

NOTES ON PROPOSED OPERATIONS AT GOLD HILL  
IN VICINITY OF THE QUE RIVER

TRACK FACILITIES:

The writer first visited the locality in April 1934, when it was readily recognised that the area was worthy of further prospecting. To facilitate this, the construction of a pack-track was commenced late in January, 1936, and completed, a distance of approximately seven or eight miles, early in April. As J. Cooney, a member of the syndicate interested in prospecting the area, was in charge of the track-cutting party for the last five weeks of that period, it is surprising that the track was left in such an incomplete state, and unless some traffic is maintained on it, the track will be difficult to follow through the myrtle.

Before horses can be taken along the track with safety it will be necessary to cord several places and to cut around two small button-grass plains.

GENERAL GEOLOGY:

Owing to the limited number of rock exposures, due to heavy covering of scrub etc., there is insufficient information available to arrive at more than a suggestion of the geological structure; but the evidence is sufficient to indicate that a belt of schists and associated porphyries, similar to the Rosebery series, extends in a general north-easterly direction through the area.

A generalised section from the junction of the two branches of the Que River in an easterly direction appears to be:-

- (1) Black slates (probably Dundas series)
- (2) chloritic schist
- (3) sheared felspar porphyry
- (4) quartz-sericite schist (in which the highly pyritised bands occur).

PROSPECTING OPERATIONS:

No active prospecting has been undertaken in this area since T. McDonald prospected it some 15 to 20 years ago. Only a shallow shaft and two trenches can now be found. The shaft is reported to be eighteen feet deep. The two trenches, each approximately 120 feet long, are four and seven and a half chains, respectively, south-west from the shaft. These expose, at least three, narrow, highly pyritised bands in quartz sericite schist over a width of two and a half chains. The pyritised band exposed in No. 1 trench is approximately ten feet wide and strikes north  $35^{\circ}$  east, with a steep south-easterly dip. In both trenches ample evidence of hydrothermal activity associated with ore deposition can be seen in the zone of kaolonizations on the west side of the pyritised bands.

The vertical section exposed by these works is about 80 feet but it could not be examined throughout that distance as the shaft is filled with water to within three feet of the collar. Dump material consists of highly pyritised grey schists, with quartz-sericite schists showing impregnation with fuchsite.

CONCLUSIONS & RECOMMENDATIONS:

In view of the fact that this area, almost without doubt, represents the northern continuation of the Rosebery belt of porphyries, schists, etc., any scheme for prospecting this belt should bear in mind the conclusions reached after the geological survey of the Rosebery district which indicated:

- (1) the greater number of the ore-bodies occur along the sheared and fractured margins of the porphyries; and
- (2) ore-bodies are likely to occur along the margin of large sedimentary xenoliths occurring within the sheared porphyries.

There-fore the first consideration of any scheme of prospecting must be to

- (1) trace and define the belt of sheared porphyries
- (2) locate the presence of sedimentary xenoliths if such exist,

and I suggest that trenching be undertaken to determine the limits of these. The existing works could be used as a starting point and lines of trenches extended in a general north-east direction; the location of other trenches could be determined as the work proceeded.

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