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AUSTRALIA AND NEW ZEALAND EXPLORATION COMPANY

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REPORT
 ON THE
 RESULTS OF EXPLORATION
 ON
 EXPLORATION LICENCE NO. 1/69
 TASMANIA
 JANUARY 1972 - SEPTEMBER 1973

INDEXED

By
 R.T. Brandt
 Burnie, Tasmania
 November 19, 1973

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SUMMARY

Exploration of E.L. 1/69 by Australia and New Zealand Exploration Company commenced in January, 1972 under a provisional option understanding with Tasminex N.L., which existed prior to the signing of the formal Option Agreement on 21st July, 1972. The initial work, from January to May 1972, was of a reconnaissance nature and was described in a brief report dated 5th September, 1972. In November 1972, Australia and New Zealand Exploration Company decided to limit its interest in E.L. 1/69 to that portion which lies south of grid line 932,000 yards north, and all subsequent field work was limited to the area to the south of this line. In February 1973, the licence area was enlarged by the inclusion within E.L. 1/69 of Exploration Licences 5/72 and 10/72. The work described in this report includes the work completed on these latter two E.L. areas, as well as within E.L. 1/69 as originally defined at the time of the original Agreement.

Between January and May 1972, the greater part of E.L. 1/69, including the northern portion, was explored by geochemical sampling on a reconnaissance scale. As a result of this work, attention was focussed on an area of some nine square miles around Laurel Creek, north of Loyetee (Maps 2 and 4), where a number of tungsten anomalies were recorded, and on the old Highclere iron prospect (Maps 1 and 7), where an analysis of the sample residues of previous Mines Department drillholes revealed the presence of anomalous tungsten.

During this period samples of Tertiary basalt were collected from various localities for magnetic susceptibility tests, to obtain data on the possible magnetic response of hidden bodies of magnetite beneath a basalt cover. Later, several ground magnetometer traverses were run over basalt-covered country in order to check the findings of the laboratory tests.

In January and February 1973, the anomalous area around Laurel Creek was re-examined and was intensively sampled and geologically mapped. Little evidence of any sizeable skarn-type deposits was found and the numerous tungsten anomalies were judged to be of no economic significance. Work in the area was suspended at the end of February.

From March to August 1973, field work in E.L. 1/69 was concentrated in the western marginal zone of the Blythe River (or Hampshire Hills) granite mass between Hampshire and Ridgley (Maps 1, 2 and 5 - 9). An aeromagnetic survey of this zone was flown on 3rd March and was followed up by geological mapping, stream sediment sampling and ground magnetometry. Some tungsten anomalies were discovered within the granite and in several places where sedimentary rocks are exposed through the cover of basalt. Little evidence of skarn-type deposits was found except at the Highclere iron prospect and to the south and east of Hampshire. It is proposed to continue investigations at these localities by magnetometry and power-auger drilling.

Most of the field work outlined above was performed by one geologists with one field assistant, but during May and June, 1973 two geologists and four field assistants were engaged in the work.

GEOLOGY OF E.L. 1/69

The geology of E.L. 1/69 north of grid line 920,000 yards north is shown on the Burnie one-mile geological sheet, published by the Geological Survey of Tasmania, and has been reproduced on the accompanying Maps 1 and 2 on a scale of 1 inch to $\frac{1}{2}$ mile. The latest geological information south of grid line 920,000 is given on Maps 3 and 4 on a scale of 1 inch to $\frac{1}{4}$ mile. Maps 5 - 9 show the geology of the Hampshire-Ridgley area enlarged to a scale of approximately 1 inch to 600 feet.

The principal geological feature of the E.L. is the Blythe River (or Hampshire Hills) granite pluton, which is of Devonian age, intrudes sedimentary rocks ranging from Precambrian to Ordovician, and is partly covered, especially in the marginal areas, by Tertiary basalt. The pluton extends southwards into the adjoining E.L. 17/68 and its centre is situated near the boundary between the two E.L.s.

On the north side of the pluton, Precambrian sediments of the Burnie quartzite and slate series, with a regional N.N.E. strike, are widely distributed and their contact with the granite can be observed in the valley of the Emu River (Map 1). Iron-bearing siliceous rocks and iron ores, said to be of Cambrian age, succeeded by Lower Ordovician conglomerates and quartzites, overlie the Precambrian in the Natone and Cuprona areas. These beds have a south-easterly dip and appear to form the western limb of a N.N.E.-trending syncline, the axial region of which is wholly concealed under Tertiary basalt. The contact of the conglomerates with the granite is visible at one point south-west of Natone, but elsewhere the mutual relations are obscured by basalt. The distribution and attitudes of the Precambrian and Ordovician sediments in the coastal area, as shown on the Burnie and Devonport Geological Survey map sheets, suggest that the syncline plunges in a S.S.W. direction, directly towards the Blythe River granite. The position of its axis seems to be marked by the course of the stream known as Sulphur Creek, so it could logically be named the Sulphur Creek Syncline.

A comparison of the iron ores at Cuprona and Natone reveals certain differences. Those at Cuprona appear to be banded sedimentary iron formations of Precambrian or possibly Cambrian age, with iron in the form of hematite redistributed and concentrated to some extent by metamorphism and/or supergene processes. They are overlain on the eastern side by conglomerates of presumed Lower Ordovician age. The iron ores at Natone, though apparently in the same stratigraphic position, are not bedded deposits, but irregular, discrete bodies, mainly of hematite, in siliceous and clayey rocks. The iron has the appearance of metasomatic introduction, possibly as a result of complete reconstitution and remobilization of the banded iron formation during metamorphism by the intruding Blythe River granite. Supergene enrichment processes are also in evidence. At both Natone and Cuprona, there is evidence of hydrothermal action in the form of vein-type copper mineralization in the Precambrian rocks.

The western intrusive margin of the Blythe River granite pluton between Ridgley and Hampshire (Maps 5 - 9) is largely basalt-covered. Precambrian sediments at the granite contact can be observed in the Ridgley area. The Highclere iron prospect, a little further south, consists of magnetite-bearing metamorphosed sedimentary rocks, probably skarns of Ordovician age, partly or

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completely enclosed in granite under a basalt cover. Between Highclere and Hampshire there is no positive evidence of the nature of the rocks intruded by the granite. South and east of Hampshire, sedimentary rocks of probable Ordovician age, including skarns, are in evidence and are considered as possible northerly extensions of the Kara tungsten-bearing formations in E.L. 17/68.

Maps 3 and 4 show the geology of the southern part of E.L. 1/69, which includes the central area of the Blythe River pluton and the Ordovician sediments, largely basalt-covered, which flank the granite on the eastern and western sides.

GEOLOGICAL AND GEOCHEMICAL EXPLORATION

a) Preliminary Reconnaissance

The objectives of the initial phase of exploration, which took place from January to May 1972, were to delineate areas of anomalous tungsten by rock and stream-sediment sampling, and to locate geological environments favourable for skarn development, namely occurrences of calcareous rocks in contact with intrusive granite. Special attention was paid to occurrences of iron ore in view of the known association of magnetite with skarn-type tungsten mineralization at Kara in E.L. 17/68.

Thirty-five rock samples and 122 panned stream-sediment samples were collected and analysed for tungsten, and some of them additionally for tin. The sample sites and analytical results are shown on Maps 1 and 2 (Map 2 also shows the sampling done in the adjoining E.L. 17/68). The majority of the panned samples yielded tungsten values of less than 2 p.p.m. W to 50 p.p.m. W, a range which is not considered significantly anomalous. Positive results were achieved, however, within an area of some nine square miles around Laurel Creek north of Loyetea, where anomalous values up to 1490 p.p.m. W were recorded. This area was re-examined at a later date, as described below.

