BRIDGE 37- CALDON CANAL

HERITAGE STATEMENT



TYPE OF APPLICATION

This heritage statement accompanies the listed building consent application for the partial demolition of bridge 37.

LOCATION

The bridge is in Hazelhurst, east of the village of Endon in Staffordshire and provides access for farmers/residents to the fields and long-term moorings over the Caldon Canal. Vehicle access can only be gained via a track off Leek Old Road (off A53) which is approximately 500m north of the bridge.

The bridge is a grade II listed structure. A copy of the listing description is shown in appendix 1. The bridge is also located in Caldon Canal Conservation Area. A map of the conservation area is in appendix 2.

DESCRIPTION OF WORKS

The listed building application concerns the partial demolition of a grade II listed brick arch bridge. The bridge needed to be taken down due to safety concerns in March 2020. The course of events is detailed in the design and access statement.

LEGISLATION CONTEXT

PLANNING (LISTED BUILDINGS AND CONSERVATION AREAS) ACT 1990

In the case of the partial demolition of bridge 37 the 1990 Planning (Listed Buildings and Conservation Areas) Act, the following sections are relevant:

- Section 16 (2) makes it a statutory duty for a local planning authority, in considering whether to grant listed building consent for any works to a listed building, to; 'have special regard to the desirability of preserving the building or its setting or any features of special architectural or historic interest which it possesses.'
- Section 66 (1) sets out a similar duty for a local planning authority when considering whether to grant planning permission for development which affects a listed building or its setting.
- Section 69 defines conservation areas as 'areas of special architectural or historic interest the character or appearance of which it is desirable to preserve or enhance'.

Regard must therefore be had to both the desirability of preserving the fabric and character of the listed bridge, as well as the desirability of preserving its setting and the contribution it makes to the conservation area. Therefore, where this is not possible and a level of harm has been sustained, it follows that a justification is necessary.

NATIONAL PLANNING POLICY FRAMEWORK

The National Planning Policy Framework (NPPF) 2012 provides the Government's national planning policy of the conservation of the historic environment, in respect of information requirements for applications it sets out that:

'In determining applications, local planning authorities should require an applicant to describe the significance of any assets affected, including any contribution made by their setting. The level of

detail should be proportionate to the assets' importance and no more than is sufficient to understand the potential impact of the proposal on their significance'.

It is therefore accepted that in order for the LPA to consider this application it is necessary for the applicant to provide a detailed justification for the partial demolition and an assessment of the heritage significance of the bridge and how any heritage values have been adversely impacted by the works.

DATE OF PREPARATION

June 2020

APPLICATION

Canal & River Trust

STATEMENT PREPARED BY

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HISTORY OF THE SITE

The Caldon Canal was built as a branch of the cross-country Trent & Mersey Canal. It runs from Stoke-on-Trent to Froghall in Staffordshire. The Canal opened in 1779 and runs for 18 miles with 17 locks.

The impetus to build the Caldon Canal came from John and Thomas Gilbert on taking lease of the Caldon Limestone Quarries, a canal was envisaged to serve these quarries and link into the Potteries and the Trent & Mersey Canal.

Eminent canal engineer James Brindley surveyed the route in 1772, shortly before his death later that year (Shill, 2011). The Act of parliament was granted in May 1776 with construction work beginning in June 1776 (Shill, 2011).

The Act enabled the proprietors to borrow £25,000 to fund the construction, which was completed in 1779. Initially, there were 15 locks, eight rising from Etruria to the start of the summit at Stockton, and 7 falling- the number was later increased to 17 (Lindsay, 1979). 1.5 miles (2.4 km) of the canal followed the bed of the river Churnet near Consall. A second Act of Parliament was obtained in 1783 to authorise a new tramway, and to extend the canal by 530 yards, which included the Froghall tunnel (Hadfield, 1985).

Traffic on the Trent & Mersey main line was such that it suffered from water shortage in dry periods, and water levels on the Caldon branch were often too low at such times, as the water was used to keep the main line moving. In 1796, the company wanted to build a reservoir at Rudyard, to improve the situation, and a branch to Leek was included in the Bill, as it was the only way to obtain the

consent of the Leek authorities and landowners for the reservoir. The Bill was defeated in Parliament, after which the Peak Forest Canal Company proposed to build a branch of their canal from Marple to Leek, and on to join the Caldon branch. It would also have included a reservoir at Rudyard, but the plan was short-lived, as the Trent and Mersey succeeded in getting their bill passed when they submitted it to Parliament for a second time in 1797.

