.98	38.26	2.28	SHALES MORE HOMOGENEOUS, BLACK TO DARK GREY. NOT LAMINATED NO VEINING.
38.26	38.81	0.55	SHALES BLACK SHALES ACCOMPANIED WITH QUARTZ AND CARBONATE VEINING. SULPHIDES DISSEM.
38.81	41.45	2.64.	SHALES HOMOGENEOUS, MASSIVE, IMPREGNATED WITH FINE QUARTZ/CARBONATE VEINING.
41.45.	44.65	3.20	SHALES AS PREVIOUS RUN, BUT MORE MASSIVE, HARD AND INDURATED.
44.65	46.98	2.33	SHALES LIGHT TO MEDIUM GREY COLOURED OXIDISED. LAMINATED AND BRECCIATED.
46.98	48.69	1.71.	SHALES. BLACKISH / DARK GREY. MINOR IMPREGNATIONS / STRINGERS CARB + QUARTZ.
48.69	51.62.	2.82.	SHALES, BLOCKY, UNOXIDISED, BLACK
51.62	53.66	2.14	SHALES, AS PER PREVIOUS RUN, WITH FEW MINOR SIDERITE) QUARTZ VEINS.
58.66	59.59	5.93	SHALES, GRAPHITIC, BLACK FRAGMENTARY. DISSEM PYRITE?
59.59	60.65	1.06	NO RECOVERY

END OF HOLE 6065m

PAGE N° 2/2

083 C.W. DAVIS E.L 30/86 CUPRONA, N.W. TASMANIA. 799083

RELOG - DEPT OF MINES DRILL HOLE.

HOLE N° CK N° 4. DEPTH 60.65m.

DEPTH (m) FROM	TO	RUN(m)	LITHOLOGICAL DESCRIPTION.
0.00	3.05	3.05	QUARTZITE, SHALE AND QUARTZ VEIN RUBBLE. ONLY POOR RECOVERY. (4.59%)
3.05	4.88	1.83	SHALES. FERRUGINOUS WEATHERED BLACK SHALES, SLIGHTLY CONTORTED.
4.88	6.86	1.98	SHALES BLACK LAMINATED SHALES, WITH QUARTZ, CARBONATE VEINLETS/STRINGERS. PYRITE DISSEM.
6.86	9.27	2.41	SHALES. LESS FINELY LAMINATED, MORE SLABBY EXTENSIVE CARBONATE/QUARTZ VEINLETS. SOME DISSEMINATED PYRITE. QUARTZ VEIN (2-3cm) @ 8.54m.
9.27	12.99	3.72.	SHALES. SLABBY BLACK TO DARK GREY INDURATED SHALES WELL LAMINATED. SOME FINE DISSEMINATED PYRITE.
12.99.	14.48	1.49	SHALES. INDURATED AND MORE HOMOGENEOUS, LESS SLABBY.
14.48	17.07	2.59.	SHALES CONTORTED AND HIGHLY BRECCIATED + PYRITE
17.07	22.26.	5.19	SHALES AS PREVIOUS RUN, BUT VERY CONTORTED, AND ACCOMPANIED BY EXCESSIVE CARBONATE VEINING QUARTZ VEINING BETWEEN 19.05 - 19.20m SOME OF SHALES/CARB VEINING IS OXIDISED/LEACHED SOME SULPHIDES (SLIGHT) ALONG BEDDING PLANES.
22.26	27.52	5.26	SHALES. BLOCKY, SLABBY, POOR CORE RECOVERY 25%. DISSEMINATED PYRITE 26.63 - 27.43m.

084

799084

ASSAY RECORD

Appendix 4

SHEET 4A

E. L. 30/86 - C. W. DAVIS

LOCATION - COPPER KING MINE REGION
- PLAN REF No. - 7/88
- NO. OF SAMPLES- 12
- Bulk Sample (Cyanide Leach) Samples

SAMPLE NO.		WT. (kg)		ASSAYS. ppb Au.
CK 100	-	7.8	-	<0.005 ? ~0.05
CK 101	-	8.6	-	0.21
CK 102	-	8.3	-	<0.05
CK 103	-	9.4	-	0.86
CK 104	-	9.5	-	<0.05
CK 105	-	8.7	-	<0.05
CK 106	-	8.5	-	<0.05
CK 107	-	9.3	-	<0.05
CK 108	-	8.6	-	0.23
CK 109	-	7.9	-	<0.05
CK 110	-	9.5	-	0.24
CK 111	-	9.4	-	<0.05

Det Limit 0.05ppb
Method 328 AA

ANALABS
Report No. 999.31.08.04909.
Date 26/11/87.

085

799085

ASSAY RECORD
SHEET 4B

E. L. 30/86 - C. W. DAVIS

LOCATION - E. L. 30/86, Regional Sampling
- Bulk Sample (Cyanide Leach Sample)
- Plan Ref. No. - 3/88
- No. of Samples - 11

SAMPLE NO.	Au (ppb)	DRY WT. (kg)
C.BCL 20	- < 0.05	5.0
C.BCL 21	- < 0.05	5.0
C.BCL 22	- 0.23	5.0
C.BCL 23	- 0.13	5.0
C.BCL 24	- 0.14	5.0
C.BCL 25	- < 0.05	5.0
C.BCL 26	- < 0.05	5.0
C.BCL 27	- < 0.05	5.0
C.BCL 28	- < 0.05	5.0
C.BCL 29	- < 0.05	5.0
C.BCL 30	- < 0.05	5.0
	Detection Limit 0.05ppb	0.1Kg
	Method 328	328

ANALABS
Report No. - 999.31.08 05122.
Date - 15/2/88

086

799086

ASSAY RECORD
SHEET 4C

E. L. 30/86 - C. W. DAVIS

LOCATION - Copper King - Cuprona Region.
- Pan Concentrate S/Sed. - Pickands Mather Grid.
- Plan Ref. No. 7/88.
- No. of Samples - 12.