The occurrences of iron ore at Natone were given special attention in view of their proximity to the Blythe River granite. Samples were taken from every outcrop and from every small creek in the vicinity, with negative results except for one iron sample (DK13R) which yielded 200 p.p.m. W, and two rock samples which gave values of 40 and 60 p.p.m. W respectively. It is noteworthy that tungsten values in this range have been recorded by Tasminex N.L. in soil samples from the same locality, and some of the samples also contained anomalous amounts of copper, arsenic and silver. Presumably the anomalous tungsten is connected with the known copper mineralization that is present in the Precambrian shales. Geological examination revealed no sign of the existence of carbonate rocks or skarn-type deposits in the area.

A possibly more significant occurrence of hematite within, or associated with, Ordovician conglomerate was found near the Blythe River, two miles east of Natone (sample site DK96R on Map 1). This sample of hematite yielded 250 p.p.m. W and the result was subsequently confirmed by another sample which ran

480 p.p.m. W. The presence of anomalous tungsten in this position on the limb of the Sulphur Creek Syncline could be significant in the event of calcareous rocks of the Upper Ordovician being present within the unexposed axial zone of the syncline. This would make possible the existence of tungsten-bearing skarns at the point where these rocks are cut by the Blythe River granite to the south. This inference has not been followed up by any field work to date, but a detailed examination of this area seems warranted and is recommended.

In the western marginal zone of the Blythe River granite, reconnaissance stream-sediment sampling did not show any anomalous tungsten, though some anomalies were discovered during later work. Surface samples of hematite-magnetite ore from the Highclere iron prospect yielded only 50 p.p.m. W, but the sample residues of four drillholes put down by the Mines Department in 1964 were analysed, by the kind permission of the Director of Mines, and revealed the presence of anomalous tungsten at depth. The highest value recorded, at a depth of 30'-37' in drillhole No.2, was 1800 p.p.m. W.

The chief results of the initial exploration phase were to focus attention on the Laurel Creek and Highclere areas and to eliminate the northernmost portion of E.L. 1/69 from further consideration. Due to the lack of positive results from the sampling and the absence of carbonate horizons in the Precambrian formations, the area north of grid line 932,000 yards north was judged to be barren of tungsten deposits and was formally excluded from the Company's area of interest.

b) The Laurel Creek Area

The anomalous area around Laurel Creek north of Loyetea was further investigated in greater detail during January and February, 1973. The geology of the area and the results of this second phase of sampling are shown on Map 4.

Stream-sediment samples were taken initially with a view to confirming the anomalous results obtained during previous work, but it was found that not all of the previous high values could be reproduced by re-sampling in the same places. Nevertheless, some of the anomalous zones were confirmed and new ones were discovered. A total of 79 panned stream-sediment and 23 rock samples were collected and analysed for tungsten, including those taken in the immediately adjacent part of E.L. 17/68.

Geological mapping showed the area to consist almost entirely of Devonian granite. Occasional small patches of quartzite and conglomerate, representing original roof rocks or pendants, occur within the granite area, but the general level of erosion appears to be well below the original roof of the Blythe River granitic pluton. A detailed search discovered skarn rocks in only one locality on Laurel Creek within E.L. 17/68, where a large xenolith, about 200 feet long, of chlorite-actinolite-quartz rock, believed to be a skarn, is enclosed within the granite but contains very little tungsten. The absence of any carbonate rocks on the granite margins to the east and south led to the conclusion that there was little chance of finding mineralized skarns of any size in the area.

The anomalous tungsten in the stream sediments was traced to small hydrothermal veins and disseminations of micaceous titanohematite (in which tungsten is present in an unidentified form) in altered granite. These occurrences, though fairly numerous and widespread, are individually small and discontinuous and no economic importance can be attached to them. The distribution of the veins and the markedly retilinear pattern of the local drainage strongly suggests that the mineralization is related to a system of conjugate shear zones in the crystallized, rigid granite, which acted as channelways along which iron and tungsten-bearing hydrothermal solutions arose from a deeper source. Where these solutions encountered hospitable carbonate host rocks on the granite margins, it can be assumed that mineralized skarns were formed. Evidence in support of this hypothesis is furnished by the tungsten-bearing skarns of the Kara prospects in E.L. 17/68, in which the magnetite and scheelite have been shown to be late introductions largely controlled by pre-existing fractures.

In view of the unsuitability of the geological environment for skarn formation and the non-economic character of the tungsten occurrences discovered, work in the Laurel Creek area was discontinued.

c) The Hampshire-Ridgley Area

As evidence accumulated that the mineralized skarn rocks of the Kara prospects in E.L. 17/68 could extend northwards into E.L. 1/69 along the western flank of the Blythe River granite, it was decided to carry out a thorough investigation of this zone, commencing in March 1973. An aeromagnetic survey was flown on 3rd March and was followed by geological mapping, stream-sediment sampling and ground magnetometry. The results are shown on Maps 5 - 9.

Since most of the intrusive margin of the granite in this area is covered by basalt, only fragmentary evidence of the nature of the intruded rocks has been obtainable. It was established that Precambrian siltstones, quartzites and carbonaceous shales border the granite in the north, but how far south these rocks extend could not be ascertained by surface mapping. The Highclere iron prospect was found to consist of a small area, approximately 1500 by 800 feet, of weathered magnetite-bearing skarn rocks completely surrounded by basalt, but probably in direct contact with granite below the basalt. Drillholes put down by the Mines Department in 1964, to test the iron ore, have revealed the presence of anomalous tungsten. There is no magnetic evidence of any extension of the skarn under the basalt and the occurrence is probably small, representing a small pocket or roof pendant within the granite.

Between Highclere and Hampshire the available geological and magnetic data suggest that granite is extensive under the basalt cover and no concrete evidence of the nature of the intruded rocks could be found. South and east of Hampshire there are small exposures, through the basalt, of sedimentary rocks which have been provisionally correlated with the Ordovician formations of the Kara area further south. Some tungsten anomalies are associated with these rocks. The northerly extension of these beds appears to be cut off by granite and any direct connection with the beds in the Highclere area is unlikely.

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All rivers and creeks in the vicinity of the granite margin were sampled at close intervals, a total of 223 panned stream-sediment samples being taken and analysed for tungsten. A number of tungsten anomalies were found in the granite, especially in the East Ridgley area, with some of the panned concentrates containing visible scheelite. These are evidently derived from small vein sources in the granite, possibly of the Laurel Creek type, and cannot be considered of any economic importance. The anomalies found in association with the sedimentary rocks south and east of Hampshire could possibly have been derived from skarn-type mineralization.

MAGNETOMETRY

The value of magnetometry in locating occurrences of magnetite-bearing skarn favourable for tungsten mineralization has been amply demonstrated during investigations of the Kara prospects in E.L. 17/68. It was not known, however, whether the same method would be applicable to basalt-covered areas, which are extensive in E.L. 1/69.

To obtain data on the possible magnetic response of bodies of magnetite concealed under basalt, a number of oriented specimens of Tertiary basalt were sent to McPhar for magnetic susceptibility tests. The tests showed no consistency in the magnetic properties of the specimens, but it was concluded that the magnetic pattern of a uniformly layered, horizontal basalt formation would reflect the topographic relief. To test this theory, several ground-magnetometer traverses were run over hilly basalt country, but very little correlation was discernible between the magnetic readings and the topography, implying that some other factors, either variations in thickness and structure of the basalt or the influence of the sub-basalt rocks, were responsible for the variations in magnetic intensity.

