

Lundenwic: the archaeological evidence for middle Saxon London

ROBERT COWIE & ROBERT WHYTEHEAD*

Where London was in the Roman and later medieval periods is clear enough: largely in the walled city, now under the modern financial district that is the City of London. But what of the period between? New evidence is assessed on this longstanding problem.

More than half a century ago Myres (1934) and Wheeler (1934a; 1934b) debated the subject of Saxon London in the pages of *ANTIQUITY*. Despite their differences both authors agreed that Saxon London lay in the area enclosed by the walls of the former Roman City. Nevertheless, the presence of loomweights and pottery near the Savoy (FIGURE 1, site 1) prompted Wheeler (1935: 141) to speculate that the riverside between the City and Westminster was occupied by groups of Saxon buildings. Until recently, however, the Savoy finds, and later discoveries at the Treasury (FIGURE 1, site 2; Green 1963; Green & Thurley in preparation) and Arundel House (FIGURE 1, site 3; Haslam 1975), were regarded merely as evidence of middle Saxon farms (Hurst 1976: 60; Blackmore 1983: 84).

This model became increasingly untenable during the late 1970s and early 1980s as numerous excavations in the City by the Museum of London's Department of Urban Archaeology produced little evidence of Saxon occupation earlier than the 10th century. The lack of middle Saxon material was curiously at odds with contemporary documentary sources, which suggested that London was a thriving international port in the 7th to 9th centuries. Confronted by this dilemma, Biddle (1984) and Vince (1984a) independently reassessed the evidence for Saxon London. From place-name evidence and from a small cluster of chance finds near the

Strand, they concluded that the middle Saxon trading port of London lay to the west of the City, about a kilometre upstream. Biddle proposed that middle Saxon London comprised two distinct elements (FIGURE 2): an extramural mercantile settlement along the Strand; and the walled area of the old Roman town, perhaps only occupied by the élite, with few buildings – possibly including a royal hall at Cripplegate, and the cathedral church of St Paul founded in 604 for Bishop Mellitus. In 1984 the archaeological basis for this new theory was tenuous; with the possible exception of the Savoy site, *in situ* middle Saxon strata had not been found in the area around the Strand. The breakthrough came in May 1985 when substantial evidence of middle Saxon occupation was recorded by the Museum of London's Department of Greater London Archaeology at Jubilee Hall (FIGURE 1, site 4; Whytehead 1985; Whytehead in preparation (a)). Since that discovery at least 20 more sites with deposits of known or probable middle Saxon date have been investigated by the DGLA (Cowie in preparation), lending considerable weight to the view that Lundenwic was located in the vicinity of the Strand. The well-preserved remains of wooden buildings at the Treasury, a site some distance from the Strand, were, as first thought, almost certainly part of a farm beyond the main settlement.

In this paper, we refer to the extramural *emporium* as Lundenwic, although it is not

* Department of Greater London Archaeology, The Museum of London, 3–7 Ray Street, London EC1R 3DJ.