SAMPLE NO.		ASSAY - As(ppm)
CK 50	-	12
CK 51	-	40
CK 52	-	12
CK 53	-	58
CK 54	-	49
CK 55	-	15
CK 56	-	9
CK 57	-	11
CK 58	-	11
CK 59	-	18
CK 60	-	3
CK 61	-	16

Detection Limit 1ppm
Method 114

AA

ANALABS

Report No. - 999.31.08. 04918.
Date - 19/11/87

087

799087

ASSAY RECORD

Sheet 4D

E. L. 30/86 - C. W. DAVIS

LOCATION - E. L. 30/86, REGIONAL.

- Pan Concentrate Samples
- Plan Ref. No. 4/88
- No. Of Samples = 21

SAMPLE NO.	ASSAY				
	Au (ppm)	Pt (ppm)	WO_3 (ppm)	Sn (ppm)	Wgt gms
C.PC.01	<0.001	<0.008	<10	14	33.8
C.PC.02	<0.001	<0.008	33	16	71.3
C.PC.03	<0.001	<0.008	<10	12	58.9
C.PC.04	<0.001	<0.008	79	< 3	52.9
C.PC.05	<0.001	<0.008	<10	18	83.5
C.PC.06	<0.001	<0.008	<10	3	45.0
C.PC.07	<0.001	<0.008	<10	54	84.5
C.PC.08	<0.001	<0.008	<10	5	67.8
C.PC.09	<0.001	<0.008	<10	6	74.6
C.PC.10	<0.001	<0.008	363	46	162.7
C.PC.11	<0.001	<0.008	<10	< 3	104.2
C.PC.12	<0.001	<0.008	<10	< 3	88.4
C.PC.13	<0.001	<0.008	26	9	105.0
C.PC.14	<0.001	<0.008	<10	5	77.8
C.PC.15	<0.001	<0.008	<10	9	124.5
C.PC.16	<0.001	<0.008	<10	17	123.0
C.PC.30	<0.001	<0.008	55	31	54.9
C.PC.31	0.100	<0.008	79	60	60.3
C.PC32	<0.001	<0.008	<10	12	69.2
C.PC.33	<0.001	<0.008	14	8	42.0
C.PC.34	<0.001	<0.008	<10	5	50.0
Detection Limit	0.001	0.008	10	3	0.1
Units	ppm	ppm	ppm	ppm	gms

Analabs - Report No. - 991.31.08.05122

- Date 15/2/88

088

799088

ASSAY RECORD

Sheet 4 E

E. L. 30/86 - C. W. DAVIS

LOCATION - COPPER KING - CUPRONA REGION
- Soil Samples (Pickands Mather Grid)
- Plan Ref. No. 7/88
- No. Of Samples - 14

Sample No		Assay As ppm
CK.SS 1	-	12
CK.SS 2	-	16
CK.SS 3	-	11
CK.SS 4	-	15
CK.SS 5	-	8
CK.SS 6	-	13
CK.SS 7	-	6
CK.SS 8	-	4
CK.SS 9	-	6
CK.SS 10	-	9
CK.SS 11	-	5
CK.SS 12	-	10
CK.SS 13	-	6
CK.SS 14	-	5

Detection Limit - 1 ppm

Method - 114

Analabs -

Report No. - 999.31.08.04918

Date - 19/11/87

089

799089

ASSAY RECORD

Sheet 4F

E. L. 30/86 - C. W. DAVIS

LOCATION - COPPER KING MINE
- Surface Rock Samples
- Plan No. - 8/88

Sample No.	Assays		
	Cu	Au	Pt
	ppm	ppm	ppm
R.S. 08	46500	0.025	< 0.005
R.S. 10	4200	0.035	< 0.005
R.S. 16	275	0.005	< 0.005
Detection Limit	5	0.005	0.005
Method	101	313	337

Analabs -
Report No - 999.31.08.04753
Report Date- 29/9/87

090

799090

ASSAY RECORD

Sheet 4G

E.L. 30/86 - C. W. DAVIS

LOCATION - COPPER KING MINE
- Mine Adit Samples (15 Samples)
- Plan Ref. No. 8/88