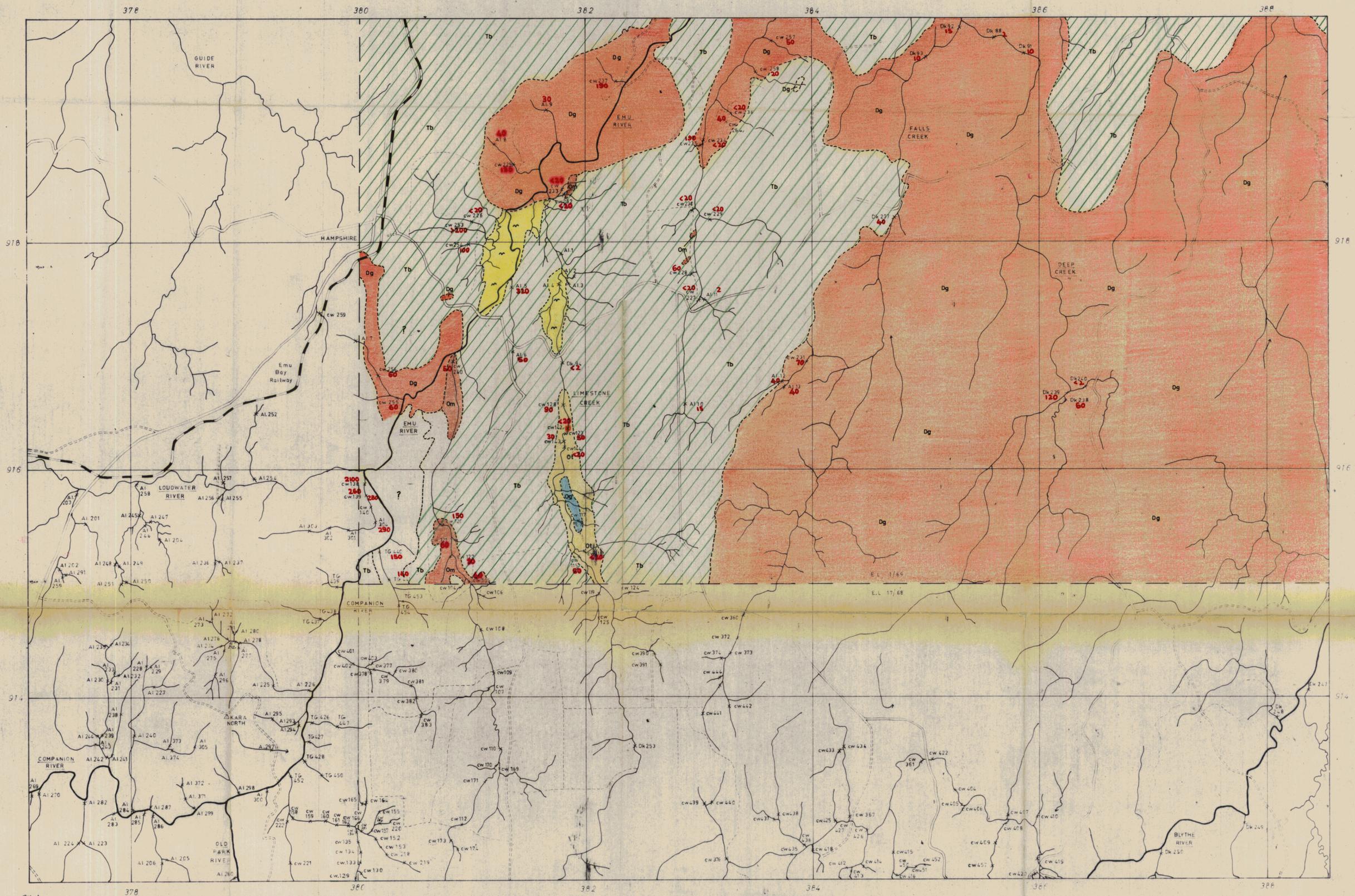
On 3rd March, 1973 an airborne magnetic/radiometric survey was flown over 45 square miles of country extending from St. Valentine's Peak in E.L. 17/68, through Hampshire to Ridgley, taking in the western margin of the Blythe River granite and a wide stretch of the basalt country adjacent to it. The results are still being assessed in the light of the geological mapping and ground magnetometry subsequently carried out.

The aeromagnetic pattern clearly reflects known geological features such as the granite-basalt contact and the Highclere magnetite occurrence, but the cause of some other anomalies in the basalt-covered area is still the subject of speculation. The ground magnetometer orientation traverses which were carried out are shown on Maps 6 - 8. The results are in substantial agreement with those of the aeromagnetic survey. One interesting anomaly, narrow but well defined and showing a maximum intensity of +2780 gammas, occurs over basalt close to its contact with the granite which crosses Kingsclere road, between Highclere and Hampshire (Map 7). There is no reason to suspect a great thickness of basalt at this point to account for the anomaly, in fact the indications are that the basalt is thin. Since recent work at the Kara prospects has shown that magnetite bodies under basalt do show up magnetically, the possibility of magnetite-bearing rocks, like those at Highclere, being present under the basalt cannot be excluded.

PROPOSED FUTURE WORK

The work accomplished in E.L. 1/69 has so far revealed evidence of skarn-type tungsten deposits only at the Highclere iron prospect and possibly to the south and east of Hampshire. It is proposed to investigate these localities by magnetometry and power auger drilling. Should the Highclere occurrence show promising results, it is considered that an investigation of the Kingsclere Road magnetic anomaly, by drilling through the basalt cover, would be justified.

On a broader scale, further investigation is needed into the tungsten possibilities of the Sulphur Creek Syncline. Though based on pure geological inference, the existence of tungsten-bearing skarn under basalt somewhere south of Camena (Map 1) appears to be a definite possibility. It is not known whether suitable host rocks for skarn formation exist in the syncline, but a detailed geological examination might succeed in finding evidence of them. A programme of geological mapping, sampling and magnetometry in this area is recommended.



659C10 MAP NO.3

AUSTRALIA AND NEW ZEALAND EXPLORATION COMPANY

HAMPSHIRE SHEET

GEOLOGY AND GEOCHEMISTRY

E.L.'s 1/69, 17/68.

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| | | | |
|-------------|----------------------|-----------|-----------------|
| PREPARED BY | C.H. WHITEHEAD | DRAWN BY | C.H. WHITEHEAD |
| SCALE | 20 Chains to an Inch | DATE | October 1, 1973 |
| DRAWING N° | | REPORT N° | |

GEOLOGY

| | | | |
|------------|---|-----|----------------------------|
| QUATERNARY | Q | Qa | = ALLUVIUM |
| | | Qt | = TALUS (BASALT) |
| TERTIARY | T | Tb | = BASALT |
| SILURIAN | S | So | = ELDON GROUP |
| DEVONIAN | D | Dg | = GRANITE |
| | | Og | = GORDON LIMESTONE |
| ORDOVICIAN | O | Oi | = TRANSITION SERIES |
| | | Om | = MOINA SANDSTONE |
| | | Oo | = CONGLOMERATE SERIES |
| CAMBRIAN | E | Ea | = UNASSIGNED |
| | | Dgs | = SPECULARITE ZONE |
| | | Dgm | = MAGNETITE-SKARN ZONE |
| | | Dgc | = CONTACT METAMORPHIC ZONE |

