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COMMONWEALTH OF AUSTRALIA
MINISTRY OF NATIONAL DEVELOPMENT
BUREAU OF MINERAL RESOURCES,
GEOLOGY AND GEOPHYSICS

RECORDS 1952 No. 36

GEOPHYSICAL SURVEY OF THE RYE PARK SCHEELITE DEPOSIT

by

J. HORVATH

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4. Position of drill holes in relation to magnetic anomalies.

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GEOPHYSICAL SURVEY OF RYE PARK SCHEELITE DEPOSIT, NEW SOUTH WALES

1. INTRODUCTION

In October, 1951, the Geological Section of the Bureau of Mineral Resources recommended a geophysical survey at the newly-developed Rye Park tungsten deposit. The purpose of the survey was the delineation of the main mineralised areas around a granite cupola. For the geophysical survey, a party consisting of S. Horvath, as party leader, and P. Tenni, W. Compston and C. Pierrehumbert left Melbourne on the 8th December, began work on the 10th and finished the main portion by the 22nd December, 1951. The survey was extended over the period, 9th to 26th January, 1952, with only two members in the field party during this second period.

The party was shown over the area and initiated into the purpose of the survey by C. J. Sullivan, Supervising Geologist of the Bureau of Mineral Resources. For the geology, this report is based largely upon the report of the 10th December, 1951, on "The Rye Park Tungsten Deposit" by H. Lloyd of the New South Wales Geological Survey, Sydney. The survey and results were also discussed with the management of Tungsten Consolidated, Sydney, especially with their General Manager, Mr. James. The assistance and co-operation of the mine management and of the lease owners, Messrs. Gordon and Egerton Bros., is hereby gratefully acknowledged.

2. LOCATION

The Rye Park scheelite deposit is situated on the eastern slope of a granite hill on the northern bank of Pudman's Creek. The mine can be reached from the township of Boorowa, over a good road leading to the small village of Rye Park, by turning off to the north about 12 miles from Boorowa and following a rather poor paddock track for over a mile to the junction of White Rock Creek and Pudman's Creek. The mine workings consist at present of a small opencut with good ore, a new shaft (No.2) at present being sunk about 130 feet to the north, some dispersed pits and a small old shaft about 600 feet north of the opencut. A portable compressor, a blacksmith shop and a temporary camp comprise the surface plant. A diamond drill, started just south of the opencut, had finished the first holes and was used to follow up some of the geophysical results.

3. OUTLINE OF REGIONAL AND MINING GEOLOGY

The general geology of the mine area can be seen on Plate 2, where the geological map of H. Lloyd's report has been drawn on the map of geophysical traverses.

The mine area consists mainly of flat-lying Silurian rocks consisting of interbedded porphyries and tuffs. The porphyries are altered to a varying degree and contain also epidote and zoisite, especially in the contact zone. These Silurian rocks are intruded by granite cupolas, one of which forms the hill near the mine on the northern bank of Pudman's Creek. This northern granite cupola has a diameter of about 600 feet. The granite is a medium grained biotite granite and is undoubtedly the source of the tungsten ore. The second granite cupola covers the area of Mica Hill, south of Pudman's Creek.

This granite is rather strongly greisenised and contains some tin and wolfram. The presence of these minerals resulted in some mining activity, mainly for tin, on Mica Hill. The scheelite ore occurs in certain layers of the porphyry near the granite contact of the northern cupola.

The present mine workings are confined to the eastern margin of the northern granite cupola. A diamond drill was at work at the time of the geophysical survey. The drill was first placed about 50 feet south of the opencut on the western bank of White Rock Creek, and was later placed near the north end of the opencut. Two drill holes were put down while the geophysical party was at work, one vertical and the other at an angle of 45° towards the hill. Both drills struck ore though this did not seem quite as rich as in the opencut.

The evidence available in the opencut and from the diamond drills and shafts indicates that the porphyries and tuffs occur as flat layers. There are several beds of slightly different texture and composition which range in thickness from a few feet to about thirty feet. The ore appears to occur in only the tuffaceous beds. It seems therefore that the tungsten mineralisation has been deposited selectively in the more favourable layers. In the ore, scheelite is accompanied by a little wolfram and by fine grained magnetite.

So far a high magnetite content has been found only in association with the scheelite. It can therefore be assumed with good reason that the geophysical picture of the magnetite distribution will be approximately true also for the scheelite mineralisation. The minerals present in this deposit and their association lead to the conclusion that Rye Park is a contact metamorphic deposit.

There is a rather high tungsten content in certain portions, such as the opencut. Samples taken have yielded values of from 2 to 10% WO_3, but the average is expected to be lower and the tungsten content will probably decrease further away from the granite. In the northern shaft and in the pits near it some scheelite occurs. However, assay values are lower and the ore is more sparse than in the area around the opencut.

4. PURPOSE OF SURVEY AND METHODS USED

A large part of the area is covered by at least a few feet of alluvium which prevents a complete and detailed geological examination and, therefore, the area is particularly suited to a geophysical survey to supplement the geological mapping. It was believed that the magnetic work would help very considerably in understanding and exploring the deposit.

