Dupath holy well, Cornwall
Archaeological investigation

Cornwall Archaeological Unit

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Report author(s)	**Ann Preston-Jones**
Checked by	**Adam Sharpe**
Approved by	**Andy Jones**

Cornwall Archaeological Unit
Cornwall Council
Fal Building, County Hall, Treyew Road, Truro, Cornwall, TR1 3AY
Tel: (01872) 323603
Email: enquiries@cau.org.uk Web: www.cau.org.uk

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This study was commissioned by Helen Allen and Win Scutt of the English Heritage Trust and carried out by Cornwall Archaeological Unit, Cornwall Council.

David Attwell of the Cornwall Heritage Trust helped facilitate this project. Help with the historical research and with work on site was provided by Andrew Langdon. Our understanding of the water system associated with the well-chapel was enhanced by Peter Coombe of Dupath, who also contributed to the practical work and undertook undertook the restoration of the water supply.

The Project Manager was Adam Sharpe.

The views and recommendations expressed in this report are those of Cornwall Archaeological Unit and are presented in good faith on the basis of professional judgement and on information currently available.

Freedom of Information Act

As Cornwall Council is a public authority it is subject to the terms of the Freedom of Information Act 2000, which came into effect from 1st January 2005.

Cornwall Archaeological Unit is a Registered Organisation with the Chartered Institute for Archaeologists

Cover illustration:

Backfilling after the drainage work had been completed. Photo by Dick Cole

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Abbreviations

CAU	Cornwall Archaeological Unit
CHT	Cornwall Heritage Trust
CIfA	Chartered Institute for Archaeologists
EH	English Heritage Trust
HER	Cornwall and the Isles of Scilly Historic Environment Record
HE	Historic England
OD	Ordnance Datum – height above mean sea level at Newlyn
OS	Ordnance Survey
WSI	Written Scheme of Investigation

1 Summary

Cornwall Archaeological Unit was commissioned by the English Heritage Trust to investigate and if possible rectify a problem with the drainage of spring water into the well-house at Dupath, near Callington in east Cornwall. Dupath Holy Well is in the care of English Heritage but managed for them by the Cornwall Heritage Trust, under an agency agreement. It is a Scheduled Monument and a Listed Building, List Entry Numbers 1013663 and 1140066 and is located at SX 37500 69218.

Two days were allocated for this piece of work which was initially anticipated to be a simple matter of unblocking a pipe or stone culvert leading from the source of the spring into the chapel. In the event, it was found that there was no pipe or properly constructed culvert. Instead, water had been reaching the well-house through a very small rough drain which subsequent research showed had once been an open channel, covered over in the course of the twentieth century. Water drained into this from voids beneath a number of randomly-set slate slabs, perhaps the collapsed remains of a former chamber. This channel had become blocked with silt and stones. The one find of significance in the course of this investigation was that one of the stones covering the formerly open channel was a granite launder, over one metre long, similar to those which conduct water across the floor of the well-chapel and into the trough at its eastern end.

To help restore the flow of water, the existing channel was cleared and then replaced with a pipe; the chamber was re-built more solidly; and by the time work was completed, the water was flowing smoothly into the well-house once more. The granite launder was replaced in its former position, inverted over the new pipe. To compliment this work and ensure that having reached the well-house, the water did not leak out of the trough through joints in the stonework, the trough was repointed and some joints sealed with clay.

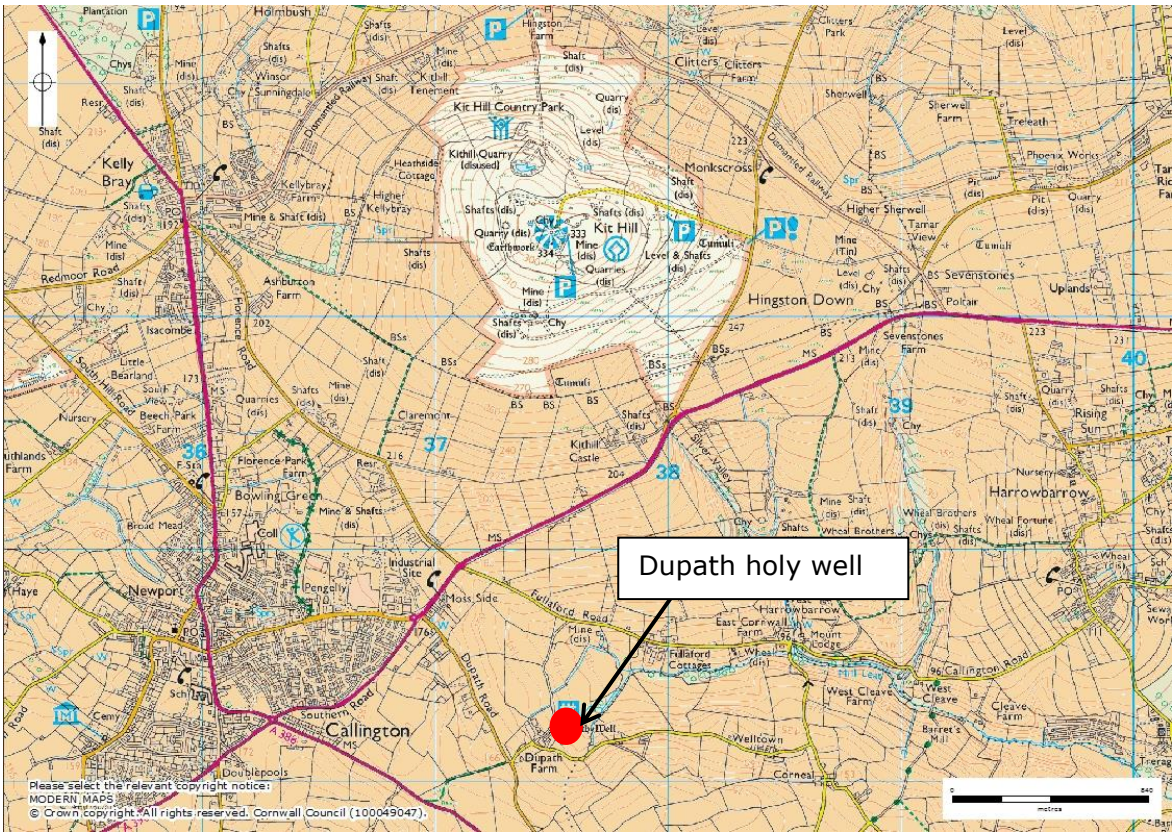


Fig 1. Location map of Dupath Holy Well, seen here in relation to Kit Hill to the north and the town of Callington to the west.

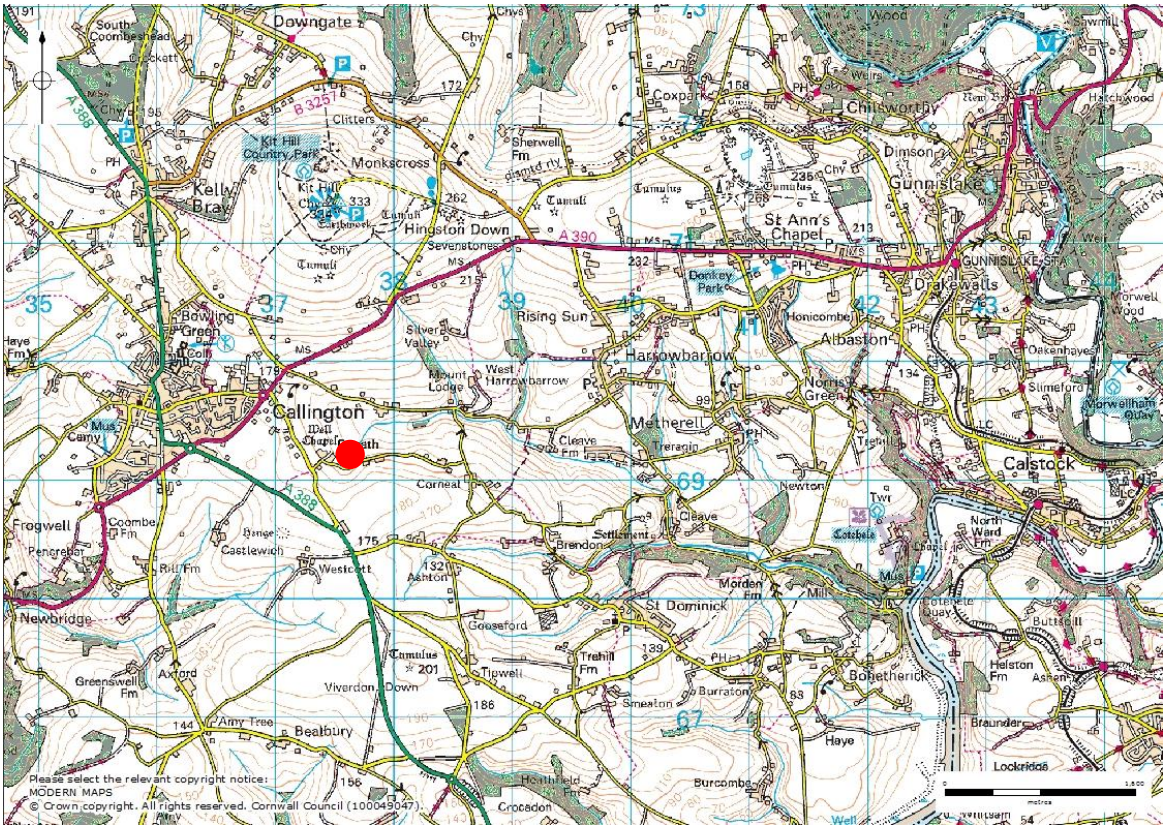


Fig 2. Location map of Dupath Holy Well showing the topographic setting, to the south of Kit Hill and at the head of a valley draining eastwards into the river Tamar.

