# Roman maritime activities: the evidence from Britain

## Michael WALSH Université de Southampton

This paper presents a brief summary of the evidence from Britain for cross-Channel contact and maritime activities throughout the Roman era. The evidence from the coastal littoral and the intertidal zone around Britain is not as extensive as one might expect from an island nation. This is largely a result of coastal morphology rather than changes in relative sea level. This is illustrated both by the considerable number of Roman roads that head toward the coast whose destinations, owing to coastal morphology, are unclear, and by Roman finds in the inter-tidal zone.<sup>1</sup>

The outer Thames Estuary as it appears now, however, is largely as it was in Roman times. The major difference is that ships would have sailed through the Wantsum Channel, which used to separate the Isle of Thanet from the mainland, to avoid the treacherous waters of the North Foreland. There is historical evidence that this channel remained navigable until the Middle Ages. In the later Roman period a fort was built at each end of this channel. Richborough (*Rutupiae*) was built at the southern end, which is believed to have been the area in which the Roman army first landed in 43 AD, while Reculver (*Regulbium*) was built at the northern end.<sup>2</sup> The fate of these two forts amply illustrates the complex changes that the British coastline has undergone since the Roman era even in this relatively small area of Kent. Richborough is now at least 1 km from the sea whereas half of the fort at Reculver has been lost into the sea. The church of St Mary's that was built in the centre of Reculver fort in the seventh century, when the fort was still intact, now stands precariously on the cliff edge.

The fate of Reculver is indicative of what has happened to large areas of the British coast since the Roman era. It has been estimated through extrapolation that, in the Roman era, the north and northeast coasts of Norfolk may have been some 2 km seaward of their present location. An engraving from 1786 illustrates the fate of another of the Roman shore forts known as Walton Castle in Suffolk, which had been completely lost to the sea by the late eighteenth century.<sup>3</sup>

With the notable exception of the port of Roman London<sup>4</sup> comparatively few other remains of Roman harbours and quays have been identified. This is very surprising given that large numbers of facilities must have existed as an island nation such as Britain was heavily dependent upon sea communications with the rest of the Roman Empire. This lack of surviving remains is possibly the result of coastal change, or could equally be explained by the continued use of harbour sites throughout history. Alternatively, there could have been a much heavier reliance on landing places such as beaches rather than formal harbour installations. Even where epigraphic evidence of harbour facilities exists, such as at York and

<sup>&</sup>lt;sup>1</sup> H. CLEERE, 1978.

<sup>&</sup>lt;sup>2</sup> B. Philp, 1996; G. Moody, 2008.

<sup>&</sup>lt;sup>3</sup> P. MURPHY, 2005.

<sup>&</sup>lt;sup>4</sup> G. MILNE, 1985.

at Lincoln, the whereabouts of these facilities remains unknown.<sup>5</sup> London has by far the most extensive harbour remains possibly reflecting its importance as a major entrepôt for the province.

There is, however, some evidence; Dover is the closest point to continental Europe and was the principal cross-Channel port for military and mercantile traffic in the Roman era. A lighthouse (*pharos*) was built on each headland, one of which still exists *in situ*. A graffito on a Roman tile (now in the British Museum) appears to illustrate a *pharos*. Evidence of a massive breakwater, a probable quay, a timber jetty and part of a harbourside have been found near the fort. Dover was the headquarters of the British squadron of the *classis Britannica* although its principal port was at Boulogne. The *classis Britannica* was more an army service corps than a "navy" in the modern sense. It operated as a state haulage company and probably controlled cross-Channel traffic – evidence from the famous Vindolanda tablets found on the northern frontier, suggests that military and commercial activities were not mutually exclusive. The *classis Britannica* probably also ran the *cursus publicus* – the Imperial postal service. There is, however, limited evidence for the *classis Britannica* in Britain.