In order to ensure that the water from Rudyard could be used to supply the main line, the Leek branch had to join the top level of the Caldon branch, and so the original route with the Park Lane locks was closed and a new route built, in the early 1800's a three-lock staircase between the junction and the old line of the canal. Bridge 37 dates from this time, as John Rennie designed the bridge and he died in 1821, so it dates from when the locks were constructed initially (Shill, 2011).

Between 1841-1842 the section Endon to Hazelhurst on the Caldon Canal was altered for the second time when The Trent & Mersey Committee decided to replace the triple staircase locks due to congestion. A new flight of three locks with side ponds were constructed (Shill,2011).

With the coming of the railways, the Trent & Mersey Company canals were sold to the North Staffordshire Railway, with the formal takeover occurring on 15 January 1845. They were keen to promote the canals and railways as mutual feeders, and so maintained the canals, with the exception of the Uttoxeter branch, which was closed by an Act of Parliament obtained in July 1847, so that the Churnet Valley Railway could be built along its course. The tramway from Froghall to Cauldon Quarries was replaced by a new cable-operated railway in 1849. It included inclined planes at Froghall, Oldridge and Cotton. Trains consisted of up to nine wagons, each capable of holding 6 tons of limestone and around 1000 tons a day were moved from the quarries to the canal (Hadfield, 1985).

Traffic gradually moved away from the canal to the railways. In 1904, Endon basin was built, where limestone brought from the quarries by the railway could be transferred to boats. One of the major users of the limestone, based at Sandbach, closed in 1920, and the cable railway to Froghall closed in the same year. Limestone was no longer transhipped at Endon from 1930, and the canal saw virtually no traffic. Responsibility for the canal passed to the London, Midland and Scottish Railway in 1940, who closed the Leek branch under an Act of Parliament obtained in 1944. The last commercial traffic was the transfer of coal from Endon to Cheddleton, which ceased in 1952 (Dean, 1997).



FIGURE 1: THE UNDERSIDE OF BRIDGE 37 LOOKING TOWARDS HAZELHURST LOCK 12 CIRCA 1962 (CANAL & RIVER TRUST ARCHIVES). THIS DEMONSTRATES THE CLOSE RELATIONSHIP TO LOCK 12 AND HOW BRIDGE 37 HAS AN IMPACT ON THE SETTING OF LISTED LOCK 12.



FIGURE 2: HAZELHURST JUNCTION CIRCA 1962 (CANAL & RIVER TRUST ARCHIVES).

SIGNIFICANCE OF THE ASSET

STATEMENT OF SIGNIFICANCE: CALDON CANAL

A branch of the Trent & Mersey (from summit at Etruria to Froghall Basin), mainly built as an agricultural lime carrying canal. Later branches to Uttoxeter (now derelict) and Leek with reservoir at Rudyard feeding canal via a 2.5-mile feeder were added.

A good collection of structures, especially stone formations on Leek Branch. Excellent, high value groups of canal/industrial buildings at Froghall, Cheddleton and Hazelhurst, where the Leek Branch crosses the main line on the 1841 aqueduct. The junction between the canals has been altered on several occasions. Locks, bridges and cottage complete the scene. Bridge 37 is part of this group.

Landscapes range from industrial/post-industrial Stoke on Trent to rugged upland scenery around Hazelhurst and Cheddleton. There are numbers of former agricultural/industrial rural buildings and dwellings alongside the canal, including lime works.

From Froghall Basin a tramroad ran to limestone quarries at Caldon Low: four different tramroad routes have existed historically.

ASSESSMENT OF SIGNIFICANCE

The 'Conservation Principles Policies and Guidance', published by Historic England, states that 'understanding the significance of places is vital' and that 'articulating the values and significance ... is necessary to inform decisions about the future' (2008, 21).

The Historic England guidance describes a range of inter-related 'heritage values' that may be attached to historic places:

- Evidential value: the potential of a place to yield evidence about past human activity.
- Historical value: the ways in which past people, events and aspects of life can be connected through a place to the present – it tends to be illustrative or associative.
- Aesthetic value: the ways in which people draw sensory and intellectual stimulation from a place.
- Communal value: the meanings of a place for the people who relate to it, or for whom it figures in their collective experience of memory.