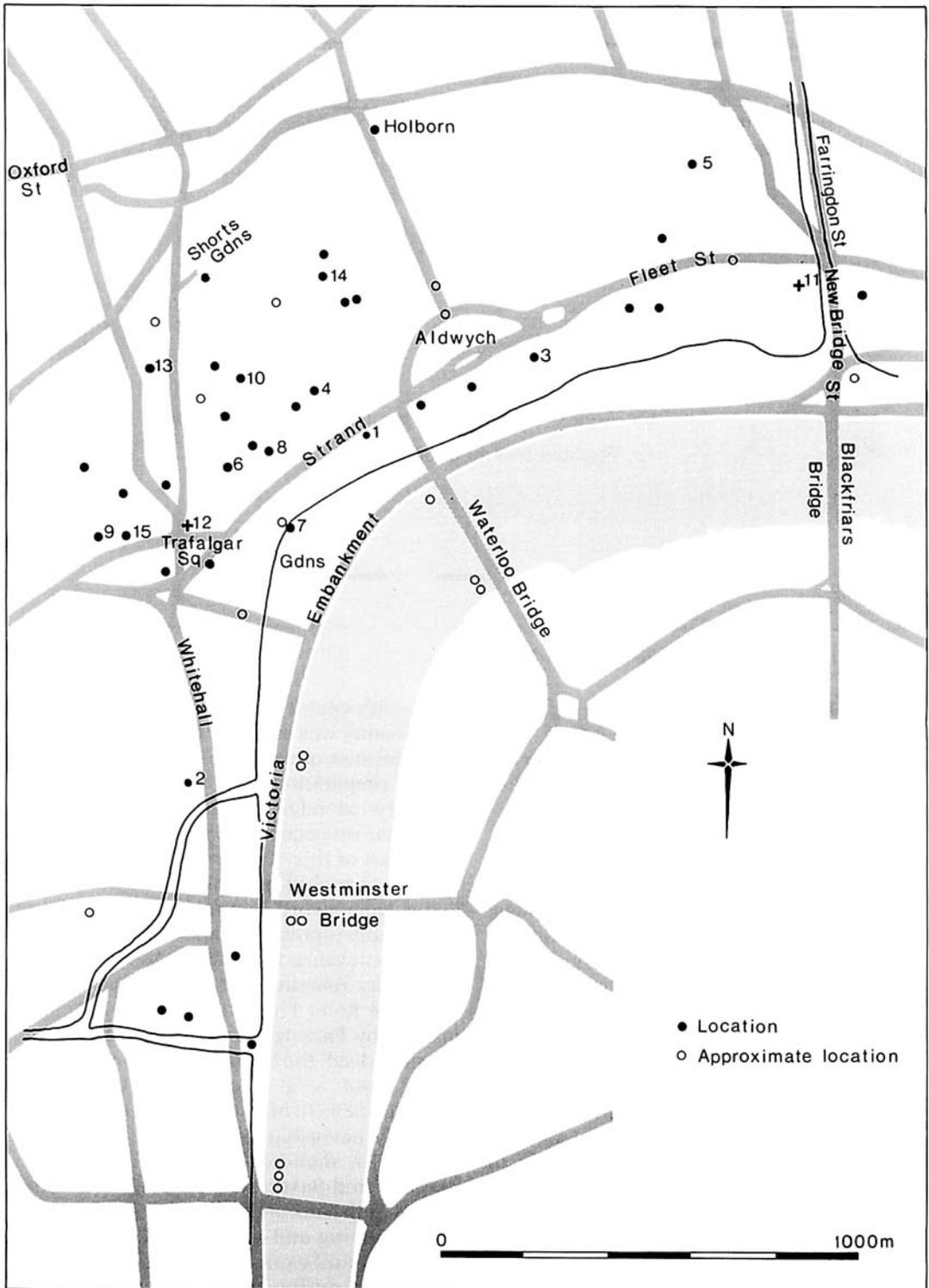


FIGURE 1. Map showing the supposed position of the River Thames and its tributaries in the middle Saxon period, and 7th to 9th-century sites between the Fleet and Westminster.

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|-----------------|------------------|------------------------------|------------------------------|
| 1 Savoy | 5 Fetter Lane | 9 National Gallery extension | 13 Great Newport Street |
| 2 The Treasury | 6 Bedfordbury | 10 Floral Street | 14 Drury Lane |
| 3 Arundel House | 7 York Buildings | 11 St Bride's | 15 National Gallery basement |
| 4 Jubilee Hall | 8 Maiden Lane | 12 St Martin-in-the-Fields | |

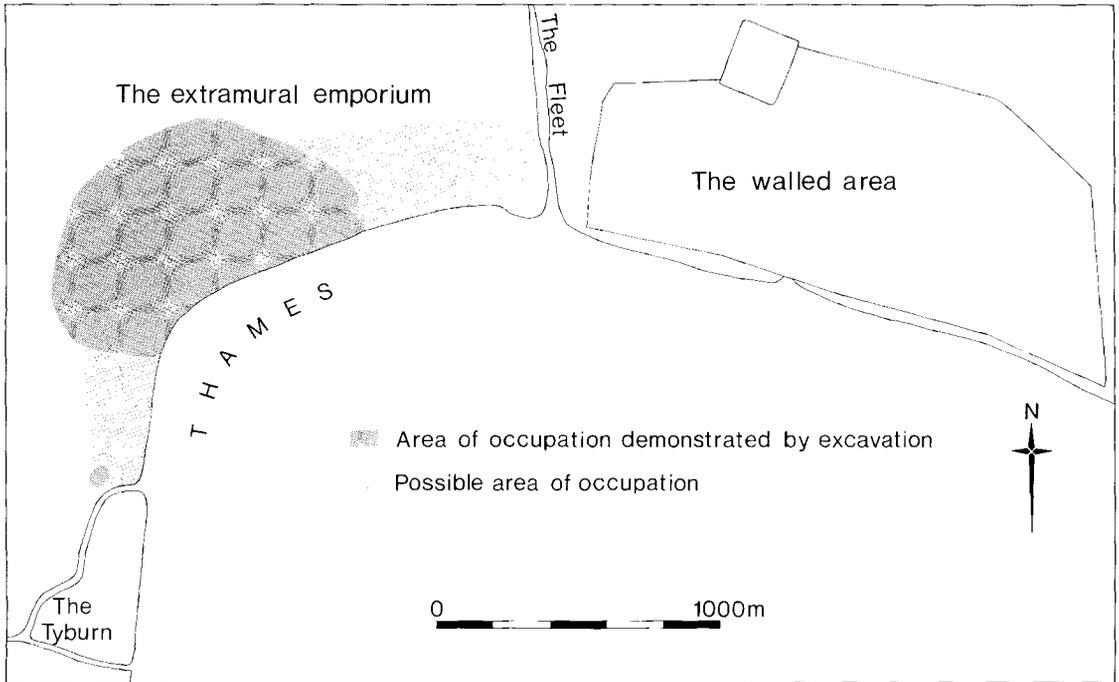


FIGURE 2. The two elements of middle Saxon London.

