The Lost Chain of Cornwall

The Blockhouses at Polruan and Fowey

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Fowey was a very important port in the late Middle Ages – far more significant than its present size would suggest. It was a deep water harbour which served the town of Lostwithiel, the administrative centre of the Earldom (later Duchy) of Cornwall. It was through Fowey that Cornish tin was exported, to London and Southampton, while other trades were of growing importance: salt was exported to Ireland and pilgrims taken to Northern Spain, on their way to Santiago de Compostella. Fowey was also a regular provider of ships for the King in time of war (there being no Royal Navy as such). Indeed the figures are startling. Fowey provided 6 ships in 1340, 9 in 1343 and 47 in 1347 (the year of Edward III's successful siege of Calais). In the same years, London provided only 10, 15 and 25! Eighteen years later, Polruan was one of five ports where the Black Prince's army embarked for France; and Fowey sent 4 ships when John of Gaunt sailed to Spain in 1385.[1]

It is not, therefore, surprising that there are two medieval blockhouses, or small forts on either side of the mouth of the River Fowey. The one on the Fowey side is almost completely ruined, but the Polruan Blockhouse can be visited. They were built to house a chain, stretched across the harbour entrance in time of danger; and were sketched by J.M.W. Turner when he visited the area in 1811.[2] The question is when they were first constructed.

1380?

A leaflet published by Polruan Town Trust (which owns the site and restored the Polruan blockhouse in 1987) tells us that it was built in 1380, that the chain came from Winchelsea in Sussex, had 16 inch links, was hung from a massive iron ring, and 'for the most part lay on the bed of the harbour.'[3] I have found no direct

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[1] Doe, 5-9; N.A.M. Rodger, *The Safeguard of the Sea* (Penguin, 2004), 497; Ackland & Druce, 7; VCH, vol I, 481.

[2] See www.tate.org.uk.

[3] *Magna Britannia*, vol 3 (Cadell & Davies, 1814) contains the following entry: 'there was a strong boom or chain, which ran across the harbour, two links of which were taken up by a trawl-boat, about the year 1776, and preserved in his grotto at Menabilly' – the source for this in turn being said to be Grose's *Antiquities* vol i, p 19. This is presumably the origin of the statement that the chain had 16 inch links.

evidence to confirm this date;[4] but there is strong circumstantial evidence. Blockhouses and a chain would have provided protection against a specific kind of menace; and we know that Castilian galleys were a real threat in the fourteenth century - Castile being the major power in the Iberian peninsula. The historian of English intervention in Spain and Portugal tells us that 'between 1372 and 1381, the war between England and Castile was fought principally at sea, where the course of the struggle demonstrated beyond doubt the

The Blockhouse, Polruan, from the landward side

accuracy of [the French King] Charles V's belief that an alliance of French with Castilian sea-power was capable of bringing home to the English people… the disadvantages of the war in which they were engaged.'[5]

More particularly, in 1377, a fleet consisting of some 24 Castilian and 12 French galleys made a number of landings in Dorset and then turned its attentions to

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[4] I searched the Close Rolls at British History Online; and John of Gaunt's Register 1379-83(Camden Third Series, vol. LVII, R.H.S., 1937); but not the Patent Rolls. The account books of the Polruan Town Trust survive from 1668 only.

[5] Russell, 226.

Cornwall. Several towns were burnt, including Fowey.[6] Cornish M.P.s were outraged: at the Parliament assembled at Gloucester in October they protested bitterly at the failure of the government to protect their county

Item, your commons of the duchy of Cornwall request: whereas they are greatly harrassed and beladen with great troubles on account of the war with the enemies overseas on all sides and from year to year…and now, in this present year, come galleys from Spain, burning all the ships, boats and towns which are in the ports and along the coasts of the sea, and the said enemies have put to grievous ransom a great part of the said duchy, for want of strength and power to resist the aforesaid enemies. And the said enemies threaten to return next season to the said duchy with an even greater force.