HISTORIC VALUE

Bridge 37 is part of the early canal network, and as such has historic value. The route of the Caldon Canal was surveyed by James Brindley, but John Rennie, another prominant canal engineer, designed bridge 37 and that of nearby bridge 36, which is similarly in style. The bridge is a well preserved example of Rennie's work, having only had minor repairs and retaining all of its original stone copers. Rennie designed many structures along the canal network and surveyed the route of the Lancaster Canal. This gives the bridge associative value.

The layout of the locks and canal at Hazelhurst has changed and this provides illustrative value showing re-modelling on the canal network, this strive for improvements, so typical of the

pioneering attitudes which fuelled the construction of canals. Therefore, the collection of structures at Hazelhurst are an important surviving testimony to the innovative spirt of canal engineers.

The design and form of bridge 37 provides illustrative value showcasing the engineering and construction techniques of the early nineteenth century. Even minor utilitarian structures in rural locations were embellished with careful architectural design.

Evidential value

The bridge demonstrates construction techniques in the early-nineteenth century. We can see the materials they used, what they used to fill the arch and the dimensions.

Aesthetic Value

Bridge 37 also has some aesthetic value, being a single arch brick bridge with dressed copings and a stone string course at carriage level. It also has four diagonal piers at the end of each wingwall. The bridge is an attractive feature in the landscape and visible from the Leek branch making a positive contrition to views from that towpath over the Caldon Canal and as the lands raises up in fields beyond towards the A53. This view is shown in appendix 3.

Setting

Historic England define setting as: 'The surroundings in which a heritage asset is experienced' (2015: 2). Setting is important in the understanding of a site and can change over time.

Canal structures are often threatened by modern industry and are at risk of losing their special character, due in part to their linear nature. However, this group in a secluded and rural area have retained their historic character.

The heritage significance of bridge 37 cannot be fully appreciated without considering its setting due to the re-modelling of the junction it is linked to the surrounding structures and part of the fine group at Hazelhurst Junction. Bridge 37 is adjacent to lock 12, which is also a designated structure (see figure 1).

Of this area Crowe commented that 'Hazelhurst locks; all purpose-made components of canals are here fitted into a rolling landscape: stone locks with footbridges, by-weirs, and short pounds between them; a standard design accommodation bridge, with the white iron parapet of a roving bridge glimpsed beyond; a lock side hut, a lock cottage' (1994: 17). It is a relatively unaltered canal scape of the early and mid-nineteenth century (see figures 3 and 4).

IMPACT ASSESSMENT

The works to bridge 37 have had a very harmful, irreversible impact on the significance of the structure, impacting negatively on its heritage values. Other options potentially less harmful to the heritage significance of the bridge were discounted on safety grounds- please see the design and access statement for the options appraisal.

Now that works to make the structure safe have taken place not much of the bridge is standing. The barrel arch, parapets, towpath wingwalls (for access) and offside wingwalls have all been taken down. Parapets were knocked inwards which allowed the stonework and bricks to be scraped back by the excavator so as much of the original fabric could be saved as possible, but many of the bricks were not salvageable.

The remains do still have some historic value, dating from the 1800's and it has not lost its association with John Rennie but it is no longer a good example of his work and the conscious design has been lost, so too has the aesthetic value.

In a very basic sense, there is evidence that a bridge did cross at this point, and the ghost of the arch is still visible on the towpath abutment- but the physical details of the bridge construction have been removed (see figure 5).

The illustrative value, which showed, the attention to detail, is not discernible from the remains. However, many of the dressed stones, including the impressive corner stones, have been saved.

Furthermore, the impact on the setting of listed lock 12 which is immediately adjacent to the bridge is very high (see figure 1). The bridge was part of a complete canal scape of the nineteenth century so the character and quality of this stretch of the Caldon Canal Conservation Area has been compromised. Views along this stretch have been altered by the partial removal of the bridge and will change the experience for towpath users and boaters when travelling down or up the lock flight. The authenticity has been diminished and completeness of the stretch has been lost due to a significant change in what as a relatively unaltered stretch (see figure 3 and 4).