certain that Saxon sources were referring specifically to this part of London when they used this name, which may also have applied to the walled area, known in the late Saxon period as Lundenburh (John Clark pers. comm.).

The size and chronology of the settlement

Various estimates for the extent of Lundenwic (Cowie 1987: 33; Hopley 1986: 16; Vince 1984a: 310) are largely based on the distribution of sites; they suggest a settlement area of between 24 and 112 ha. From the present configuration of occupation sites, we prefer a figure of 60 ha; the settlement area confirmed by excavation is over a kilometre north-east–south-west and 0.6 km north-west–south-east. It is not yet clear how much of this area was occupied at any one time, or whether there was any shift in the focus of settlement, although recent archaeological evidence has begun to shed light on this question.

Judging by site distribution, the 7th/9th-century settlement extended south to the Thames, north to Shorts Gardens, and west to Trafalgar Square. The town may have continued southwards from the Square, along the river-bank at Whitehall, but this low-lying, marshy area would have been less suitable for occupa-

tion; a 9th-century sunken-floored building at the Treasury was probably abandoned and back-filled because of wet conditions (Green & Thurlley in preparation). To the east, occupation probably extended at least as far as Aldwych, but so far no occupation sites have been excavated east of this. The few finds from the Fleet Street area, including a coin of Coenwulf and the Fetter Lane sword pommel (FIGURE 1, site 5), may simply represent chance losses outside the settlement (Vince 1984a: 311). Nevertheless, the possibility remains that Lundenwic extended up to the River Fleet, today underground and marked by Farringdon Street and New Bridge Street. Indeed, the Saxon derivation of the word Fleet, *Fleot* – ‘a place where vessels float’ (Ashton 1889: 3), hints that the river, which was probably navigable near its mouth, may have provided a sheltered berth for boats. No evidence of mid-Saxon settlement has been found on the south bank of the Thames, much of which was low-lying and unsuitable for occupation; although mid-Saxon pottery and three *sceattas* were found during excavations at Bermondsey Abbey, Southwark (possibly founded in the mid-Saxon period), 3 km southeast of the emporium (Dave Beard pers. comm.).

Lundenwic, therefore, was in a prime location, with good communication routes provided by the Thames, and by surviving Roman roads. Building materials were readily available: brickearth (for daub) and gravel (for metalling) could be obtained from the river terraces on which the settlement was built, while stone and tiles could be robbed from Roman remains in the City.

At present, few sites between Aldwych and Trafalgar Square seem to have produced finds likely to be earlier than the mid/late 7th century, although this view may be modified if the middle Saxon ceramic sequence can be more closely dated. Those sites that show signs of early activity include Jubilee Hall, where one of the earliest features was an inhumation with a ^{14}C date of 1370 ± 60 b.p. (HAR-8936) calibrated to 630–675 AD (calibration curve in Stuiver & Pearson 1986), and possibly Bedfordbury (FIGURE 1, site 6) where a high proportion of the pottery in the earliest phase was chaff-tempered. At York Buildings (FIGURE 1, site 7), foreshore deposits containing numerous animal bones may also be early, for they were sealed by an embankment which contained planks dated by dendrochronology to the last quarter of the 7th century (Ian Tyers pers. comm.). Before the mid 7th century it seems that the settlement was confined to a small area around the Strand, or was perhaps only occupied seasonally as a market-place – a Hodges' type A *emporium* (Hodges 1982: 50–2; 1988: 5).

During the late 7th to early 8th centuries, the settlement appears to have grown considerably. The laws of the Kings of Kent suggest that by the 680s it was well established with a reeve to oversee the transactions of that kingdom's traders, while the construction of a waterfront embankment during this period (above) possibly reflects increased sea-borne trade with settlements like Dorestad, where the construction of harbour causeways had also begun. Structural and environmental evidence suggests that by the 8th century Lundenwic was permanently occupied. Excavations at four sites to the north of the Strand have yielded six *sceattas* (identified by Peter Stott) dating between 700 and 740 (FIGURES 3 & 4). Occupation in the later 8th–9th century is indicated by sherds of Tating ware, Badorf-type amphorae, a sherd of Beauvais red-painted ware, and pieces of glass funnel beaker, from sites near the



FIGURE 3. A series T sceat from the National Gallery extension. The obverse shows the bust of an unknown individual. (Photo: Museum of London, Louise Woodman.)