An early second century Roman shield boss (British Museum 1893,1213.1) of Junius Dubitatus was one of a number of pieces of Roman military equipment recovered in 1867 from Herd Sand in the mouth of the River Tyne at South Shields. The fort of Arbeia at the mouth of the River Tyne on the edge of Hadrian's Wall on the northern frontier is the most extensively excavated Roman military supply base in the Roman Empire. Although it was used to supply the Severan campaigns into Scotland of 208-11 AD, no port facilities have been found.<sup>9</sup>

As stated, London has the most extensive Romano-British waterfront yet discovered. It revealed details of developments from the late I<sup>st</sup> century until its decline in the IV<sup>th</sup> century. Each succeeding quay was built further into the river thereby indicating that the tidal level had dropped by as much as 1.5 m over the period of its development. The importance of London as an entrepôt in the Roman era, however, may have been enhanced by the extent of the archaeological remains.<sup>10</sup>

Other methods of unloading such as the beaching of flat-bottomed vessels or the transhipment of cargo from sea-going ships to river barges would leave few formal structures and therefore little archaeological evidence. It is known that goods reached Britain using a complex system of transhipment centres. Moreover, natural harbours such as St Peter Port on Guernsey would not have required formal facilities. Surveys of the Thames, Solent and Severn river foreshores have revealed considerable archaeological evidence in the inter-tidal zone thereby providing evidence of unloading without the use of formal structures such as piers, jetties or wharves.<sup>11</sup>

A series of late Roman coastal installations, the so-called "Saxon Shore" forts, were built along the south-east coast from Brancaster in Norfolk to Clausentum in Hampshire. They include Richborough, Reculver and Walton Castle mentioned earlier. These forts combined with a similar system along the northern coast of Gaul. They were previously considered a unified centralised defensive system against piracy and coastal raiding resulting from the political, military and economic crises of the third century. Recent analysis of fort

<sup>&</sup>lt;sup>5</sup> P. Ottaway, 1993, p. 85.

<sup>&</sup>lt;sup>6</sup> T. WILMOTT, J. TIBBER, 2009.

<sup>&</sup>lt;sup>7</sup> M.J. MILLETT, 2007, p. 176-177; B. PHILP, 1981.

<sup>&</sup>lt;sup>8</sup> G. MILNE, 2007.

<sup>&</sup>lt;sup>9</sup> P. BIDWELL, 2001.

<sup>&</sup>lt;sup>10</sup> G. MILNE, 1985.

<sup>&</sup>lt;sup>11</sup> M. WALSH, 2013.

morphology, however, has suggested their development occurred over 70 years from c. 225 to 300 AD. They are now considered a complex military network shipping supplies from the south of the province and possibly from Gaul to the northern military frontier along Hadrian's Wall. Many Roman installations that had been sited on the Yorkshire coast but which have now been lost have been interpreted as signal stations. Portchester Castle on the south coast is a particularly good example, which well illustrates the maritime context of these fortified ports but no attendant maritime structures have been found. There must have been considerable exploitation of the coastal fringe including agriculture, fowling and fishing, although there is little evidence from the Roman period even for fish traps. There is some evidence for industrial activity; salt-extraction sites are common but less so in areas of known coastal erosion. Surprisingly few ship-building sites have been identified, and mineral and stone extraction in the coastal zone is also poorly understood.

There is a considerable gap in our knowledge of maritime activities around Britain with no known evidence from the several hundred years spanning the prehistoric Humber boats to the mid-Roman period. Even then, only a handful of vessels from the Roman era have been discovered in the British Isles. The Blackfriars 1 ship was found in the early 1960s during building works in the vicinity of the Blackfriars Bridge over the River Thames in central London. It dates from the mid II<sup>nd</sup> century and was built in the so-called Romano-Celtic tradition, a robust carvel-style using huge timbers and very large iron nails. It carried a cargo of Kentish ragstone from Medway in Kent which was probably intended for the construction of London's new walls. <sup>14</sup>

The New Guy's House boat was found when an extension to Guy's Hospital in London was being built. It dates from the late II<sup>nd</sup> century and is the only Roman vessel not considered to be sea-going.<sup>15</sup> The Barland's Farm boat was found in Wales near the river Severn and dates from the early III<sup>rd</sup> century.<sup>16</sup>

