Gunnerside Gill Mines

The rich ore veins of Beldi Hill and Swinnergill continue eastwards into Gunnerside Gill and as a result this area has seen intensive mining activity. At the head of the gill is the Blakethwaite Vein which runs from West Stonesdale, through to Punchard Gill in Arkengarthdale; and lower down the gill the Friarfold complex runs through to the Old Gang mines on Melbecks Moor. Many smaller veins run off these principal veins so many mine entrances (levels) were driven into both sides of the gill to explore this rich mineral landscape.



Sir Francis bouse teams and dressing floor

The Lowanthwaite mines extend west until they meet up with the Swinnergill levels. There were three principal veins worked which are marked on the landscape by the three hushes (Gorton, Bunton, Friarfold) on the east side of the gill. The main veins crossing the gill were worked by hushing before the end of the 18th century and then levels were driven into the hush sides in the early 1800's.

Pre 1670 Lord Philip Wharton worked these mines, and they then passed to Lord Pomfret who inherited the Wharton estate. In the early nineteenth century the A. D. Company worked both the Swinnergill and Lowanthwaite mines, and used the Lowanthwaite smelt mill at Botcher Gill until they built the new mill at the Blakethwaite site. By 1827 the new mill was in full production and the older mill closed. On the 1854 Ordnance Survey map it was labelled as 'Old Smelt Mill (ruins).

The Blakethwaite mine is very old and before the levels were driven into the hill side, it was worked by shafts on the moor above which left behind many bell pits that can be seen today. A level was worked from Blakethwaite Gill which hit a vein and the output of the mine passed over 530 tons in one year. A hydraulic engine was installed in the west workings and the water for it was sourced from Moss Dams, which was supplied by a long water course from East Gill Head, a considerable distance away.

Unfortunately the smelt mill and peat store have been vandalised over the years but the flue system can still be seen, rising 150 ft up the steep hill behind the smelt mill ruins. The flue was cut into the solid limestone rock face for much of its length. The peat store is situated across the beck, over a single slab bridge, but is now sadly in ruins with only one open arched wall remaining.

The Sir Francis Level was named after Sir George Denys's son, and was intended to explore the ground below the Friarfold complex and also drain a large area of existing mine workings further up the gill. The A.D. Company and Old Gang Company had a joint interest in this enterprise and so shared the cost and labour of driving it. Work commenced in 1864 but progress was slow; by 1869 only 202 fathoms had been cut at a cost of £10 per fathom. Rock drills and an air compressor were brought in and in 1873 dynamite was used which helped the work progress. The Friarfold vein was reached in 1877 and a shaft was sunk and hydraulic engine installed at a cost of £4,500. The shaft was 43 fathoms deep and water from the Sun Hush Dam was carried down cast iron pipes to the engine which worked two pumps and a hoist. The engines could lift 24 tons of material an hour and pumping 500 gallons of water per minute. Sir George Denys died in 1881 and the engines ceased working in 1882.



Water Pipe and Shaft Cage; Sir Francis Mine

Photograph by Dave Harper.

Large amounts of ore was obtained from the workings the Sir Francis level accessed so two crushing mills were built at the level entrance on opposite sides of the river; one for the Old Gang Company and the other for the A.D. Company. The waterwheel from the West Stonesdale mine was brought down to power the crushers.

Old Gang dressed ore was carried up to the Bunting level and taken underground through the mine workings to emerge from Hard Level entrance at the Old Gang site, on Melbecks Moor, for smelting. This cost much less than transporting it over the moors. The A.D. Company had to carry their ore from the Sir Francis site six miles over the moor to the Surrender Smelting Mill.

In 1882 the price of lead collapsed and work at the mine suspended, during this time the engine sump was flooded and the engine never worked again.

(Source: Raistrick, A (1975): Lead Industry of Wensleydale & Swaledale: Vol 1: Moorland Publishing. Fawcett, E (circa 1939): Lead Mines in Swaledale MS, North Yorkshire County Records Office).