From the observed association of magnetite and scheelite in the ore samples from the mine area, it is considered probable that the occurrence of magnetite is confined to the tungsten ore. It therefore seemed that, by using the magnetic method, it would be possible to delineate the ore shoots approximately.

From the evidence already available there seemed to be two possibilities. Some scheelite occurs in the shaft about 600 feet north of the opencut and it was thought that the ore might continue from the opencut right to the northern shaft. The second possibility was that there are separate orebodies with a lens- or pipe-like shape.

One of the main objects of the survey was to determine which of these assumptions is correct, but the work was extended to include an investigation of the area surrounding the two cupolas.

The survey was carried out mainly with a Watts Vertical Magnetic Balance (No.61519), having a scale value of 27.6 gammas per scale division. As the magnitude of the magnetic anomalies in places exceeded 1000 gammas the auxiliary magnets had to be used. Since the magnetic anomalies were so large, it was not necessary to correct for diurnal variations. To get more information about the shape of the disturbing magnetic body several of the traverses were also surveyed with a horizontal magnetic balance. This gave both the vertical and the horizontal magnetic intensities for use in making an interpretation. The Watts Horizontal Magnetic Balance (No.61911) had a scale value of 47.8 gammas per scale division.

An Atlas Gravity Meter (F21) was also used to observe the gravity variations along some profiles. The instrument, being very light and easily transportable, is especially suited to gravimetric prospecting on ore deposits. The ore deposits themselves are mostly too small to give rise to a gravity anomaly of sufficient magnitude to be discerned, but it was considered likely that the gravity meter would assist in outlining the general geology, especially in the demarcation of the granite intrusions. The instrument is accurate enough to allow gravity observations to within 0.05 milligal.

The gravity meter measures variations of the gravitational field and the interpretation of the results depends on the existence of differences in density between some sub-surface body and its surrounding. If such differences in density exist, the results may be used to determine the approximate location, depth, shape and density of the sub-surface body.

In the magnetic method the forces acting upon the instruments are the vertical and horizontal components of the earth's magnetic field which, in turn, are influenced by the magnetic properties of the underlying rock formations.

In general, granite and porphyry are non-magnetic except for possible sporadic occurrence of magnetite disseminated through the granite but not related to any ore deposit. On the other hand, a magnetite deposit becomes highly magnetised by induction in the earth's field. It may also possess some permanent magnetism not necessarily related to the induced magnetisation.

The magnetic anomalies observed over an orebody containing magnetite are the resultant of the induced and permanent magnetism which sometimes produce conflicting effects. This makes the geological interpretation of a magnetic survey sometimes uncertain, particularly when the magnetite is only an accessory mineral as it is in the tungsten ore at Rye Park.

The correctness of the interpretation of the magnetic survey at Rye Park depends upon the validity of the assumption that the magnetite occurs only in association with the scheelite. So far this assumption seems to be correct.

5. FIELD OPERATIONS

In order that identical observation points could be used for the different surveys with the vertical and horizontal balances and with the gravity meter, a grid was laid out and pegged. This grid enabled observation points to be found again and used as references in setting out indication pegs and drilling targets. The grid is shown on the enclosed Plates 1 and 2. The baseline of the grid follows roughly the eastern margin of the granite from 600 North to 300 South. At this point the line turns through an angle of 15° to the west for the stretch to 600 South where another sharp turn is made to the west through an angle of 39°. The idea in laying the baseline in that shape was to cross the contact of the two granite cupolas with the geophysical traverses as far as possible always at right angles to the contact. Along the traverses the observation points were pegged at every 50 feet. The distance between traverses was mostly 100 feet but in magnetically undisturbed areas it was increased to 200 feet.

At the southern end of the area, two long traverses (1800.S and 2000.S) were extended far to the west. Short traverses were laid at right angles to traverse 1800.S, running to the north-east and south-west. These were for the purpose of investigating the whole marginal area along the southern contact of the second granite cupola.

The survey was carried out mainly with the magnetic vertical balance. Observations were made every 25 feet in magnetically disturbed areas and every 50 feet in undisturbed areas. The area covered by the magnetic balance is shown in Plate 1. It embraces practically the whole area surrounding the two granite cupolas, where scheelite mineralisation could be expected. With these traverses not only the known mineralised part of the eastern granite contact was investigated but also the western contact and the porphyry out to about 2,0 0 feet east of the contact. If any additional granite cupolas are discovered in the area, further geophysical surveys might be justified.

The results are plotted as profiles and as contours. The small figures shown on the contour map (Plate 1) are the deviations in units of one hundred gammas from the average value in the undisturbed area. For example, at point 100N/ 25W, the figure +3 is abbreviated from the observed value of +324. Where only a minus sign (-) is shown beside the traverse line, the magnetic field is practically undisturbed, being less than 50 gammas from normal.

Several profiles with pronounced anomalies in the vertical component were also surveyed with the horizontal balance, as it was considered desirable to have additional data for the purpose of interpretation. However, the work with the horizontal balance was confined to areas with strong magnetic anomalies. As the magnetic disturbances in some parts reach values as high as 5000 gammas, the auxiliary magnets had to be used extensively, thus slowing down the speed of the survey.