To which the King's officers replied:

Our lord the king by the advice of his council shall provide and ordain a remedy.[7]

Did the King's officers do as they promised? It seems that they devolved responsibility back to the local authorities. Thus, on 8 April 1380 they ordered landowners in Cornwall to remain on their estates near the sea and organise the county's defences for themselves.[8] Likewise, on 20 July they ordered the Steward of the Duchy of Cornwall to improve the defences of the Fowey estuary:

Order, if assured by inquisitions or otherwise that the 88 parishes adjacent or any of them are bound to find 160 archers or any part thereof for defence of the ports and towns of Fawy and Polruan and the adjacent parts, and were used so to do, to deal as by law ought to be done in such a case and as used heretofore to be done; as by complaint of the men and tenants of those ports the king has learned that many times they and their ships and boats have been well-nigh annihilated by galleys and the enemy landing there.[9]

It seems reasonable to conclude that the blockhouses at Fowey and Polruan were built at this time, to accommodate these archers, as well as to house the chain; and that this was done by local men, rather than the Crown.[10]

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[6] Sumption, vol III, 325. Froissart's account of these naval operations has the French attacking Rye, the Isle of Wight, and then Lamende (Falmouth?), Dartemode (Dartmouth), Plemende (Plymouth), Plesume (Portsmouth?) and Poq (Poole?), all in the same season: vol 1, 512.

[7] Russell, 242, citing *Rotuli Parliamentorum*, iii, p.42; but see now British History Online, *The Rolls of Parliament*, October 1380, membrane 3, item 41.

[8] V.C.H., vol I, 481 (n.7), citing Patent 8/4/1380.

[9] CCR 1377-81, 388-390.

[10] Although in November 1380 MPs were still demanding *that vast sums must be invested in the safeguard of the sea coasts against galleys this coming season, so that the enemy's malice and misdeeds can be better resisted than they were last season, when, as you know, they inflicted great harm and villainy on the aforesaid kingdom:* Parliament Roll, November 1380, pp iii-88, membrane 5.

After 1457?

The problem is that there are many authorities which say that the blockhouses were built as a response to a raid by Norman and Breton ships, mounted in 1457. The Heritage Gateway website states categorically that the forts in Polruan and Fowey are

the remains of a C 15 blockhouse. Square section towers were built on either side of the Fowey Estuary during the reign of Edward IV. Between the towers a chain was laid across the river which could be raised to prevent ships entering or exiting the harbour.

This is a view which is shared by the editors of the volume about Cornwall in Pevsner's *Buildings of England*; by Dr Helen Doe in her excellent *Maritime History of Fowey Harbour*; and by the *Historic Audit of the Fowey Estuary* published by the Cornwall Archaeology Unit in 2000.[11]

However, none of these statements is based on direct evidence. They all appear to derive from the account to be found in the *Itineraries* of the Tudor antiquary John Leland, who visited Fowey around 1538:[12]

Ther is at the west point of the haven of Fawey mouth a blok house devisid by Thomas Treury and made partely by his cost, partely by the town of Fawey. A little higher on this point of the hille is a chapel of S. Catarine. About a quarter of a mile upper on this the west side of Fawey Haven is a square toure of stone for defence of the haven made about King Edward the 4. tym, and litle above this tower on the same side is Fawey town lying alonge the shore and buildid on the side of a great slatty rokkid hille.

The glorie of Fawey rose by the warres in King Edward the first and the thirde and Henry the v. day, partely by feates of warre, partely by pyracie, and so waxing riche felle al to marchaundice: so that the town was hauntid with shippes of diverse nations, and their shippes went to al nations.

The French-men diverse tymes assailid this town, and last most notably about Henry the vj. tyme: when the wife of Thomas Treury the 2. with her men repellid the French out of her house in her housebandes absence. Wherapon Thomas Treury buildid a right fair and strong embatelid towr in his house: and embateling al the waulles of the house in a maner made it a castelle: and onto this day it is the glorie of the town building in Faweye.

In Edwarde the 4. day 2. stronge towers made a litle beneth the toun, one on eche side of the haven, and a chayne to be drawen over.[13]

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[11] www.heritagegateway.org.uk/Gateway/Results. Pevsner gives a date of 1437, but that must be a typing error: 1457 was surely intended. I am grateful to Dr Doe for the reference to the Historic Audit.

[12] There appears to be no reference to the chain in the work of William Worcester (1478).