2 Introduction

2.1 Project background

Cornwall Archaeological Unit was requested by Helen Allen of the English Heritage Trust to undertake an investigation and small-scale remedial works to the water supply system at Dupath Holy Well, near Callington, Cornwall (Figs 1 and 2).

Normally, water flows into the upper (south west) side of the well-house from beneath the threshold and from there runs in a shallow stone channel or launder, across the floor, to fall into a trough. However, the water supply to the well had failed and English Heritage was concerned that this traditional and integral feature of the well should be restored. An area of damp ground which had appeared, close to the well on its upslope side suggested that the problem might be due to a blocked or broken pipe or culvert.

Dupath Holy Well is in the ownership of the English Heritage Trust and is managed for the English Heritage Trust by the Cornwall Heritage Trust, with oversight by CHT trustee David Attwell. Day to day care of the chapel and its enclosure is undertaken by the farmer at Dupath, Peter Coombe. Having been born and brought up at Dupath, he has a better understanding of the well and how it works than almost anyone.

Fig 3. Site extent.

2.2 Aims

The principal aim of the project was to obtain an understanding of the issues related to the water supply to the holy well, and to identify the location where the problem was occurring. It transpired, in the course of an initial site meeting, that the nature of the water system was not entirely understood, and so it was agreed that a little further investigation should be undertaken on the downhill (north east side) of the well-house in order to both elucidate and record the drainage on that side. Simultaneously, minor works were undertaken to the water trough within the well-house by a separate contractor.

This report fulfils the further project aim of producing a clear record and account of the works and the findings.

2.3 Methods

2.3.1 Desk–based assessment

During the desk-based assessment historical databases and archives were consulted in order to obtain information about the history of the site and the structures and features that were likely to survive. The main sources consulted were as follows:

- Cornwall HER.
- Early maps including Joel Gascoyne's map of Cornwall (1699), Thomas Martyn's map of Cornwall (1748), the OS 1 inch survey (*c*1810), the parish Tithe map (*c*1840), and the 1st and 2nd Editions of the OS 25 inch maps (*c*1880 and *c*1907).
- Published histories.

2.3.2 Fieldwork

The proposed fieldwork for the project was described in the WSI (Appendix 1). This stated that:

- Investigative trenching would be carried out at locations identified during a preliminary site visit attended by CAU, Cornwall Heritage Trust, English Heritage and the landowner and by the results of a report on a camera survey of the drainage system commissioned by English Heritage; it would also be informed by an amended maplet showing the schematic drainage arrangements for the holy well provided by English Heritage to CAU.
- The investigative excavation would be focussed on and limited to the mapped route of the culverted water supply to the south side of the well-house, proceeding from an area of identified collapse to the south-west of the well-house northwards towards the well-house. A further modern pipe entering the well-house on its northern side and linking it with Chamber C would also be investigated by trenching.
- The test trenches would be limited to the minimum size consistent with the project aims – to locate and expose two areas of the water supply and drainage arrangements and identify the location in which the supply culvert had failed, allowing the site managers to determine what type of repairs or other works were required.
- Once the areas to be investigated had been opened up the nature of the issues affecting the water supply culvert were to be discussed with English Heritage and their stone masons and an appropriate scheme of works agreed. The situation relating to the modern drainage pipe was also to be discussed with English Heritage and a scheme for its removal and for undertaking any works to the north-eastern corner of the well-house agreed with English Heritage and submitted to Historic England.

In the event, circumstances only permitted investigation and remediation of the principal blockage to the south.

3 Location and setting

3.1 Physical setting

The settlement of Dupath (with the well-house) is set on a north east-facing slope above one of the tributaries of a major catchment draining Hingston Down and flowing south-south-east towards the river Tamar. Kit Hill, the highest point of Hingston Down, lies due north of and some ninety metres higher than Dupath, and forms a striking backdrop to the monument (Figs 3 and 4).

Although Kit Hill and Hingston Down are granite, Dupath lies on rocks of the Teign Valley group of mudstones, siltstones and sandstones, part of the Lower Culm Measures. Peter Coombe, owner of Dupath Farm, states that a roughly north west to south east fault line runs through rocks in the area of the holy well, explaining why a spring rises here. Until it was drained some 50 years ago, the field to the east, on the same fault line, was extremely wet (Peter Coombe, *pers comm*) and beyond this at SX 3767 6913 is the site of a deserted medieval settlement of Well Town, whose name also suggests the site of a spring.

The mineral wealth of the area, associated with the Kit Hill granite, is well known, and is reflected in the fact that one of the other tributaries in this catchment is known as 'Silver Valley'. In the valley immediately north of Dupath a Silverhill Mine is shown on the 1880 OS map (disused by the 1907 OS map) (Figs 10 and 11).

3.2 Historic setting

The summit of Kit Hill is crinkled with the mounds of a major linear barrow group including a Neolithic long cairn, as well as the more recent remains of mining and stone quarrying. South west of Dupath Holy Well is the later Neolithic earthwork of Castlewich henge and a Neolithic axe has been found in the vicinity of the farm.

Hingston Down saw action in the early ninth century when a combined force of Vikings and Cornish were defeated by the English in a battle which marked the end of Cornish independence. The location of the clash here, on Hingston Down, may be explained by the fact that the lowest historic bridging point of the river Tamar, on the historic route from Tavistock to Callington and Liskeard, is close by at Gunnislake (Henderson and Coates 1928, 52-3). Though the bridge was built in the 16th century it was almost certainly, like most historic bridges, preceded by a ford or ferry.

Callington, a historic settlement recorded in Domesday Book, lies only a mile to the west of Dupath.

In summary, despite the fact that it now seems to occupy a quiet and secluded rural location, Dupath is in an area of strategic and ritual significance from prehistoric times through to the present.

Historic land characterisation identifies the fact that Dupath farm lies at the boundary between Anciently Enclosed Land to the south and east and Recently Enclosed Land to the north. The farm and holy well lie on the eastern edge of the parish of Callington. It is very close to the parish boundary with St Dominick, which runs along the line of a stream immediately east of Dupath. In this it can be compared to other Cornish holy wells in liminal locations like, for example, St Euny's Well in west Cornwall, which is on the boundary between the parishes of Sancreed and St Buryan and also close to the boundary of St Just-in-Penwith.

Fig 4. Dupath Holy Well: the front (south west) elevation (Kit Hill rises behind trees to the left).

Fig 5. Dupath Holy Well: the rear (north east) elevation.

4 Designations

4.1 National

Dupath Holy Well is an outstanding monument, its significance reflected in its designation as both a Scheduled Monument and a grade I Listed Building:

- Dupath Holy Well is a Scheduled Monument, List Entry Number: 1013663
- Listed Building, List Entry Number: 1140066

The monument is in the care of the state, being owned and managed by the English Heritage Trust.

There are no other designations affecting the site.

5 Description of the Dupath Holy Well

5.1 The building

The following description is abbreviated and paraphrased from the very full description in the scheduling documentation. See also the photos of the well in Figures 4 and 5.

The holy well survives with a rectangular well-house measuring 3.9m north east - south west by 3.59m north west - south east externally, with the entrance in the south west end. The walls are built from large neatly squared and finely jointed granite ashlar. The walls rise 2.35m high at eaves level and the south west and north east gables rise to *c*4m high at roof ridge level. The south west doorway has a four-centred arch, hollow-moulded on its outer side. It is set within a sunken surround with raised moulding along its outer edges. The doorway's threshold is a reused window sill, chamfered along its inner edge and with infilled sockets for glazing bars along its upper face. A modern wooden door with iron fittings closes against the doorway's inner face.

The well-house is lit by a small vertical slit window in each side wall and a larger decorated window of two lights in the north east wall. It is roofed by courses of granite slabs spanning the length of the building. Small pinnacles rise at each corner of the building whose south west gable, above the doorway, is crowned by a large bell-cote. Four small crocketted pinnacles rise from each corner of the bell-cote, with a larger pinnacle rising from its apex.