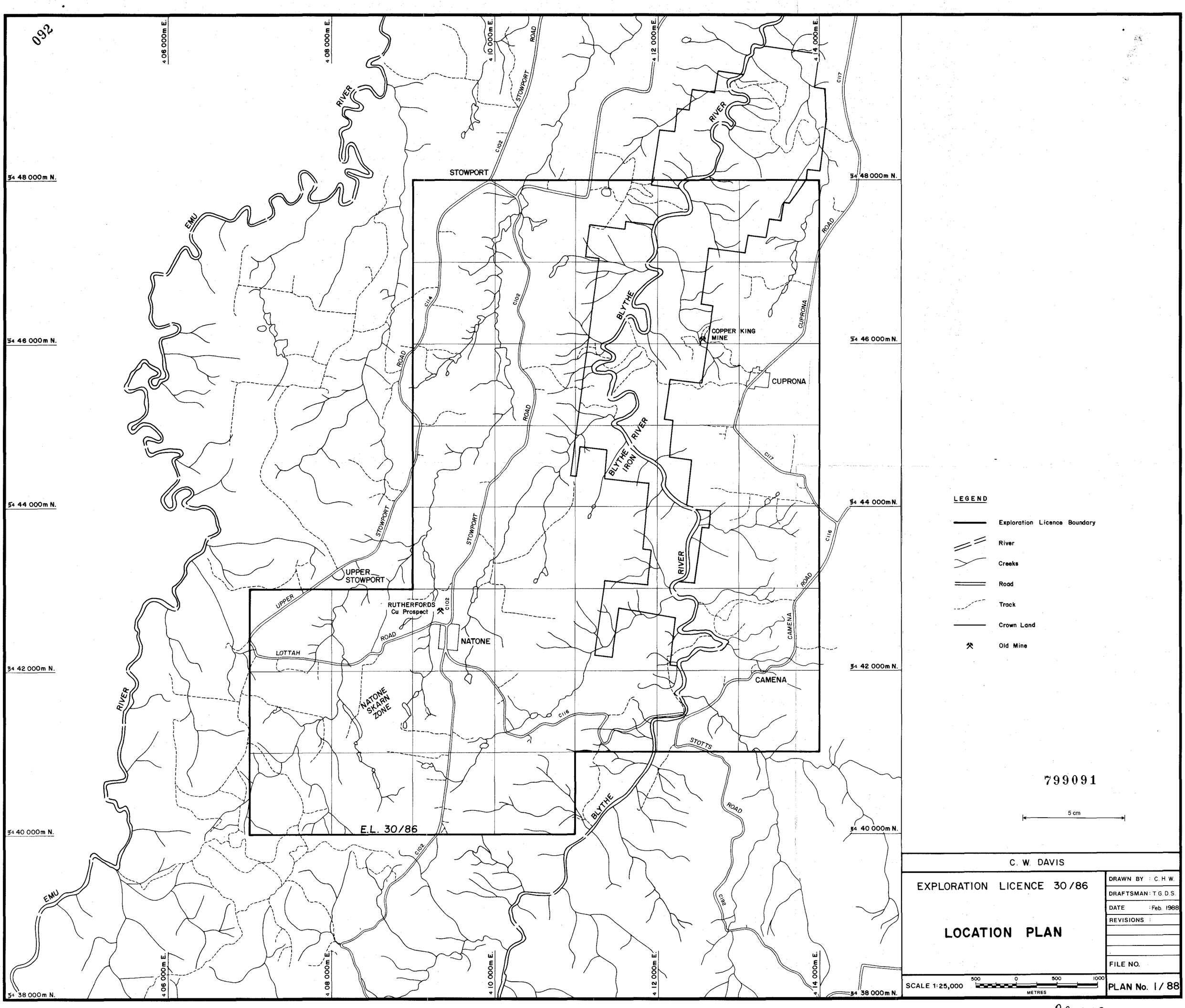
Sample No.		Assays Cu ppm	Au ppm	Pt ppm
CM 0.00 - 1.00	-	925	0.015	<0.005
CM 1.00 - 2.00	-	170	0.010	<0.005
CM 2.00 - 3.00	-	135	<0.005	<0.005
CM 3.00 - 4.00	-	410	0.020	<0.005
CM 4.00 - 5.00	-	545	0.045	<0.005
CM 5.00 - 6.00	-	29500	0.035	<0.005
CM 6.00 - 7.00	-	4300	0.040	<0.005
CM 7.00 - 8.00	-	330	0.005	<0.005
CM 8.00 - 9.00	-	705	0.010	<0.005
CM 9.00 - 10.00	-	630	0.015	<0.005
CM10.00 - 11.00	-	170	0.010	<0.005
CM11.00 - 12.00	-	665	0.015	<0.005
CM12.00 - 13.00	-	235	0.025	<0.005
CM13.00 - 14.00	-	170	0.055	<0.005
CM14.00 - 15.00	-	190	0.015	<0.005
Detection	-	5	0.005	0.005
Method	-	101	313	337

Analabs-

Report No. 999.31.08.04753

Report Date - 29/09/87

092



LEGEND

- Exploration Licence Boundary
- River
- Creeks
- Road
- Track
- Crown Land
- Old Mine

799091

5 cm

C. W. DAVIS

EXPLORATION LICENCE 30/86

LOCATION PLAN

DRAWN BY	C.H.W.
DRAFTSMAN	T.G.D.S.
DATE	Feb. 1988
REVISIONS	
FILE NO.	

SCALE 1:25,000 — 500 0 500 1000 METRES

PLAN No. 1/88

88-2791

093

406 000m E. 408 000m E. 410 000m E. 412 000m E. 414 000m E.

34 48 000m N. 34 46 000m N. 34 44 000m N. 34 42 000m N. 34 40 000m N. 34 38 000m N.