FIGURE 4. A series D type 8 sceat from Maiden Lane. (Photo: Museum of London, Louise Woodman.)

Strand, as well as two coin hoards of c. 842 and c. 871, from the Middle Temple and Waterloo Bridge respectively (Dolley 1960: 42). However, no conclusive evidence has been found for occupation beyond the late 9th century.

This outline is based on limited archaeological evidence, and more information needs to be

gathered by fieldwork and finds analysis before the chronological sequence of the town's development can be further refined.

Roads

Some of the Roman roads radiating from London remained in use during the Saxon period, among them Watling Street, probably a vital link between landlocked Mercia and its only seaport, Lundenwic. A Roman road leading to Watling Street passed close to the northern edge of Lundenwic along what is now Oxford Street, and was probably part of the route into Mercia. Lundenwic itself was centred around the Strand, which with Fleet Street is thought to be on the line of a Roman road leading from Ludgate in the City (Margary 1955: 51; Merrifield 1983: 121). The Strand was probably the town's main street, for it overlooked the important waterfront area and would have provided the most direct route to the walled area. Its importance as an early thoroughfare is shown in a charter of 1002, where it is referred to as *Akemannestraete* (Sawyer 1968: no 232). Traces of this road have yet to be found, apart, perhaps, from those recorded in the 16th century by Stow, who noted the remains of an earlier road under the pavement on the north side of Fleet Street, between Chancery Lane and St Dunstan's church. There is little physical evidence for other roads in Lundenwic, although patches of gravel metalling were found during excavations at Maiden Lane (FIGURE 1, site 8; Cowie 1987: 32). Gravel for road and yard surfaces may have come from a quarry area just outside the (hypothetical) western boundary of the settlement. Several gravel pits were found at the National Gallery Extension (FIGURE 1, site 9) during excavations in 1987 (Cowie 1988). One quarry was 2.75 m deep and was traced for 16.5 m; the full dimensions are not known since it extended beyond the edges of the excavation area. It is not absolutely certain when these quarries were dug. A mid-Saxon date is likely, for their earliest fills produced a small number of middle Saxon artefacts, while their upper fills contained 10th to 12th-century pottery (Lyn Blackmore pers. comm.), and the massive quarries could have taken several centuries to fill up. The size of the quarries suggests that they were part of a communal enterprise, possibly controlled by a central authority.

Waterfront

The waterfront was probably entirely located in the narrow strip between the north side of the Victoria Embankment Gardens and the bottom of the steep slope which leads up to the Strand. Part of it was found recently at 18–20 York Buildings, about 40 m north of the Gardens, where mid-Saxon deposits, provisionally interpreted as an embankment, were excavated in a small trench more than 5.5 m below modern street level (Cowie 1989). Traces of the embankment were also observed in pile-holes and trenches dug by building contractors across the entire length of the site, indicating that the embankment was, at this point, at least 17 m wide (north–south). The embankment, which rested on a sandy foreshore, consisted of brushwood weighed down by a thin scatter of stone rubble and Roman tile. The brushwood had been built up around oak and alder stakes driven into the foreshore. Some stakes were in a row aligned approximately parallel to the Thames. The brushwood also surrounded a revetment aligned at right angles to the river, which was made of stakes with traces of wattle, and oak planks placed vertically edge to edge. Dendrochronological dating indicates that seven of the planks came from oaks felled between 670 and 690 (Ian Tyers pers. comm.); the structure may have been built shortly after the earliest reference to the 'Saxon port of London' made in Frithuwald's charter of 672–4 (translation in Whitelock 1955: 440–1).

The embankment may have been built in stages, gradually developing and extending, as areas of foreshore were marked out at low tide with lines of stakes and planks, filled with bundles of brushwood, and reclaimed. The stakes and planks would have formed crude revetments, retaining the brushwood, and protecting the edges of the reclaimed land. The revetments of earlier stages of the embankment would be enclosed by later extensions, which would explain why those at York Buildings were surrounded by brushwood.

The embankment would have provided a level area, where vessels beached against it could be loaded and unloaded. Waterlaid clay covered the southern part of the embankment, supporting the suggestion that Lundenwic was 'sitting on a tidal reach of the Thames' (Milne 1985: 86), in an advantageous location that would have allowed ships from the Continent to

travel right up to the settlement on an incoming tide. Fluctuations in sea level and the tidal head of the Thames may have affected the operation of the port; so environmental changes might have contributed to the decline of Lundenwic in the 9th century (Vince forthcoming).