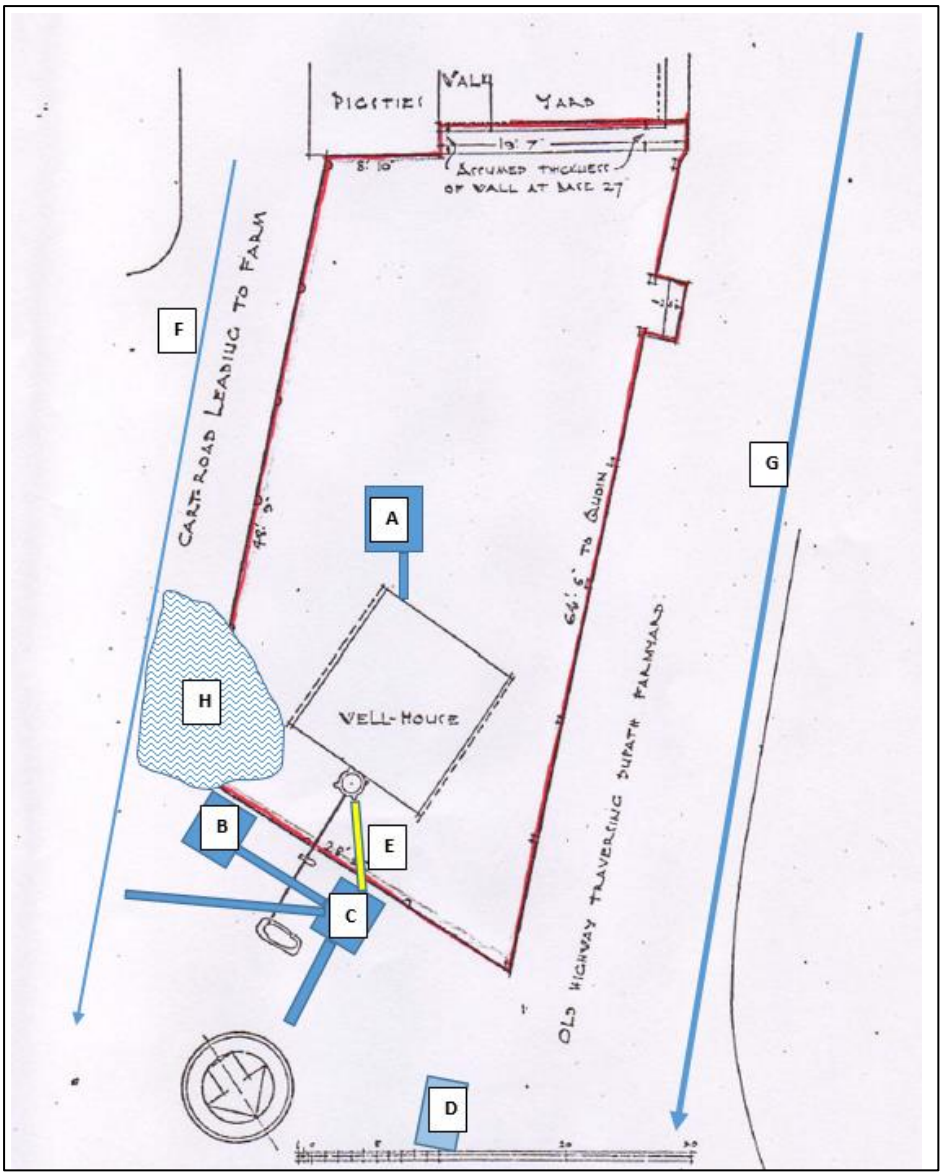
The interior is divided into two sectors by the roof support arch and by two granite sill slabs crossing the floor beneath the arch. These mark off a south western area, 1.53m long, beside the entrance, in which the spring is channelled across the floor, and a north eastern area, 1.35m long, dominated by the well pool and lit by the main window. Water flows out of the pool across recent paving, leaving the well-house through a hole near the base of the north east wall. From there the water pours over the lip of a medieval circular stone trough, in origin a domestic mortar (though often misinterpreted as a font).

Much of the present floor in this area comprises mortared slate paving dating from a recent restoration, but granite slabs along the north west and south east sides are thought to be earlier features. Also the result of recent restoration is a granite gutter (launder) which carries water from the spring, under the south end of the threshold slab, and then crosses the floor to a gap between the two sill slabs beneath the roof arch.

5.1 The below- and above-ground drainage

The water flow at Dupath Holy Well is not well understood and our understanding at the outset of this project was based on information from Peter Coombe, the owner of Dupath Farm, as described to David Attwell of the Cornwall Heritage Trust (CHT). It is summarised in Figure 6, a map owned by English Heritage but annotated by David Attwell.

Spring & Drainage Patterns - Dupath Well (Callington)



Key

A	Drainage chamber with stone drain to well house
B	Drainage chamber with pipe linking to Chamber C
C	Drainage Chamber with in and out clay pipes – running
D	Site of Trough
E	Suggested new pipe linking overflow to drainage chamber
F	Drain emanating from Farmhouse direction
G	Highways drain (15'') draining from road above and issuing near bottom field gateway
H	Area of very wet waterlogged ground inside and outside SAM area

Fig 6. Plan of the drainage pattern at Dupath Holy Well.

(although Peter Coombe said that even this is not completely accurate).

The well is believed to be spring-fed, water rising here because of the presence of a significant fault-line in the bedrock. Spring water was thought to collect in a chamber just a couple of metres south of the well-house and to flow from there to the well-house through an underground culvert or pipe.

The flow of water through the well-house is illustrated in Figure 6. From the well-house, the water falls into a stone bowl or basin (formerly a mortar) (Fig 7), thence into a pipe from which it is conducted away (line E in Fig 6: although Peter Coombe said that this actually runs to a sump at D, not C). Another line of drainage which is not indicated in this plan was installed some 30 years ago during a watching brief undertaken by Nigel Thomas of Cornwall Archaeological Unit. Because this results of this work has never been made available before, it has been included here as an Appendix (1).

Fig 7. Visible features of the passage of spring water through the well-house. Left, the main trough or pool (before recent repointing). Top right, the granite launder conducting water across the well-house floor to the trough. Below right, the stone basin or mortar into which the water falls after exiting the well-house.

6 Site history

Only limited research has been possible on this occasion, sufficient to inform the project. It is clear that much has been written about the well but on closer scrutiny, very little proves to be reliable or true, being based instead on tradition and inference, repeated time and again without checking.

Founding-tales of a battle on Hingston Down which led to the construction of the well-house by the victorious party are commonly re-told in antiquarian literature but the origin of much of this can almost certainly be laid at the door of the Reverend RS Hawker, whose romantic verse *Dupath Well* was not only published in his own work

(Hawker 1836 17-19) but also repeated by Blight (1858, 97-8), to accompany his illustration which is reproduced here in Figure 8.

Further questionable (or unprovable) statements include the assertion that the well-house was built by the canons of St Germans in the early 16th century; that it was dedicated to St Ethelred; and that it was intended as a baptistery and an oratory (Beacham and Pevsner 2014, 178-9), while its waters were known as a cure for whooping cough (for example Meyrick 1982, 38). Even the parish within which it lies appears open to doubt, with both Callington and St Dominick being suggested (for example, compare Quiller Couch 1894, 63-5 with Henderson 1925, 69-70).

In reality, remarkably little strictly factual information is known, and present resources have not permitted a closer evaluation. However, it is felt that further research would be both profitable and desirable to avoid re-repeating the common stories.

This absence of information is not surprising because, according to Nicholas Orme, small features like holy wells are rarely recorded in the official documents of the church. It is quite normal, even for a well like Dupath which is one of the biggest surviving in Cornwall, that its reputation is not traceable before the nineteenth century. He notes from the few instances where we have information that they may have attracted offerings, like the well of St Paternus in North Petherwin where receipts are mentioned in the Churchwardens' Accounts of 1496-7; their water might be taken for use in the parish church font, and they may have had a role in healing. It is recorded as early as *c* 1100 that the water from St Cadoc's well in Padstow had a reputation for curing intestinal worms (Orme 2010, 78-9).

The settlement of Dupath, but not the well, was first recorded in 1175, as *Theuepath* (Gover 1948, 177). The name is English and means 'thieves path'.

Thus Charles Henderson's stark summary in his entry on Callington parish in the *Cornish Church Guide* is about as close as one can get without considerable further research.

'At Dupath is a Holy Well enclosed by a good 15th century building, built perhaps by the monks of St Germans, to whom it [the property of Dupath] belonged until the Reformation.' (Henderson 1925, 70).

6.1 Dupath Well in the nineteenth century

Dupath Holy Well steps more firmly into recorded history in the nineteenth century.

Gilbert (1817-20, 254, 272) records that about one mile east of the town [of Callington], are the remains of a 'small Gothic edifice called Dupath Chapel, which stands in a wet clayey soil, and appears to have been an oratory, or baptizing well. It is built of square blocks of granite, and covered with the same kind of stone, now nearly overrun with lichen, and wild grass: it has an arched entrance at the west end, over which is a hollow cupola, intended for the reception of a bell. In the floor is a well of excellent water, supplied by a never-failing spring.'

In 1849 HM Rice, the vicar of Callington, described the well in much detail. His description includes the following details which indicate that he was involved in some small-scale restoration:

'…below the coping stones on each gable, there is a pinnacle, four in all; these pinnacles I discovered built up in the walls of the adjacent farm buildings, and had them restored to their proper places. The font, which was used as a *trough*, in a neighbouring farm-house, has also been re-instated; it is circular, with four grooves in relief on the sides running up from the base; the bowl only remains.'

He added the flowing information which helps to explain how the dedication to St Ethelred became attributed to the site:

'I have been unable to trace any particulars of the ancient history of this Chapel in the registers; under the name of Dupath it does not occur at all; Bishop Stafford licensed a Chapel in St Dominick, dedicated to St. Ethelred, 9th April, 1405; Gilbert suggests that

this might be the one, it stands immediately on the borders of St. Dominick, though in Callington parish.' (Rice 1849, 194-5).

