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SILVERBAND MINESHOP,
CUMBRIA

STATEMENT OF SIGNIFICANCE

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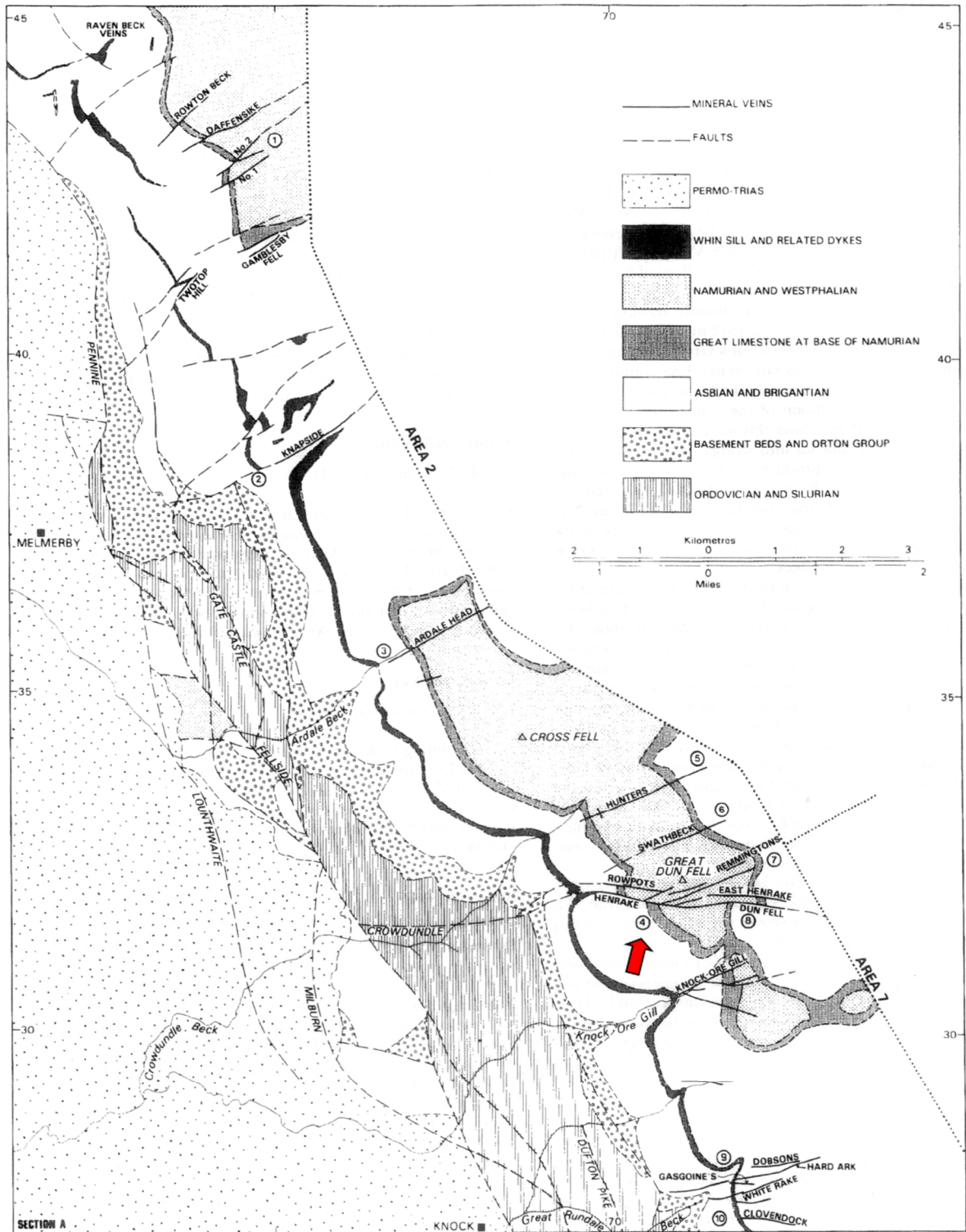


Figure 18 Key map, area 1, The Escarpment

Key to numbered mines 1 Hartside; 2 Knapside; 3 Ardale Head; 4 Silverband; 5 Hunter's Vein; 6 Swathbeck; 7 Loppysike; 8 Dun Fell; 9 Threlkeld Sike; 10 Dufton; 11 White; 12 Murton; 13 Hilton; 14 Amber Hill; 15 Long Fell; 16 Augill; 17 Cabbish.

Plate 1: position of Silver Band Mine, and its association with main ore bodies (after Dunham 1990, 106)