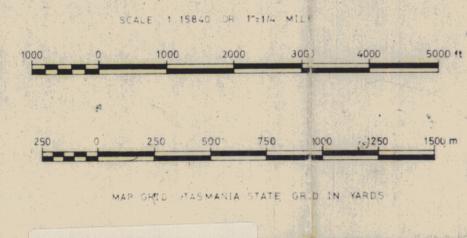
GEOLOGY

| | |
|---------------------|--|
| KARA GEOLOGY | |
| Q | = QUARTZITES, SANDSTONES AND CONGLOMERATES |
| L | = LIMESTONE |
| T | = TACTITE |
| M | = MAGNETITE TACTITE |
| - - - | = GEOLOGICAL BOUNDARY |
| - - - | = INFERRED GEOLOGICAL BOUNDARY |
| - - - | = DIP AND STRIKE |
| + | = HORIZONTAL AND VERTICAL DIPS |
| - - - | = FAULT |
| X - X | = FOLD STRUCTURE |
| - - - | = REGIONAL DIP |
| - - - | = STRUCTURAL TRENDS |

REFERENCE

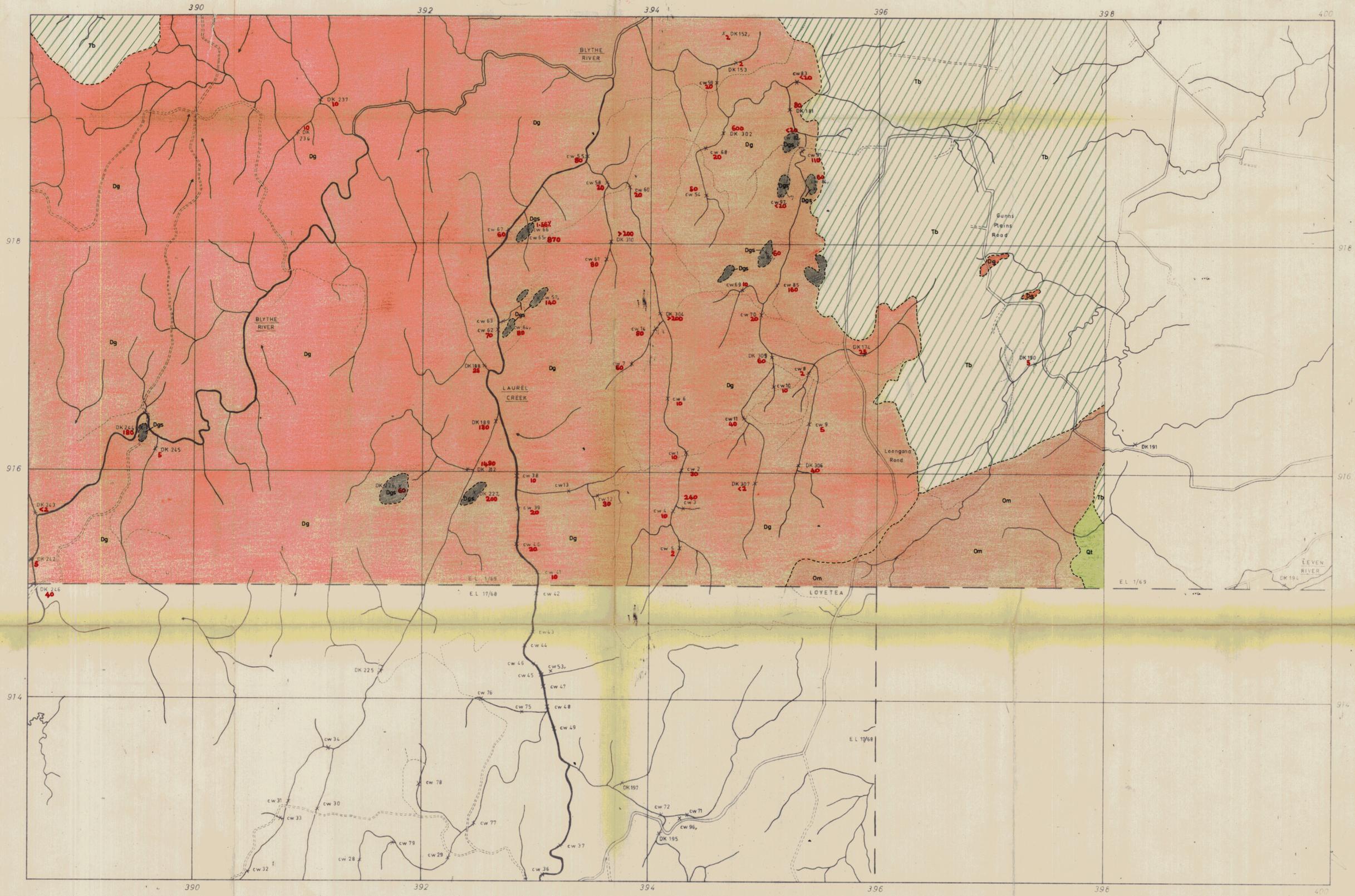
| | | | |
|-------|--------------------------|-------|-----------------|
| - - - | = ALL WEATHER ROAD | - - - | = RIVER |
| - - - | = CLEARED TRACK | - - - | = CREEK |
| - - - | = UNCLEARED FOREST TRACK | - - - | = E.L. BOUNDARY |
| - - - | = RAILWAY | - - - | = TRIG BEACON |

SCALE



A1.12 X = SAMPLE NUMBER AND VALUE IN ppm W (IN RED)

73-975



GEOLOGY

| | | | |
|------------|---|-----|----------------------------|
| QUATERNARY | Q | Qa | = ALLUVIUM |
| | | Qt | = TALUS (BASALT) |
| TERTIARY | T | Tb | = BASALT |
| SILURIAN | S | So | = ELDON GROUP |
| DEVONIAN | D | Dg | = GRANITE |
| | | Og | = GORDON LIMESTONE |
| ORDOVICIAN | O | Ot | = TRANSITION SERIES |
| | | Om | = MOINA SANDSTONE |
| | | Oo | = CONGLOMERATE SERIES |
| CAMBRIAN | E | Ea | = UNASSIGNED |
| | | Dgs | = SPECULARITE ZONE |
| | | Dgm | = MAGNETITE SKARN ZONE |
| | | Dgc | = CONTACT METAMORPHIC ZONE |

GEOLOGY

KARA GEOLOGY

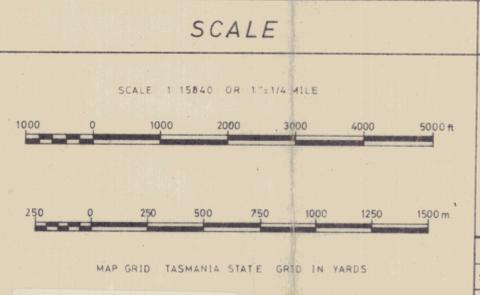
| | |
|----|--|
| Q | = QUARTZITES, SANDSTONES AND CONGLOMERATES |
| L | = LIMESTONE |
| T | = TACTITE |
| Tm | = MAGNETITE TACTITE |

| | | | |
|-----|--------------------------------|-----|---------------------|
| --- | = GEOLOGICAL BOUNDARY | --- | = FAULT |
| --- | = INFERRED GEOLOGICAL BOUNDARY | --- | = FOLD STRUCTURE |
| --- | = DIP AND STRIKE | --- | = REGIONAL DIP |
| + | = HORIZONTAL AND VERTICAL DIPS | --- | = STRUCTURAL TRENDS |