STOWPORT RIVER EMU UPPER STOWPORT LOTTAH BLYTHE CUPRONA CAMENA STOTTS

ROAD C102 C114 C116 C117 C182

COPPER KING MINE

RUTHERFORDS Cu Prospect

NATONE

E.L. 30/86

Tb Pb Dg Oc Es Qa

LEGEND

QUATERNARY	Qa	Alluvium
TERTIARY	Tb	Basalt
DEVONIAN	Dg	Housetop Granite
ORDOVICAN	Oc	Chert, Conglomerate, Quartzite
CAMBRIAN	Es	Siliceous Siltstone with Haematite
PROTEROZOIC	Pb	Burnie Quartzite / Slate

- Exploration Licence Boundary
- River
- Creeks
- Road
- Track
- Crown Land
- Old Mine / Prospect
- Cu Copper Prospect
- Fe Haematite

799092

5 cm

C. W. DAVIS

EXPLORATION LICENCE 30/86

REGIONAL GEOLOGICAL PLAN

DRAWN BY : C.H.W.
DRAFTSMAN : T.G.D.S.
DATE : Feb. 1988
REVISIONS :
FILE NO.

SCALE 1:25,000 500 0 500 1000 METRES

PLAN No. 2/88

88-2791

4 06 000m E. 4 08 000m E. 4 10 000m E. 4 12 000m E. 4 14 000m E.

34 48 000m N. 34 46 000m N. 34 44 000m N. 34 42 000m N. 34 40 000m N. 34 38 000m N.

EMU RIVER

STOWPORT ROAD C102

STOWPORT

RIVER

C117

STOWPORT

BLYTHE

C114 ROAD

C102

ROAD

CUPRONA ROAD

COPPER KING MINE

CUPRONA

C117

UPPER STOWPORT

UPPER STOWPORT ROAD

RUTHERFORDS Cu Prospect

C102

NATONE

LOTTAH ROAD

RIVER

C116

CAMENA

CAMENA ROAD

C116

STOTTS ROAD

BLYTHE

C102

C192

E.L. 30/86

EMU

20 21 22 23 24 25 26 27 28 29 30 100 101 102 103 104 105 106 107 108 109 110 111

LEGEND

- Exploration Licence Boundary
- River
- Creeks
- Road
- Track
- Crown Land
- Old Mine

X 20 to 30 / 100 to 110 — C.W. Davis BULK STREAM SEDIMENT SAMPLE

799093

5 cm

C. W. DAVIS

EXPLORATION LICENCE 30/86

REGIONAL GEOCHEMICAL SAMPLING

BULK CYANIDE LEACH SAMPLES

SCALE 1:25,000 500 0 500 1000 METRES

DRAWN BY : C.H.W

DRAFTSMAN : T.G.D.S

DATE : Feb. 1988

REVISIONS :

FILE NO.

PLAN No. 3/88

88-2791

406 000m E. 408 000m E. 410 000m E. 412 000m E. 414 000m E.

34 48 000m N. 34 46 000m N. 34 44 000m N. 34 42 000m N. 34 40 000m N. 34 38 000m N.

RIVER EMU STOWPORT ROAD C102 C114 C116 C117 ROAD BLYTHE CUPRONA ROAD CAMENA ROAD STOTTS ROAD C192

STOWPORT

BLYTHE RIVER

COPPER KING MINE

CUPRONA

CAMENA

UPPER STOWPORT

RUTHERFORDS Cu Prospect

NATONE

LOTTAH

E.L. 30/86

LEGEND

- Exploration Licence Boundary
- River
- Creeks
- Road
- Track
- Crown Land
- Old Mine

X 1 to 17, 30 to 34 — C.W. Davis PAN CONCENTRATE STREAM SEDIMENT SAMPLE (Assayed WO_3, Sn, Au, Pt)

799094

5 cm

C. W. DAVIS

EXPLORATION LICENCE 30/86

REGIONAL GEOCHEMICAL SAMPLING

PAN CONCENTRATE SAMPLES

DRAWN BY : C H W
DRAFTSMAN : T G D S
DATE : Feb 1988
REVISIONS :
FILE NO.

SCALE 1:25,000 500 0 500 1000 METRES

PLAN No. 4/88

88-2791

6522

700 N
800 N
900 N
1000 N
1100 N
1200 N
1300 N
1400 N
1500 N
1600 N
1700 N
1800 N
1000 E
1200 E
1400 E
1600 E
1800 E
(8484)
(8628)
(8483)
(8482)
(8481)
(8479)
(8472)
(8471)
HOUSETOP GRANITE
KLEIN FARM
RUTHERFORD FARM
SHEPHERD FARM
CAMBRIDGE FARM
To Upper Stewart
LOTTAH ROAD
To Stewart
To Upper Natone
To Cornelia
C102
NATONE
NT 2
NT 3
NDDH 1
NDDH 2
NDDH 3
A
B
SECTION A-B
62500
63000
63500
64000
64300
64500
65000
66000
29°
60°
40°
41°
34°
Fe
H
L
MN
799095
5 cm

GEOLOGICAL LEGEND

TERTIARY — Basalt
DEVONIAN — Granite
ORDOVICIAN — Conglomerate
CAMBRIAN (Oonah Formation) — Fe Ironstone; Limestone; Silicified Sediments
PRE CAMBRIAN (Burnie Formation) — Shales

GROUND MAGNETICS (SHELL METALS)