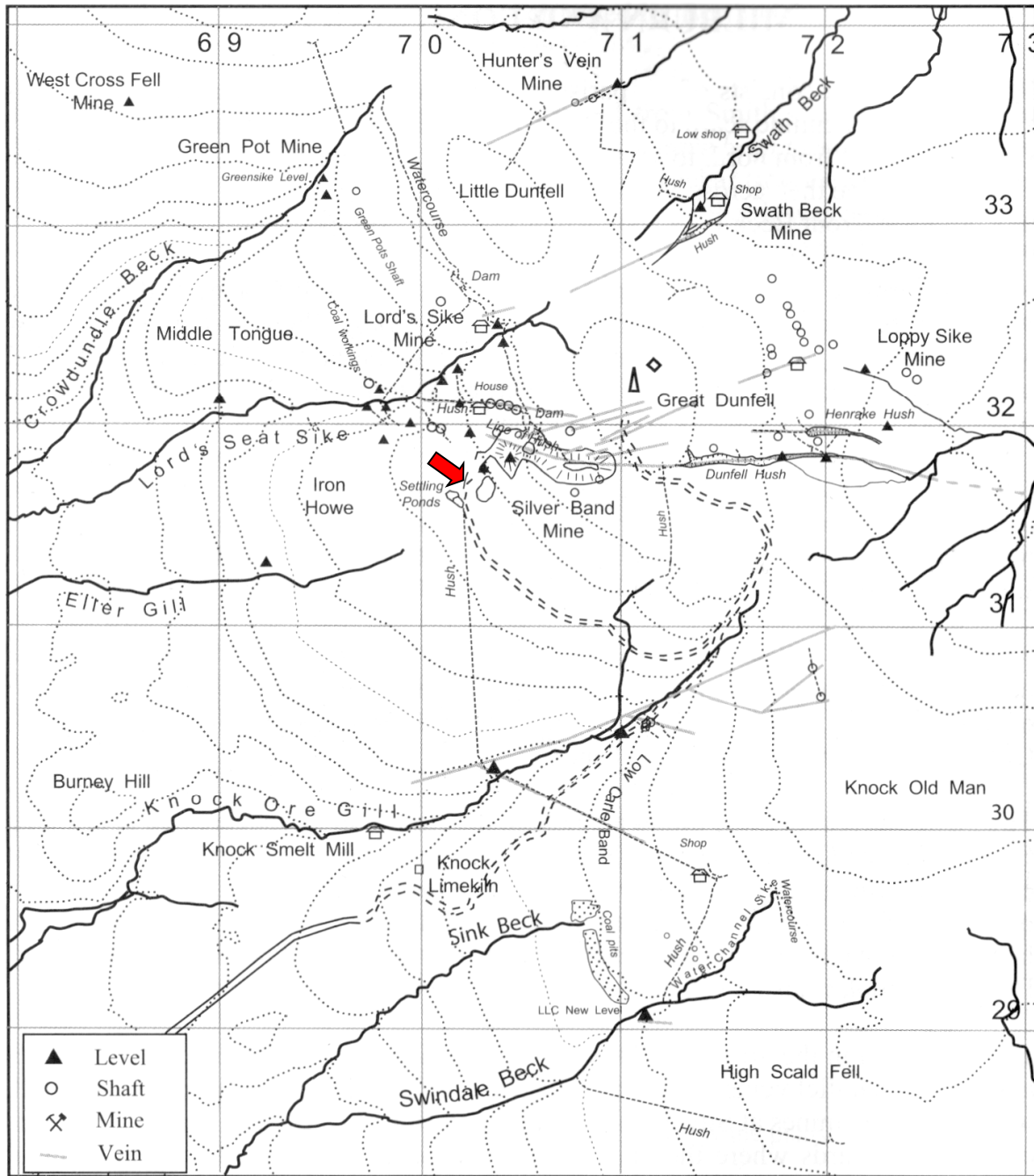


Plate 2: principal mine workings (reproduced from Smith and Murphy 2011, 44); location of mine shop arrowed

Historical Context and Statement of Significance

The Silver Band (or Silverband, or Westmorland Silverband) mine workings lie 850m to the south-west of the summit of Great Dun Fell (NGR NY 702 318), at 652m above sea level. The mine workings occupy a broad yet gently sloping shelf, which steepens to the north as it rises towards Dun Fell, and south as it drops down into the valley below.

“The third Elevation of this Ridge of Mountains is called by the Name of Silverband; which Name it has either by the large Substance of Silver got by the Product of the Ore, or from the Nature of the Ore, which, when refin’d by Art, yields a valuable Product of Silver” (Thomas Robinson, 1709, quoted in Smith and Murphy 2011, 43).

There is quite an extensive complex of mining in this area, most of which lies beyond the scope of what can be discussed here. This report will focus on the surface works associated with Silver Band High and Low Levels, and their later reworking in the 20th century for barytes, but these mines form only a small part of quite an extensive mining landscape stretching across the south and west slopes of Great Dun Fell. The mines worked a series of east-northeast veins springing from the north side of Old Silverband or Dun Fell Vein, a large east-west aligned master vein which is described extensively by Dunham (1990, 109) and which probably does not require repeating here. From the north, the mines worked Rowpott’s Vein, Remmington’s North/Deed Vein, Remmington’s South Vein, Henrake Vein, Slope Vein and Loppyside Vein (Smith and Murphy 2011, 54).

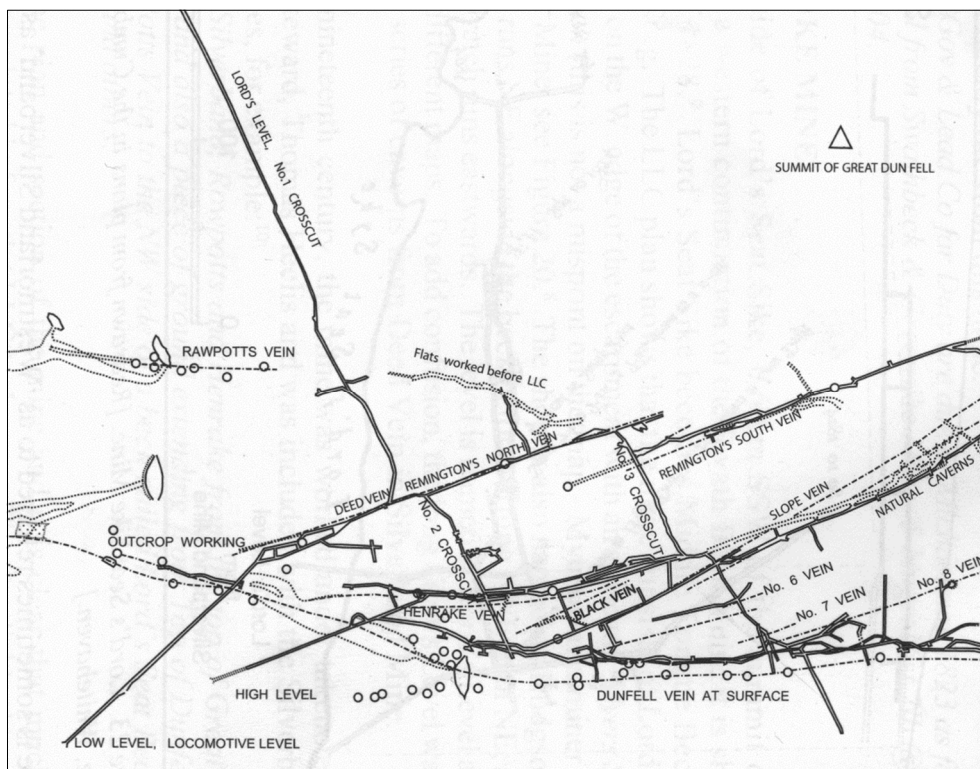


Plate 3: the veins at Silver Band (reproduced from Smith and Murphy 2011, 44); the location of the levels is shown bottom left

History

Silver Band was mined for lead, lead and barytes and later for barytes under a succession of companies; the geology of the mines at Silver Band is described as *‘lead, with massive and*

Crystallized Sulphate of Barytes, in Strata, from the Fire-stone to the bottom of the Great Limestone' (Forster 1821, 317). Mining seems to begin (or certainly be recorded) from the 16th century; though there is no reference to the mine specifically, there is a reference to the '*myndes of Knok and mylburnefell*' in an indenture by the late Earl of Cumberland to Christopher Bainbridge, dated around 1567 (Smith and Murphy 2011, 45). It has been suggested by Dunham (1990, 299) that these mines were worked by German miners – Rowpott's Vein being *Rupert's* or *Ruprecht's* Vein, and Henrake Vein being *Heinrich's* Vein – but there is no definitive evidence of this.

From the mid-17th century, the mines were under the control of the Earl of Thanet (Smith and Murphy 2011, 45). The parish of Long Marton was held by the Cliffords until around 1629. In that year, the Second Earl of Thanet, Sir John Tufton, married Margaret Sackville, daughter of the Earl of Dorset and Lady Anne Clifford. Their son, the third Earl, gained control of the barony of de Clifford from his maternal grandmother, and it was at this point that the parish, and some of the richest lead mines in the area, came into the control of the Earls of Thanet (Murphy and Smith 1999, 104). This land subsequently became the Moor House NNR (Borthwick *pers. comm.*).