Buildings

The best-preserved structural remains were found in 1961, at a location probably outside the main settlement, in waterlogged deposits at the Treasury, Whitehall, where the wooden remnants of two successive buildings were preserved. In the first, a sunken floor was enclosed by walls made of vertical oak planks resting on sleeper beams (Green & Thurley in preparation). A substantial rectangular hall overlay the remains of this structure, its floor laid on a raft of planks re-used from the earlier building. There was evidence that the hall was divided into bays, and had a porch. Traces were also found of what might have been a sunken-featured building with a plank floor.

Within the main settlement area two sites, Jubilee Hall and Bedfordbury, have produced clear evidence of post and sill-beam structures. At Bedfordbury there were traces of a structure, perhaps with a porch leading on to a metalled yard. At Jubilee Hall a number of beam-slots and associated post-holes were found, indicating the position of either fences or houses (Whytehead 1985; Blackmore 1986: 215). An extensive brickearth floor incorporating a hearth was also recorded at this site. Some of the structural features at both sites were covered with homogeneous grey earth, which micro-morphological analysis has shown to be a mix of daub, wood, charcoal and domestic debris, probably derived from collapsed buildings, and reworked by natural action, particularly earthworm activity (Macphail in preparation). At a third site, 17–18 Floral Street (FIGURE 1, site 10), evidence was found of at least one building, and possibly two others. The building had a sunken floor made of clay. As the structure had been destroyed by fire, the floor was covered by successive layers of charcoal and burnt daub, and a charred plank was found against the side of the sunken area.

Numerous fragments of burnt daub made of local brickearth were found at several sites near the Strand, and provided indirect evidence of buildings in the area. A large number of daub

fragments from Maiden Lane, and a few from Jubilee Hall, were coated with white limewash suggesting that the walls of some buildings were whitewashed.

It is likely that fire was an endemic hazard in Lundenwic, where timber was the main building material. According to the *Historia Regum*, a 12th-century manuscript thought to be drawn from earlier sources (Whitelock 1955: 239), London was destroyed by fire in 764, 798 and 801. Accidental fires may have caused the destruction of buildings at Jubilee Hall and Floral Street, and the Hall at the Treasury, and may also account for other finds of burnt daub.

Rubbish from the dwellings was dumped either in pits or surface middens. Some pits were initially used as cess pits, and at Maiden Lane the primary fill of one pit produced coprolites, identified as human (Clare de Rouffignac pers. comm.). Wells were often dug close to houses, and in some cases were lined with barrels or timber.

Churches

Two churches near the Strand, St Bride's (FIGURE 1, site 11) and St Martin-in-the-Fields (FIGURE 1, site 12), have produced evidence that they might date to the middle Saxon period. The remains of the first St Bride's church were excavated in 1952 by Grimes (1968: 182–203), who concluded that the south wall of the nave was no later than late Saxon. The nave wall is presented as 6th-century where the remains are today displayed beneath the Wren church, presumably on the dubious grounds that the church was dedicated to St Brigit, a 6th-century Irish saint (see Brook & Keir 1975: 139). There is no archaeological basis for such an early date. At St Martin's two glass palm cups and an iron spearhead were found with stone coffins aligned north–south when the portico was built in 1722–6. These burials may have been part of a Continental-style cemetery (Biddle 1984: 25; forthcoming) which possibly had an associated church.

Burials

Apart from the sarcophagi at St. Martin's, no evidence for middle Saxon cemeteries has been found. Individual male burials were found at Jubilee Hall and Bedfordbury, both orientated west–east with their heads to the west. The skeleton at Jubilee Hall was prone (Whytehead



FIGURE 5. *The burial at Bedfordbury.*

1985), a position which has been associated with criminal burials. The grave appeared to be as early as, or to pre-date, the earliest occupation at the site. The burial at Bedfordbury was in the middle of the occupation sequence, dug through dump layers on a disused gravel yard surface (Whytehead in preparation (b)); the body seemed to have been rolled into the grave and lay awkwardly on its right side (FIGURE 5). A long spearhead lay under the left shoulder and upper arm. Rubbish pits continued to be dug in the vicinity of the grave, one of which removed the skull. Similar disturbance may explain undated skull fragments from the Kingsway (LCC), Maiden Lane, and Shorts Gardens, and jawbones from 141–7 Drury Lane (Myres 1937: 432–3), and 26–7 Southampton Street.

The economy of the town

Small amounts of industrial waste have been recovered from a number of sites around the Strand, suggesting that production was undertaken on a small scale in households and workshops across Lundenwic. While some sites have produced more of a particular craft than others, there is no evidence of exclusive specialization at any site.

A few fragments of what may have been smelting furnace were recovered at Great New-

port Street (FIGURE 1, site 13), suggesting that iron smelting may have been undertaken on the fringe of the settlement.