The gravimetric work was limited to a few profiles because the inconclusive results on these traverses did not seem to warrant a more extensive use of the gravity meter. The need for an altitude correction to the observed values necessitated a levelling of the observation points on these traverses but the open character of the country was quite favourable for this work.

6. THE RESULTS OF THE SURVEY

Over much of the surveyed area the magnetic intensities remain nearly constant, thus showing that these portions are quite undisturbed.

However, there are magnetic anomalies which are confined to a quite small portion of the area only, occurring almost exclusively in the marginal area around the northern granite cupola. These are strong and quite definitely limited in their extent and their form indicates a lens-like shape of the magnetic bodies. The contour map, Plate 1, shows their shape quite well. The results provide an answer to the question of whether the ore-bodies in the opencut and in the northern shaft are part of the same continuous body. They are not. On the contrary, there are three lens-like bodies of various dimensions. The southernmost of these is the one in which the opencut and the other mine workings are at present laid out. It extends southwards to the edge of Pudman's Creek and northwards to the new shaft which was being sunk at the time of the survey.

The interpretation of the magnetic vertical and horizontal intensities suggests a nearly horizontal magnetic layer. The magnetic intensities are strongest between traverses 00 South and 300 South near the opencut. The magnetic anomaly is strongest near the opencut. On the assumption that the highest scheelite content corresponds to the highest magnetite content, this indicates that the opencut is situated at the best portion of the field. Therefore, it is not likely that better mineralisation will be found anywhere else within the area covered by the survey.

On Plate 3(a) the profiles of magnetic vertical intensities measured in the mine area are plotted on a scale of 1000 gammas to the inch. The profiles show very well the magnetically undisturbed area, such as between 600N and 500N and also the rather limited extent of the magnetic anomalies to the north. For instance, the quite pronounced anomaly on profile 300N with a maximum of over 1000 gammas at about 130E lies between the practically undisturbed adjoining profiles of 400N and 250N.

The mine workings around the northern shaft are to the west of and outside the maximum of the magnetic anomaly at 300N/130E. The presence of minor amounts of scheelite in the northern shaft suggests that the limit of the scheelite area might not always coincide exactly with the magnetite area as outlined in the map of the magnetic anomalies and that traces of scheelite might sometimes be found beyond the limits of the magnetic anomalies.

The magnetic anomaly of the main orebody can be seen on profiles 100S, 200S, 300S and 400S. The undisturbed nature of the adjoining profiles, 0 and 600S, shows that the orebody is limited to the aforementioned profiles and does not extend as far as 0 or 600S. Profile 100S could not be measured in the important part between 100W and 50E because much iron is scattered around. This influenced the readings to such an extent that they are useless for the purpose of interpretation. As additional information was required for the area between 0 and 200S additional profiles at 50S and 150S were measured in the second part of the survey.

The shapes of the contours and profiles show that the magnetic anomaly between 100N/40E and 100S/80E is not identical with the main anomaly between 100S and 400S. There are two distinct anomalies separated by a weakly magnetised area.

The No.2 shaft is situated slightly west of the area separating the two anomalies and might contain some ore belonging to the main orebody. While the main anomaly shows a flat magnetic layer, the anomaly between 100N and 100S suggests a dipping magnetic body. Accordingly, it was recommended that the first drill hole put down here should be oblique. The magnetic profiles show also that the magnetic body pitches to the north. It would, therefore, be advisable to drill on profile 0, or on profile 50S to reach the magnetic body on 0/60E at a depth of 50-100 feet. Plate 3(c) shows how an approximate determination of the pole depth at profile 0 has been made from magnetic vectors using both vertical and horizontal components. On the same plate is also shown the interpretation for profile 300S. This profile was affected to some extent by ore heaps from the opencut and some ore laying on the eastern side of the creek. The interpretation suggests a flat layer that is approximately 150 feet wide at profile 300S.

The interpretation of profile 400S also indicates a flat layer but its polarity is not as clearly indicated as in the case of profile 300S. There is a strong positive (north) pole at shallow depth at 175W with weaker negative (south) poles to the west and east of this. The most likely interpretation is that the body is complex and consists of several flat layers. The magnetic effect is greater at the western end of the anomaly than at the eastern, thus indicating either that the layer dips to the east or that the magnetite content decreases to the east. For the latter reason it was recommended that a drill hole be put down at the western end of the anomaly.

Some of the profiles were more than 2,000 feet long and covered both eastern and western margins of the granite cupola. They also extended some distance over the porphyry to the east of the granite, but no further magnetic indications were obtained.

The survey was continued southwards to profile 2000S thus including both the area between the granite cupolas and the southern granite or greisen dome of Mica Hill as well. The magnetic profiles are shown on Plate 3(b). Only two areas showed any magnetic anomalies and these were of very limited extent. The one on profile 600S is so small that it hardly warrants having any exploration work done on it. Less than 100 feet to the west of it is an old prospecting shaft. The small amount of prospecting done here does not seem encouraging either, but a closer study of the geology of this particular area might be warranted since the anomaly is the only one rather remote from the granite margin. The mineralisation might therefore be somewhat different.