A takenote of 5th September 1681 signed by the Rt. Hon Richard Earl of Thanet allowed Richard Joplin to mine for lead ore at Silver Band at a duty of 1/5 ore (Smith and Murphy 2011, 59). Between 1691 and 1693 the mines were worked by Charles Powlett, Lord Bolton; a side note in an account records '*the Duke of Bolton's Lead-Works at Silver Band. Proffits for ye year 1691 being 45 bing Smelted into 12 ffother of Lead, besides 2 ffother of Lead more which ye Slaggs paid for ye smelting of & 10s over*' (*ibid*). The lead ore was smelted at the Knock smelt mill, thought to have been built by the sixth Earl, Thomas Tufton (1644-1729). The date of construction for the smelt mill is uncertain, but it was unlikely to been in existence in 1703, as the Earl's duty ore is recorded being smelted at Bollihope smelt mill (near Frosterley, Weardale, Co. Durham) at this time (Murphy and Smith 1999, 106).

The mines were idle between 1693 and 1694. From 1700, the mines were certainly being worked, but details are quite thin; in July 1703 the mines were inspected by Thomas Elliott, at the request of Thomas Carleton, the Earl of Thanet's new steward, to see if a level was required there, and to see if the mines were being regularly worked (Smith and Murphy 2011, 59). The mines are recorded as being worked in 1709, with leaseholder '*the ingenious and famous*' Mr Bacon (Smith and Murphy 2011, 43). The mines were leased in September 1739 by James Jenkin (*ibid*).

The large deep hushes, shown on the surveys carried out by the London Lead Company (LLC) in 1831, indicate very considerable early activity in the area, prior to the 19th century (Welch 1974,

8). Hushing is thought to have originated in the medieval period but was used extensively throughout the post-medieval period and well into the 19th century. There appears to have been a revival in its use in the early 18th century; a letter of 1736 by Walton and Boag of Alston complains of the damage caused by hushing *'though long known yet was not practised till late years'* (Welch 1974, 18). In 1742, Samuel Storey and Thomas Parsons appeared at the Quarter Sessions for hushing at Silver Band and causing pollution in Newbiggin Beck, which poisoned men and cattle (Welch 1974, 7). *"Old Silver Hush"*, shown on the First Edition Ordnance Survey mapping, is almost certainly of 17th or 18th century date, whereas the long straight hush known as Knock Ore Gill North, which runs from the settling ponds at Silver Band, is probably 18th century in date (Welch attributes this to the London Lead Company, which suggests it may have been for prospection – 1974, 18).

Jeffery's Map of Westmorland, surveyed in 1768 and published in 1770, shows the area but does not indicate any lead mines, despite showing these on other parts of the map, where both *'lead mines'* and *'miner's houses'* are depicted (see Plate 4). The mines were presumably not significantly developed at this time to be included.



Plate 4: detail of Jeffery's map of Westmorland, 1770; note references to lead mines west of Dufton Fell and at Birkdale, but none in position of the study area.

In August 1772, Silverband and Dunfell mines were leased for 21 years to George and Matthew Atkinson of Temple Sowerby, and Adam Wilkinson, gentleman of Nentsberry of Alston Moor,

for a duty of 1/7 of the ore raised, fit and ready for smelting and free of all charges and deductions, with obligations to make full payment every 6 months and to ensure all shafts were covered to stop sheep and horses falling down them. In July 1793, William Todd, William Race, William Richardson and Joseph Hutchinson took the subsequent 21-year lease, details unknown (Smith and Murphy 2011, 60).

The latter lease may have been terminated, as in September 1793, Joseph Salkeld (of Ranbeck), John and Thomas Walton (Nest, Alston Moor, and Milburn respectively, both miners) and Thomas Waugh (Howgill Castle, Milburn, and a yeoman farmer) were granted a lease for Silver Band vein on similar terms. The lease forbade hushing (presumably due to earlier pollution incidents) and expected the lessees to drive a level for the winning of ore, and to employ four miners (Smith and Murphy 2011, 60). This company seems to have run into trouble as the lease was terminated and a takenote (in effect a short lease) was issued to Salkeld and Waugh, with new partners – John Carleton, Johnathan Holmes and Thomas Collin (Lownthwaite, Milburn, a yeoman farmer). Other takenotes were issued to Joseph Dickinson in 1805, and to Thomas Collin, William Waugh (presumably a relative of Thomas), William Graham (Dufton Wood) '*and others*' in 1807. The suggestion is that in the later 18th and early 19th century the mines were in a state of flux and were struggling to provide enough to warrant individuals taking out the longer leases.

On the 7th October 1808, a 21 year lease of Silver Band and Rawpotts Veins, was granted to the same group – Waugh, Collin, Graham, along with Jonathan Robinson (Milburn), John Nicholson (Yanwath), John Bunting (Gateskill, Dalston, yeoman farmer) and John Shield (Tyne Head, Alston) – at a more favourable rate of 1/8 of the ore raised. The mine appears to have been quite productive, from the few records of duty paid. Between 1800 and 1821, the mines of Dufton Fell, Dun Fell, Silver Band and Hilton produced around 1500 bings of lead per annum (Forster 1821, 420).

In 1820, a two-year agreement was drawn up between the Rev. John Heelis (on behalf of the Earl of Thanet) and Robert Stagg of the Governor and Company for the Melting of Lead with Pit Coal and Sea Coal (known as the London Lead Company - LLC) to search and mine lead, and to carry out a detailed survey of the mining potential of the manors of Milburn, Dufton and Knock. The LLC was the most important single producer of lead and silver in the North Pennines, accounting for between one quarter and one third of total output in Cumberland, rising to two thirds in 1866. In 1753, the company began to exploit the ore-bearing rocks at Newbiggin in Teesdale, from its office in Middleton-in-Teesdale. After giving up leases in Wales and Derbyshire (where they were less successful), the company began taking on equivalent leases on

Alston Moor, and from the later 18th century in Weardale (Stanhope and Bollihope), and in Teesdale, as well as in the Derwent valley and estates at Hilton, Murton and Dufton. Mines and a smelt mill were leased in Egglestone from 1771 (Raistrick 1938, 17-18). The LLC had taken over the smelt mill at Dufton in 1801, which was convenient for its Westmorland operations.



Plate 5: T. Hodgson's plan of Westmorland, 1823 (detail); Silverband Lead Mine named.

In 1823, the mines were leased to the London Lead Company for 21 years at a general grant of 1/7 duty in ore apart from those with existing leases and takenotes, and this lease was renewed in 1844. Waugh, Collin and Graham had taken another lease on the 18th July 1838 for 21 years, but this ended eight years later when a new 21-year lease was issued for Silver Band and Rawpotts Vein to the LLC on the 18th June 1846.

The returns for the period prior to the expiry of the first lease suggest that most of their mining was only carried out at Silver Band, though it was probably a convenient collecting point for the other mines. Between 1821 and 1879, the London Lead Company only mined a total of 15,062 tons of lead concentrates from all its mines in the Thanet-Tufton royalty, with perhaps on half coming from Silver Band, a poor return for the 17,500 ft (5.3km) of level which had been driven.