Some smithing slag came from Jubilee Hall and Maiden Lane, and a significant amount from Bedfordbury, where hammer scale was also found. A small pit full of iron-working waste, which spilled out beyond the pit, was found at 42–4 Drury Lane (FIGURE 1, site 14). Finer metal working is attested by a crucible fragment from Jubilee Hall, which contained droplets of gunmetal, and at Bedfordbury by a fragment of a fired clay mould used to cast copper-alloy keys, a small ‘ingot’ of copper-alloy, and a large number of finished and possibly unfinished copper-alloy objects, mainly pins (Lyn Blackmore pers. comm.).

At Maiden Lane and Jubilee Hall horn- and antler-working were indicated by horn cores, and sawn off-cuts from red-deer antlers. Finished items made of antler and bone have been found on several sites; they include pins, combs, and a decorated knife handle (FIGURE 6), although these may have been made elsewhere.

Cloth production is indicated by a range of artefacts including spindlewhorls, bone thread-pickers, a glass linen-smoother, a carding comb, and loomweights. The loomweights were found in some quantity at a number of sites near the

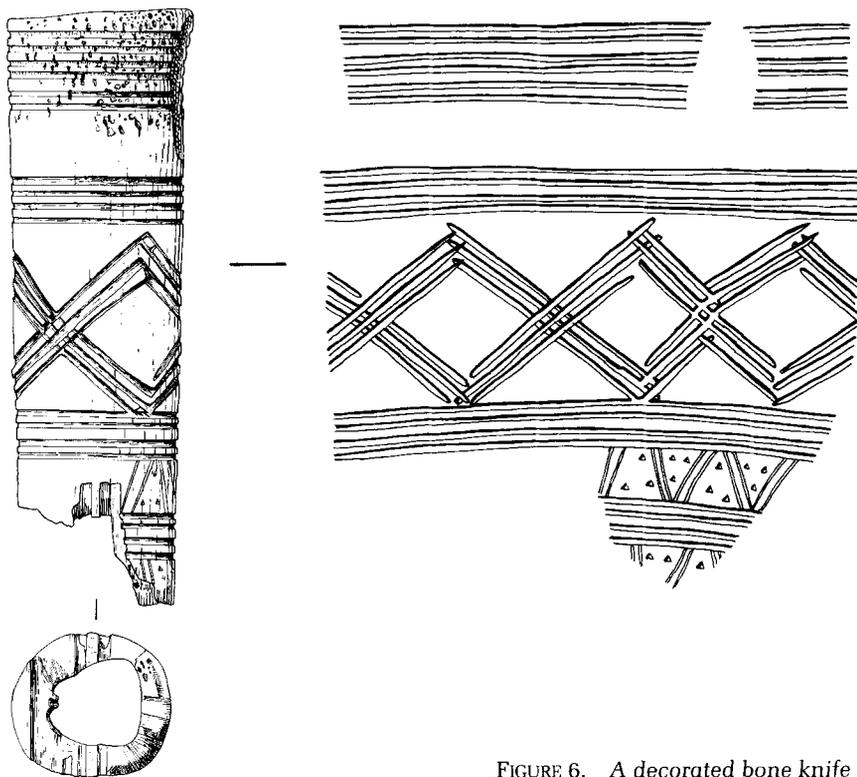


FIGURE 6. A decorated bone knife handle from Jubilee Hall.

Strand, including an unspecified site in York Buildings, where it was reported in 1930 that over a hundred were found (Vince 1984b). Ipswich-type ware from middle Saxon rubbish pits in the National Gallery basement (FIGURE 1, site 15), which had an internal purple deposit, may have contained dye derived from madder (Lyn Blackmore pers. comm.). Although textiles have not been found, two impressions of woven material were identified on daub fragments from Maiden Lane (Richenda Goffin pers. comm.).

By the 8th century, the archaeological evidence suggests that Lundenwic was probably too large to be entirely self-sufficient in food; some foodstuffs were imported from the surrounding countryside and farther afield to support the town-dwellers not engaged in agricultural production, and no doubt to provision visiting merchants and boat crews.

Floral and faunal assemblages have been recovered from several occupation sites near the Strand. Only the assemblages from the first two excavations, Jubilee Hall and Maiden Lane, have so far undergone detailed examination by

the Environmental Archaeology Section at the Museum of London. These have already provided important information about the agricultural economy of the region, and the diet of Saxon Londoners. Barley and wheat, the most common cereals at these sites, were sometimes grown as pure crops, although occasionally they may have been grown together with other cereals (Davis & de Moulins in preparation). Rye was present in smaller quantities, and oats in very small amounts, probably as a weed. With a few exceptions, chaff and large weed seeds were rare, suggesting that the grain had been processed elsewhere. The widespread occurrence of quernstone fragments in the settlement suggests that most households may have ground their own corn. Cereals were supplemented with other food plants including hazelnuts, apples/pears, sloes/plums, blackberries/raspberries, and strawberries.