In 1858, Blight published a brief description and detailed drawing of the well (reproduced in Fig 8). He added the following details of its condition:

'A portion of the front is overrun with ivy; grass and weeds grow in clusters from the chinks on the roof. The water from the spring, unconfined by any regular channel, flows through the doorway and falls out at the east end, inundating in its course much of the surrounding soil and rugged pathway. The spot has a deserted and neglected appearance…' (Blight 1858, 97).

Fig 8. Blight's illustration of Dupath Holy Well, published in 1858.

The Quiller-Couch sisters' account of the well (1894, 63-4: largely based on a manuscript of Thomas Quiller Couch) is so similar to Blight's that it appears there was some copying or collaboration; however, they add a rather exaggerated account of Rice's restoration: 'it was found several years since by the Rev, H.M. Rice, Rector of South-hill and Callington (an ardent antiquary, in the line of ecclesiology especially), in a very dilapidated condition. He carefully picked out the ruins lying around; and with the carefulness of one trying to put together a dissecting puzzle, succeeded in restoring the well.'

Polsue (1867, 172) adds little apart from the information that the well had recently been carefully and judiciously restored at the expense of Lady Ashburton. She was the wife of Bingham Baring, the second Baron Ashburton, who was Member of Parliament for Callington from 1830-31. Presumably she helped to subsidise the work put in hand by Rice.

Two photos of *c* 1900, in the collection of M Waters, found on the internet, add information of particular relevance to this project. The first, at http://cornishmemory.com/item/WAT_01_239 shows the well from the west, but

looking upwards, from a sunken lane[1]. A broken picket fence is seen in the foreground and the roof is covered in vegetation. The other photo http://cornishmemory.com/item/WAT_01_236 shows it from the south west. Several significant differences can be seen. The building appears much as it is now, without any vegetation on the front, but the pointing is in very poor condition and largely absent. Inside the well, the paved floor can be seen, with the launder running across it from the south corner of the doorway. However, there is no threshold stone as there is now and it appears that water is flowing into this from an open drain (though it is not certain whether the channel included the granite launder found during excavation). The ground level is slightly lower than at present and there is a small step up into the well-house, rather than down, as nowadays. Leading up to the doorway is a path, seemingly of compacted earth and stone. This path is shown more clearly on a photo in Lewis Hind 1907, although the open channel cannot be seen (opposite page 254).[2] In the background is a tumbled fence.

The well was first scheduled in 1923. In 1936 it was purchased by local philanthropist AC de Glubb who then gave it into the care of the state in 1937. According to the scheduling documentation (courtesy of Dan Bashford, Historic England Heritage at Risk Project Officer), further consolidation and drainage work was carried out after it passed into Guardianship.

6.2 Map evidence

The OS map of 1813 does not name the well but shows two adjacent settlements, Dew Path and Well Town, very close to the southern edge of the open rough ground of Hingston Down (Fig 9). Both have tracks linking north towards the rough ground, suggesting that use of the rough ground for summer pasture was an important part of their economy in the past.

On the 1841 Tithe Map for Callington the well chapel is depicted as a small square, unenclosed building on the north east edge of the hamlet of Dupath (Fig 10). It sits in an open area at the point where a track leads north towards the open ground of Hingston Down. By 1880 (Fig 11), a small rectilinear enclosure had been created to enclose the well-chapel. This most probably relates to the restoration of the well by Rice. It is named as St Ethelred's Chapel. In the wider landscape, a difference between these two maps is the appearance of Silverhill Mine in the valley due north of Dupath.

The main change between the 1880 and 1907 maps is that the settlement is named as 'Dupath on Site of St Ethelred's Chapel', while the attribution of this dedication to the chapel had been dropped. The monument is simply named as 'Dupath Well'. A feature of interest shown by both maps is that rather than running from the well-house in the most direct line towards the bottom of the valley, which would be eastwards, the water appears to have been conducted north, along the line of the track, towards Silverhill Mine. The implication is that the water was re-used for some purpose at the mine: an aspect worthy of further research in the future.

The modern map names the well as Dupath Well and suggests that the shape of the enclosure may have altered slightly but otherwise there is no significant change evident.

[1] According to Peter Coombe, this lane was filled in by his father in the 1970s. The access from the lane to the west is now level.

[2] It should be noted that these details of the open channel and the path were only found after the archaeological investigation which is described in the next section.

7 Archaeological results

7.1 Results of the archaeological investigation

Archaeological investigation of the water supply to the well-house took place on Thursday 16th and Friday 17th November 2017, with work on the Friday comprising a watching brief while the culvert was reconstructed.

Initial investigation into the causes of the failure of the water supply to the well-house proceeded from the point to the west of the threshold where the water is channelled into the well-house. Turves were carefully removed, the ground cleaned, and then a further area of turf lifted as the direction of the suspected culvert or pipe was established (Figs 14-15).

The initial discovery of a slate slab beside the threshold to the well-house (Fig 14) led to the expectation that a neatly-constructed slate culvert would be found, which could be easily traced back to the source of blockage or collapse. This hope proved unfounded, however. Further turf removal only resulted in the discovery of a series of relatively loose rough stones set in yellow-brown clay, adjoining an area to the west of heavily consolidated mid-brown earth and stones, possibly representing a path leading to the entrance (presumably that noted above on page 12). Moving further south, towards a slightly hollowed area suspected as a possible blocked chamber, a large 1.2m long slab of rough granite was identified, and then a series of larger, but randomly-set relatively loose stones in yellow-brown clay with many voids (Fig 15). This was on the site of the slight hollow previously identified by Peter Coombe as the likely site of a collapsed chamber.

7.1.1 The alleged culvert

Initially, the culvert from the well-house to the chamber was rodded (Fig 18) and a few largish stones were pulled out from underneath the large piece of granite on the line of the assumed culvert. However, there remained some sort of blockage preventing a free-flow of water from the site of the chamber and under the long piece of granite, so in order to alleviate that, it was decided that the granite would need to be lifted and re-set.

When the granite was lifted, it was found to be a granite launder, similar to those used to conduct water across the floor of the well-house and into the trough or pool. This had been inverted for re-use as a capstone, but as it had been set on only a few small stones, the available channel beneath it was no more than 10cm high. The granite launder measured overall 1.2m long by 15cm deep and 0.15 to 0.25cm wide. Cut into its upper surface (which was facing down when in use) was a curved channel, 12cm wide and approximately 1.5cm deep (Figs 19 and 20). Along one long edge, a series of half-round linear hollows 2cm wide and approximately 17cm apart were noted: the remains of drill marks, indicating that the launder is of 19th century origin. It had been damaged on one side, which may explain why it was re-used in this way.

Between this granite launder and the slate slab by the threshold of the well-house, a small section of the culvert was found to have been roughly re-constructed in cement. This was likewise removed because again, it provided only a small capacity for the flow of water and was badly silted.

When excavating along the line of the culvert, the only find made was a single piece of white china.

The sum of evidence is that this very rough 'culvert' had been reconstructed in the relatively recent past, although it must have been more than forty years ago since Peter Coombe, who has lived at Dupath all his life, had no recollection of ever seeing the culvert open. It had no properly constructed sides, and no smooth stone floor. The capping was a random assortment of stone including one re-used granite launder. In fact, it is remarkable that the water had flowed so well for so long.

The photos of 1900 described above confirm these deductions. In all probability the drainage work undertaken in this area when the site went into Guardianship simply involved covering over the open channel, installing the threshold to the well-house and then raising the ground level (thereby covering the culvert and path) with a thick layer of clay subsoil.

7.1.2 The alleged chamber

Further investigation in the area of the slight hollow, thought to be the site of the suspected chamber, revealed two substantial slate slabs (Figs 16 and 17). These were lifted, resulting in the discovery that spring water was trickling into the back of the resultant hole but also that the alleged chamber consisted of no more than the two slate slabs set on rough pieces of stone. There was no formally-built chamber and with rough earthen sides it was very easy for silt and smaller stones to collapse into the water. It appears likely that there may in the past have been some sort of small chamber where the water collected (as Peter said) which may have collapsed or been disturbed and was put back very roughly – with the slate cap-stones at the bottom and other stones which may have originally formed the sides, back on top, all very loosely. This disturbance to the chamber cannot be dated as there were no finds but the loose and unconsolidated nature of the backfilling, plus the very poor construction, suggested that this was all relatively recent work.

At the base of the chamber was a layer of silt at least 10cm thick. This was dug out to help improve the flow of water (Fig 21). The back of the area revealed by the removal of all these stones was excavated 20-25cm to the south and east. To the south lay a uniform deposit of yellow-brown clay and stones, possibly hitherto undisturbed subsoil while to the east, the subsoil was more disturbed and was cut by a highly decayed iron pipe, approximately 1½ inches in diameter (3.8 cm) (Fig 23). At the base, bedrock - a green-black slaty stone - was encountered and it could be seen that the water was trickling from the junction between the subsoil and the bedrock (Fig 22).

8 Work to restore the water flow

8.1 Trough repair

Some repairs were done to the trough before the water supply problem was investigated, to ensure that once restored, the water would flow correctly into and out of the trough without any leaking away into the ground.