The other and much stronger magnetic anomaly is on the northern bank of Pudman's Creek and directly at the south-west corner of the granite cupola. Profiles 900S and 950S show distinct magnetic variations exceeding several thousand gammas. The very sudden change from large positive to large negative anomalies shows that the source of these disturbances is rather shallow. A full examination of the anomaly is not possible because several points on the traverse are situated in the creek bed. The absence of anomalies on profiles 1100S and 800S indicates the limit of mineralisation in both directions. The irregular form of the magnetic profiles suggests that the magnetic body has a complex shape. It is, however, favourably situated at the southern margin of the granite and an attempt should be made to test it by drilling at 950S/475W, where an indication peg has been placed.

The magnetic profiles to the south covering Mica Hill and also extending further west did not show any distinct anomalies, and the greisen body of Mica Hill does not seem to contain any magnetite. However, there are signs of some slight mining activity there in the past.

In the second part of the survey, the traverses were extended to cover a large area surrounding the two granite cupolas but no additional magnetic anomalies were found. This indicates that the magnetite, with which the scheelite appears to be associated, is confined to the eastern and southern margins of the northern granite cupola.

Several traverses were also surveyed with the gravity meter but the variations of the gravity values, after the application of the elevation correction, are so small that there can be no appreciable density differences between the granite and the porphyry and other rock formations in the area. In these circumstances there was no purpose in continuing the gravity survey although it would have been helpful had it been possible by this method to delineate the granite cupolas and to detect any other batholiths not visible at the surface. The procedure in that case would have been to find granite batholiths by a gravity survey and follow up with a magnetic survey over the marginal areas of each. As that procedure cannot be followed, the present survey was confined to the margins of the known granite cupolas. It may be possible in a later survey to investigate areas further afield for additional granite bodies and the tungsten ore that may be associated with them.

7. CONCLUSION AND RECOMMENDATIONS

At the Rye Park scheelite deposit the magnetic method was used to locate and delineate scheelite bodies on the margin of a granite cupola. The ore occurs in porphyritic layers and consists of scheelite with a rather high percentage of magnetite and some traces of wolframite. An area covering two granite cupolas and their surroundings was traversed by closely spaced profiles. The orebodies containing magnetite and scheelite showed up as quite strong magnetic indications near the south-eastern margin of the northern granite cupola. The magnetic survey proved that the orebodies are several lens-shaped deposits of unequal extent. The greatest of the anomalies coincides with the orebody exposed in the opencut. It extends from 150S to 450S and has a length of about 300 feet in the direction of strike. A second anomaly is situated between 100N and 150S and several quite small ones are at 300N/125E, 600S/100E and at 950S/475W.

The interpretation of the magnetic vectors shows that the magnetic bodies are most probably flat layers with little dip. Accordingly, it is recommended that the magnetic indications be tested mainly by vertical diamond drill holes except for the anomaly between 100N and 150S where a probable steeper dip makes oblique holes advisable. The points where the strongest magnetic anomalies were found have been marked by indication pegs. All the indication pegs are marked and have also been shown to the mine manager. The locations of the eight pegs that have been put in are shown on the map (Plate 2) and they are also enumerated here :-

200S/90W	)	
300S/80W	)	Main orebody.
400S/175W	)	
600S/220W	)	
0/60E	)	Second anomaly.
50N/60E	)	
300N/130E		Small anomaly.
950S/475W		" "

The southern portion of the second anomaly, at 50S/65E and 100S/65E, has not been marked by indication pegs because traverses 50S and 150S were surveyed later. The shaft that was being sunk at the time of the geophysical survey is situated between the two anomalies and must be regarded as being in a less mineralised zone. If drilling should prove that the second anomaly represents payable scheelite ore, the shaft would be/in a quite good position as both orebodies could be worked by the same shaft and less ore reserves would be lost by the shaft pillar.

8. TESTING

A number of diamond drill holes have been put down by Tungsten Consolidated Ltd. since the geophysical survey was completed. Many of these drill holes were sited on the basis of the geophysical results as an advance copy of the magnetic contour map had been made available for this purpose. The relation of the drill holes to the magnetic anomalies is shown on Plate 4. In general, the results of the drilling agree well with the geophysical interpretation. Payable scheelite ore has been found only within the magnetically disturbed areas.

The main orebody, consisting of two layers, was proved by drill holes Nos. 1, 2, 4 and 5 in all of which it showed good quality. Only the lower layer was found to be well mineralised in drill hole No.7 put down in No.2 shaft. Near the eastern and southern margins of the main orebody, only low values were obtained as shown in drill holes Nos. 26, 27, 29, 31, 32 and 33, while drill hole No.30 which was put down east of the magnetically disturbed area showed no sign of ore.

The second orebody was proved at profiles 0 and 50N by drill holes Nos. 8, 9, 10 and 11. The rich ore discovered in these holes represents a substantial increase in the known ore reserves. The results of the drilling on profiles 0 and 50N show that this orebody also consists of a flat layer even though the magnetic results suggested that the body had a steep dip. There is as yet no sufficient geological evidence to hand to explain the apparent difference in the magnetic anomalies over the two orebodies.

Drill hole No.18, which was in progress when the undersigned last visited the field, should reach a point near the western margin of the northern orebody, and proposed drill hole No.20 should test the position of the southern margin of this body. It might be advisable to follow this drill hole with another one some 60-80 feet farther east.