REFERENCE

| | | | |
|-----|--------------------------|-----|-----------------|
| --- | = ALL WEATHER ROAD | --- | = RIVER |
| --- | = CLEARED TRACK | --- | = CREEK |
| --- | = UNCLEARED FOREST TRACK | --- | = E.L. BOUNDARY |
| --- | = RAILWAY | --- | = TRIG BEACON |

cw 39 = SAMPLE NUMBER AND VALUE IN ppm W (IN RED)



659011 **MAP NO. 4**

AUSTRALIA AND NEW ZEALAND EXPLORATION COMPANY

LAUREL CREEK SHEET

GEOLOGY AND GEOCHEMISTRY

E.L.'s 1/69, 17/68 **011**

| | | | |
|-------------|---------------------|-----------|----------------|
| PREPARED BY | CH WHITEHEAD | DRAWN BY | CH WHITEHEAD |
| | A L LIDGARD | | A L LIDGARD |
| SCALE | 20 Chans to an Inch | DATE | October 1 1973 |
| DRAWING N° | | REPORT N° | |

73-975

REFERENCE

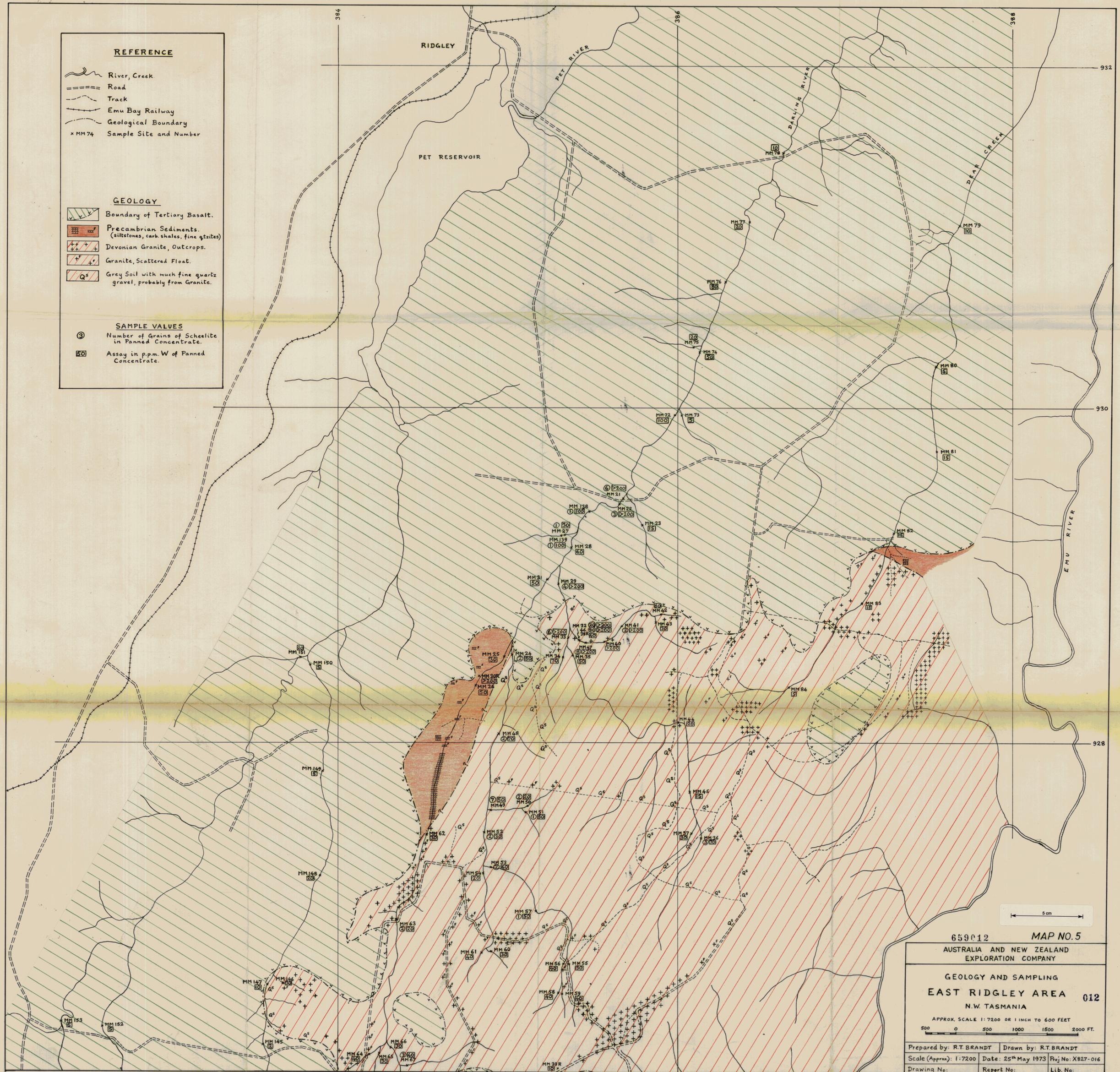
- River, Creek
- Road
- Track
- Emu Bay Railway
- Geological Boundary
- Sample Site and Number

GEOLOGY

- Boundary of Tertiary Basalt.
- Precambrian Sediments. (siltstones, carb. shales, fine quartzites)
- Devonian Granite, Outcrops.
- Granite, Scattered Float.
- Grey Soil with much fine quartz gravel, probably from Granite.

SAMPLE VALUES

- Number of Grains of Scheelite in Panned Concentrate.
- Assay in p.p.m. W of Panned Concentrate.