The County Hall ship was found in 1910 when the new headquarters for the Greater London Council was being built on the Southbank of the Thames, near where the London Eye now stands. This wreck dates from the late third century and is the only Roman wreck found in northern Europe that was built using Mediterranean techniques. This was a hull-first construction using mortice and tenons to join the hull planks together before the frame timbers were fitted. It was, however, built from timber grown in SE England so was probably built by craftspeople who had learned their craft in the Mediterranean. Although the function of this vessel is unknown the introduction of this technique may have arisen out of the need to build warships locally. Caesar described the use of Mediterranean-style warships in British waters in the first century BC.<sup>17</sup>

The remains of the Roman ship found in St Peter Port harbour in Guernsey also dates from the late third century. It is the only wreck to have been found in a maritime context; all the others have been found in riverine or what would have been riverine contexts. It carried a cargo of pitch but had been burned to the waterline in antiquity. Building materials dominate the cargoes on vessels found around Britain. The pottery assemblage associated with the wreck ranged in geographical scope from North Africa to northern France, which would seem to suggest that the ship had been engaged in long-distance voyaging. It is more likely,

<sup>&</sup>lt;sup>12</sup> M. WALSH, 2013, p. 100-1.

<sup>&</sup>lt;sup>13</sup> M. WALSH, 2013, p. 101-2.

<sup>&</sup>lt;sup>14</sup> P. MARSDEN, 1994, p. 33-91.

<sup>&</sup>lt;sup>15</sup> P. MARSDEN, 1994, p. 97-104.

<sup>&</sup>lt;sup>16</sup> N. NAYLING, S. McGRAIL, 2004.

<sup>&</sup>lt;sup>17</sup> P. Marsden, 1994, p. 109-128.

however, that the assemblage is the result of cabotage or coastal tramping, collected while the ship called at ports along the route, rather than indicative of long-distance trade.<sup>18</sup>

In northern Europe, sadly, we have more evidence of the so called Romano-Celtic or Gallo-Roman boat building traditions than we do about the transition in maritime transport from the Bronze Age through the Iron Age to the Roman era. <sup>19</sup> Indeed in Britian we appear to have more contextualised evidence for Bronze Age cargoes than we do for Roman; as evidenced by the assemblage now in the British Museum which was recovered from Langdon Bay just outside Dover harbour. It largely comprises scrap bronze artefacts from the middle Bronze Age and appears to represent the cargo of a boat that may have overturned and deposited its load on the seabed.

There is some evidence from the Gallic side of La Manche that in some ways fills this gap. The Ploumanac'h wreck off the Brest peninsula represents a cargo of lead ingots from southwest Britain dating from the late pre-Roman Iron Age.<sup>20</sup> Literary sources and pictorial evidence for Britain is also limited. Evidence for maritime activities include a coin of Cunobelinus,<sup>21</sup> the king of the Trinovantes, that depicts a ship,<sup>22</sup> as do the Arras medallion,<sup>23</sup> an intaglio recovered from the River Thames,<sup>24</sup> and coins of the British usurpers Allectus and Carausius.<sup>25</sup> The forward located mast step on Romano-Celtic craft indicates they were rigged for sail but obviously beyond this we have no direct evidence for ship's rigging. There is some indirect evidence, however, including a second or third century monument from Trier, a third century floor mosaic from Germany, and Caesar's account of Venetic watercraft.<sup>26</sup>

It should be stressed that the mechanisms of cross-Channel trade operated long before the arrival of Roman forces on the north Gaulish coast. Trade in this context encompasses all mechanisms of exchange adopted by pre-industrialised societies, but there was undoubtedly considerable pre-invasion contact. This is evidenced by typically Roman material culture found in late pre-Roman Iron age contexts like Dressel 1 amphorae found as grave goods in late pre-Roman Iron age inhumations.<sup>27</sup>

Fulford's analysis of fifteenth century port books from Bristol, which detailed all the items brought into that port, found that pottery is seldom recorded in port book lists.<sup>28</sup> Consequently, it appears that the least valued item of trade becomes one of most important items in the archaeological record. He also found that less than a fraction of one per cent of what was traded survives in the archaeological record.