A disappointing feature of the testing was the failure to find ore in drill hole No.17 which was put down on the smaller anomaly at 950S/475W. However, there is hardly any justification for further testing there since the magnetic anomaly indicates a body too small in extent to be of economic importance.

The northernmost and smallest anomaly at 300N/130E was proved by drill hole No.12 which showed very good ore. However, the restricted extent of the ore, as indicated by the anomaly, was proved by drill holes Nos. 13, 14, 15 and 16 which were put down a little outside the area of the magnetic "high." No ore was found in these four drill holes.

The results of drilling holes Nos.12-16 provide an excellent proof of the accuracy of the magnetic method.

The scheelite ore so far proved in the course of the drilling campaign is a relatively small deposit and an attempt may have to be made to discover additional deposits. The anomalies found so far are small in extent with the result that traverses have to be rather closely spaced. The coverage of the geophysical survey has already been extended to embrace a larger area around the mine workings but it would not be practicable to extend the area still further to search indiscriminately for possible orebodies.

The geological evidence indicates quite clearly that the margins of granite batholiths are favourable locations for scheelite deposits in this area. Therefore, if further exploration is contemplated, it would be desirable to attempt first to locate other granite bodies in the vicinity by a general geological reconnaissance. The detailed geophysical investigations could then be confined to the granite margins.

(S. Horvath)
Geophysicist.

Melbourne.
August, 1952.

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GEOPHYSICAL SURVEY AT RYE PARK SCHEELITE DEPOSIT N.S.W.

VERTICAL MAGNETIC INTENSITY CONTOURS

SCALE OF FEET

100 0 100 200 300 400

LEGEND

TRACK ---------- FENCE ----------

GEOPHYSICAL TRAVERSE WITH OBSERVATION POINTS

VERTICAL MAGNETIC INTENSITY IN 100 GAMMA UNITS
— MEANS LESS THAN 50 GAMMAS DEVIATION

CONTOUR INTERVAL 500 GAMMAS

POSITIVE MAGNETIC INTENSITY VALUE

NEGATIVE " " "