62000
63000
63500
64000
65000
66000

Geological Boundary
40° Dip & Strike
Shell Metals Grid (1200 N / 1400 E)

LEGEND

Property Boundary
(8479) Property Title
Property Building
Road
Track
NT 3 Drill Hole - Shell Metals (1982)
NDDH 3 Drill Hole - Minops

C. W. DAVIS

EXPLORATION LICENCE 30/86

NATONE SKARN ZONE

GEOLOGY / GROUND MAGNETICS

SCALE 1:2500 — 50 0 50 100 METRES

DRAWN BY : C.H.W
DRAFTSMAN : T.G.D.S.
DATE : Feb. 1988
REVISIONS :
FILE NO.
PLAN No. 5788

88-2791 6523

700 N 800 N 900 N 1000 N 1100 N 1200 N 1300 N 1400 N 1500 N 1600 N 1700 N 1800 N

1000 E 1200 E 1400 E 1600 E 1800 E

To Upper Stowport

(8484) (8628) (8483) (8482) (8481) (8479) (8472) (8471)

HOUSETOP GRANITE

KLEIN FARM

RUTHERFORD FARM

SHEPHERD FARM

CAMBRIDGE FARM

LOTTAH ROAD

NT 2 (-70°)

NT 3 60°

NDDH 1

NDDH 2

NDDH 3

29°

40°

41°

34°

62500 63000 63500 64000 64300 64500 65000 66000

H L Fe

A B SECTION A-B

To Stowport

NATONE

To Camena

C102

To Upper Natone

MN

799096

5 cm

GEOLOGICAL LEGEND

TERTIARY — Basalt
DEVONIAN — Granite
ORDOVICIAN — Conglomerate
CAMBRIAN (Oonah Formation) — Fe Ironstone; Limestone; Silicified Sediments
PRE CAMBRIAN (Burnie Formation) — Shales

GROUND MAGNETICS (SHELL METALS)

62000 63000 63500 64000 65000 66000

Geological Boundary
40° Dip & Strike
Shell Metals Grid (1200 N / 1400 E)

LEGEND

Property Boundary
(8479) Property Title
Property Building
Road
Track

NT 3 Drill Hole - Shell Metals (1982)
NDDH 3 Drill Hole - Minops

C. W. DAVIS

EXPLORATION LICENCE 30/86

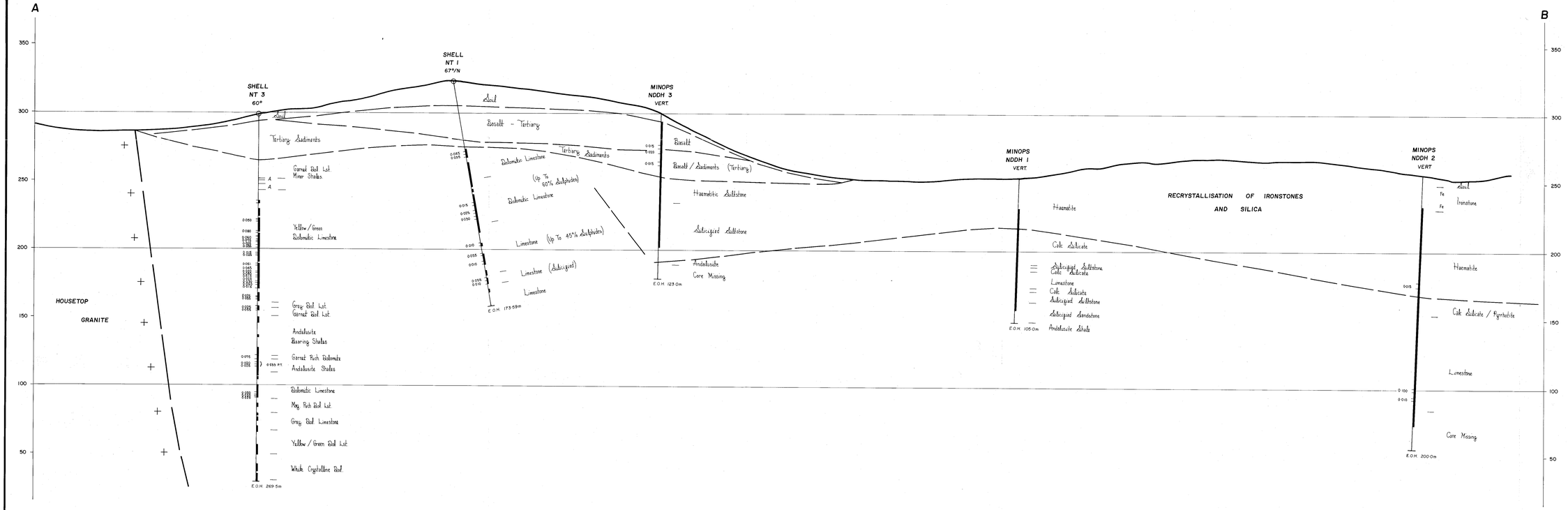
NATONE SKARN ZONE

GEOLOGY / GROUND MAGNETICS

SCALE 1:2500 (50 0 50 100 METRES)

DRAWN BY : C.H.W.
DRAFTSMAN : T.G.D.S.
DATE : Feb. 1988
REVISIONS :
FILE NO.
PLAN No. 5/88

88-2791 6524



LEGEND

Drill Samples Re-assayed C.W. Davis 1987 - Au - Pt

Gold Values (g/ton)

Pt Values (p.p.m)

799097

5 cm

C. W. DAVIS

EXPLORATION LICENCE 30/86

NATONE SKARN ZONE

LONGITUDINAL SECTION

A — B

DRAWN BY : C.H.M.