The Polruan Blockhouse from the estuary

So Leland reported that the blockhouses and chain were installed in Edward IV's reign (1461 to 1483). He also tells us that us that it was removed and sent to Dartmouth in 1478:

When warre in Edward the 4. dayes seasid bytwene the French men and Englisch, the men of Fawey, usid to pray, kept their shippes and assailid the French-men in the sea agayn King Edwardes commaundement; wherapon the capitaines of the shippes of Fawey were taken and sent to London, and Dertemouth men commaunded to fetche their shippes away; at which tyme Dertmouth men toke them in Fawy, and toke away, as it is said, the great chein that was made to be drawen over the haven from towr to towre.[14]

A 15th century date would explain why the blockhouse at Polruan has two inverted keyhole-type gunports. Gunpowder weapons were in use in the 14th century but they were primitive and almost certainly ineffective at long range against swift-moving Castilian galleys; but by Edward IV's reign they had come a long way. Famously, the Turkish Sultan Mehmet the Conqueror battered down the walls of Constantinople with cannon-fire in 1453 – the year in which the French

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[13] Leland's *Itineraries*, www.melocki.org.uk.
[14] See also Carew, 134-6, who says that Edward IV punished Fowey because the gallants there had cut off one of his steward's ears.

master-gunner Jean Bureau destroyed the last English army in France at Castillon, in the same way.

However, Leland was not always a reliable historian; and he does, after all, confirm that Fowey was already an important harbour in the 14th century and that 'the French-men diverse tymes assailid this town' <u>before</u> the reign of Henry VI (1422-1461).

There is also another objection to the suggestion that the Fowey/Polruan defences date from the late 15th century. In *Lanteglos by Fowey* (1978) local historians Ackland & Druce pointed out that the heyday of profitable piracy in the area was the 15th century, when the Mixtow family was particularly successful because it was 'secure because of the blockhouses and chain across the harbour'; but the most notorious achievements of the Mixtow clan were in 1402, 1433 and 1450 – before the French raid of 1457, not after.[15]

Conclusions

What conclusions should we draw? The problem cannot be solved without archaeological investigation; but my view is that the work which was done after the French raid of 1457 may well have been a repair and refurbishment, rather than a 'new build'. It seems to me that the threat to the harbour in Fowey and elsewhere, following the raid of 1378 must have been difficult to ignore. Moreover, the need for effective defensive measures along the South coast of England continued throughout the rest of the 14th century and during the first decade of the 15th century; but by 1407 it is clear that the English knew how to defend themselves. Jonathan Sumption's assessment of the situation in that year is that

Hit and run raids against coastal settlements, which had provided such easy spoils in the 14th century, had become more and more hazardous. Fixed defences had been built along the south coast of England, notably at Southampton and Dartmouth.[16]

Taking all the circumstances into account, it seems likely that these 'fixed defences' included the blockhouses and chain at Fowey-Polruan.[17]

There is support for this conclusion in the scepticism shown, as long ago as 1906, by the editor of the relevant volume of the Victoria County History, William Henry Page, F.S.A. After telling us that the Norman and Breton raiders who sacked

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[15] Ackland & Druce, 11; Doe, 11-12.

[16] Sumption, vol IV, 92, 78, 119, 186, 227-230.

[17] The authors of the website www.polruan.org.uk appear to take the same view: 'There were two [blockhouses], built at the end of the 14th century to protect the harbour from pirates and the French. A chain was pulled up across the river…to stop vessels entering the harbour'. But also 'in 1457 the French launched a raid against Fowey Harbour, and as a result a boom defence was added. There were two towers… and it was between these that the chain was stretched.'

Sandwich in 1457 and then made their way home via Fowey did not attempt to enter the harbour, or do much damage to shipping (though they set fire to half the town), he suggests that this shows that the entrance to the harbour was <u>already protected</u>. Further, he tells us that:

The two towers are usually assigned to the reign of Edward IV but in view of the [unfriendly] relationship between the town and the King it seems unlikely that he would have regarded the fortification of the place favourably or have made a grant in aid.