The repairs were organised by the EH Trust and carried out by R Moulding and Co of Salisbury, a conservation building company. The work, undertaken initially in September 2017, included repointing the stones at the entry to and exit from the trough, and infilling with a red clay around the edge of the trough, whose base had previously been lined with cement.

8.2 Chamber

Repair and reconstruction of the chamber was undertaken by Peter Coombe on 18th November 2017 (Fig 24).

After all large random and collapsed stones had been removed from the area of the old chamber and a good flow of spring water established, a new, more substantial chamber was reconstructed, in the same location, using the same stones. The sides were built with stone from the site and a small number of concrete blocks to make up the deficit. Care was taken to ensure that silt could not easily filter into the new chamber by filling around the outside wall with pea gravel (granite chippings). The two large slate slabs were replaced on the top (Fig 26) and the joint between them covered over with further stones. The ground was then backfilled and re-turfed (see front cover).

The repaired chamber is centred at SX 37497 69215, approximately 2m south west of the south corner of the well-house (Figs 22 and 26).

8.3 Culvert

Because the floor of the existing culvert was so rough (there was no properly constructed floor), it became apparent that the best way to ensure a smooth and even flow of water from the reconstructed chamber to the well-house would be to pipe the water. Accordingly, a 10 cm diameter brown plastic pipe was laid from the exit of the chamber to within 20cm of the well-house threshold. Owing to the angle at which the culvert enters the well-house, the pipe could not be taken all the way to the well-house but the final section was created as a regular culvert with stone side-walls and a slate capstone (the one which had been found here originally). Care was taken, however, to ensure that despite this angle, it would be possible to maintain the pipe in the future by rodding. Pea gravel was laid all around the pipe, which was also held in place with small stones to either side (Fig 25).

9 Conclusions

This project has been successful in re-establishing a good flow of water into the well-house. The project was not helped by the lack of appropriate recording of previous interventions and understanding of the water system: however it is hoped that this report will make future remedial work, should it be needed, easier to undertake.

10 Recommendations

The only recommendation arising from the work of restoring the well water is that the pipe will need regular rodding to ensure that the stream is effectively maintained.

There may be a need for further repointing of the trough inside the well-house.

In addition to this it is recommended that a full archaeological assessment, to including historical research as well as recording and assessment of the building, would be of considerable benefit in informing both the future management and especially the interpretation of this remarkable monument.

11 References

11.1 Primary sources

Ordnance Survey, *c*1880. 25 Inch Map First Edition (licensed digital copy at CAU)

Ordnance Survey, *c*1907. 25 Inch Map Second Edition (licensed digital copy at CAU)

Ordnance Survey, MasterMap Topography

Tithe Map and Apportionment, *c*1840. Parishes of Callington and St Dominick (licensed digital copy at CRO)

11.2 Publications

Beacham, P and Pevsner, N, 2014. *The Buildings of England: Cornwall*. London: Yale

Blight, J T, 1858. *Ancient Crosses, and Other Antiquities in the east of Cornwall*. London: Simpkin Marshall

Gilbert C S, 1817-20. *An historical and topographical survey of the County of Cornwall* Volume 2, part 2. London: J Congdon

Hawker, R S, 1836 Records of the Western Shore, 1st series, 2nd edition. Stratton: J Roberts

Henderson C G, 1925. *Cornish Church Guide and Parochial History of Cornwall*. Truro: Lake

Henderson, C G and Coates, H, 1928. *Old Cornish Bridges and Streams*. Exeter and London: University College of the South West, Exeter and Simpkin Marshall

Lewis Hind, C, 1907. *Days in Cornwall*. London: Methuen & Co Ltd

Meyrick, J, 1982. *A Pilgrims Guide to the Holy Wells of Cornwall,* Falmouth

Orme, N, 2010. *Victoria County History volume 2: A History of the County of Cornwall: II: Religious History to 1560*. Woodbridge: Boydell and Brewer

Polsue, J, 1867. *A Complete Parochial History of the County of Cornwall*, Vol 1. Truro: Lake

Quiller Couch, Misses M and L, 1894. Ancient and Holy Wells of Cornwall. London: CJ Clark

Rice, H M, 1849. 'On certain churches in the Deanery of East in the County of Cornwall' *Exeter Diocesan Architectural Society,* vol 3, 194-5

11.3 Websites

http://www.heritagegateway.org.uk/gateway/ Online database of Sites and Monuments Records, and Listed Buildings

12 Project archive

The CAU project number is **146699**

The project's documentary, digital, photographic and drawn archive is maintained by Cornwall Archaeological Unit

Electronic data is stored in the following locations:

Project admin: CAU\Live projects\Dupath well drainage 2017 146699\Report

Digital photographs: \\Historic Environment (Images)\SITES.A-D\Sites D\Dupath Holy Well

Historic England/ADS OASIS online reference: cornwall2-304284

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Fig 9. Extract from the OS First Edition One Inch Map c1809.The approximate location of the well-house is shown with a red arrow.

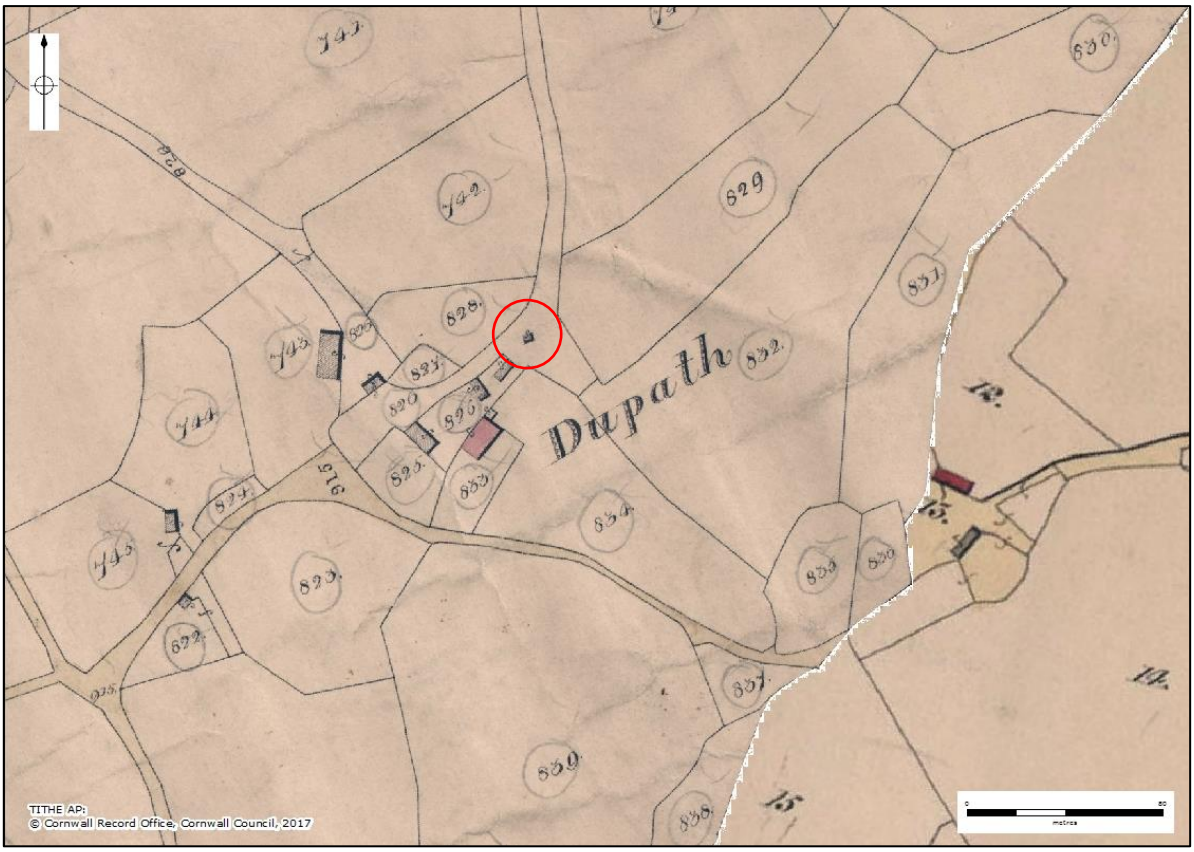

Fig 10. Tithe Map, c1840.