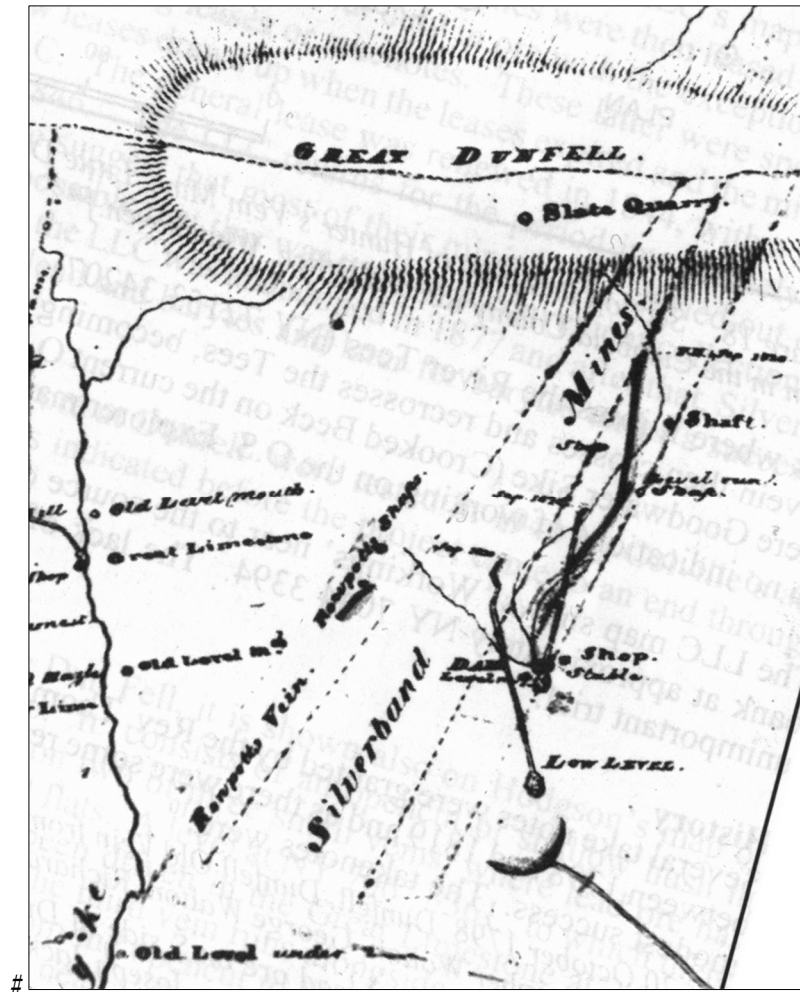


Plate 6: early 19th century London Lead Company plan (reproduced from Smith and Murphy 2011, 44); 'Low Level' is depicted with hush dam and hush to south

Between 1863 and 1876, 1,007 tons of lead concentrates were obtained, containing 75% lead, with 6.9oz silver per ton of lead obtained (Dunham 1990, 111).

Mining by the London Lead Company was abandoned in 1877, and the mine was reported as idle in 1880 (Smith and Murphy 2011, 63). Between 1884 and 1888, the Silverband Mining Co. Ltd (of Hartford Manor, Northwich) operated the mine, but it became idle again in 1888.

Between 1914 and 1918, an unsuccessful attempt was made, under Mr Brammal's direction, to mine for barytes at Silver Band, which was then disused (Welch 1974, 8; Dunham 1990, 111); in the 1930s, it was run by the Silverband Syndicate (cited on the Durham Mining Museum website¹). Mining was resumed during World War II, and from 1939 to 1963 the site was worked by B. Laporte & Company (Laporte Chemicals Ltd from 1949) who extracted over 215,000 tons of dressed barytes from the Silverband Low Level (Dunham 1990, 111); in 1950, 65 employees

¹ <http://www.dmm.org.uk/colliery/s937.htm>

were recorded at the mine (40 below ground, 25 above²). An aerial ropeway was constructed 3.5 miles (5.6km) long, to transport the crude ore from the mine to a mill at Millburn Grange (Plate 7), where a further ropeway took it on to Long Marton railway station (Dunham 1990, 111); it was said that the miners travelled to the mine on the upturned buckets. Mining ceased because drainage problems made extraction uneconomic and cheaper ore was available in Eyam, Derbyshire. The ropeway and mill were dismantled (supposedly taken to Aviemore ski resort in Scotland – Smith and Murphy 2011, 64).



Plate 7: the mill at Millburn Grange, 1949 (© Fred Raynes)³

Despite the closure, considerable reserves remained, and opencast operations resumed in 1973, when Mr H. Taylor acquired it and built a mill at the mine itself, working the spoil heaps west of the High Level, and producing 75,000 tons of barytes (Dunham 1990, 111). Smith and Murphy (2011, 64) record the mines as being run by a Mr Horace Taylor (Minerals) Ltd in 1980, but from 1983, it was being worked by Crag and Cutriss Ltd, a local haulage contractor (Dunham 1990, 111). In the later 1980s, it was being run by the Silverband Barytes Company (cited on the Durham Mining Museum website⁴) and in the late 1990s by Waitings Minerals of Cliburn, who were reprocessing spoil heaps for barytes (Smith and Murphy 2011, 65).

² <http://www.dmm.org.uk/company/l021.htm>

³ https://www.aditnow.co.uk/Photo/The-Silverband-Concentration-Plant-Milburn-Grange1949_74621/

⁴ <http://www.dmm.org.uk/colliery/s937.htm>

Barytes extraction has caused a lot of damage to the historic workings, particularly after the closure of the modern operations in 2006, when the site was landscaped leading to the loss of a lot of historic features (Smith and Murphy 2011, 55).

Map Regression

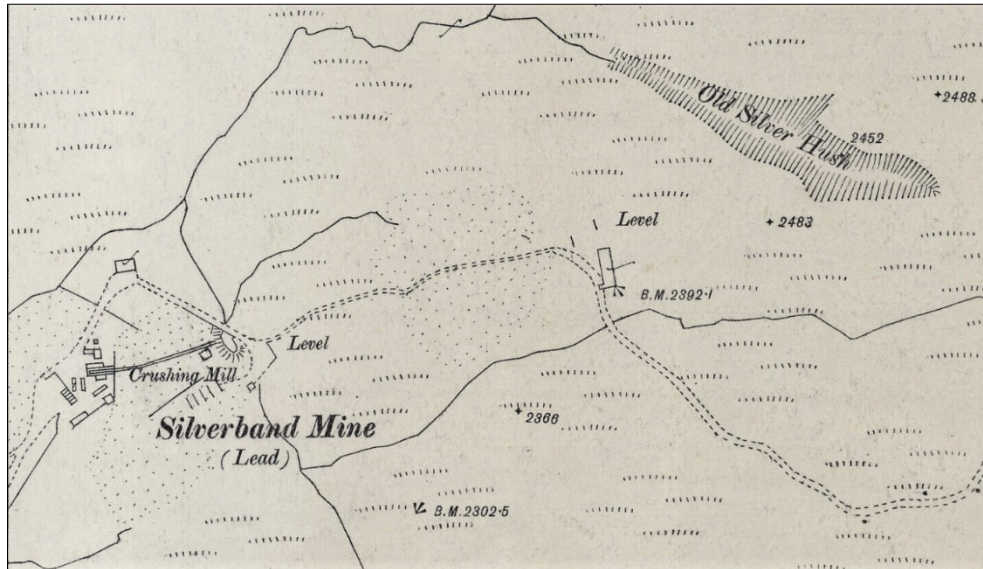


Plate 8: First Edition 25" Ordnance Survey Map, 1861; the High Level, with its mine shop, is shown just right of centre. The Low Level is left of centre, with the crushing mill depicted to the west of this level

