

NOTES ON MINERAL LEASE NO. 10305/M -
 70 ACRES CHARTED IN THE NAME OF
 D.J. BUCKLEY. FORMERLY SECTION NO.
 5430/M - 79 ACRES.

The writer acting under instructions from the Director of Mines made a brief examination of the workings on this lease on 19th March last.

Situation and Access. - The lease is situated about 2 miles south of the settlement of Moina. A branch road from the Middlesex road passes along the northern part of the lease. The branch road referred to was formed for a mile or more and was intended to be taken to the Lorinna district along the western side of the valley of the Forth River. The construction of the road which is disused was not continued. It is blocked with trees and fallen timber. A rough bush track from the old road leads from the hill to the workings.

Topographical Features. - The area comprising the lease is situated on the southern slope of Dalcoath Hill which falls away somewhat steeply towards the valley of the Forth River. The surface is covered with secondary growth of trees and thick undergrowth, making it very difficult to walk over and examine the country rocks.

The general topographical features are very favourable for mining purposes.

Economic Geology. - The upper portion of the Section is occupied by quartzite and sandstone rocks, the surface being covered with loose boulders and rubble, rendering it very rough and uneven. Lower down the hill side in the vicinity of old workings the country rock is granite, traversed by quartz and greisen veins. The surface is so obscured by plant growth and fallen trees that very little information relating to the geological features can be obtained.

An old trench disclosed a quartz greisen formation about 20 ft. wide, striking 310 degrees; small quantities of tin can be seen occasionally in the rock.

Lower down to the south east a tunnel has been driven a distance of approximately 140 feet in a general north westerly direction through fairly hard granite rock, through which occur numerous small veins of tin bearing greisen.

At a point 20 ft. from the end of the tunnel a winze has been sunk to a depth of a few feet on a greisen vein carrying apparently a higher proportion of tin than the average class of stone passed through in the tunnel.

The winze being full of water and with no appliances at hand for bailing, an examination of it was impracticable.

An occurrence of a vein of beryl about 3 inches thick is stated to be in the winze. The material excavated therefrom contains crystal of that mineral.

In Geological Survey Bulletin No. 29, Page 95, Mr. A. McIntosh Reid described in detail the geological features of this section as well as referring to the ore occurrences. Since that time there appears to have been very little work undertaken.

Mine Workings:- Apart from the tunnel, the trench referred to, and several other small surface excavations no other development work has been carried out, so far as can be seen. There may be others obscured by the thick

undergrowth of ferns and shrubs.

The walls of the tunnel appear to have been systematically sampled, judging by the regular grooves cut along them. The information, if obtainable, as a result of this work, would be valuable if it has been efficiently carried out.

The only development in the tunnel that appears to be worth attention is at the point near the end where the winze is sunk. The occurrence of tin here is said to be in a much higher proportion in the greisen than elsewhere found in these workings.

Tin ore associated with greisen veins in granite as a rule occurs as localised enrichments and a rich patch cannot be taken as an indication that any large quantity of similar grade stone is likely to be developed.

It is necessary to carry out exploratory work of sufficient extent to enable an estimate of the approximate quantity and value of the ore available to be made. The results obtained as the work proceeds will be the best guide as to future work.

The greisen rock in which the tin occurs is very favourable for concentration. The tin occurs as cassiterite in well formed crystals of the size of ordinary grains of sugar to a finer state.

Detrital Deposit. - From indications in the vicinity of the tunnel it is probable that shallow deposits of tin bearing detrital material occur on the lower slopes of the hill. The economic value of this material will depend upon its possibility of obtaining an adequate water supply for sluicing purposes.

(J.B. Scott) Signed

STATE MINING ENGINEER.

Mines Department,
HOBART.

8/5/30