DRAFTSMAN: T.G.D.S.

DATE : Feb. 1988

REVISIONS :

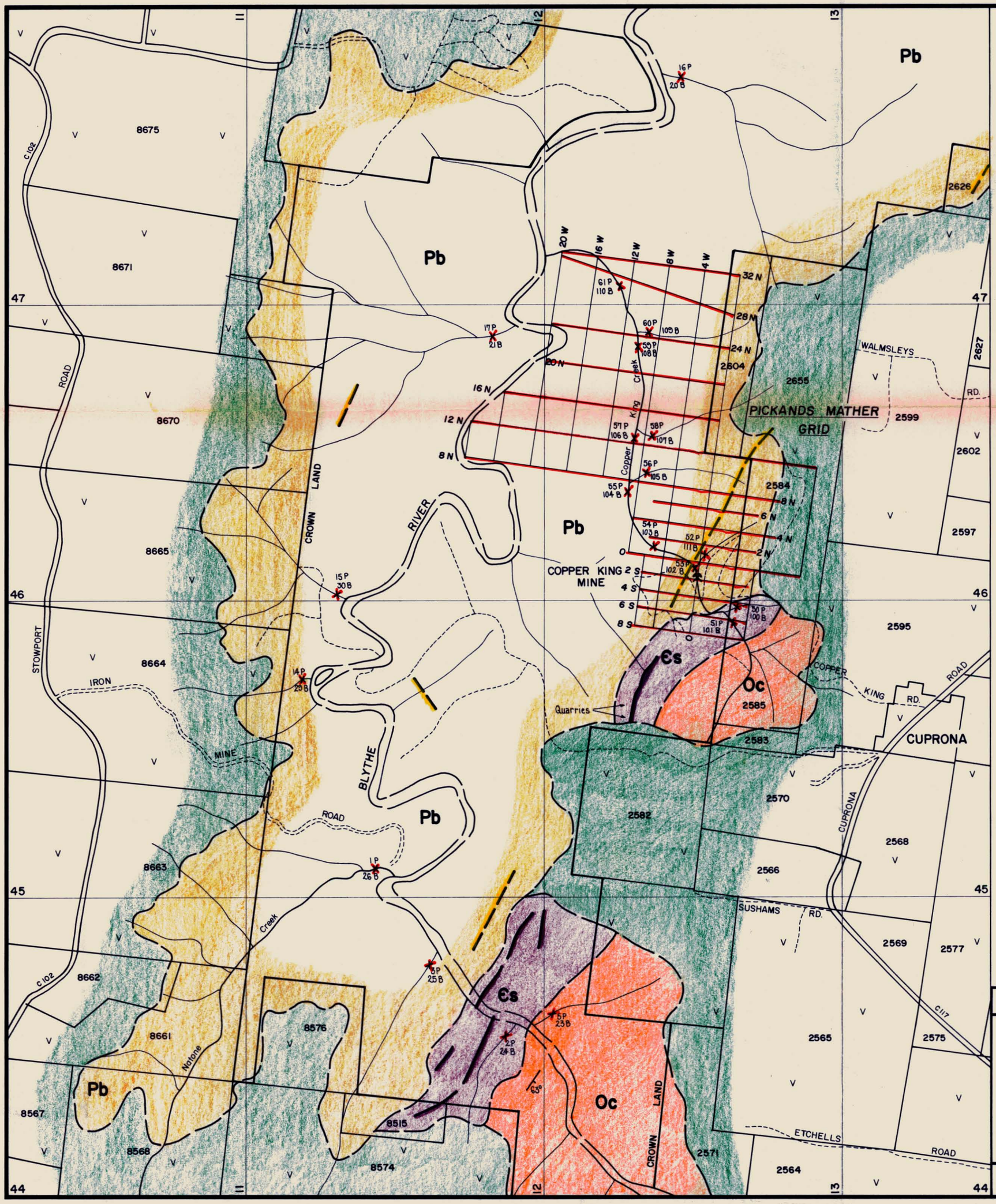
FILE NO.

SCALE 1:1000 — 20 0 20 40 METRES

PLAN No. 6/88

88-2791

6525



LEGEND

TERTIARY	V V	Basalt / Sediments
PROTEROZOIC	Pb	Burnie Formation Quartzite and Slates
CAMBRIAN	Cs	Oonah Formation Siliceous Siltstones Containing Ironstones
ORDOVICIAN	Oc	Conglomerate, Chert, Quartzite

- Copper Lodes
- Haematite Ore
- 63° Dip and Strike
- Mine
- Geological Boundary
- Road
- Track
- 2566 Property and Title No.
- Crown Land
- River
- Creek
- 10P — Pan Concentrate Samples
- 20B — Bulk Stream Sediment (Cyanide Leach Samples)