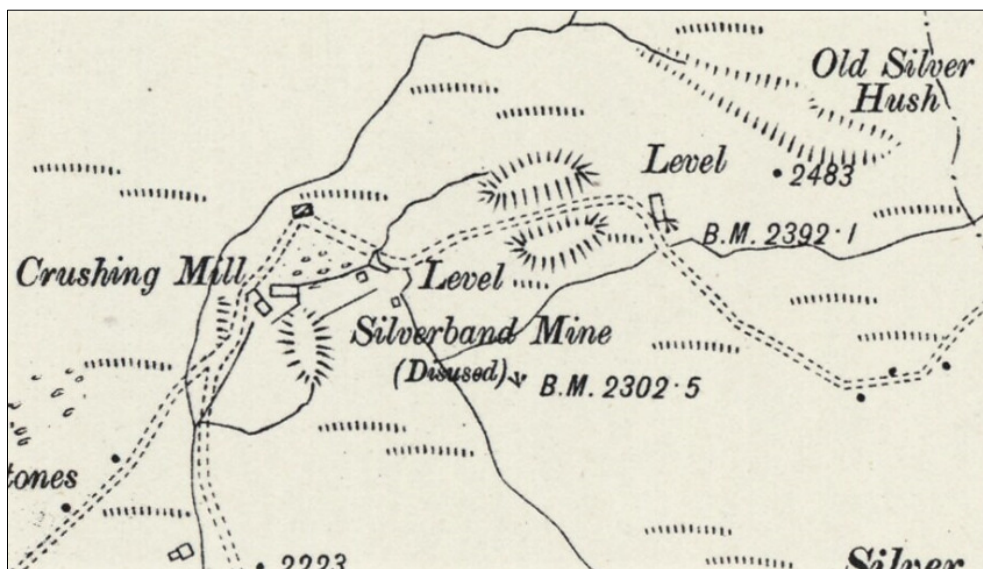


Plate 9: Second Edition 6" Ordnance Survey Map, 1900; little change, with the mine marked as 'disused'

The evolution, and subsequent demise, of Silver Band Mine, is captured in the snapshots provided by the different editions of Ordnance Survey mapping from 1861 to 1957. The First

Edition mapping of 1861 (Plate 8) depicts the main features of the mine, at the time of the LLC tenure; the Low Level is shown, with a small pond to the west fed by leats; a small square building lies to the south of the level on the spoil heap (possibly a gun-powder store – powder stores became more prevalent as a consequence of the Metalliferous Mines Act (1872) and the later Explosives Act (1875), but early examples are common). Along the western side of the spoil heaps are the bouse teams (for storing the ore to be crushed).

The pond at the level portal was drained diagonally downhill to a wheel-pit, set to the west of a broad north-south aligned retaining wall, with buildings either side which would have held water-powered crushing machinery. Crushing machines were introduced at the end of the 18th century, and the LLC had installed them at most mines by the 1820s. The installation of crushing machines was only possible once the dressing floors had been centralised. The equipment was expensive, and it would have been impractical to have one at every mine. The introduction of crushers coincided with the change from the miners being responsible for their ore being washed to the company taking on the task and charging the cost against the miner's earnings.

There are several small buildings within the yard surrounding the wheelpit, and to the south-west, a north-west to south-east aligned wall has a series of structures abutting the southern side, which are probably Brunton buddles. Buddles were traditionally a set of sloping troughs into which crushed ore would be washed to flush away impurities.

According to Raistrick, mine shops were introduced by the London Lead Mining Company at their mine sites in 1818, partly to meet the real difficulty of miners getting to and from the remoter mines to their homes. The 'shop' was a substantially built cottage constructed close to the mouth of the mine, and was fitted with rough bunk beds, a cooking range, and *'a few simple necessities, such that a few miners could with considerable comfort live in it during the week, walking home on Saturday and returning Monday morning'* (Raistrick 1938, 19-20). To the north of the complex, on a bend in the road leading up to the High Level, is a large rectangular building which is almost certainly a mine shop. The High Level is shown, with a large north-south aligned building adjacent, which is the mine shop and stables shown on the earlier LLC mapping (Plate 6); two long east-west finger-mounds are depicted extending west from this level. The Second Edition mapping of 1901 (Plate 9) shows little change to this layout, though the mine is marked as *'disused'* from this point onwards, as it had been from 1888.

