

FRIENDS OF BRANDY BOTTOM COLLIERY, PUCKLECHURCH

Newsletter: N^o 1, November 2013



As this is the first newsletter, it is covering events from the start of 2013. It is intended that future newsletters will be published at intervals throughout the following year.

Work on site has been at a low key, as the first 5-year licence from English Heritage, allowing us to work on site, expired towards the end of 2012. As a result 2013 has been a year for paperwork, with the applications for the Heritage Protection Agreement and Scheduled Monument Consent making their way through the system. While we wait, the specifications for essential preservation works to the Horizontal Engine House, chimney, Pumping Shaft capping, and Old Boiler House have been drawn up. All the indications are that we will get the required approvals fairly soon.

The lease with Ibstock Brick also expired during 2013, and is in the process of being renewed. We would like at some time in the future to extend the area covered, to include certain areas currently lying outside the fence such as the structures associated with the fan ducts. We had thought the ducts, built of brick with a poor quality concrete cap, were an insignificant modern addition. However to EH the Brandy Bottom structure is a rare, if not unique, example. This type of fan ducts was not solidly built, so were easy to knock down. The one at Brandy Bottom is in danger of collapsing, as a tree and pressure from the material on the batch have caused the southern-most wall to bow inwards. This is the left-hand one in the picture to the right. Alleviating the pressure is another item on the list of 'things to do'.



Progress During 2013

There was a meeting with English Heritage in February, where the main objective was to start the process of renewing the permit to work on the site. It was at this meeting that we found out about the importance of the fan structures.

The site inspection during the first work party of the year in March revealed that some masonry had fallen from the top of the chimney during the winter, and this was confirmed by the examination of 'before' and 'after' photos. There



had also been suspicions that there were more structures associated with the fan housing lying

outside the fence. Clearance of some of the undergrowth revealed the engine bed for the fan's electric drive motor, which can be seen to the right of the tools in the photo at the bottom of the previous page, while the photo to the right shows recording of the area in progress. The ducts inside the fence were also partially cleared of rubble, including one brick with 'Shortwood' stamped into the frog (figure 1). In his book on the Bristol Coalfield, John Cornwell records that the fan had been of the Sirocco pattern. The brick ducts inside the fence would have been used to reverse the direction of the air flow, as this cannot be done by changing the direction of rotation of the fan.



The floor of the Cornish Engine House was completely cleared of spoil and fallen masonry by April. It is a mixture of stone and tiles, dominated by the stone engine bed and 2 of the 4 securing bolts which were uncovered in 2012. There is a crack running right across the bed. One of the 2 remaining securing bolts is located off-centre, with an empty socket nearby where it may have originally been located. One wonders whether the crack and empty socket are connected, and if so which came first. The annular wear ring where the base of the cylinder had chafed against the bed can be seen in figure 2, which also shows the crack running through the stone. The floor was measured (photo right), photographed, and then backfilled for protection against the elements.

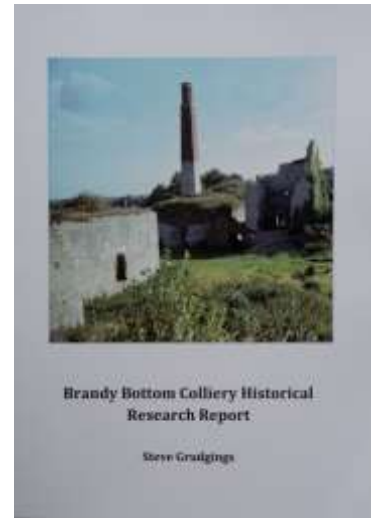


Regrettably there were two visits by vandals: the first at the end of March/early April in and the second in early May. In the first they targeted bricks in the arched roof of the Pumping Shaft crossover. These had been propped at the previous work party as they were liable to fall off, and the photo to the right shows the supports being fitted. The vandals removed the props, they also knocked the loose bricks off using some of the stones stockpiled nearby. The target in the second visit was the access hatch to the New Pit shaft. The metal cover was levered off the concrete base. Inspection of the damage showed that the frame had merely been cemented onto the top of the concrete capping. The hatch was repaired by the Coal Authority within a short space of time, and this time they bolted and cemented the frame to the concrete capping. But before that happened the opportunity was taken to make a photographic record of the inside of the capping. Many generations of youngsters have played in the area, despite the perimeter fencing, gaining access by cutting holes in the perimeter fence. Pressure on the site will increase when the new houses are built on the other side of the cycle path.



A presentation on Brandy Bottom was made to the 'South Wales and West of England Regional Conference on Industrial Archaeology', which was organised by the Bristol Industrial Archaeology Society on 20 April. There was also a site visit for those who wanted after the presentations.

The report into the history of Brandy Bottom was published in July 2013. It includes excerpts from surface maps dated 1881, 1903, 1915 and 1936, which shows how the layout of the surface buildings and associated railway lines have changed over time. There are also excerpts from the underground maps held by the Coal Authority, and a number of recent photos of the surface buildings. Steve is sure that there is more historical information waiting to be discovered, languishing in some poorly catalogued archive. He has not discovered any photos, apart from the aerial surveys reproduced in the report and Jonathan Maxwell's 1965 photo of the Cornish Engine House that adorns the front cover of the report. Talking to passers-by has also uncovered further information since publication, which still has to be followed up. These include information on the inhabitants of the cottages, and the presence of a scrap metal merchant on site. The passer-by could not recall the date, apart from the fact that the railway was still running. Copies of the report are available by post from Martin Leathwood for £7, plus £2.50 p+p, by contacting him on mlduckhole@aol.com.