The April 2008 'Conservation Principles Policies and Guidance', published by Historic England, states that 'if all or part of a significant place will be lost, whether as a result of decision or inevitable natural process, its potential to yield information about the past should be realised. This requires investigation and analysis, followed by archiving and dissemination of the results, all at a level that reflects its significance.'

In line with this Bridge 37 was recorded by Survey Operations who carried out a laser survey before the work began, documenting the bridge and capturing its evidential and historical values (see figure 6).

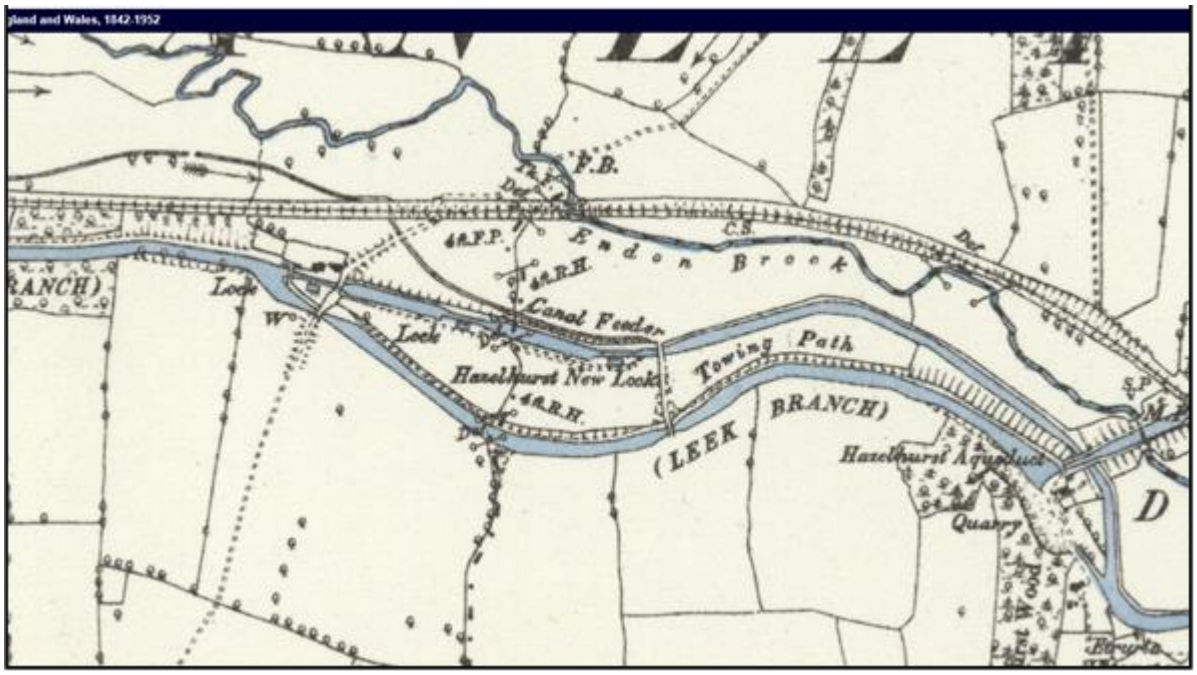


FIGURE 3: MAP FROM 1880 SHOWING HAZELHURST JUNCTION AND THE STRETCH DOWN TO HAZELHURST AQUEDUCT CIRCA 1962 (CANAL & RIVER TRUST ARCHIVES).



FIGURE 4: HAZELHURST JUNCTION TODAY WHICH IS LITTLE ALTERED.



FIGURE 5: THE TOWPATH SIDE REMAINS OF ABUTMENT OF BRIDGE 37. THE GHOST OF THE RAISING ARCH AND THE PLINTH STONE.