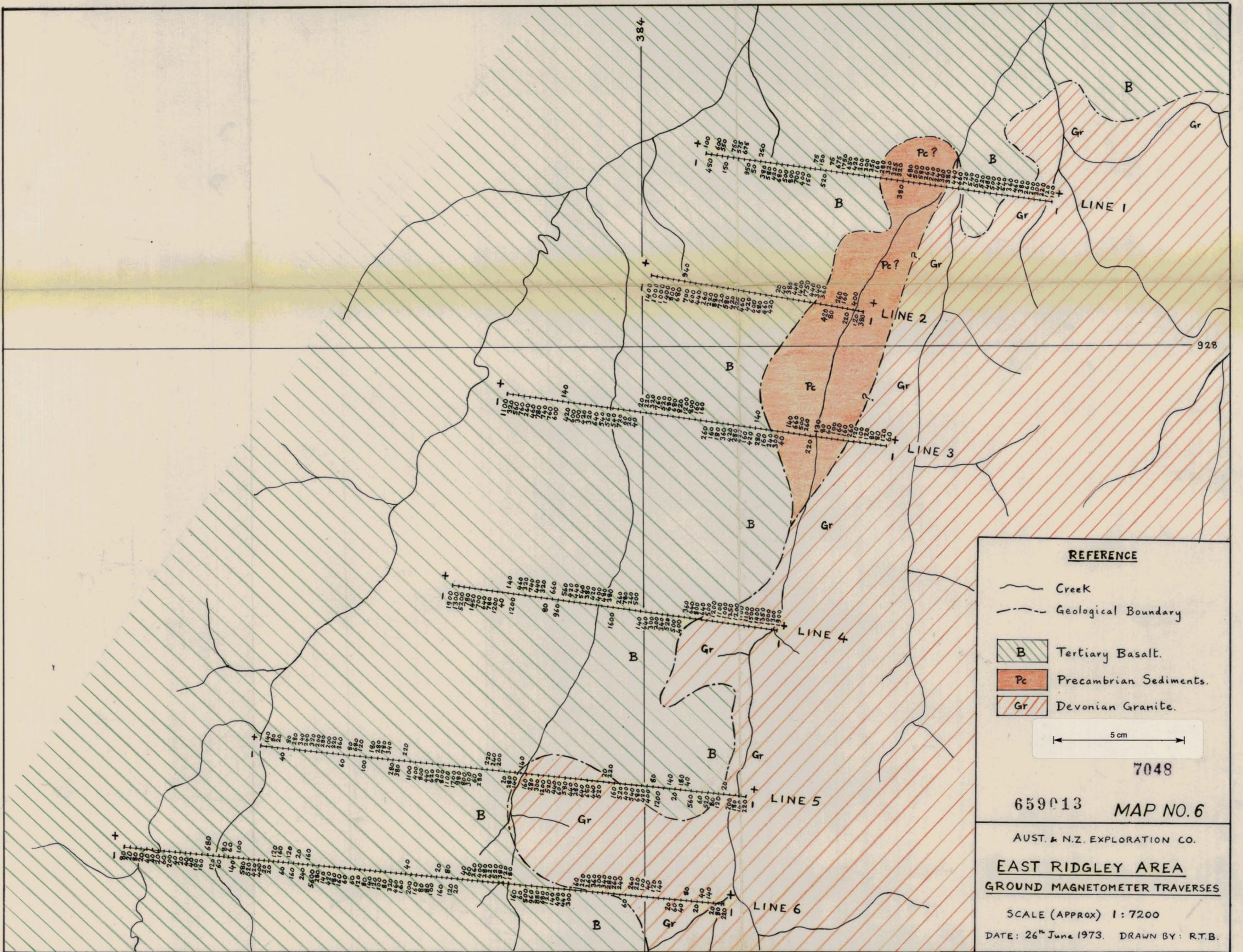
659012 MAP NO. 5
 AUSTRALIA AND NEW ZEALAND
 EXPLORATION COMPANY

GEOLOGY AND SAMPLING
EAST RIDGLEY AREA 012
 N.W. TASMANIA

APPROX. SCALE 1:7200 OR 1 INCH TO 600 FEET
 500 0 500 1000 1500 2000 FT.

Prepared by: R.T. BRANDT Drawn by: R.T. BRANDT
 Scale (Approx): 1:7200 Date: 25th May 1973 Proj No: X827-016
 Drawing No: Report No: Lib. No:

73-975



REFERENCE

-  Creek
-  Geological Boundary
-  Tertiary Basalt.
-  Precambrian Sediments.
-  Devonian Granite.

5 cm

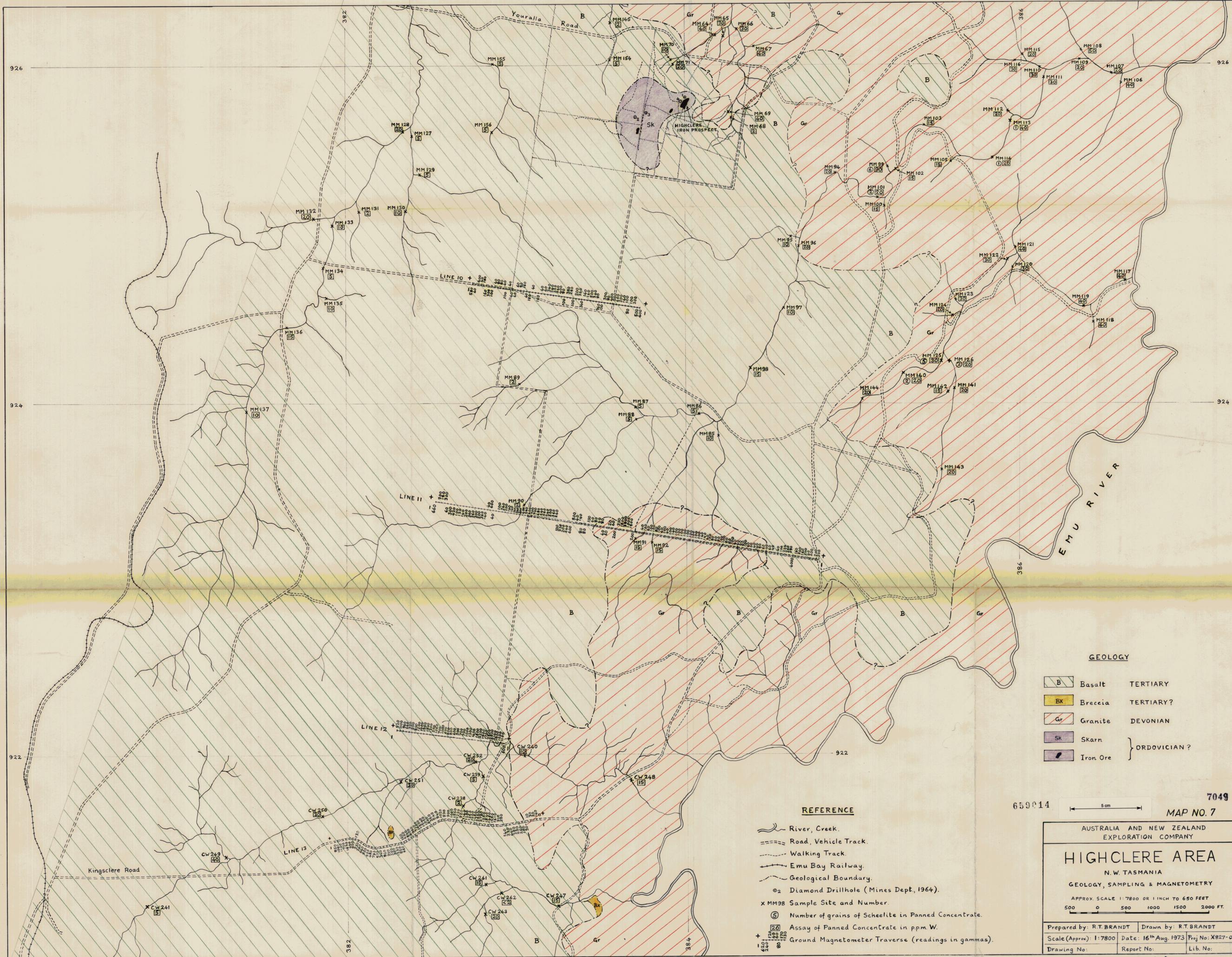
7048

659013 MAP NO. 6

AUST. & N.Z. EXPLORATION CO.
EAST RIDGLEY AREA
 GROUND MAGNETOMETER TRAVERSES

SCALE (APPROX) 1:7200
 DATE: 26th June 1973. DRAWN BY: R.T.B.

73-975



GEOLOGY

- | | | |
|--|----------|---------------|
| | Basalt | TERTIARY |
| | Breccia | TERTIARY? |
| | Granite | DEVONIAN |
| | Skarn | } ORDOVICIAN? |
| | Iron Ore | |

REFERENCE

- River, Creek.
- Road, Vehicle Track.
- Walking Track.
- Emu Bay Railway.
- Geological Boundary.
- Diamond Drillhole (Mines Dept., 1964).
- Sample Site and Number.
- Number of grains of Scheelite in Panned Concentrate.
- Assay of Panned Concentrate in ppm W.
- Ground Magnetometer Traverse (readings in gammas).