There is a considerable amount of building stone in the Vertical Engine House as a result of the collapse of the walls at some time in the past. It was decided that the task of moving the recovered stones to stockpiles around the site would be made easier by levelling the ground outside the entrance to the Engine House. This started in July, and the initial discovery of a firm stone base outside the entrance led to the uncovering of a flight of steps running along the edge of the building towards the New Boiler area. These can be seen in the photo at right. The treads appear to be made from recycled Dramway sleepers. The steps may well have been used for access to the tops of the two Lancashire boilers that were probably located in this area. The circular plate with a slot (figure 3) was found here, which has been identified as a weight for a safety valve.



Some of the brickwork supporting the base of the chimney in the Old Boiler House has collapsed (see picture to the right) and will need to be replaced. The north-eastern wall is also bowing inwards due to pressure from the adjacent batch. A test trench was dug in the area in August, to provide information about the state of the ground. This is needed for drawing up the specifications for conservation work. A wagon identity plate was found while digging this trench (figure 4). It was carried by wagon 4259 of the Bristol and South Wales Wagon Company Limited. Research showed that the company had been



started in 1860 as the Bristol and West of England Wagon Co, before changing its name in 1863. The company went into liquidation in March 1934, and Handel Cossham was one of the original directors.

Photographs and measurements were taken in the undercroft of the Horizontal Engine House in August. The brick supports for the machinery are still in place (figure 5), and there are traces of grease thrown from the ropes still in situ on the wall at the back of the picture. There is also a Colliers' Font in the northern corner (figure 6).

A possible source of building stone for repairing walls was located in the grounds of a house being built, where a quantity of lias stone and clay had been stockpiled during the excavation of the basement. Following negotiations, we have been picking through the heap (see photo to the right) and so far about 10 tonnes of good-sized stones have been delivered to the mine site by the end of October with the prospect of more to follow.



A site clean-up at the end of October saw a fair quantity of old plastic, cans etc. being taken off-site. This included the objects thrown down the alcove pit by the vandals. It was noticed while clearing the pit that there was a semi-circular collar at the base of the pit, about 6 feet below the surface and just above the water level at the time. This can be seen in the picture to the right. At present the reason for this structure is unknown. The source of the water has yet to be established. If it is groundwater, then there is a steep hydraulic gradient between the mine site and the nearby pit used as a rubbish dump. According to its superintendent, the water table there is some 40 m below the surface.



Nature continues to try to reclaim the site, despite all our efforts. The bracken on top of the Old Pit heapstead keeps on coming back, despite being strimmed several times. It will also have to be stopped from trying to colonise the New Pit heapstead ramp, as the top of the ramp and the heapstead are a wild flower meadow in summer with around 20 or so different species growing there. The picture to the right was taken in July, and shows the area at the top of the New Pit heapstead ramp. There was a glut of brambles this year. The birds must have been so stuffed that they have left many on the bushes to shrivel up. Buzzards have been seen, and heard, flying over the surrounding fields, and on one occasion two kestrels flew over the site and appeared to land on the chimney. The trees around the



site are filled with bird song in spring, to be replaced at this time of year by the squawks of seagulls from the nearby dump.

Guided tours have been given to interested passers-by throughout the year.

There have been 17 work parties during 2013, and the AIBT would like to thank those volunteers who are not members who have helped in all sorts of weather conditions. These varied from the cold of April (figure 7) to the balm of July (figure 8).

Future Projects

Associated with the application to English Heritage for the Scheduled Monument Consent and Heritage Protection Agreement was an application for a grant to complete the essential elements of conservation work on the Horizontal Engine House roof, chimney and Old Boiler House. However we were informed at a site meeting in November that all available funds had been diverted elsewhere. As a result we will have to restrict our efforts in 2014 to those elements that can be self-funded, unless we are able to get a grant from another body. This is being investigated.

The intention is to install a waterproof membrane on the top of the Horizontal Engine House roof, which will stop rain from penetrating the bricked roof. This should stop the inner brick skin from spalling in frosty weather. The masonry at the top of the walls will have to be patched to provide a firm edge for the membrane. Also on the immediate list is the installation of an internal ladder in the chimney, so that the state of the masonry at the top can be ascertained. Hopefully the masons will be able to conserve the stonework at the top by working overhand from an internal platform. The exposed top of the Pumping Shaft needs to be patched on safety grounds, and access to the flue and the pit in the alcove restricted. After that there is work on the fan ducts, stabilising the walls and the base of the chimney in the Old Boiler House, the New Pit passage, putting some form of protection onto the tops of the Cornish Engine House walls ... The list gets longer all the time as we discover more about the site.

Unless otherwise stated, all photos are by Robin Whitworth (© 2103).



Figure 1 – Semi-bullnose brick with ‘Shortwood’ stamped into the frog, found in the fan ducts.



Figure 2 – Engine bed in Cornish Engine House, showing the crack running through the stone base and the annular groove worn into its top surface.



Figure 3 – Weight for a safety valve, found by the steps outside the Vertical engine House.



Figure 4 – Wagon owners' plate found in Old Boiler House.



Figure 5 – View of the undercroft of the Horizontal Engine House, with grease sticking to the far wall. © Steve Grudgings, 2013



Figure 6 – Colliers' font in the undercroft of the Horizontal Engine House. © Steve Grudgings, 2013



Figure 7 – A pause for conversation on a cold day in April ...



Figure – 8 ... The end of a successful work party on a hot July day.