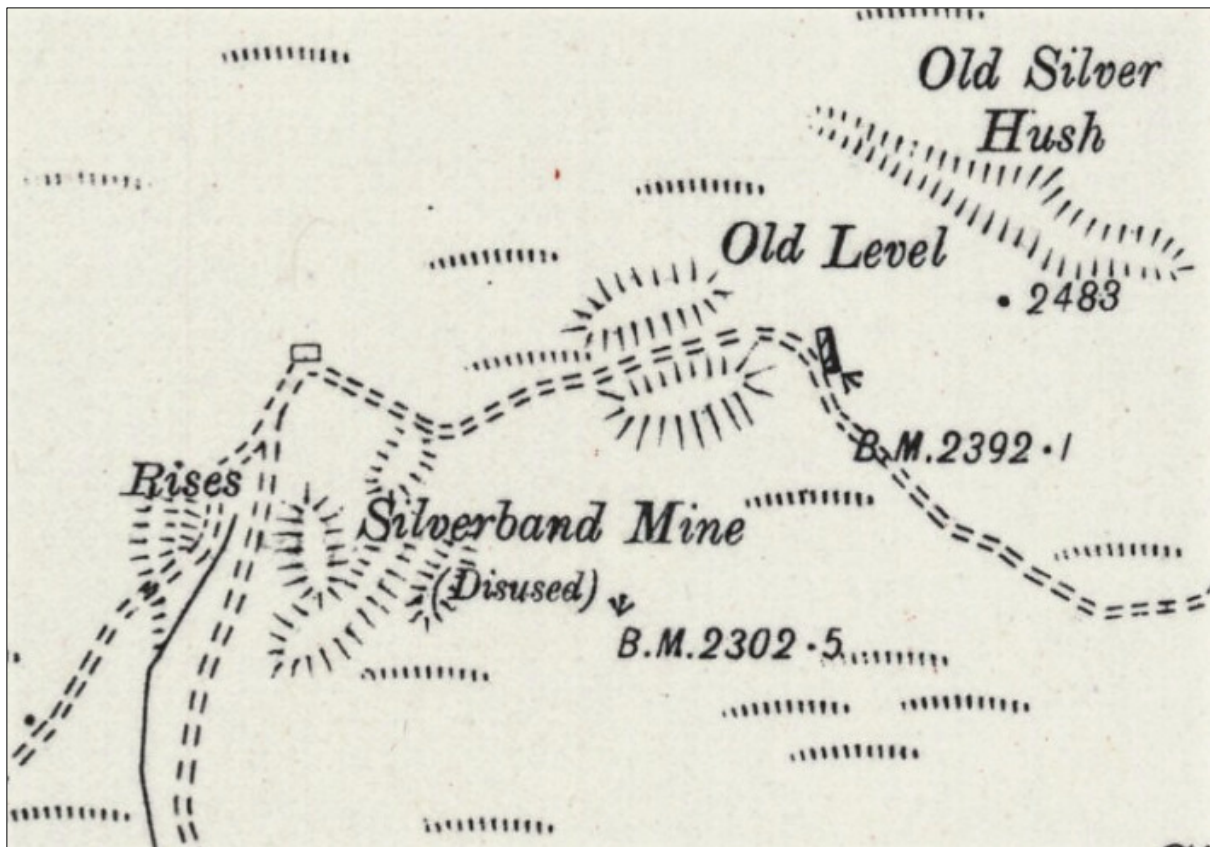


Plate 10: Third Edition 6" Ordnance Survey Map, 1919; all buildings, other than the mine shops, have been cleared

The Third Edition of 1919 (Plate 10) shows the most significant change; the buildings around the wheel-pit and the wheel-pit itself, are no longer depicted, and have presumably been cleared, with only the two mine shops remaining as standing structures. The mines are shown as little more than spoil heaps here, suggesting wholesale clearance of the buildings by this date. The sole activity in this period was low intensity mining for barytes during WWI, and there was clearly underinvestment in any structures at the mine at this time, with most being cleared away and the stone reused for other purposes.

By the time of the issue of the 1957 Ordnance Survey map (Plate 11), new buildings are shown, including the plant for the aerial ropeway, and new buildings constructed on the site to the west. The L-shaped building depicted west of the ropeway terminal is probably the building which forms the focus of this study. The mine shops are no longer depicted, though the north gable of the High Level shop may be shown, suggesting it is near collapse. These buildings all relate to the tenure of the site by Laporte Chemicals Ltd between 1939 and 1963.

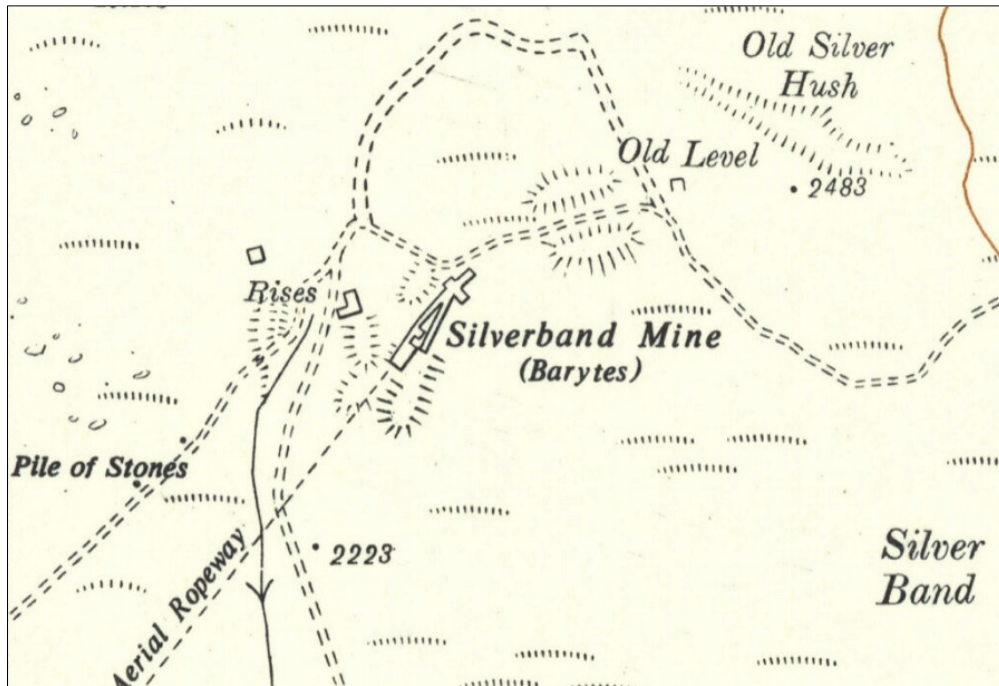


Plate 11: 1:10,000 Ordnance Survey Map, 1957; aerial ropeway and new buildings shown, but mine shops no longer depicted (though north gable of High Level shop may be depicted)



Plate 12: Google Earth, 2019; High Level (Blue Arrow) and Low Level (Green Arrow) shown, with High Level shop (pale blue box). The Silver Hush is entirely destroyed by Waitings opencast works.



Plate 13: panorama of main mine workings; the Silver Band mine shop is to the centre of the photograph, with Rowpott's Vein hush dam to the extreme right. The land in-between has been scoured out by open cast barytes operations, with the big pond (centre-right) a product of these.

The Archaeological Remains

Despite extensive reworking of the area for barytes, particularly in the latter half of the 20th century, evidence for the earlier lead mining at Silver Band mine does still survive, albeit in a fragmentary state. The following represents a very brief synopsis of the surviving elements, based on a short site visit, but further detailed survey is recommended.

The Mine Shop



Plate 14: The mine shop, facing west; the building shows multiple phases of construction

There is a single building surviving intact at Silver Band mine, which Smith and Murphy (2011, 57) perhaps understandably refer to as a mine shop, stating that this is as depicted on the First Edition Ordnance Survey map, but this is not in fact the case. The mine shop is in fact a much later (20th century) building; though the date of its construction remains unclear, it appears from

map regression (above) to relate to the Laporte occupation of the site and was therefore probably built in the 1940s.

The building is oriented roughly north-east to south-west, and measures 20.5m in length by 5.5m in width (though much wider with its western lean-to additions). The building has clearly been extended several times; the main body of the building appears to be a long structure, 11.70m in length, with a brick fireplace at each end; this probably ties up with the building depicted on the 1957 Ordnance Survey mapping. The interior is better described by Countryside Consultants (this report), but broadly speaking the building divides in thirds, with the southern third comprising a well-lit office, accessed by a door on the west side and with two broad windows, and remaining two thirds comprising a long room, much more poorly lit, with smaller windows along its western side, but blind on its eastern side. This latter room would have served as the miner's quarters, but probably not in the traditional sense, and perhaps little more than a cloakroom and mess room. A door in the north wall leads into an extension, 3.75m in length, comprising a single room with small window on the east side, which may have served as a store. A series of additional extensions abut this, with a wider building abutting the north side and measuring 6.3m by 4.5m (again further stores). There are very modern lean-tos on the north-west side: a modern lobby to the main office door, containing toilets, built in brick and measuring 4.45m by 2.25m; and a partially open extension to the stores, measuring 5.55m by 3.40m. The interior contains evidence for its former use in the form of shelving, coat-hooks, and workbenches, and timber floor boards survive in the main room.