659014 7049

5 cm

MAP NO. 7

AUSTRALIA AND NEW ZEALAND
EXPLORATION COMPANY

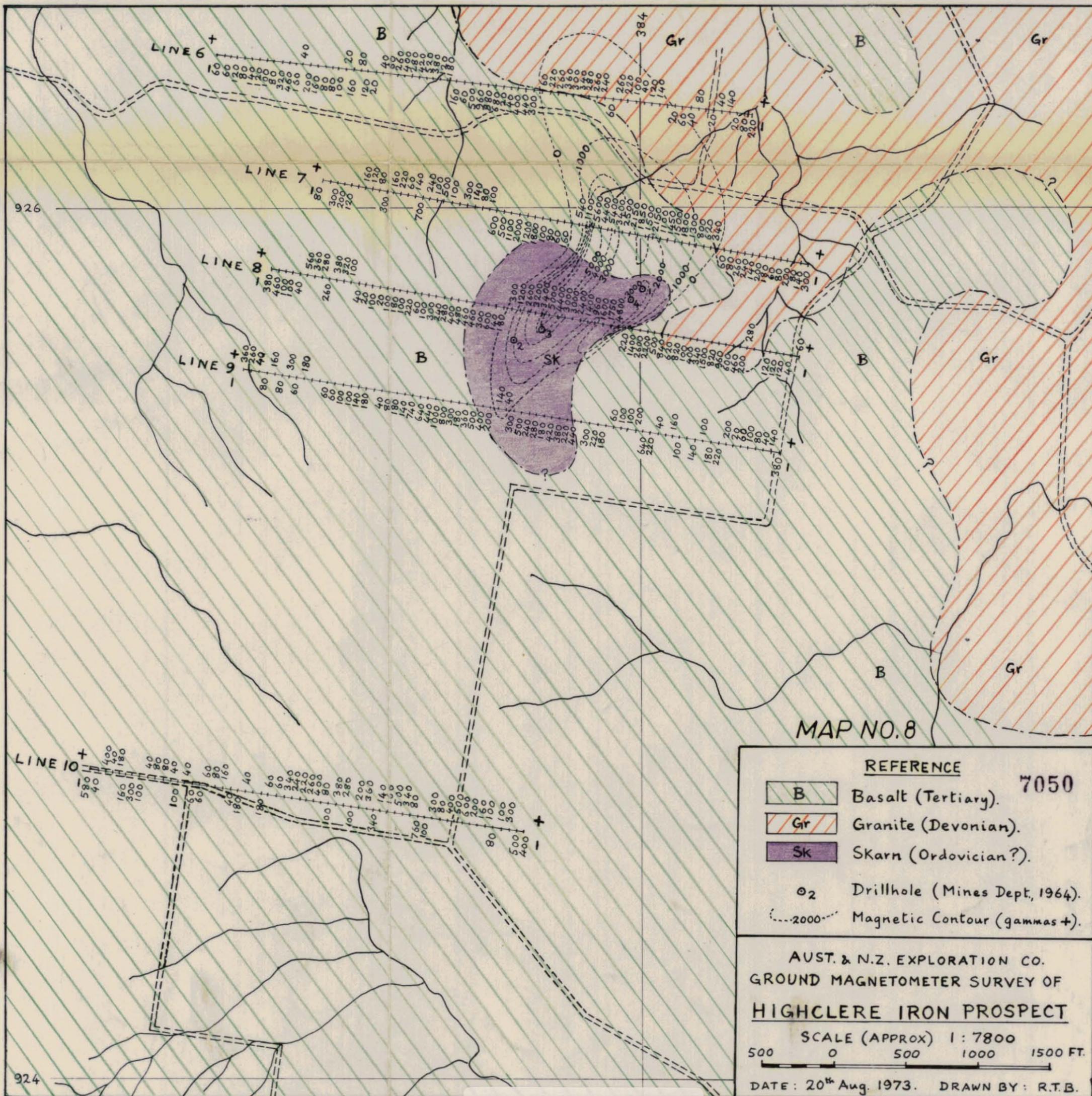
HIGHCLERE AREA
N.W. TASMANIA

GEOLOGY, SAMPLING & MAGNETOMETRY

APPROX. SCALE 1:7800 OR 1 INCH TO 650 FEET

500 0 500 1000 1500 2000 FT.

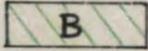
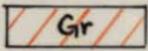
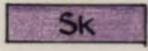
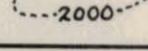
| | |
|--------------------------|--|
| Prepared by: R.T. BRANDT | Drawn by: R.T. BRANDT |
| Scale (Approx): 1:7800 | Date: 16 th Aug. 1973 Proj No: X827-016 |
| Drawing No: | Report No: Lib. No: |



MAP NO. 8

REFERENCE

7050

-  B Basalt (Tertiary).
-  Gr Granite (Devonian).
-  Sk Skarn (Ordovician?).
-  O₂ Drillhole (Mines Dept, 1964).
-  -2000- Magnetic Contour (gammas+).

AUST. & N.Z. EXPLORATION CO.
GROUND MAGNETOMETER SURVEY OF
HIGHCLERE IRON PROSPECT

SCALE (APPROX) 1 : 7800

500 0 500 1000 1500 FT.

DATE: 20th Aug. 1973. DRAWN BY: R.T.B.

5 cm

73-975

659015

AUSTRALIA AND NEW ZEALAND
EXPLORATION COMPANY.

GEOLOGY + GEOCHEMICAL SAMPLING.

EAST OF HAMPSHIRE.

E.L. 1/69.

SCALE 1" = 600 FT.

DATE - MAY 1973.

5 cm

GEOLOGY.

-  = ALLUVIAL.
-  = TERTIARY BASALT.
-  = BASAL CONGLOMERATE.
-  = DEVONIAN GRANITE.
-  = MAGNETITE SKARN.
-  = ORDOVICIAN SEDIMENTS.

SAMPLING.

- X = SAMPLE LOCATION.
- cw.250 = STREAM SEDIMENT SAMPLE.
- cw.251r = ROCK SAMPLE.
- X40 = ASSAY VALUE - PPM. W.

REFERENCE.

-  = RIVER.
-  = CREEK.
-  = ROAD OR TRACK.
-  = FOREST TRACK.
-  = RAILWAY.

SCALE.

