

Ham: The Edwards Collection

by DAVID FIELD

Summary

The Edwards Collection, a surface collection of archaeological material from Ham Fields, reveals that the area has seen intermittent occupation throughout prehistory. The site is now mostly quarried away. The artefacts are described and considered in conjunction with those from other collections. Finally, some conclusions as to the nature of the site are offered.

Introduction

Ham Fields have long been known to collectors as an area fruitful in the retrieval of antiquities. Johnson and Wright (1903, 121) first noted the evidence. Subsequently J G Marsden (1932-4, 429-30), T H Knowles and others collected material there. More recently Laçaille (1966, 21-9) commented on the Mesolithic evidence from the site, while excavations by S S Frere and B Hope-Taylor produced evidence of Saxon occupation (Anon, 1952, 101).

The composition and archaeological value of the available material varies. While some collectors retained a whole range of finds, others selected only the more impressive pieces. Knowles, for example, simply purchased artefacts from local people and the gravel diggers.

The present article, although using evidence from other collections to elaborate points, deals specifically with the Edwards Collection of artefacts. Until recently these were housed in Richmond Public Library and labelled as deriving from Ham Fields. The Collection is a relatively small one, too small for statistical analysis. Nevertheless it contains flint tools, flakes and blades of all sizes together with pottery, coins and clay pipes. It might therefore be considered to be as representative a sample of Ham Fields occupation debris as is likely to have been recovered and to some extent may reflect the nature of early settlement.

The Site

Ham Fields are conveniently defined on three sides by a great loop of the Thames and on the east by Ham village (fig 1). The area seems to have formed part of Manor Farm though field names taken from the Tithe Apportionment (SRO Diocesan copy) give no indication of archaeological potential.

The whole of Ham Fields are situated on the Flood Plain Terrace and periodically quarrying has taken place for sand and gravel. Towards Petersham sand pits were being worked during the 18th century, though early gravel digging on the fields only started in a small way in the mid-19th century. By 1910 this had grown to an irregular area centred on NGR TQ 164 722 just to the south of a group of farm buildings known as Coldharbour. A plan of these earlier pits (SRO 58/14/28) made in 1893 indicates that they were of a shallow nature, only on rare occasions reaching a maximum depth of 1.30m. Excavating continued up to 1952 on a much larger scale, this time to the north of Coldharbour. The largest pit centred TQ 165 725 was flooded and left as a boating lake for the Thames Young Mariners, while the others were filled in partly with ballast from Chelsea which confusingly also produced flint implements.

The major site seems to have been around Coldharbour, alongside and sometimes astride a