At both Maiden Lane and Jubilee Hall, cattle were the most important domesticated (numerically and by weight), followed by pig, and then sheep (West & Rackham in preparation). Animals were bred mainly for meat, and Saxon

Londoners often enjoyed good-quality cuts from young animals. The low number of foot and lower jaw bones suggests that animals were slaughtered elsewhere, possibly at farms close to Lundenwic, where heads and feet may have been trimmed off before the carcasses were sent to town. The site at the Treasury, where the high proportion of waste bones from cattle were interpreted as 'commercial debris' (Chaplin 1971: 136), may have been one such farm. Small numbers of birds including domesticated geese, ducks, and chickens were also eaten.

Not all animals were killed at a young age. Some were kept for breeding, milk, and wool, while ox-bones affected by arthritis found at Maiden Lane suggest that some cattle were used as draught animals.

The faunal assemblages include little game, suggesting that hunting was rarely practised. There is evidence that local rivers were often fished, mainly for eels and *Cyprinidae*, although small numbers of roach, salmonids and pike were also represented in the assemblages (Locker in preparation). In addition, oysters and mussels – presumably gathered from beds at the mouth of the Thames – as well as small quantities of sea fish, including herring, plaice, haddock and whiting, were brought upstream to Lundenwic.

The trading system between consumer and supplier is not known; it may have been direct or, as Hodges (1982: 138) has suggested, food-rent may have been paid by farming communities to the king and then redistributed. Before this problem can be tackled properly more information is needed about Saxon rural settlements in the hinterland of Lundenwic – settlements difficult to locate in the modern urban landscape of Greater London. Nevertheless, evidence of middle Saxon occupation has been found at Battersea (Blackmore 1986: 214), Northolt (Hurst 1961: 213), Shepperton Green (Canham 1979), Tottenham Court Road (Blackmore 1983) and at Barking Abbey (MacGowan 1987). These discoveries combine with documentary evidence for estates (see Gelling 1979) to suggest that the origins of the medieval settlement pattern around London may date to the middle Saxon period (Vince 1988: 90).

Documentary and archaeological evidence shows that regional and long-distance trade were important elements of the economy of middle Saxon London. It is likely that Lun-

denwic would have relied on regional trade to supply raw materials such as wool, antlers and metals, necessary for its crafts. Regional contacts are indicated by fragments of quernstone made of grey limestone, probably from the Hythe Beds (identified by David Williams, Southampton University), a series M sceat, thought to be minted in Kent, and a series S sceat, perhaps of East Saxon origin.

Long-distance trade, via emporia such as Lundenwic, was primarily used to acquire commodities that were locally unobtainable, and was a source of wealth and prestige for the kings who controlled and regulated it. For most of the middle Saxon period the trade which passed through London was ultimately controlled by Mercian kings, although documentary sources imply that it was under Kentish control for a while in the 7th century.

Trading links between Lundenwic and the Continent are indicated by a number of foreign items. Most middle Saxon sites in Central London, for example, have produced fragments of lava quernstones from the Mayen–Niedermendig area of the Rhineland. Pottery from northern France (FIGURE 7), the Rhineland and the Low Countries has also been found on several sites near the Strand, comprising between 11.5% and 19% (based on sherd counts) of the pottery assemblages examined (Blackmore & Redknap 1988: table 1a). It is not clear whether these wares were commercially traded, or simply brought in by sea-faring merchants for their own use, an argument used by Hodges (1981: 91) to account for the large amount of foreign pottery at Hamwic compared with inland sites. Coin evidence for international trade has been disappointing, for only one sceat (a series D type 8, FIGURE 4) from the settlement is thought to have a Continental origin (Stott forthcoming).

Although most foodstuffs probably came from the surrounding countryside, plant remains recovered at Maiden Lane suggest that figs, grapes and possibly lentils may have been shipped in from warmer parts of the Continent (Davis & de Moulins in preparation), while the bones of ling, a sea-fish from northern waters, implies coastal trade (Locker in preparation). There is also indirect evidence that wine was imported, for some Continental table wares found in the Strand area may have been associated with the trading of wine (Blackmore &



FIGURE 7. A north French burnished ware vessel from Maiden Lane (height c. 300 mm). (Photo: Museum of London, Jon Bailey.)