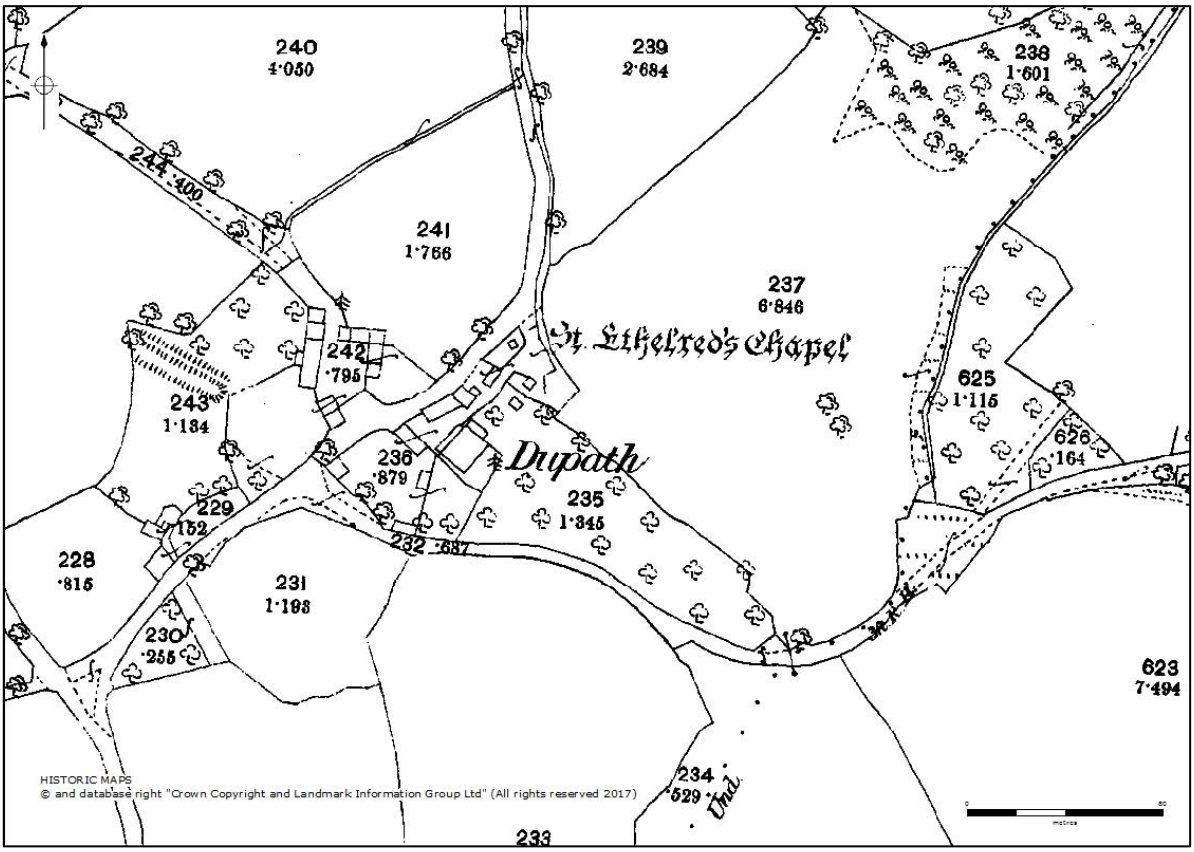

Fig 11. First Edition of the Ordnance Survey 25 Inch Map, c1880.

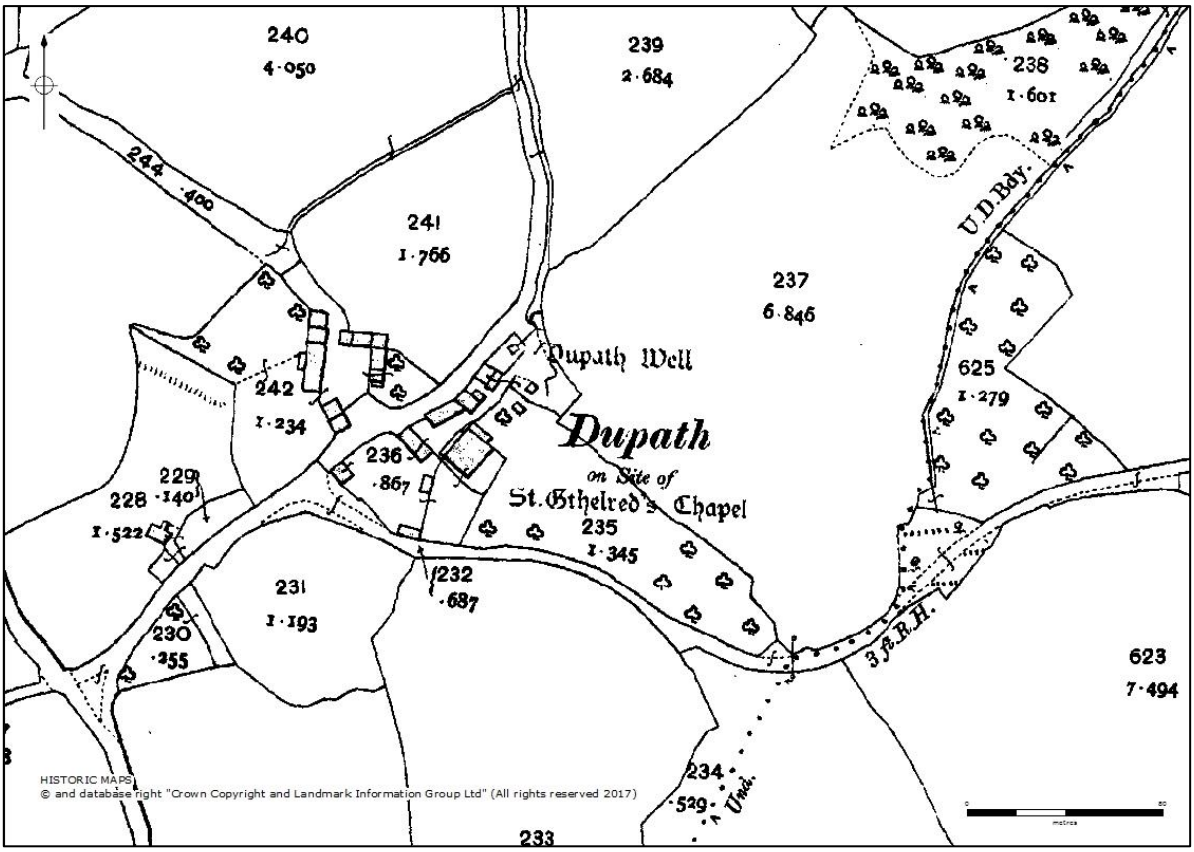

Fig 12. Second Edition of the Ordnance Survey 25 Inch Map, c1907.

Fig 13. Dupath Holy Well at the beginning of the twentieth century (Lewis Hind 1907, opposite page 254).

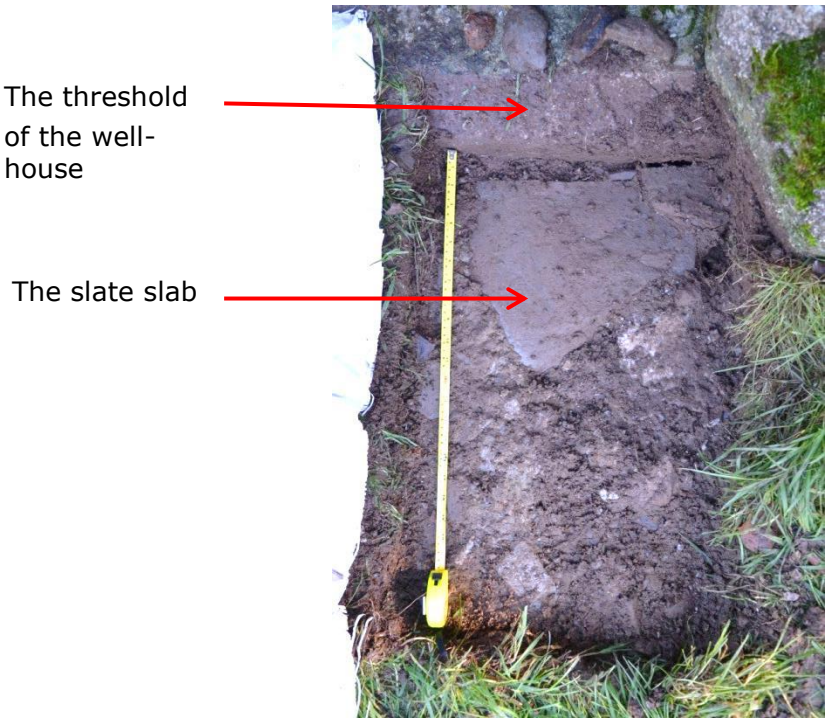

Fig 14. The slate slab at the doorway to the well-house: originally (but wrongly) thought to be covering a neat slate-built culvert.

Fig 15. Turf removed from the line of the culvert, to reveal a large piece of granite and various slabs of stone. The latter were lifted, to reveal the slate slab seen in Figure 16.

Fig 16. The first of the slate slabs to be revealed, covering the 'chamber', and its relationship with the inverted granite launder.

Fig 17. Removing the second of the slate slabs covering the 'chamber'.

Fig 18. Peter Coombe and Andrew Langdon, attempting to rod the culvert.

Fig 19. Lifting the granite launder.

Fig 20. The granite launder which had been inverted and used to cover the 'culvert'. Note the drill marks along one edge (especially clear on the bottom left of the picture) and the fact that it is slightly damaged (top right on this picture).

Fig 21. Andrew Langdon clearing silt from the alleged chamber.

Fig 22. View southwards, from the doorway of the well-house, showing the full extent of the excavated 'chamber', 0.7m deep. Bedrock can be seen at the back of the excavation, at the bottom, behind the shovel, as well as the unconsolidated clay sides of the hole.

Fig 23. Iron pipe seen at a late stage, in the excavation on the east side of the 'chamber'. The pipe was black as a result of corrosion which had stained the surrounding ground red. The pipe had been previously cut through, presumably by earlier work on the chamber – it was not damaged during this project. The fall of the pipe (as far as we could ascertain) appeared to be from east to west and its purpose was uncertain.