Finally, Page points out that Dartmouth and Plymouth were both fortified or re-fortified in 1377, as indeed were Yarmouth, Harwich, Rye, Sandwich, Winchelsea, Southampton and Chichester; and that the fortifications at Dartmouth are of the same type as the blockhouse at Fowey.[18]

Finally, there is another problem with the conventional wisdom. The histories all tell us that the chain across the harbour-mouth lay on the bottom of the sea for most of the time, and was only raised in times of danger. Yet the sceptical tourist, when he (or she) looks across the mouth of the Fowey may well wonder how it was physically possible to do this, given the length and weight of the chain, especially in view of the phenomenon of 'stiction' (which is obvious when one observes local yachtsmen scraping the seaweed off their moorings).

One point which emerges clearly from the literature on harbour chains in general is that very often chains like this were made lighter by incorporating wooden sections. (An alternative possibility was to have wooden rafts spaced at intervals along the chain). Whether this was done at Polruan is impossible to discover; but it was done in Constantinople in Byzantine times, where there was a very large chain strung across the Golden Horn.

The chain in Constantinople has been studied from an engineering perspective by Takeno and Takeno.[19] It was over 1,000 metres long, made up of some 2,000 links and weighed around 40 tonnes; but it would appear that some 700 metres of the chain at the Galata Tower end was supported on rafts and that it was only the 300 metres at the Topkapi end which needed to be raised or lowered for defence. This would have reduced the weight of chain to be lifted to about 10 tonnes. The power required was supplied by a waterwheel.

The blockhouse at Polruan is hemmed in by the land and built on a rocky promontory. There seems no obvious way in which a waterwheel could have been used. On the other hand, the weight of our chain (assuming a continuous chain 300 metres long) would have been approximately 8 tonnes. This

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[18] V.C.H., I, 483-4.
[19] Takeno & Takeno, p.199.

View from St Catherine's Castle, Fowey (1541).

would have required around 40 men, or 8 horses, to raise it 5 metres.[20]   If these calculations are anywhere near accurate, it is difficult to see how this chain could have been lifted at all, since there is no room for 40 men or 8 horses in the Polruan blockhouse, which is little bigger than the average living room!

      The conclusions to be drawn here are two-fold. Firstly, it is likely that there were one or more floats, placed along the length of the chain, so that only part of it needed to be lifted at any one time. Secondly, it is unlikely that the part of the chain which had to be raised and lowered lay on the sea-bed in times of peace. It is more likely that it was kept suspended at a depth of around 1 to 3 metres - enough to allow friendly ships to enter and leave the harbour without difficulty; and that it was raised only when it was reported that the enemy was approaching.

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[20] Length checked by reference to the O.S.map for St Austell & Liskeard, no 107. Some perspective on the effort needed to lift such a weight is provided by the capstans on *HMS Victory*, which could lift an anchor assembly weighing 10 tonnes; but this required more than 200 men working the capstan bars! See www.nautarch.tamu.edu –website of the Centre for Marine Architecture).

Further reading

The Blockhouse – leaflet distributed by the Polruan Town Trust.

John Leland's *Itineraries* (e-book at www.melocki.org.uk) (c.1538).

Richard Carew, *The Survey of Cornwall, 1602* (London, 1769).

Enguerrand de Monstrelet, *Chronicles,* tr. and ed. Thomas Johnes (London, 1845).

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V.C.H. – the *Victoria County History*, Cornwall, volume I (1906).

P. E. Russell, *The English Intervention in Spain & Portugal in the time of Edward III & Richard II* (Oxford, at the Clarendon Press, 1955).

N.A.Ackland & R.M.Druce, *Lanteglos by Fowey, The Story of a Parish* (Ackland & Druce, 1978).

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Maurice Keen (ed.) *Medieval Warfare: A History* (Oxford, 1999).

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The Buildings of England, Cornwall (Peter Beacham & Nikolaus Pevsner, Yale University Press, 2014).

Jonathan Sumption, *The Hundred Years War volume IV, Cursed Kings* (Faber & Faber, 2015).

www.british –history.ac.uk (British History Online)

www.castlesfortsbattles.co.uk/polruan

www.fowey.co.uk

www.foweyharbourheritage.co.uk/heritage/places/blockhouse

www.foweyharbourheritage.co.uk/fowey-harbour-survey

www.heritagegateway.org.uk/Gateway/Results.

www.melocki.org.uk

www.polruan.org.uk