799098

C. W. DAVIS

EXPLORATION LICENCE 30/86

COPPER KING MINE
CUPRONA REGION

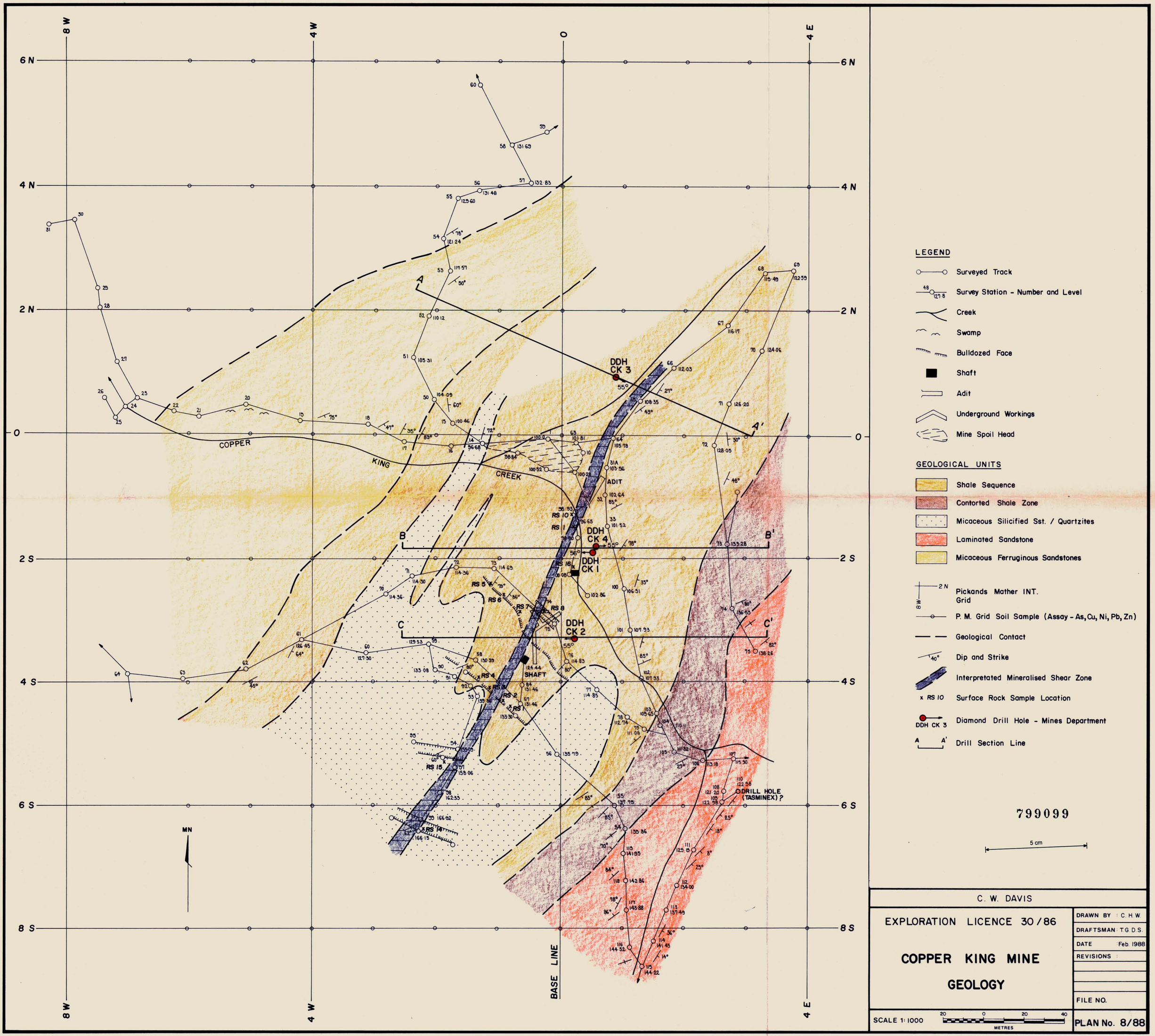
GEOLOGY / GEOCHEMISTRY

SCALE 1:10,000 — 200 0 200 400 METRES

DRAWN BY : C.H.W.
DRAFTSMAN : T.G.D.S.
DATE : Feb. 1988
REVISIONS :
FILE NO.

PLAN No. 7/88

88-2791 6526



LEGEND

- Surveyed Track
- Survey Station - Number and Level
- Creek
- Swamp
- Bulldozed Face
- Shaft
- Adit
- Underground Workings
- Mine Spoil Head

GEOLOGICAL UNITS

- Shale Sequence
- Contorted Shale Zone
- Micaceous Silicified Sst. / Quartzites
- Laminated Sandstone
- Micaceous Ferruginous Sandstones

- Pickands Mather INT. Grid
- P. M. Grid Soil Sample (Assay - As, Cu, Ni, Pb, Zn)
- Geological Contact
- Dip and Strike
- Interpretated Mineralised Shear Zone
- Surface Rock Sample Location
- Diamond Drill Hole - Mines Department
- Drill Section Line