J. Horvath
Geophysicist

Geophysical Section, Bureau of Mineral Resources Geology & Geophysics

G III-1

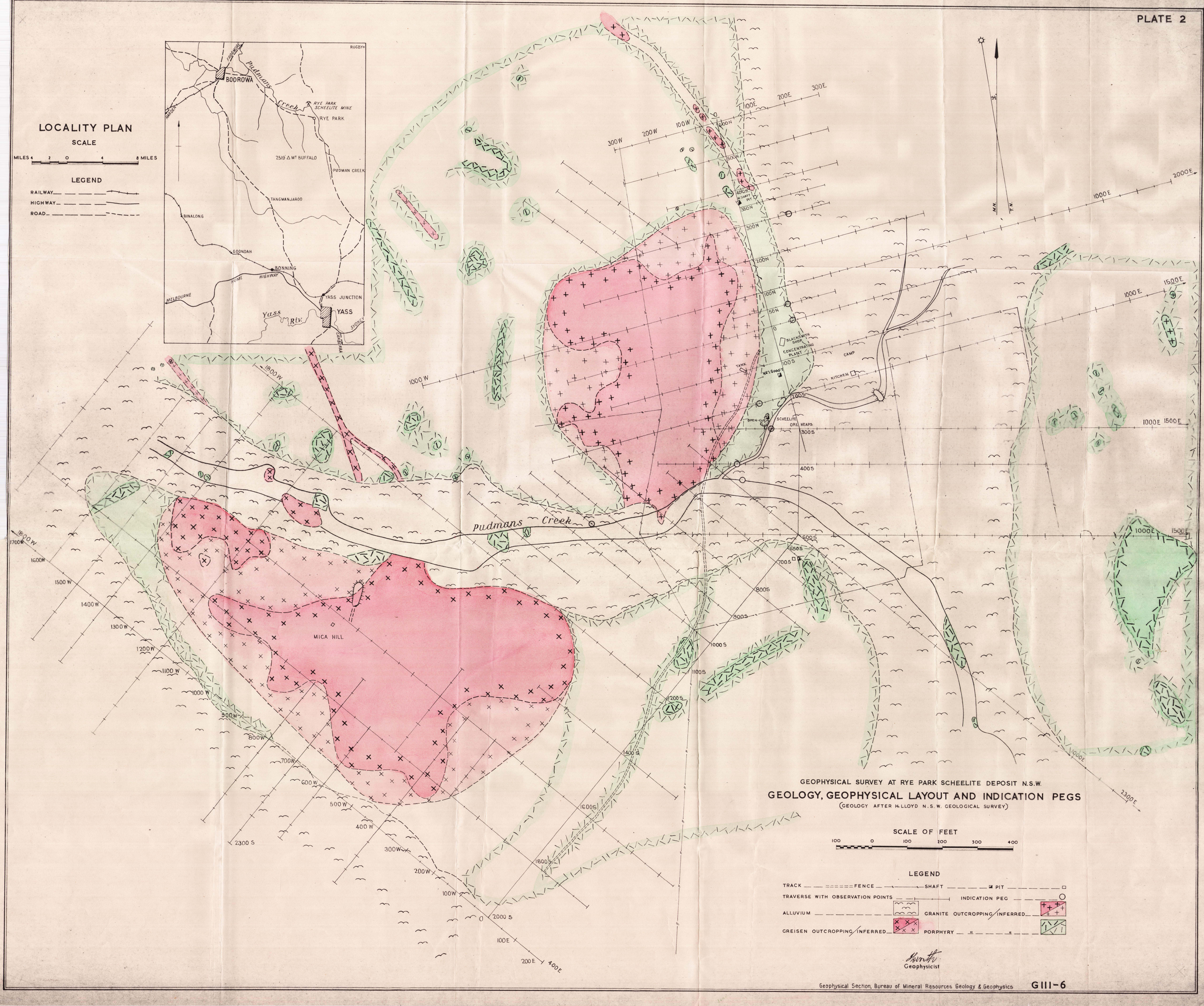
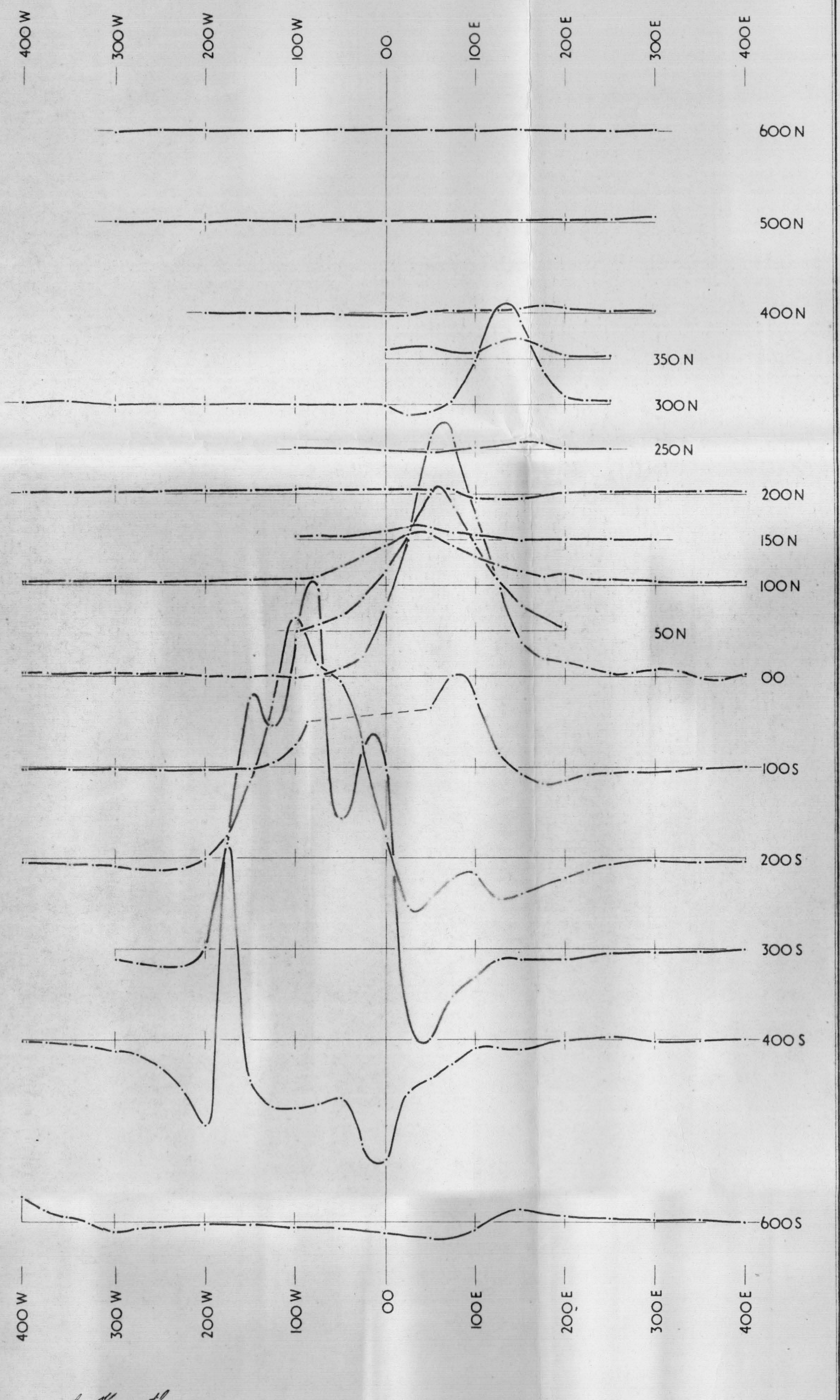