Modern Mill

North of the mine shop was the gravity-fed barytes mill, built by H. Taylor in 1974 and now entirely dismantled. This lay against the west side of the large spoil-heap, all of which was material which had derived from Silver Band Low Level, or which had been added from open-cast and reprocessing works elsewhere on the site. Interestingly the 20th-century mill occupies roughly the same position as the early 19th-century crushing mill, which is shown on the First Edition Ordnance Survey mapping (Plate 8). Material from reprocessing was loaded into the mill from the elevated position on the spoil heap, where it was crushed and separated, with separated materials collected at the bottom near the mine shop. Photographs prior to its dismantling show the jiggers for separating the material in position, and an example of this machinery survives standing on the west side of the site, and west of the mine shop, in good (though deteriorating) condition.



Plate 15: Taylor's gravity mill (© Malcolm Street 1985)⁵, with in situ plant before it was demolished (© CJ Philip 2015)⁶



Plate 16: The Low Level, facing north-east; the picture on the right shows the blockage

Low Level

Silver Band Low Level, also referred to as Locomotive Level (NY 7031 3176, 697m AOD) was driven by the London Lead Company in the early part of the 19th century and was reopened to become the main working level for Laporte's barytes business. The large spoil heap to the south was levelled and used by Waitings (and earlier companies) to load material into the barytes mill below. The arched portal of the level survives well, and there remains a continuous flow of water from the interior suggesting the level is still draining the mines, though the level is blocked by a

⁵ <https://www.geograph.org.uk/photo/73468>

⁶ <https://oldindustrial.wordpress.com/2015/01/29/silverband-mine/>

collapse c10m into the interior. There is also a small collapse at the entrance, which partially blocks it.

High Level and Shop

Silver Band High Level (NY 7048 3183, 727m AOD) lies 150m to the east of the Low Level, and was driven by the London Lead Company at broadly the same time as the Low Level; there may have been a further redundant level to the north, which is described as 'run' on the LLC surveys; this may have been the level mentioned on Joseph Salkeld lease of 1793. The High Level appears on First Edition Ordnance Survey mapping of 1861, which clearly depicts the mine shop just south of the entrance, the LLC describing it as a shop and stable on their plans (Plate 6). The level is hard to find as it appears to have collapsed at the portal entrance and been entirely grassed over; its approximate position can be gauged by following the earthworks of drains and waggonways which lead towards the hillside from the finger dumps, which still survive in good condition. The mine shop lies a short way to the south of the level, and is visible as little more than an earthwork, though the south-western corner of the building is just visible (Plate 16).

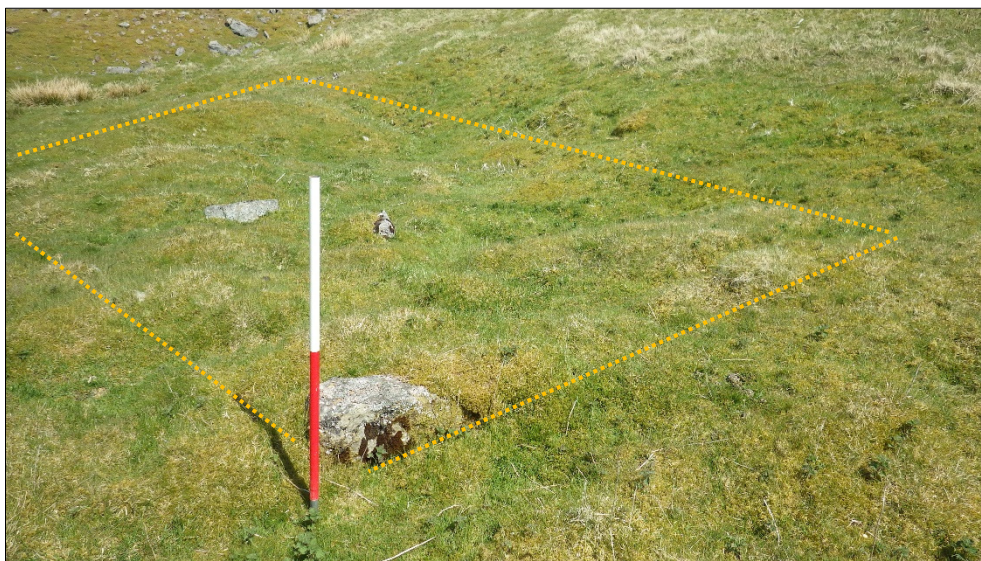


Plate 17: The High Level mine shop, facing north; the ranging pole marks the south-west corner.

Hushes

There are numerous hushes in the vicinity of the study area, but none of these lie particularly close to the site itself. Perhaps the best surviving is Knock Ore Gill North (Plate 18), the north-south aligned very straight hush, depicted on Plate 2, and said by Welch (1974, 18) to have been carried out by the LLC in the 18th century. There is evidence of ore dressing along the south side (two separate small dressing floors were noted during the visit, which only examined its northern end), and at least one circular ore bin, completely choked up with deads but still discernible. Smith and Murphy (2011, 57) correctly indicate that the settling ponds just south-west of the

buildings are located “*on the site of the hush dam at the head of the long straight hush running down to Knock Ore Gill*”. This is clearly shown on the early 19th-century plan drawn by the London Lead Company (see Plate 6). There is now no earthwork evidence for the reservoirs in their original form.

The Old Silver Hush, which lay to the north of the High Level, was been entirely destroyed by the opencast works, but evidence of dressing floors is visible just south its location at NY 7080 3175, on the line of an old stream, which now drains entirely into the open cast pit and is nothing but a dry bed.



Plate 18: Knock Ore Gill North hush, facing south; the pale scar to the right of the hush in the centre of the photo is a dressing floor.



Plate 19: base of aerial ropeway pylon, with standing example in far distance.

Aerial Ropeway and Terminus

The 1940s aerial ropeway survives well and is in fact the only element associated with the mine which is designated as a Scheduled Monument (Historic England 1021009). The designation includes the 17 surviving iron pylons extending over 1.75km, and a brake house at its midpoint, but does not extend up to the site itself, ending just short of the access track to the mine. The northern terminus of the ropeway, which is depicted on the Ordnance Survey mapping of 1957 (Plate 11) now only survives as some fragmentary walls, which include a brick fireplace which looks very similar to that in the mine shop. To the south, the concrete base of one of the pylons survives well (Plate 19). Contemporary photographs of the site in the late 1940s show an arrangement of low one-storey buildings in this location (Plate 20). The buildings are now dwarfed by a telecoms mast, with a modern breeze-block hut to the rear containing its power supply.