799099

5 cm

C. W. DAVIS

EXPLORATION LICENCE 30/86

COPPER KING MINE

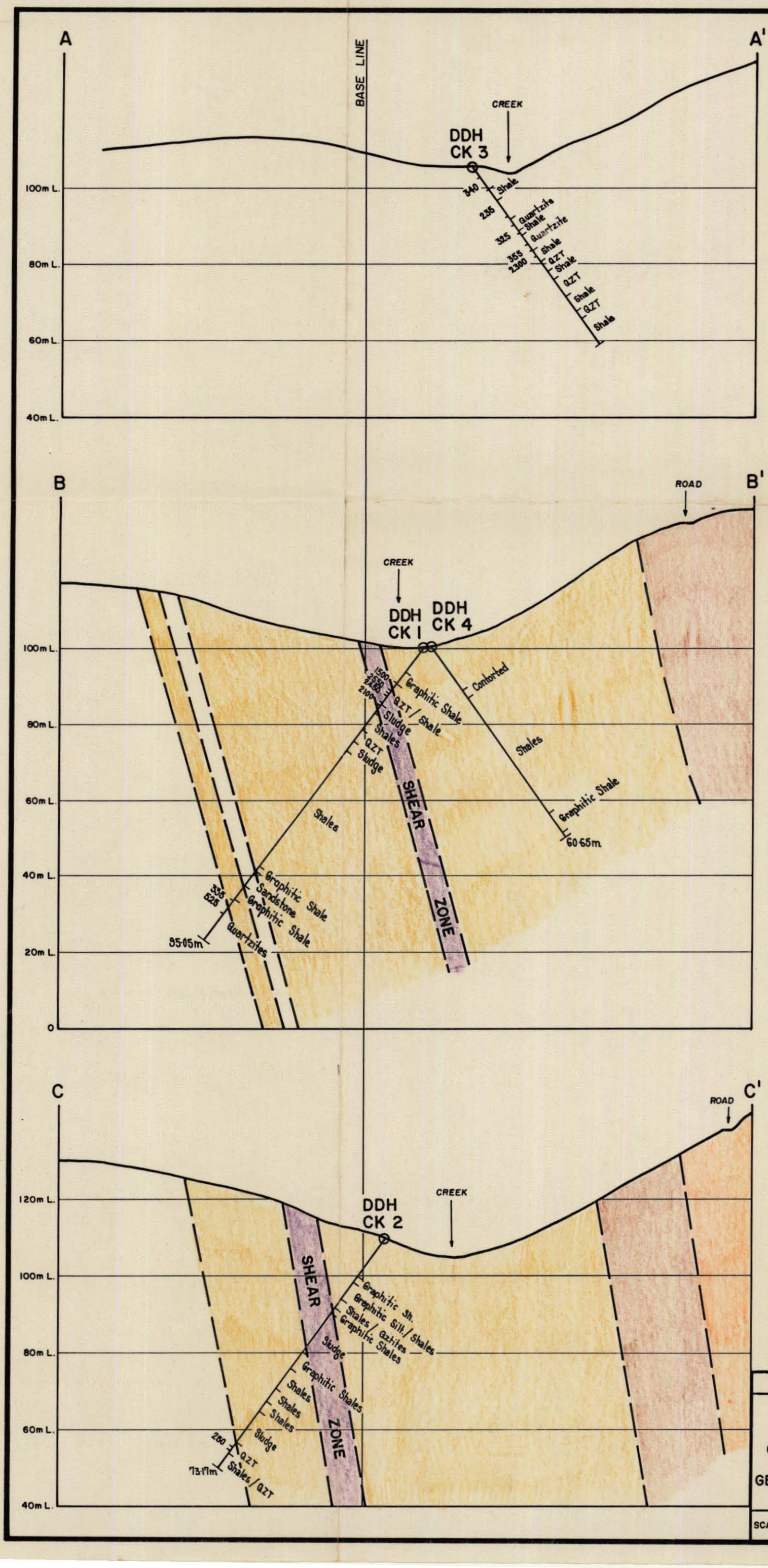
GEOLOGY

DRAWN BY : C. H. W.
DRAFTSMAN : T. G. D. S.
DATE : Feb. 1988
REVISIONS :
FILE NO.

SCALE 1:1000 — 20 0 20 40 METRES

PLAN No. 8/88

88-2791 6527


A
A'
BASE LINE
CREEK
DDH
CK 3
100m L.
80m L.
60m L.
40m L.
340
Shale
235
Quartzite
Shale
325
Quartzite
365
2300
Shale
QZT
Shale
QZT
Shale
QZT
Shale
B
B'
ROAD
CREEK
DDH
CK 1
DDH
CK 4
100m L.
80m L.
60m L.
40m L.
20m L.
0
1500
2520
2280
2100
Graphitic Shale
QZT / Shale
Sludge
Shales
QZT
Sludge
Contorted
Shales
Graphitic Shale
60-65m
SHEAR
ZONE
Shales
Graphitic Shale
Sandstone
Graphitic Shale
Quartzites
336
525
35-05m
C
C'
ROAD
CREEK
DDH
CK 2
120m L.
100m L.
80m L.
60m L.
40m L.
SHEAR
ZONE
Graphitic Sh.
Graphitic Silt. / Shales
Shales / Qzhites
Graphitic Shales
Sludge
Graphitic Shales
Shales
Shales
Shales
280
QZT
Sludge
73-17m
Shales / QZT
LEGEND
356
p.p.m. Cu values
799100
5 cm
88-2791
C. W. DAVIS
E.L. 30/86
COPPER KING MINE AREA
GEOLOGICAL DRILL SECTIONS
SCALE 1:1000
10 0 10 20
Metres
DRAWN BY : C.H.W.
DRAFTSMAN: T.G.D.S.
DATE : Feb. '88
REVISIONS :
FILE NO.
PLAN No. 9/88

6528