Fig 24. Peter Coombe, laying and levelling the new pipe.

Fig 25. Pea gravel laid around the pipe, and the slate and granite launder replaced where they had been found.

Fig 26. The first slate slab replaced over the rebuilt chamber, close to its original position.

Appendix 1: A Watching Brief at Dupath Holy Well, Callington

Field Officer's Report

At the request of English Heritage (Properties in Care South West), CAU were present during drainage works at the well on 1st October 1992. Dupath Holy Well (Grid Ref) is a fine example of a 16th century well-house, built of ashlar granite with a stone roof. Its roof is decorated with an imitation of a bell cote and pinnacles. The building has been conserved and maintained by the Ministry of Works and its successors since the 1930s.

The water that flows through Dupath well-house is a channelled spring. It emerges into the well-house from the uphill side under the threshold and runs into a shallow stone lined rectangular pit. This pit has an overflow which allows excess water to escape through the east wall and into a stone trough situated below the exterior wall face.

In the past (*c*1965 according to the farmer), ceramic drains had been put in to remove surface water from the north and south sides of the building. In addition a small lined sump and drain had been provided to remove water overflowing from the external stone trough. Despite these works boggy ground has developed at the foot of the east wall and the present works are designed to overcome this problem. The new drains consist of 3 spur trenches inside the fenced area containing flexible plastic subsoil drain pipe, backfilled with pea gravel and overlain with turf. These drain into an existing ceramic pipe which leads downslope to an inspection cover. CAU was present during excavation of the spur drains on 1st October 1992. After the trenches were cut, sections were recorded at 1:20 and photographed. The natural ground varies from a grey-green shillet to an orange clay also derived from decomposed shillet. It was noted that the east wall of the building has a foundation course of roughly squared large granite blocks, which is exposed at present ground levels. In all the trenches it could be seen that this foundation course was laid upon the natural shillet. In Trench B, a smaller granite stone was visible in the base of the foundation, indicating that some levelling was necessary for the foundation slabs. In Trench A layer of green to orange, fairly compact re-deposited shillet was apparently cut through to install the foundations of the well-house and therefore appears to represent the medieval level. Above this was a very stony compact subsoil, containing quartz, greenstone and shillet and was apparently built up against the foundation. Although no finds were made, it is assumed that this layer is post-medieval. Within Trench B, the soil profile showed a similar pattern to that of A, but here was also an additional layer containing fragments of ceramic drain pipe situated below the external water trough showing that the trough has been re-positioned at some time, probably when the well-house was consolidated by the Ministry in the 1930s.

Trench C was cut through a more disturbed and waterlogged area. The natural substrata consisted of orange decayed shillet. This was overlain by green-grey decayed shillet, probably re-deposited material and possibly represents the medieval ground surface. Above this was a layer of silty material containing slate fragments and grey shillet. An 18th or early 19th century base of a wine bottle was recovered from it. A 20th century pipe trench was cut through these layers. This drains water from a small sump situated below the stone water trough.

Excavation of Trench C revealed that water is penetrating below and running out of the base of the well-house. This is probably escaping from cracks in the gulleys and/or pit inside the building or perhaps from further upslope.

At present, remedial work is not necessary as the amount of water escaping is insignificant and there appears to be no danger of the well drying out.

Nigel Thomas, Archaeological Assistant, 1992

Appendix 2: Summary of approved Written Scheme of Investigation

Client Name: **English Heritage**
Client Contact: **Helen Allen**
Client tel: **0117 975 0714; 07825 907228**
Client email: **Helen.Allen@english-heritage.org.uk**

Site name: **Dupath Holy Well**
Site location: **SX 37499 69218**

Summary project background
Dupath Holy Well is sited adjacent to Dupath Farm, near Callington, Cornwall. The original supply of water to the well-house would have been from a natural spring, but this is now via a piped supply. The water supply has failed and the well has dried up. An area of damp ground has appeared close to the well on its upslope side.

English Heritage has asked Cornwall Archaeological Unit to produce a WSI (this document) and a related cost schedule for investigating the source of the problem through ground investigation. It is also proposed that some minor works pointing works are undertaken to the stone basin within the well to make it watertight. As the holy well is a Monument in Care, these works will be subject to Scheduled Monument Consent.

Site history
The scheduled monument description reads as follows:
The monument includes a large and elaborate late medieval holy well-house over a flowing spring, situated 1.5km ESE of Callington in north east Cornwall. Adjacent to the well-house is a medieval circular trough that collects the outflowing water. The holy well is located on the upper slope of a small valley containing a minor tributary of the River Tamar. The well-house is a monument in the care of the Secretary of State and is Listed Grade I. The holy well survives with a rectangular well-house measuring 3.9m north east - south west by 3.59m north west - south east externally, with the entrance in the south west end. The walls are built from large neatly squared and finely jointed granite blocks, a masonry type called ashlar. The blocks are often massive, up to 3.5m long, and laid in regular courses up to 0.49m thick. The walls rise 2.35m high at eaves level, passing through six courses, though adjoining higher ground masks the lower course of the south east wall. The south west and north east gables are similarly constructed but with generally smaller blocks and rise to c.4m high at roof ridge level. The south west doorway has a depressed arch, hollow-moulded on its outer side. It is set within a sunken surround with raised moulding along its outer edges. This doorway and surround are framed by massive jamb and lintel slabs flush with the south west wall face. The doorway's threshold is a reused window sill, chamfered along its inner edge and with infilled sockets for glazing bars along its upper face. A modern wooden door with iron fittings closes against the doorway's inner face.

The well-house is lit by a small vertical slit window in each side wall and a larger decorated window of two lights in the north east wall. The slit windows are unglazed, up to 0.48m high by 0.1m wide, with inwardly-splayed sides. The main window, in the north east wall, is 1m high and 0.94m wide overall, divided into two courses up to 0.38m wide by a single mullion. Both lights have depressed arched heads, carved from a single slab, with hollow-moulded edges except for the inner edges of the mullion: its north west inner edge is chamfered while its south east inner edge has a roughly battered chamfer. The mullion is also slightly shorter than the thickness of the window opening, a group of discrepancies taken to indicate that the mullion is reused in its present position. The window's lights also have square sockets for glazing bars: three horizontal and one vertical, though again the mullion differs in having two additional

lozenge-shaped sockets in its north west face. The well-house is roofed by courses of granite slabs spanning the length of the building, seven courses on each side and two slabs to each course, supported by the gable and a single internal arch. The outer faces of the slabs are bevelled to match the 45-50 degree pitch of the roof, with only fine jointing visible between slabs and courses. The lowermost course along each side overhangs the wall face by up to 0.17m. A course of shorter slabs forms the ridge of the roof. From the lower edge of the roof at each corner of the well-house, a slab known as a kneeler, projects a little to each side to support a small square-section pinnacle. The pinnacles have small raised enrichments called crockets along their edges and the most intact pinnacle, above the eastern corner, is 0.9m high. A similar pinnacle rises from the top of the north east gable. The south west gable terminates as a small rectangular platform surmounted by a large bellcote. The sides of the bellcote are formed by two upright tapered slabs whose parallel inner faces bear sockets for the bell pivot. These sides support a highly decorative canopy carved from a square slab, with cable moulding along the lower edge and mock battlements carved around the sides. A small crocketed pinnacle rises from each corner of the slab, with a similar larger pinnacle rising from the centre.

The well-house walls are generally 0.27m-0.3m thick, but rise to 0.44m thick in the south west wall to accommodate the large entrance opening and the bell cote above. This gives the building internal dimensions of 3.15m long, north east - south west, by 3m wide, north west - south east. The interior faces rise 2.4m to the lowest row of roof slabs, with the gables rising to 4.05m. The interior is divided into two sectors by the roof support arch and by two granite sill slabs crossing the floor beneath the arch. These mark off a south western area, 1.53m long, beside the entrance, in which the spring is channelled across the floor, and a north eastern area, 1.35m long, dominated by the well pool and lit by the main window. The south west area is lit from each side by the two slit windows, their splays partly masked by the arch pillars.
Much of the present floor in this area comprises mortared slate paving from a relatively recent restoration, but granite slabs along the north west and south east sides are considered earlier features. Also the result of recent restoration is a granite gutter which carries water from the spring, under the south east end of the threshold slab, and then crosses the floor to a gap between the two sill slabs beneath the roof arch. A 19th century account describes the water flowing unchannelled from the spring. After passing between the two sill slabs, the gutter discharges the water into the well pool, occupying most of the north east sector of the interior. The pool measures 2.45m north west - south east, across the width of the well-house, by up to 0.7m wide and 0.2m deep. It is defined to the south west by the granite sill slabs beneath the roof arch and to the north west and south east by granite floor slabs beside the walls. The north east side of the pool is defined by slender granite edging slabs, separated from the north east wall by a narrow strip of recent mortared slate paving. Water flows out of the pool across that recent paving, leaving the well-house through a hole near the base of the north east wall. From there the water pours over the lip of a medieval circular stone trough, 0.59m in external diameter, 0.41m high and with walls 0.07m thick. The trough resembles a small mortar and is decorated on its outer surface by four opposed flat vertical ribs, each 0.13m wide and 0.05m high. Water leaves the trough through a hole near the base of its NNW side, flowing into the head of an adjoining modern drain.
The roof support arch within the well-house is supported on plain pillars, up to 1.75m high, against the north west and south east walls and each largely carved from a single slab, up to 0.33m wide and 0.22m thick. Each pillar supports a plain capital, bevelled on its innermost face only. From this springs the single granite rib forming each side of the arch, meeting at a large but simple bevelled keystone. The ribs forming the arch are finished differently on each face: their north west faces have a rough surface with shallow hollows along their lower edges; their south east faces are smooth with pecked pitting and a chamfered lower edge. A narrow gap between the ribs of the arch and the inner faces of the roof slabs is filled by mortared rubble.

