

TR3-78-80

Examination of Clarke's Lease 58m.48, Zeehan

by A. H. Blissett

Introduction

This lease was examined in detail by D. Burger between November 1st and November 8th, 1952. Since mineralisation was poor, Burger advised against deepening the shaft below 27 feet, and recommended that Clarke's adit (approximately 450 yards south-west of the shaft) should be extended towards the north-east along a shear zone, and should be abandoned after 20 feet if no mineralisation was found. His advice was not followed; no work was carried out on this particular adit, and the shaft has since been deepened to 42 feet with local financial backing. The lease-holders have now applied for further assistance to sink the shaft deeper. The lease was examined on October 22nd, October 24th and October 27th; and Clarke's adit on November, 5th, 1958.

Location

The shaft is approximately 80 yards west of Dunkley's Tram, one mile north of Zeehan Post Office, and half a mile north-east of the old Western Mine.

Country Rocks

Shattered and sheared slates and quartzites of the Dundas Group (i.e., Cambrian age).

Detail*The Shaft*

Sunk vertically to a depth of 42 feet. At the bottom, a drive has been cut north-westwards for 10 feet in highly slickensided slates and siltstone, exposing on the eastern wall a quartz vein up to 8 inches thick, striking to 317 degrees and dipping at 80 degrees to the north-east. The quartz vein has been regarded as the footwall of a "lode" and a crosscut has been excavated for 12 feet to the north-east. A second quartz vein was revealed 4 feet north-east of the first, also up to about 8 inches thick, striking to 313 degrees and dipping north-east at 80 degrees. The "lode" material associated with the veins consists of highly slickensided dark slates and siltstones with masses and stringers of barren milky quartz. No mineralisation was seen underground. About 20 lbs. of material were brought up and later examined carefully. It comprises lumps and masses of slickensided slates with listric surfaces, injected by thin stringers and irregular bands of milky quartz. The only signs of mineralisation were rare grains of galena and a few traces of pyrite.

Adit

The adit appears to have been driven since Burger's visit in 1952. The portal lies 60 feet north-west of the shaft, and the drive was cut for about 25 feet north-west, then towards the north-east for 10 feet. Contorted black slates were noted near the entrance, but most of the eastern wall of the adit is concealed by timber and slime. The roof is of weathered slate with only a few feet of cover.

At the end of the adit there is a small synclinal fold in banded shale, plunging towards true north.

No signs of mineralisation were seen in the adit.

Other Workings (see D. Burger's plan)

Two hundred and eighty yards south-west of the shaft, the great Western Tunnel is the first of five adits in a line, 250 yards long, each driven north-westwards into the hillside. The adits were fully described by Burger, and little work has been done since his visit. The present examination merely confirms his conclusions that mineralisation is very poor.

Conclusions

Slight mineralisation is present in the workings on the lease. Traces of pyrite, galena and sphalerite are associated with zones of shearing within Dundas Group slates and siltstones. It is concluded that mineralisation is too poor to encourage further expense. Any financial assistance would be for exploration only, with uncertain chances of discovering mineralisation of economic value.