The observed reduction in the numbers of imported *amphorae* over time suggests a move away from Mediterranean amphora-based products to a more northern European trade using other receptacles such as barrels, pots, bottles, baskets, boxes, sacks or loose carriage.<sup>29</sup> For example, Strabo (*Geogr*. V 1.8) recounts how the Illyrians came to Aquileia to collect their wine that had arrived by sea, which they then transferred into barrels to transport home (see Caesar, *BG* VIII 42.1); similar practices may account for the abundance of amphorae found at Toulouse.<sup>30</sup> Images of ships, such as that found on the famous Neumagen frieze,

<sup>&</sup>lt;sup>18</sup> M. Rule, J. Monaghan, 1993.

<sup>&</sup>lt;sup>19</sup> M. Walsh, 2013, p. 104.

<sup>&</sup>lt;sup>20</sup> M. L'Hour, 1987.

<sup>&</sup>lt;sup>21</sup> See P. GALLIOU, 2019, p. 2, Fig 1.

<sup>&</sup>lt;sup>22</sup> K. MUCKELROY *et al.*, 1978.

<sup>&</sup>lt;sup>23</sup> G. ASKEW, 1980, p. 54.

<sup>&</sup>lt;sup>24</sup> M. HENIG, A. ROSS, 1998.

<sup>&</sup>lt;sup>25</sup> M. WALSH, 2013, p. 104.

<sup>&</sup>lt;sup>26</sup> M. WALSH, 2013, p. 105.

<sup>&</sup>lt;sup>27</sup> See D.F. WILLIAMS, D.P.S. PEACOCK, 1983.

<sup>&</sup>lt;sup>28</sup> M. FULFORD, 1978.

<sup>&</sup>lt;sup>29</sup> A.J. PARKER, 1992, p. 89.

<sup>&</sup>lt;sup>30</sup> A. TCHERNIA, 1983, p. 94.

sometimes portray cargoes, but cargo is more usually carried in the hold of ships so is difficult to portray in iconography. Moreover, barrels rarely survive in the archaeological record and are usually found in secondary contexts such as reuse as well linings.

A combination of river barges and sea-going vessels brought goods up the Rhone and Rhine rivers, then across the Channel to the Thames. Strabo (*Geogr.* IV, 5, 2) lists the four main Channel crossings as originating from the mouths of the rivers Rhine, Seine, Loire and Garonne. The overwhelming concentration of inscriptions related to the shipment of goods on the Rhône-Saône axis highlights the dominance of this route as the principal commercial axis of Gaul.<sup>31</sup> The decline in imports over time suggests the province of Britannia was becoming self-sufficient by the third century.

<sup>&</sup>lt;sup>31</sup> P. MIDDLETON, 1979, p. 82, Fig 1.

#### References

#### **Primary**

Caesar, De Bello Gallico, 1982, Translation by S.A. HANDFORD, Hammondsworth, Penguin Classics.

Strabo, Geographia, 1917, Translation by H.L. JONES, London, Heinemann/Loeb Classical Library.