The holy well-house has been dated to c.1510 and incorporates architectural features typical of the 15th century to the early-16th century. It was built on land that was then named `Theu Path', acquired by the Augustinian canons of St Germans in 1432 and remaining in their possession until their priory was dissolved in 1539. A tradition persists that this holy well is located close to a chapel dedicated to St Ethelred, licensed in 1405, though the identification of that chapel with this site remains insecure. In the mid-19th century the antiquary Thomas Quiller-Couch recorded the well-house as considerably overgrown and other late 19th century writers also note that the monument had relatively recently attracted an apocryphal legend to account for its construction. The well was partly restored during the 19th century by the Revd H M Rice, the rector of South Hill and Callington. Further consolidation and drainage at the monument was undertaken by the Ministry of Works

Methodology
All recording work will be undertaken according to the Chartered Institute for Archaeologists *Standards and Guidance for Archaeological Investigation and Recording.* Staff will follow the CIfA *Code of Conduct* and *Code of Approved Practice for the Regulation of Contractual Arrangements in Archaeology.* The Chartered Institute for Archaeologists is the professional body for archaeologists working in the UK.

Desk-based assessment
A brief desk-based assessment will be carried out to inform the fieldwork stage. This will comprise:

- Published sources
- Historic maps, including

  - Joel Gascoyne's map of Cornwall (1699)
  - Thomas Martyn's map of Cornwall (1748),
  - OS 1 inch survey (*c*1810)
  - parish Tithe maps (*c*1840),
  - 1st and 2nd Editions of the OS 25 inch maps (*c*1880 and *c*1907)
- Modern maps
- GIS layers available to CAU
- Background material supplied by English Heritage

Fieldwork: site investigation
Evaluation trenching
Investigative trenching will be carried out at locations identified during a preliminary site visit attended by CAU, Cornwall Heritage Trust, English Heritage and the landowner and by the results of a report on a camera survey of the drainage system commissioned by English Heritage; it will also be informed by an amended maplet showing the schematic water supply by drainage arrangements for the holy well provided by English Heritage to CAU.
The investigative excavation will be focussed on and limited to the mapped route of the culverted water supply to the south side of the well-house, proceeding from an area of identified collapse to the south-west of the well-house northwards towards the well-house. A further modern pipe entering the well-house on its northern side and linking it with Chamber C (see Fig 1) will also be investigated by trenching.
The test trenches will be limited to the minimum size consistent with the project aims – that is to locate and expose two areas of the water supply and drainage arrangements and identify the location in which the supply culvert has failed, allowing the site managers to determine what type of repairs or other works are required.
Once the areas to be investigated have been opened up the nature of the issues affecting the water supply culvert will be discussed with English Heritage and their stone masons. An appropriate scheme of works will be agreed with English Heritage and submitted to Historic England. The situation relating to the modern drainage pipe will also be discussed with English Heritage and a scheme for its removal and for

undertaking any works to the north-eastern corner of the well-house will be agreed with English Heritage and submitted to Historic England.
In advance of the investigative trenching CAU will discuss with the client:

Working methods and programme.

- Health and Safety arrangements.
- Treatment of artefacts.
- *Recording – general*
- Excavation of archaeological features will be restricted to the minimum necessary to assess their character, significance and sensitivity to the proposed works and likely potential. The test pits are likely to be shallow and limited in extent.
- Where present, any turf will be carefully removed and hand-dug with the turf and/or sward set to one side on a plastic sheet as a precursor to the excavation of the test trenches. The sward will temporarily stockpiled facing upside down and will be kept moist. Following excavation and recording, the trenches will be hand backfilled and the turf reinstated.
- The positions of the test trenches will be marked onto a scaled base map (linked to the National Grid). A handheld GPS unit will be used to locate the test trenches.
- Each test pit trench be hand excavated, any archaeological features sampled to recommended levels and recorded. Where appropriate small-scale sondages will be excavated to determine floor levels within structures revealed in the test trenches. Each test trench will be given a unique code preceded by site code DW17.
- Site drawings (plans 1:20 and sections at 1:10) will be made by pencil (4H) on drafting film; all drawings will include standard information: site details, personnel, date, scale, north-point.
- All features and finds will be accurately located at an appropriate scale.
- All archaeological contexts will be identified as single contexts, numbered and described to a standard format linked to a continuous numbering sequence.
- Finds will be collected in sealable plastic bags, which will be labelled immediately with the context number or other identifier.
- Photography will include both general and feature specific photographs.
- Detailed photographs will include a metric scale. A north arrow will also be included where the subject is shown in plan.
- The archive standard photographs will be accompanied by a register detailing as a minimum the feature number, location, and direction of shot.
- Photographs of details will be taken with lenses of appropriate focal length.
- A tripod will be used to take advantage of slower exposures.
- Difficulties of back-lighting will be dealt with where necessary by balancing the lighting by the use of flash.
- If human remains are discovered during the work they will be treated with respect and the Historic England Inspector of Monuments and Public Health will be informed. All recording will conform to best practice and legal requirements.

Treatment of finds

The fieldwork may produce artefactual material.
All finds in significant stratified contexts predating 1800 AD (e.g., settlement features) will be plotted on a scaled base plan and described. Post-medieval or modern finds may be disposed of at the cataloguing stage. This process will be reviewed ahead of its implementation.
All finds predating 1800 AD will be collected in sealable plastic bags which will be labelled immediately with the context number or other identifier.
Fieldwork: photographic recording
Photographic recording will include colour photography using a digital SLR camera (with a resolution of 10 million pixels or higher).

CAU follows Historic England guidance on digital image capture and file storage (2015). The photo record will comprise:

- general views.
- examples of structural and architectural detail.

- Methodology for the archive standard photography is set out as follows:
- Photographs of details will be taken with lenses of appropriate focal length.
- A tripod will be used to take advantage of natural light and slower exposures.
- Difficulties of back-lighting will be dealt with where necessary by balancing the lighting by the use of flash.
- A metric scale will be included in all views, except where health and safety considerations make this impractical.
- Colour digital images taken as part of the site archive will be either converted from colour to black and white negative film and added to the site archive, or deposited with the Archaeological Data Service (ADS).

Conservation works

It is proposed that a suitably experienced conservation mason is commissioned to repoint the trough within the well-house using an appropriately specified lime mortar mix in order to make it watertight and to control the water flow within the well-house, preventing leakage into the ground within the building. CAU would superintend these works. Further works will be necessary to re-set or install new capstones to the collapsed section of the culvert to restore its function. These works will be undertaken by an approved conservation mason and will also be superintended by CAU.

Creation of site archive

To include:

- Monochrome film and digital colour photographs (stored according to HER guidelines and copies of images made available to the client).
- Preparation of finished drawings.
- Completion of the Historic England/ADS OASIS online archive index.

Archive report

A written report will include:

- Summary
- Project background
- Aims and objectives
- Methodology
- Location and setting
- Designations
- Site history
- Archaeological results
- Chronology/dating evidence
- Significance
- Impacts
- Mitigation measures
- Conclusions
- References
- Project archive index
- Supporting illustrations: location map, historic maps, plans, elevations/sections, photographs

Copies of the report, illustrations and any other files will be held in the Cornwall HER. Paper copies of the report will be distributed to the client, to local archives and national archaeological record centres.

Timetable

The study is anticipated to be commenced during the summer of 2017. CAU will require at least two weeks' notice before commencement of work, in order to allocate field staff and arrange other logistics.
The archive report will be completed within 3 months of the end of the fieldwork. The deposition of the archive will be completed within 3 months of the completion of the archive report.

Agreed monitoring points
Monitoring of the project will be carried out by the Historic England Inspector of Monuments.
1. The Inspector will monitor the work and should be kept regularly informed of progress.
1. Notification of the start of work shall be given preferably in writing to the Inspector at least one week in advance of its commencement.
2. Any variations to the WSI will be agreed with the Inspector, in writing, prior to them being carried out.
3. If significant detail is discovered, all works must cease and a meeting convened with the client and the Inspector to discuss the most appropriate way forward.

Monitoring points during the study will include:

- Approval of the WSI
- Completion of fieldwork
- Completion of archive report
- Deposition of the archive

This WSI was produced by
Adam Sharpe
17 August 2017

This WSI was approved on: 19 August 2017

Cornwall Archaeological Unit

Fal Building, County Hall, Treyew Road, Truro, Cornwall,
TR1 3AY

(01872) 323603
enquiries@cau.org.uk
www.cau.org.uk