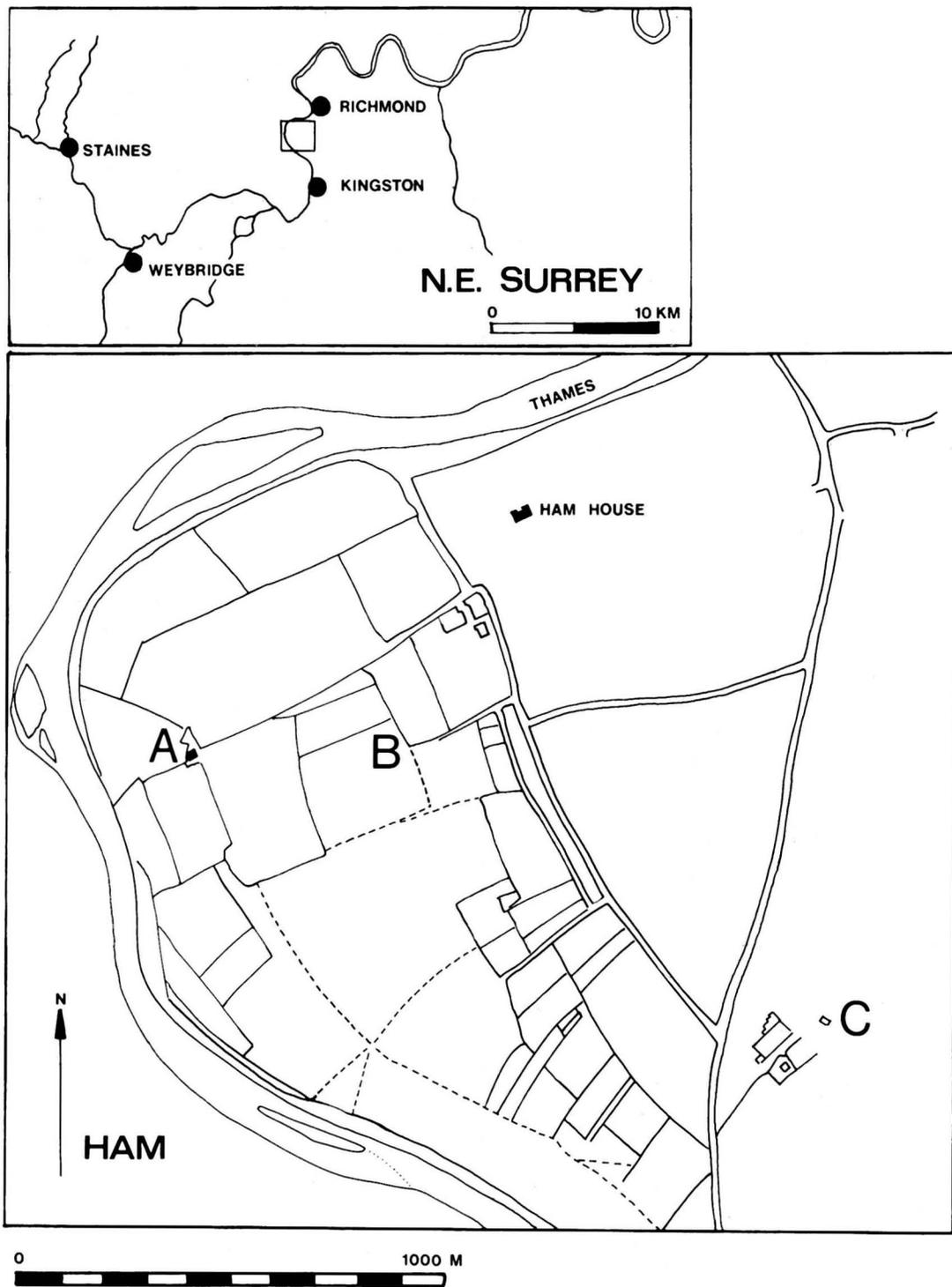


Fig 1. Site Location map. The Ham loop of the Thames. Site A Coldharbour, Site B The Maize fields, Site C Walkers Farm.

gravel bank that ran parallel to the river. This was probably a levée and may have provided a degree of shelter. Johnson and Wright collected flint from the surface of a field about 100 yds inland from the river and references are also made by Knowles (unpublished notebook Museum of London, 60. 176) to material being found between 100 and 200 yds inland. This correlates well with the evidence of Marsden and Lacaille (Lacaille 1966, 23) who indicate that artefacts were recovered from the surface of the gravel bank.

Within the same area Lacaille collected flint from the maize fields which extended towards Petersham (OS Records) and in addition noted material extending southwards towards Kingston. Other material (mostly flint) has been recovered as far east as Ham Common (OS Records) from where scatters can be traced into Richmond Park (Carpenter 1958). A group of material comes from Walkers Farm which can probably be identified with Church Farm, adjacent to St Andrew's Church. Flint debris has also been recovered to the south of this as far as Tudor Drive (pers comm Ann Bott). The major groups can therefore be identified as follows:

Site A	Coldharbour Farm	TQ 164 724
Site B	Maize Fields	TQ 170 725
Site C	Walkers Farm	TQ 179 717

The Collection

The Collection, the work of Mr E Edwards, was donated to Richmond Library in September 1913. There it joined the collections of A Lloyd and P J Croke, which were transferred to the Museum of London in more recent years. The Edwards Collection however remained at Richmond and may have been packed away on the outbreak of the last war, being wrapped in newspaper of that date, and not inspected until recently. The material was transferred temporarily to Kingston Museum in 1979 for study purposes. Original accession numbers marked on some artefacts in pencil were re-marked in ink together with a new series identification number.

Here the artefacts are separated into general groups for description and are listed below.