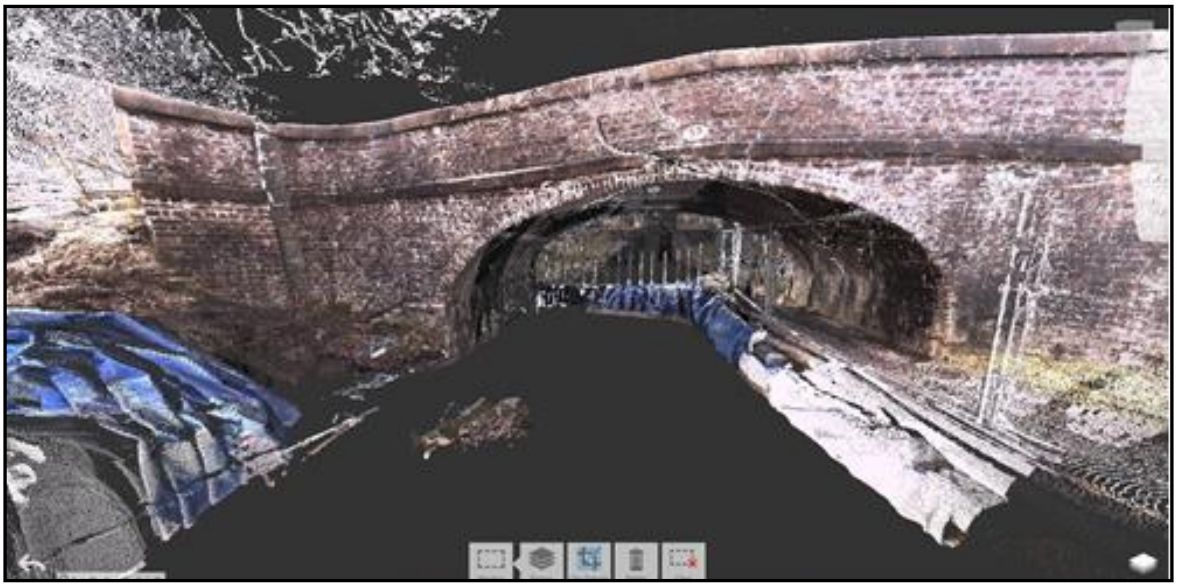


FIGURE 6: SCREENSHOT OF THE RECORDS MADE OF BRIDGE 37 BEFORE THE PARTIAL TAKE DOWN.

APPENDIX 1- LISTED BUILDING DESCRIPTION

Details

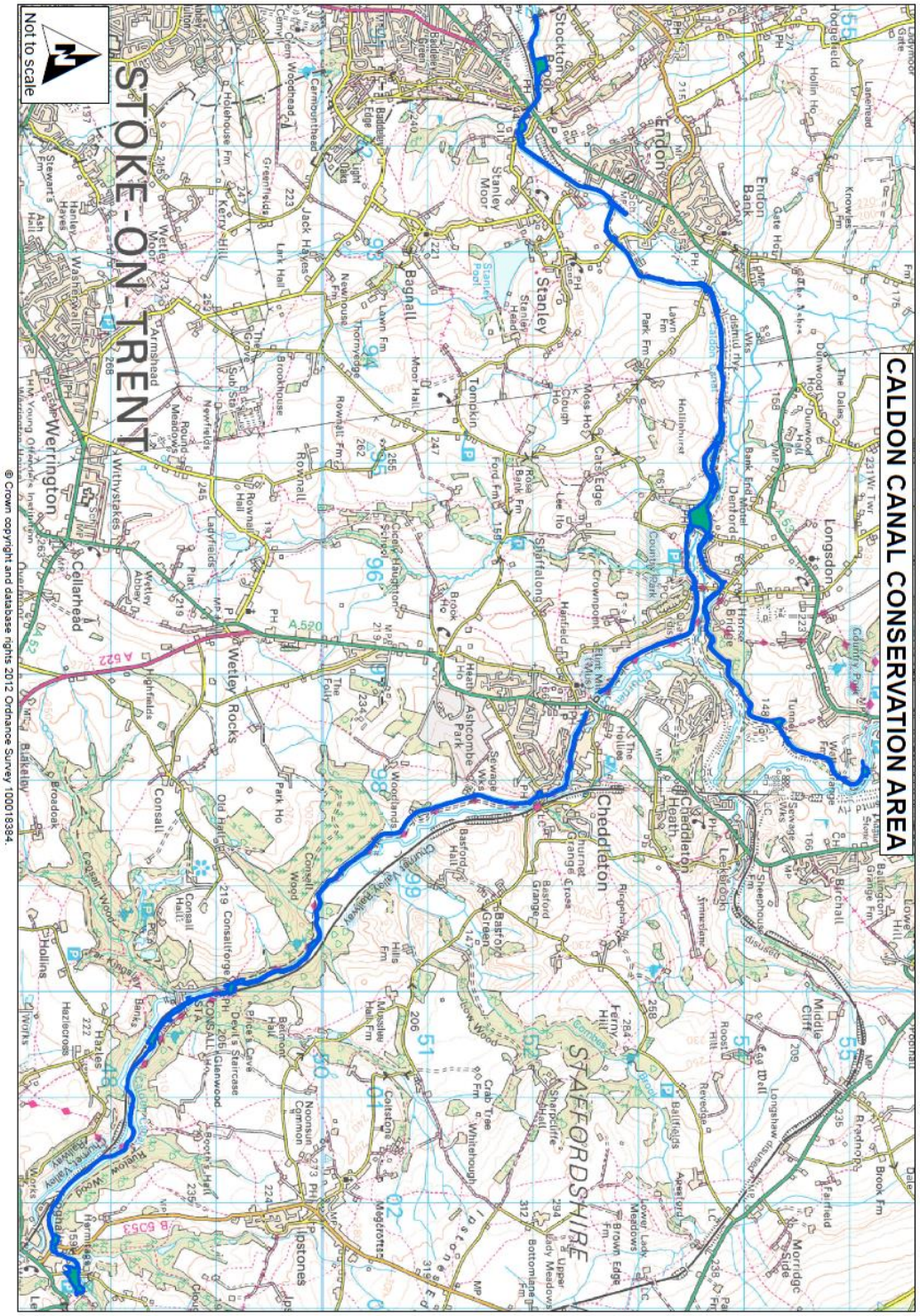
CHEDDLETON C.P. CALDON CANAL SJ 95 SE SJ 950 537 5/42 Bridge at SJ 950 537 -