PLATE 2
LOCALITY PLAN
SCALE
MILES 4 2 0 4 8 MILES
LEGEND
RAILWAY
HIGHWAY
ROAD
BOOROWA
FROGMORE
HARDEN
Pudmans Creek
RYE PARK SCHEELITE MINE
RYE PARK
RUGBY
2519' △ MT BUFFALO
PUDMAN CREEK
TANGMANJAROO
BINALONG
GOONDAH
BONNING
HUME HIGHWAY
MELBOURNE
YASS JUNCTION
YASS
Yass Riv.
SYDNEY
CANBERRA
MICA HILL
Pudmans Creek
BLACKSMITH SHOP
CONCENTRATING PLANT
CAMP
TANK
KITCHEN
OPEN-CUT
SCHEELITE ORE HEAPS
M.N.
T.N.
GEOPHYSICAL SURVEY AT RYE PARK SCHEELITE DEPOSIT N.S.W.
GEOLOGY, GEOPHYSICAL LAYOUT AND INDICATION PEGS
(GEOLOGY AFTER H. LLOYD N.S.W. GEOLOGICAL SURVEY)
SCALE OF FEET
100 0 100 200 300 400
LEGEND
TRACK
FENCE
SHAFT
PIT
TRAVERSE WITH OBSERVATION POINTS
INDICATION PEG
ALLUVIUM
GRANITE OUTCROPPING/INFERRED
GREISEN OUTCROPPING/INFERRED
PORPHYRY
Geophysicist
Geophysical Section, Bureau of Mineral Resources Geology & Geophysics
G111-6

PLATE 3A.



J. Horvath
GEOPHYSICIST

18. 2. 52.
DATE

GEOPHYSICAL SURVEY AT RYE PARK N.S.W.

VERTICAL MAGNETIC INTENSITY PROFILES

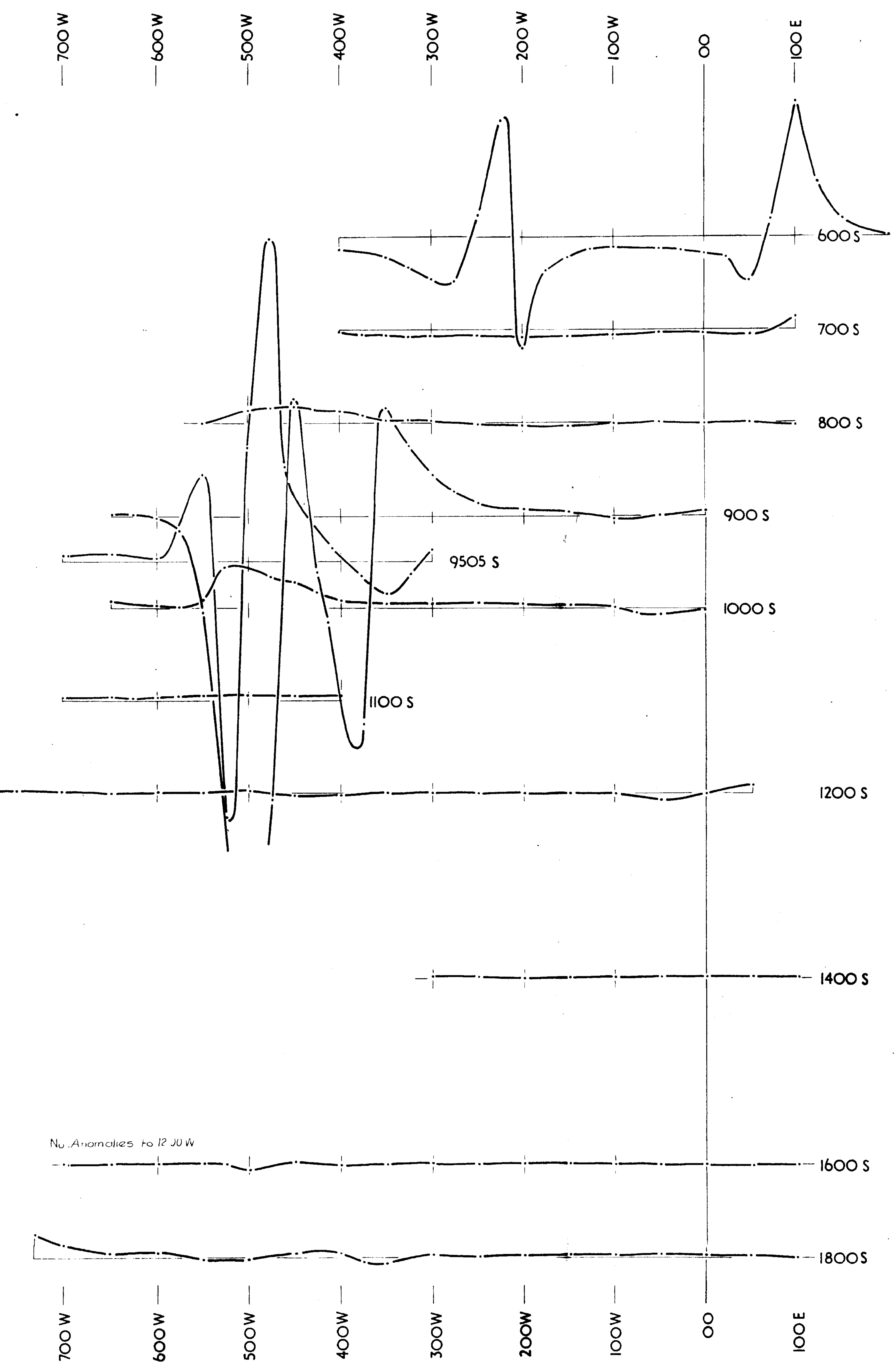
SCALE

DISTANCE 100 0 100 200 FEET

PROFILES 1000 0 1000 2000 GAMMAS

G III-2

Geophysical Section - Bureau of Mineral Resources Geology and Geophysics



I. Horvath
GEOPHYSICIST

18.2.52
DATE

GEOPHYSICAL SURVEY AT RYE PARK N.S.W.