### Secondary

- G. ASKEW (1980), The coinage of Roman Britain, London, Seaby.
- P. BIDWELL (2001), « A probable Roman shipwreck on the Herd Sand at South Shields », *Arbeia Journal* 6-7, p. 1–21.
- H. CLEERE (1978), « Roman harbours in Britain south of Hadrian's Wall », in J. DU PLAT TAYLOR, H. CLEERE (eds), Roman Shipping and Trade: Britain and the Rhine Provinces, Council for British Archaeology Research Report 24, London, p. 36–40.
- M. FULFORD (1978), « The interpretation of Britain's late Roman trade: the scope of medieval historical and archaeological analogy », in J. DU PLAT TAYLOR, H. CLEERE (eds.), Roman Shipping and Trade: Britain and the Rhine Provinces, Council for British Archaeology Research Report 24, London, p. 59-69.
- P. GALLIOU (2019), « Les relations entre l'Ouest de la France (hors Pas-de-Calais) et les îles britanniques de la protohistire à la fin de l'époque romaine », in M.-Th. CAM (éd.), Les relations trans-Manche dans l'Antiquité et au Moyen-Age, Annales de l'APLAES, Revue en ligne.
- M. HENIG, A. ROSS (1998), « A Roman intaglio depicting a warship from the foreshore at King's Reach », *Britannia* 29, p. 325-327.
- M. L'HOUR (1987), « Un site sous-marin sur la côte de l'Armorique. L'épave antique de Ploumanach », Revue archéologique de l'ouest 4, p. 113–31.
- P. MARSDEN (1994), *Ships of the Port of London: First to Eleventh Centuries AD*, London, English Heritage Archaeological Report 3.
- P. MIDDLETON (1979), « Army supply in Roman Gaul: an hypothesis for Roman Britain », in B.C. BURNHAM, H.B. JOHNSON (eds), *Invasion and Response: The Case of Roman Britain*, British Archaeological Reports British Series 79, Oxford, p. 81–97.
- M.J. MILLETT (2007), « Roman Kent », in J H WILLIAMS (ed.), *The archaeology of Kent to AD 800*. Boydell Press/ Kent County Council, Woodbridge, p. 135-184.
- G. MILNE (1985), The Port of Roman London, London, Batsford.
- G. MILNE (2007), Notes on the South-Eastern Research Framework Maritime Themes, South-East Research Framework.
- G. MOODY (2008), The Isle of Thanet from Prehistory to the Norman Conquest, Stroud, Tempus.
- K. MUCKELROY, C.C. HASELGROVE, D. NASH (1978), « A pre-Roman coin from Canterbury and the ship represented on it », *Proceedings of the Prehistoric Society* 44, p. 439-444.
- P. MURPHY (2005), « Coastal change and human response », *in* T. ASHWIN, A. DAVISON (eds), *An Historical Atlas of Norfolk* (3<sup>rd</sup> edn), Philimore, Chichester, p. 6-7.
- N. NAYLING, S. McGrail (2004), *The Barlands Farm Romano-Celtic boat*, York, Council for British Archaeology Research Report 138.
- P. OTTAWAY (1993), Roman York, London, Batsford.
- A.J. PARKER (1992), Ancient shipwrecks of the Mediterranean and the Roman provinces, Oxford British Archaeological Reports International Series 580.

- B. PHILP (1981), *The Roman forts of the Classis Britannica at Dover 1970-77*, Dover, Kent Archaeological Research Unit Research Report 3.
- B. PHILP (1996), The Roman Fort at Reculver, (9th edn), Canterbury, Kent Archaeological Rescue Unit.
- M. RULE, J. MONAGHAN (1993), A Gallo-Roman Trading Vessel from Guernsey, St Peter Port, Guernsey Museum Monograph 5.
- A. TCHERNIA (1983), « Italian wine in Gaul at the end of the Republic », *in* P. GARNSEY, K. HOPKINS, C.R. WHITTAKER (eds), *Trade in the ancient economy*, Berkeley, p. 87-104.
- M. WALSH with A. BROCKMAN, M. EDDY, G. GRAINGE, J. ELLIS JONES, A. LOCKER, A. MOORE, P. MURPHY, J. SATCHELL, D. TOMALIN and P. WILSON (2013), « Roman, c. AD 43–400 », in J. RANSLEY, F. STURT, with J. DIX, J. ADAMS, L. BLUE (eds), *People and the Sea: A Maritime Archaeological Research Agenda for England*, London, Council for British Archaeology Research Report 171, p. 93-112.
- D.F. WILLIAMS, D.P.S. PEACOCK (1983), « The importation of olive-oil into Iron Age and Roman Britain », in J.M. BLÁZQUEZ MARTÍNEZ, *Producción y comercio del aceite en la Antigüedad*, Universidad Complutense, Madrid, p. 263-280.
- T. WILLMOTT, J. TIBBER (2009), « Richborough, a Roman and Medieval Port », *English Heritage Research News* 12, p. 20-22.