Redknap 1988: 225). It is not clear from the archaeological record what commodities were exported from Lundenwic, although Blackmore (1986: 216) has drawn attention to the large number of loomweights from the settlement, which might suggest that cloth was produced for export. Two documents from the period suggest that cloaks and slaves may have been traded from London to the Continent. Bede wrote in the *Historia Ecclesiastica* that a Northumbrian prisoner was sold in London to a Frisian merchant in 679. The other document is a letter from Charlemagne to Offa of Mercia concerning the agreement between them about the trade or exchange of Mercian cloaks and blackstones (probably quernstones) from Carolingia (translation in Whitelock 1955: 781–2). Although London is not mentioned in the letter, it is likely that these transactions involved this Mercian seaport.

Internal organization

Although the sites excavated thus far have been too few and too small to indicate with certainty the layout of the settlement, the evidence allows some preliminary conclusions.

The Strand was probably the principal thoroughfare (see p. 710, above), and it is possible that there was a grid system of streets, as at Hamwic (Brisbane 1988: 104), orientated to it. The main harbour area probably lay to the south of the Strand, but there may also have been port facilities near the mouth of the River Fleet. Most of the residential area lay to the north of the Strand, where the remains of buildings, wells, rubbish pits and cesspits have been found. It is possible that there was a high status property in this area at Maiden Lane, for elements peculiar to the site included two successive 'defensive' ditches and large quantities of whitewashed daub. Industrial activity such as metal-working

was apparently confined to the periphery of the residential area. Likewise, an area of massive gravel quarries, probably dating to the middle Saxon period, was likely to have been located just outside the western boundary of Lundenwic. Although only two isolated burials have been found so far, the town was undoubtedly served by at least one cemetery, for it seems likely that during the two centuries the settlement existed thousands of its inhabitants would have been interred.

The end of Lundenwic

The lack of late Saxon pottery and other artefacts in the extramural settlement, and their widespread distribution in the City, indicates that by the late 9th century Lundenwic had been abandoned in favour of the City, about a kilometre to the east, which became the nucleus of Saxon and later occupation.

The decline of Lundenwic may in part be connected with the waning prosperity of its continental counterparts, notably Dorestad, which by the mid 9th century were suffering from the economic effects of reduced silver supply and civil war in Carolingia (Hodges & Whitehouse 1983: 163). Certainly between the late 9th and mid 11th centuries scarcely any foreign pottery was reaching London, reflecting reduced international trade (Vince 1985: 34; Blackmore & Redknapp 1988: 227). Above all, the *emporium* of northwest Europe suffered a series of devastating Viking raids during the 9th century. It was recorded in the *Anglo Saxon Chronicle* that London itself was attacked in 842 and 851, and finally came under Viking control when the Great Army wintered there in 872. The coin hoards from Middle Temple and Waterloo, undoubtedly buried during these troubled times, are probably associated with the events of 842 and 872, while at Maiden Lane a ditch was dug in the 9th century, perhaps to protect an individual property. The U-shaped ditch, between 1.9 m and 2.3 m wide, survived to a depth of 2 m (Cowie 1987: 32), with traces of an earlier 9th-century ditch on the same alignment beneath it. Lundenwic was vulnerable to attack, for its position on a tidal estuary made it as accessible to pirates as it was to traders, and unlike the City it lacked walled defences. It is likely that this was the main reason why Lundenwic was abandoned in the mid to late 9th century.

The settlement pattern in the first millennium AD

Roman London was limited to a walled area east of the Fleet, with a suburb on the opposite bank – an area now part of Southwark. During the two centuries following the Roman period settlements in the London area apparently consisted exclusively of small rural communities. The 7th century saw the growth of Lundenwic, a kilometre to the west of the former Roman town. This proto-urban settlement was abandoned in the second half of the late 9th century. By the early 10th century, or possibly earlier, the walled area of the Roman City was reoccupied, and became the nucleus from which medieval London grew.

Future work

The archaeological evidence accumulated by the Department of Greater London Archaeology since 1985 clearly demonstrates the existence of a large 7th- to 9th-century settlement in the vicinity of the Strand, and has significantly increased our knowledge of middle Saxon London and its economy. As the areas of Saxon deposits have been small, and often severely truncated by post-medieval buildings, very little of the settlement has been examined. It is essential that all future development sites between New Bridge Street and Whitehall, where middle Saxon deposits might be threatened, are thoroughly investigated. Further information is badly needed to test current thinking about Lundenwic, and many aspects of the settlement require elucidation, including the precise limits of the occupation area and its general layout, the road network, the location of churches and cemeteries, the nature and development of the waterfront, and the chronological sequence of the *emporium's* development from its foundation to its end. The number of middle Saxon sites discovered in the last four years suggests that there will be many opportunities to shed light on these aspects in the decades to come.

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* These reports, and other archives on middle Saxon sites, can be consulted by arrangement with the Department of Greater London Archaeology, the Museum of London.