GV II

Accommodation bridge. Early C19. Brick with stone string at carriage- way level and copings; wide elliptical arch (including towpath); parapets and carriageway cambered over span and finished by piers set out diagonally. This section of the Caldon Canal was opened circa 1779 to take limestone from Caldon Low, Henshaw and John Rennie engineers.

Listing NGR: SJ9507553708

APPENDIX 2: CALDON CANAL CONSERVATION AREA PLAN



APPENDIX 3: AHCITECTURAL HERITAGE SURVEY

BRITISH WATERWAYS ARCHITECTURAL HERITAGE SURVEY CL

A	BW Region	NW		PRN	1144
	Waterway	CALDON		OS Sheet	SJ 95 SE
	BW Struc No	BRIDGE No 37		NGR	
	Side	TOW OFF (CEN) OTH		Photo Neg No	08 / 19 + 20 + 6
	BW Owned	(Y) U/K N		MMS/PMS	CL-01545
B	County	Staffs		Alt Address	Bridge No 37, Caldon Canal
	LA District	Staffs Moorlands			
	Parish	Cheddleton			
	Address	Bridge at SJ 950 537, Caldon Canal			
C	Date Listed	15 12 86		SAM No	
	Grade	I II* II ✓		Protected Area	NP AONB CA SSSI
	Serial No	1798-0 / 5 / 42		Structures in Item	
D	Design Integ	A (B) C D		Context	VIL URB (ISO) (GRO)
	Setting	A (B) C D		Condition	A (B) C D
	Listable	(Y) N		Present Use	
	Group Value	(Y) N			
E	Building Type	accomodation bridge			
	Date	1)	2)	3) EC19	
	Engineer Designer(s)	Henshaw, Renaie J.			
	Materials	BR ✓ ST ✓ EBR CO IR ME WD			
		TI SL CTI CER AS OTH			
	S Features/ Tech Merit				
	Date Inspected	5 2 94			

F Site Notes/List or Scheduling Description

Accommodation bridge. Early C19. Brick with stone string at carriageway level and copings; wide elliptical arch (including towpath); parapets and carriageway cambered over span and finished by piers set out diagonally. This section of the Caldon Canal was opened circa 1779 to take limestone from Caldon Low. Henshaw and John Rennie engineers.

** Known to BW as Bridge No.37 **

G Defects

Repairs repointed brickwork to base of arch vault.


CL144 08/19


CL144 08/20



REFERENCES

Crowe, N. (1994) *Canals.* English Heritage.

Dean, R. (1997) *Canals of North Staffordshire.*

Hadfield, C. (1985) *The Canals of the West Midlands.* David and Charles.

Historic England (2008)

Shill, R. (2011) *Silent Highways.* The History Press.