VERTICAL MAGNETIC INTENSITY PROFILES

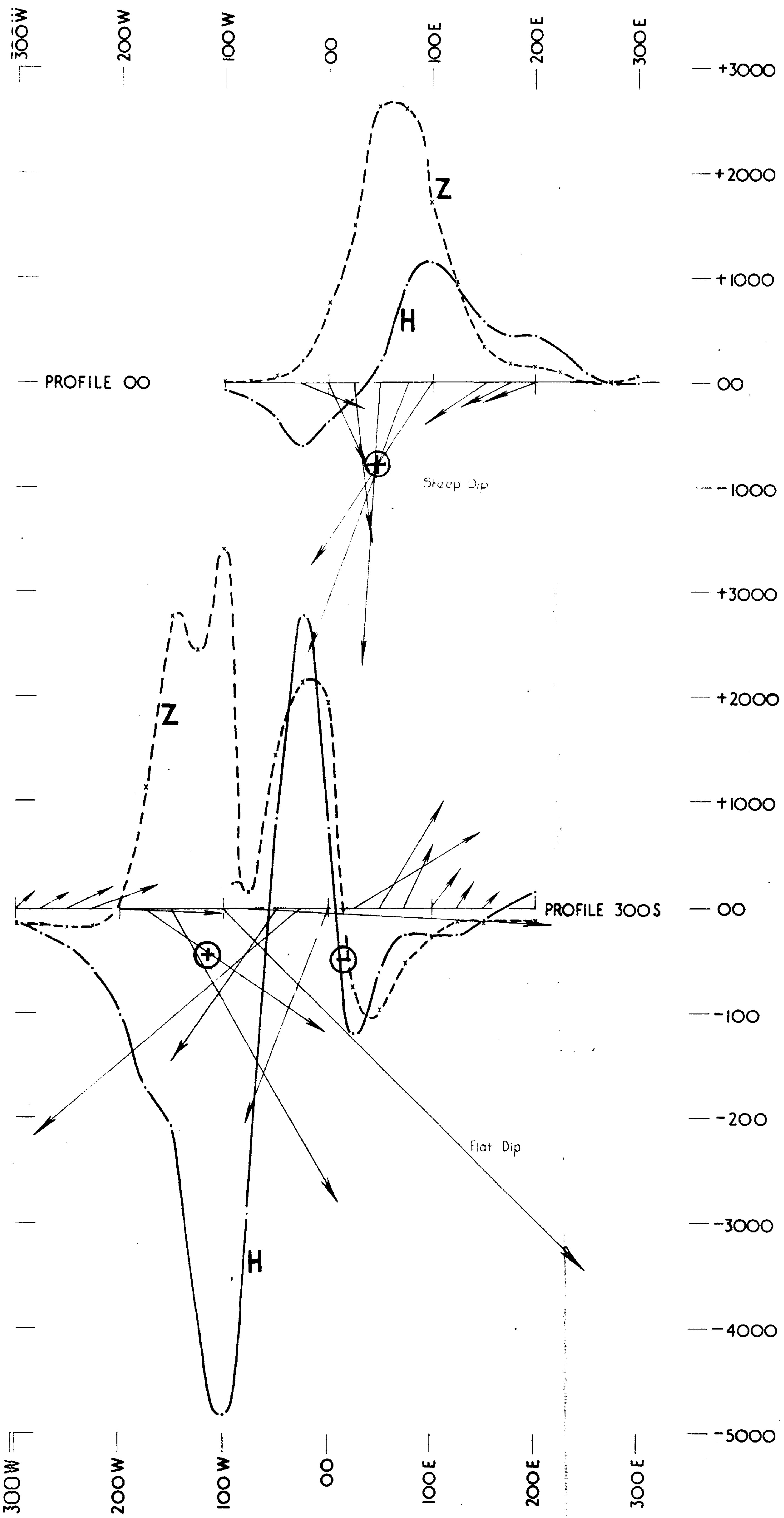
SCALE

HORIZONTAL DISTANCE 100 0 100 200 FEET

PROFILES AND VECTORS 1000 0 1000 2000 GAMMAS

G 111-3

PLATE 3C



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18.2.52
DATE

GEOPHYSICAL SURVEY AT RYE PARK N.S.W.

VERTICAL AND HORIZONTAL MAGNETIC INTENSITY PROFILES AND MAGNETIC FORCE VECTORS (WITH INTERPRETATIONS)

SCALE

HORIZONTAL DISTANCE 100 0 100 200 FEET

PROFILES AND VECTORS 1000 0 1000 2000 GAMMAS

G111-4

PLATE 4

GEOPHYSICAL SURVEY AT RYE PARK SCHEELITE DEPOSIT N.S.W.

POSITION OF TEST DRILL HOLES IN RELATION TO MAGNETIC ANOMALIES

Geophysicist

Geophysical Section, Bureau of Mineral Resources Geology & Geophysics