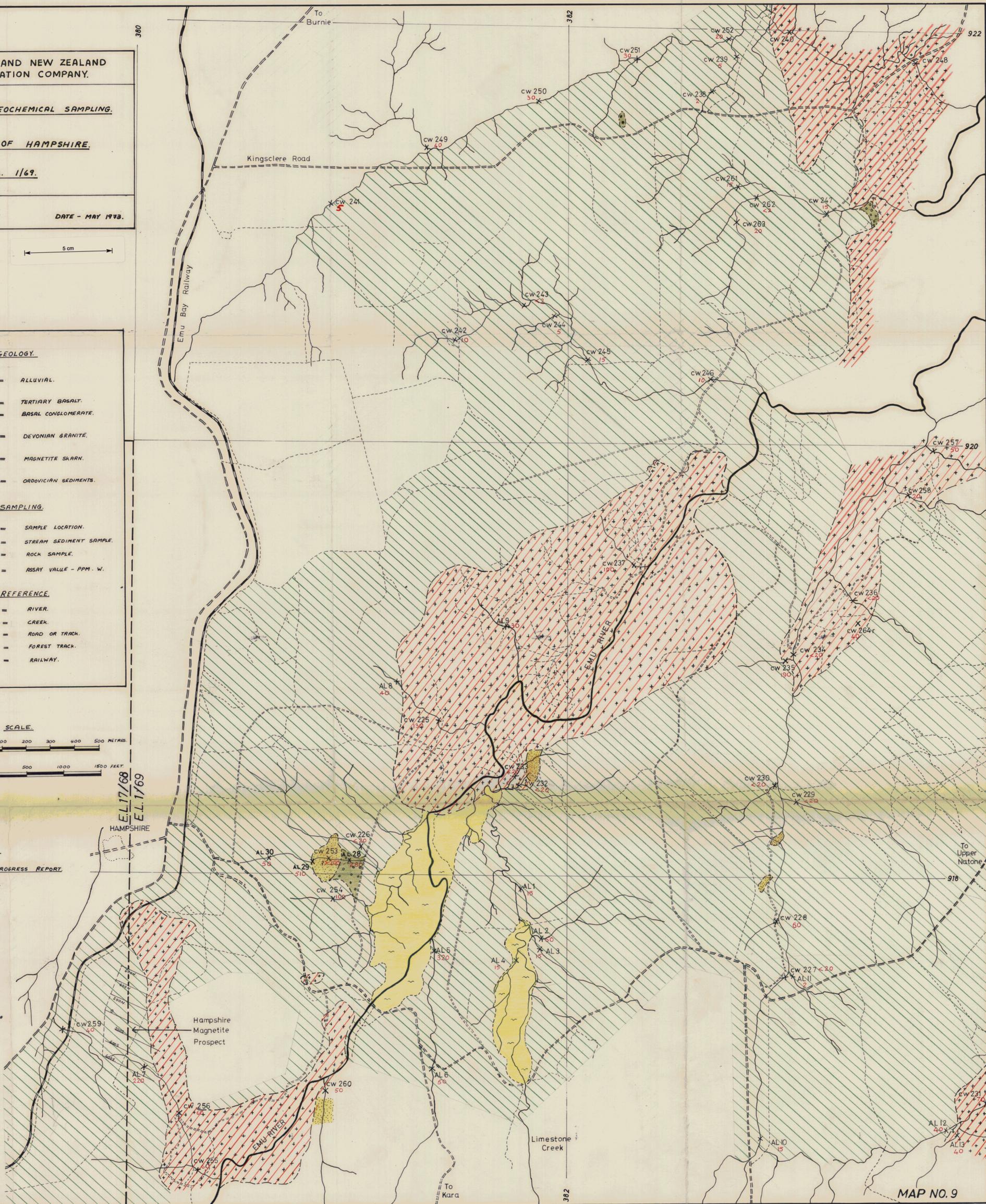
1:7200
0 100 200 300 400 500 METRES
500 0 500 1000 1500 FEET

PLAN ACCOMPANIES:-

C.H. WHITEHEAD PROGRESS REPORT

MAY 1973.

N.

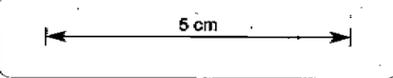


MAP NO. 9

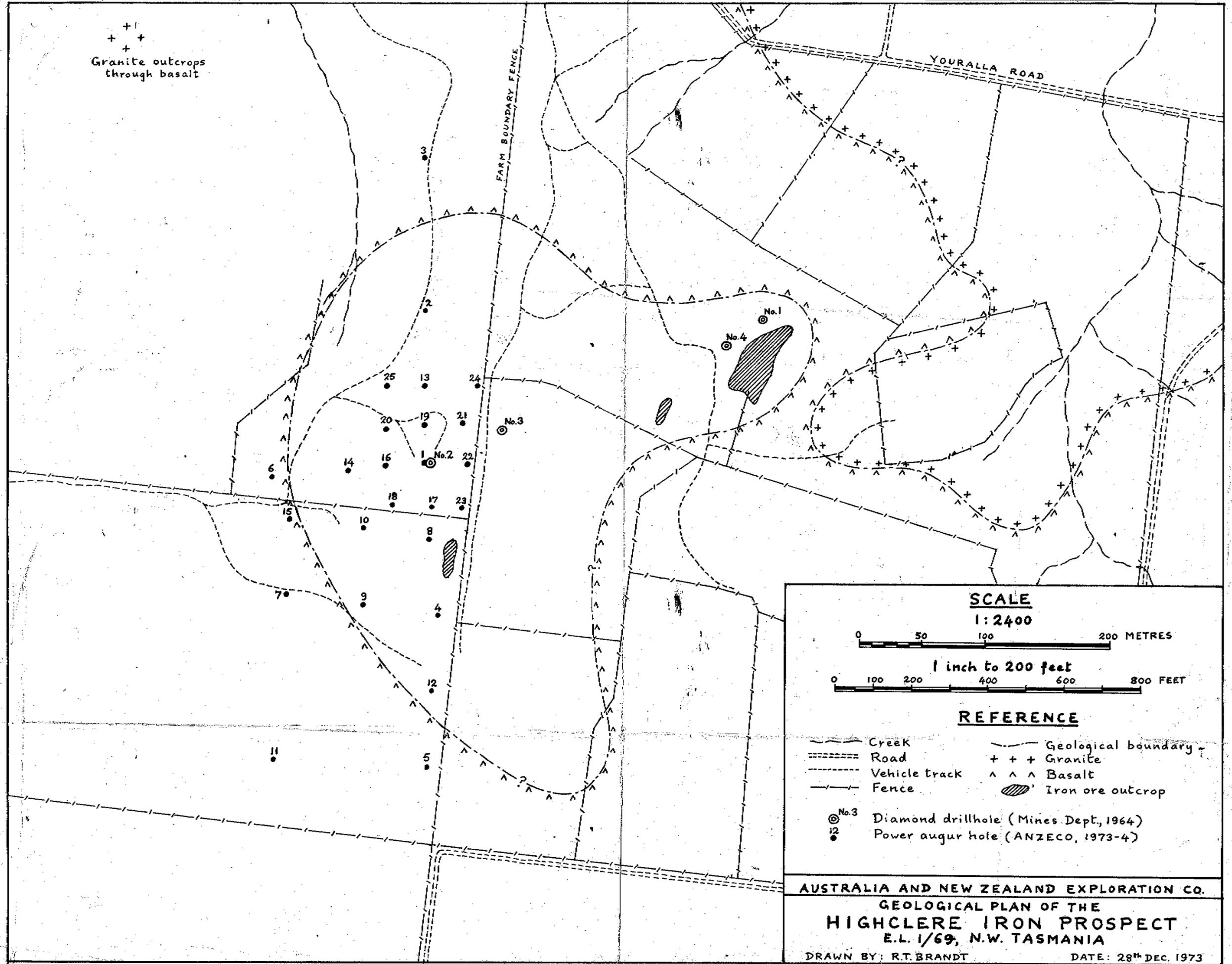
659016

73-975

7051



+ + +
Granite outcrops
through basalt



SCALE
1:2400

0 50 100 200 METRES

0 100 200 400 600 800 FEET

REFERENCE

| | | | |
|--|---------------|-------|---------------------|
| | Creek | | Geological boundary |
| | Road | + + + | Granite |
| | Vehicle track | ^ ^ ^ | Basalt |
| | Fence | | Iron ore outcrop |
| | No.3 | | |
| | No.2 | | |
| | No.1 | | |
| | No.4 | | |
| | No.12 | | |

AUSTRALIA AND NEW ZEALAND EXPLORATION CO.
 GEOLOGICAL PLAN OF THE
HIGHCLERE IRON PROSPECT
 E.L. 1/69, N.W. TASMANIA
 DRAWN BY: R.T. BRANDT DATE: 28th DEC. 1973

659017

7052

APPENDIX I: ANALYSES OF HIGHCLERE ANGER HOLE SAMPLES