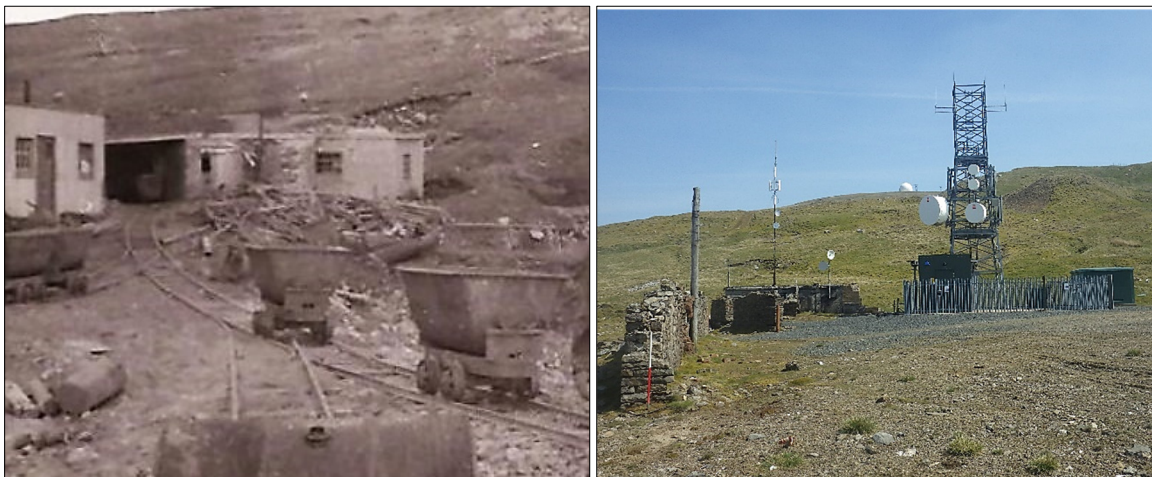


Plate 20: the terminus in 1949 (© Fred Raynes)⁷, and a similar view today

STATEMENT OF SIGNIFICANCE

Overall Significance

The Silver Band mine complex is of regional significance as an example of a 18th – 19th century lead mine and dressing floor, forming part of the wider North Pennines mining landscape, but this significance is lessened considerably by its condition. The rapid assessment has established that the evidential value of the standing remains on the site is fairly low; little of its former life as a lead mine is evidenced from what remains on the site now, this being confined solely to the Silver Band Low Level. The remaining structures all have a life much later in Silver Band's history, being associated with the extraction and reprocessing of barytes in the 20th century. This

⁷ https://www.aditnow.co.uk/Photo/Entrance-To-Silverband-Mine-1949_74619/

evidence is, in itself, of worth, as highlighted by the designation of the 1940s ropeway as a Scheduled Monument by Historic England, but none of the elements within the study area were considered worthy of designation at the time. Notwithstanding this, there is likely to be considerable sub-surface evidence of the former life of the site as a lead-mine, as the reprocessing involved the movement of large quantities of material down onto the site, which is likely to have buried a lot of the earlier remains relating to all aspects of the dressing processes including buddling, jigging and slimes, as well as crushing and sorting.

The site is of considerable historic value, in particular the links with the Earl of Thanet, with the London Lead Company, and other smaller concerns. Further research is necessary to fully understand the historic development of the site and how it functioned, especially how the main dressing floor met the needs of the other mines in the area. Further survey and excavation may answer some of these questions. Within the wider landscape, important evidence of early lead mining survives in the form of hushes, levels, shafts, and dressing floors, and would warrant detailed examination. Evidence of leats, reservoirs/dams and other water management systems also appear to survive well.

The site has a considerable communal value with regard to the level of interest inspired in the industrial history of the area, particularly mining. There are a number of local and regional industrial interest groups including the Cumbria Amenity Trust Mining History Society (CATMHS) and other mine exploration groups and local history societies who would be interested in the site and there is the potential to bring these elements together to advance a better understanding of the site and its surroundings. The site also lies adjacent to a popular walking route, and its interpretation would benefit passing tourists.

Site Specific Values

The following table summarises the site-specific significance of the Silver Band Mine according to four high level themes as set out in Conservation Principles, Policies and Guidance for the Sustainable Management of the Historic Environment (English Heritage, 2008):

Evidential Values - the potential capacity of the dressing floors to yield primary evidence about past human activity (building design, extent of survival, etc).

Historical Values - the potential of the dressing floors to advance the historic narrative – the connection between the present and the past through association with people, events and aspects of life.

Aesthetic Values - the potential for people to derive sensory and intellectual stimulation from a place, through design, art, character and setting.

Communal Values - the potential for the dressing floors to bring people together through collective experience or memory.

Table 1: Summary of heritage significance

<p>Evidential</p>	<p>The degree of preservation of material related to the mining of lead and its associated dressing floors appears to be poor, though later elements related to the extraction of barytes survive in good condition. These elements include standing walls and include the mine shop. The later phases appear to have been built on top of, and bury, the earlier phases which implies a good sequence of material could potentially be preserved.</p> <p>Sub-surface remains could potentially include evidence of all phases of lead processing. Usually processing moves downhill, with sorting and crushing higher up and jigging and buddling lower down, but this is not clearly demonstrated here, and may have been arranged differently.</p> <p>The group value of the site in terms of the wider industrial landscape and in the more immediate context of understanding the development of the mines on Dun Fell appears high.</p>
<p>Historical</p>	<p>The site can address a number of themes:</p> <p>The association of the mine with the Earl of Thanet (and his lessees), the London Lead Company (Lead) and later Laporte Chemicals Ltd (Barytes);</p> <p>The association of the site with smaller earlier and contemporary mining concerns, and its later use by smaller concerns related to reprocessing for barytes;</p> <p>The wider historic significance of the site in terms of understanding the pattern of settlement and communication across the North Pennines;</p> <p>The historic importance of the site in terms of understanding the lives of the lead miners and how the partnerships were organised and administered;</p>

	The importance of the site in relation to the reprocessing of barytes and the lives of those working there in the 20th century.
Aesthetic	<p>The position of the mine set high up on the south slopes of Great Dun Fell have aesthetic appeal, despite the lessening of this by the later reprocessing and the use of the site for modern telecom masts etc. The site is intriguing and promotes a sense of discovery and exploration for those who make a detour from the path to investigate.</p> <p>The mine building that survives provides an important focus for the mine and its interpretation, albeit despite its later date, and is important to the aesthetic significance of the site.</p> <p>Views both from and around the site are key to the setting of the site, in particular the long view across the valley to the south, with the pylons stretching away in the distance.</p>
Communal	There is already considerable interest in the history and archaeology of the site and the potential to bring together groups to explore both the evidential and historic elements of the mines and dressing floors to promote a greater understand and appreciation of the lead and barytes mining heritage in the area.

FURTHER RECOMMENDATIONS

The site remains vulnerable to flooding, erosion and associated subsidence through ground saturation, which place the significance of the site at considerable risk. There are also a number of other issues which threaten not only the dressing floors but also the remains of the upstanding buildings, such as destruction by stock, and to a lesser extent stone-robbing. In order to preserve and enhance the significance of the site, a formulation of a management plan is recommended to ascertain the nature and extent of the risks to the asset and determine a workable programme of stabilisation. In the absence of such a plan, and as a short-term measure, the following should be considered:

- Further recording of the mining landscape - both landscape survey and historic building recording;

- A regular programme of condition monitoring. Any future survey can be used as a baseline to inform this work which should be undertaken at least on an annual basis or after episodes of heavy flooding;
- Addition information should be added to the Cumbria County Council Historic Environment Record (HER) regarding details of the mines.

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