PREHISTORIC MATERIAL

The flint assemblage consists of the following:

Tools:	Axes/Adzes	7	
	Scrapers	11	
	Arrowheads	3	
	Awls	4	
	Chisel	1	
	Knives (various)	6	
	Hammerstones	3	
	Waste:	Cores (1 polished axe fragment)	15
		Core waste	5
		Rejuvenation & trimming flakes	27
Flakes (primary, secondary, utilized, snapped)		121	
Blades (primary, secondary, utilized, snapped)		135	
Total		343	

Axes/Adzes (fig 2: 1-5)

These display the tranchet edges characteristic of the Mesolithic period. The whole range of sizes is present from 85 to 172 mm in length. At least 4 display an asymmetrical profile that

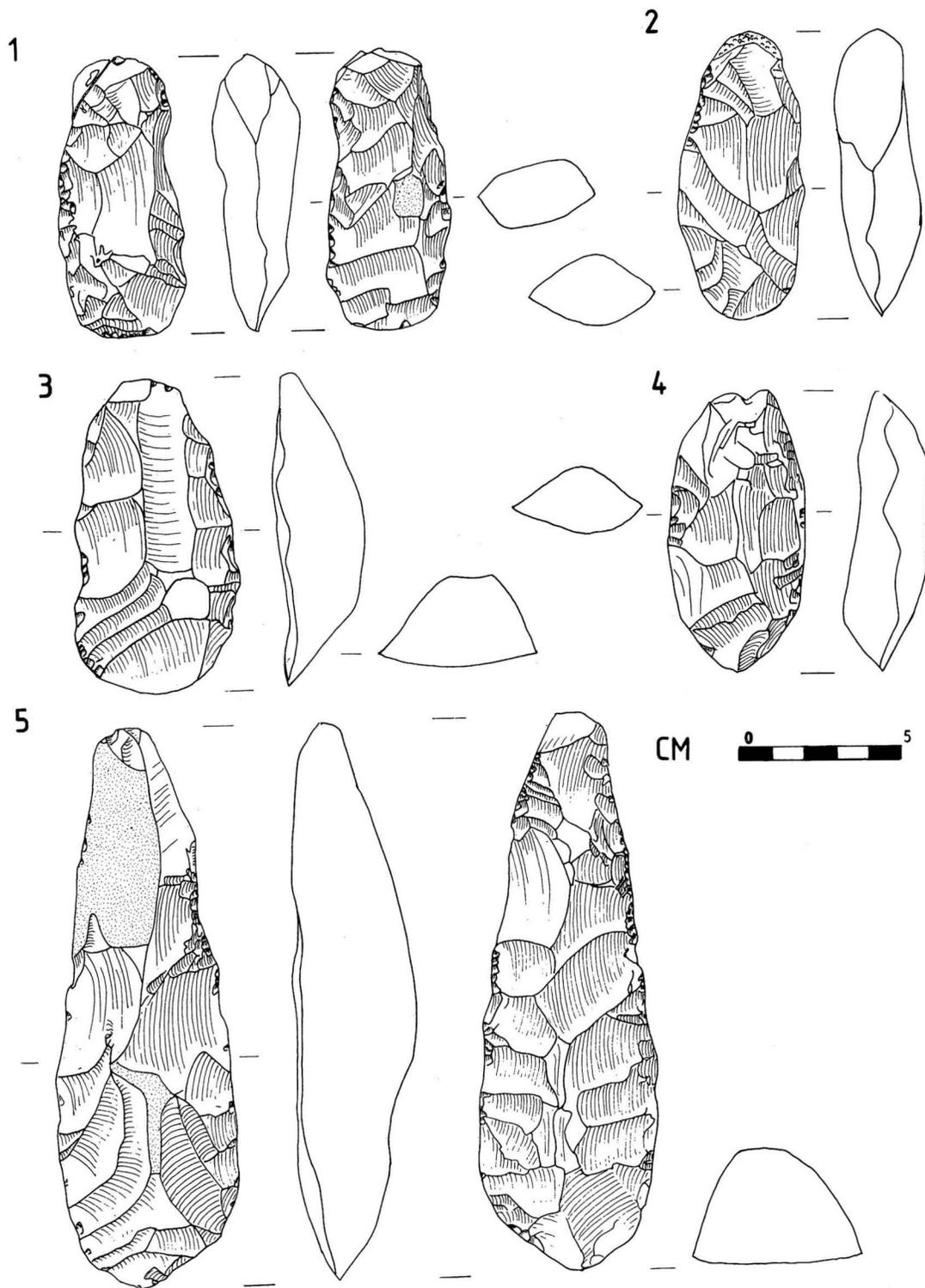


Fig 2. Flint axes and adzes from the Edwards Collection. 2/3

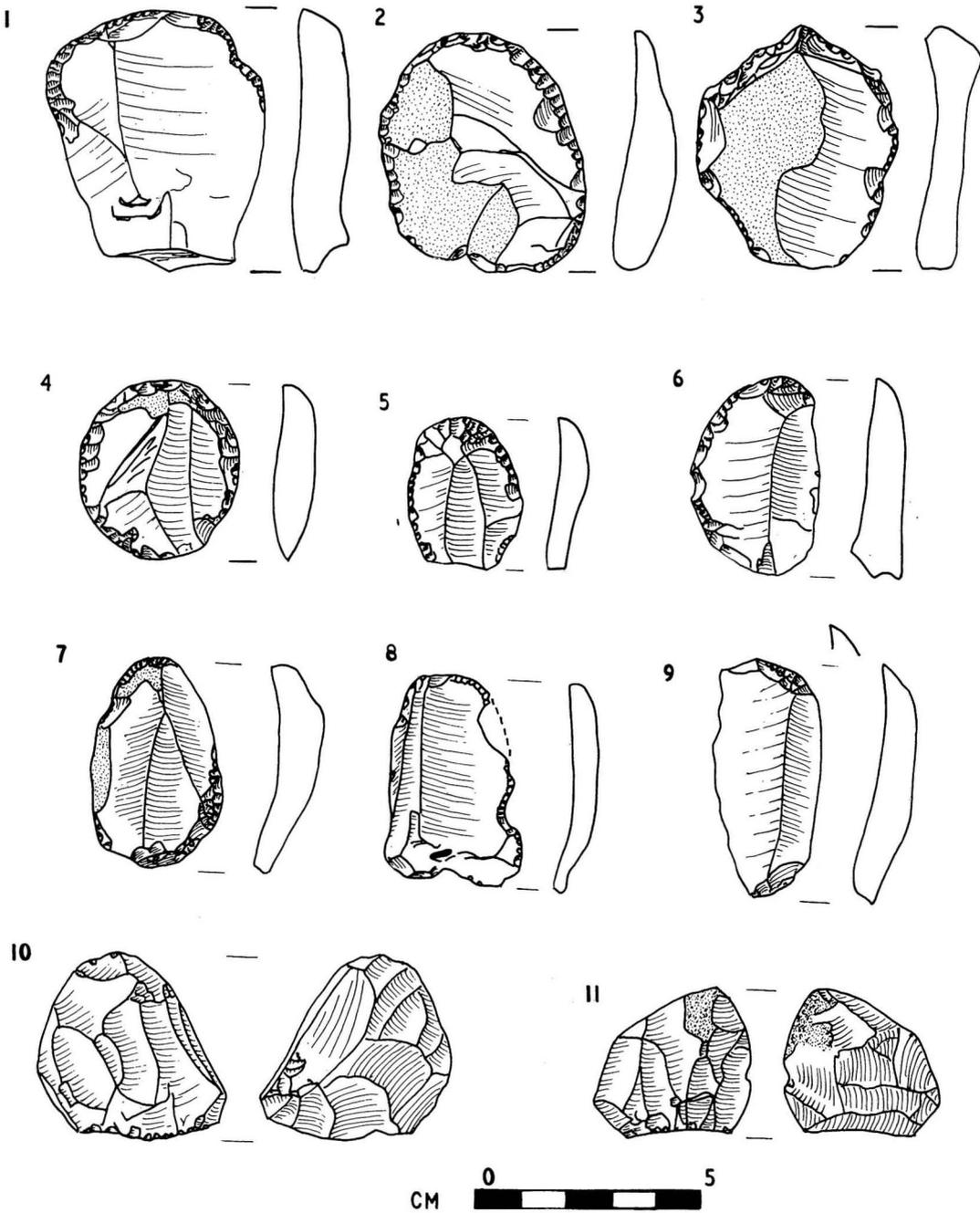


Fig 3. Ham: The Edwards Collection — flint scrapers (1-9) and cores (10-11). 2/3

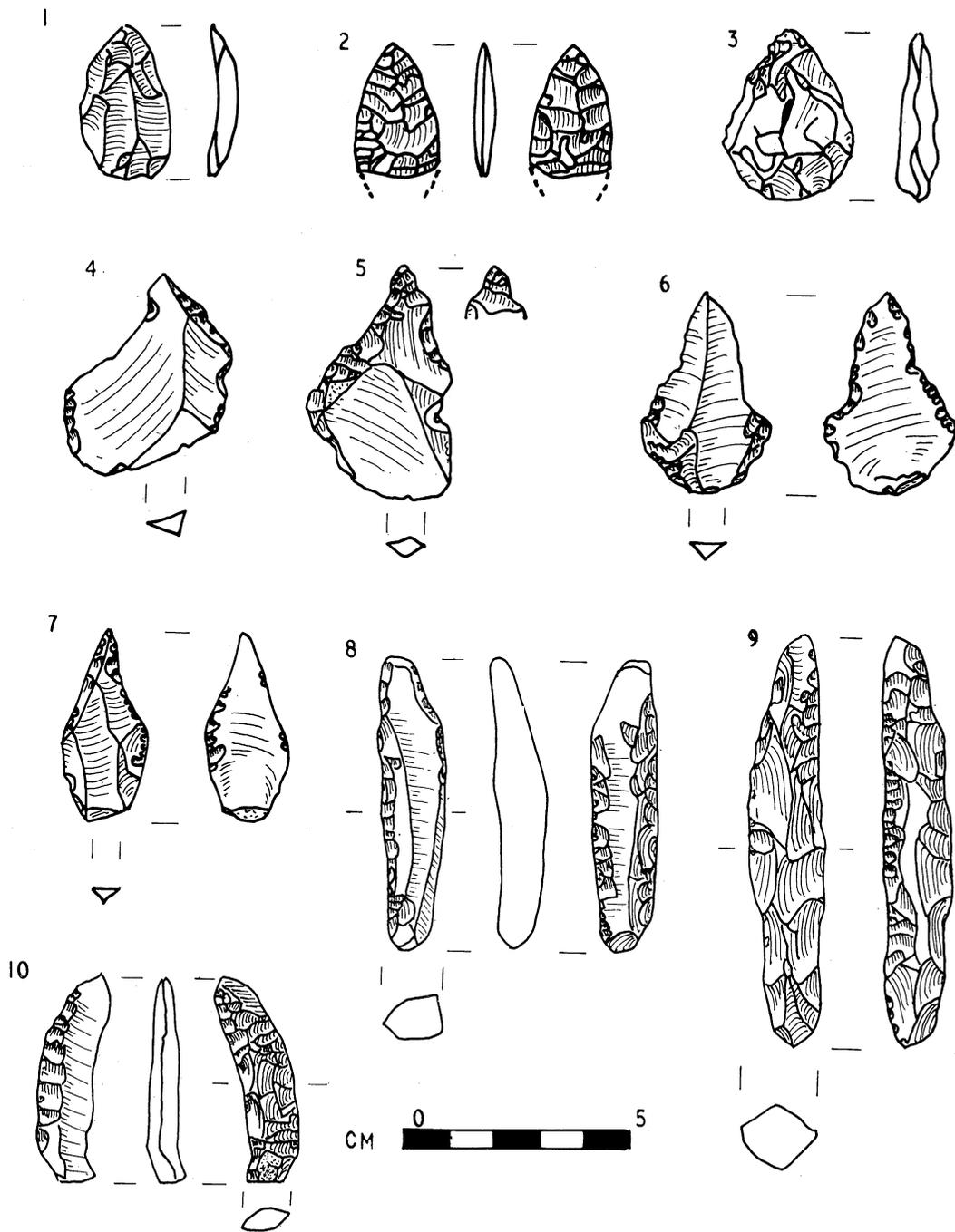


Fig 4. Ham: The Edwards Collection — arrowheads (1-3), awls (4-7), fabricators (8-9) and miscellaneous tool (10).
2/3

indicates use as an adze rather than an axe. The largest of these (fig. 2:5) with its pointed butt and radial flaking on the under surface is reminiscent of some Neolithic polished adzes.

Chisel (fig 5: 2)

Butt fragment of a chisel or narrow axe, bifacially flaked and oval in section.

Scrapers (fig 3: 1-9)

Three of these are on large flakes with abrupt retouch which is smoothed by use, and might be described as Mesolithic. A disc shaped example (fig 3:4) would normally be categorised as Bronze Age. The remainder on blades are end or side scrapers with pressure flaked retouch.

Arrowheads (fig 4: 1-3)

One unifacial leaf-shaped projectile point and one bifacial leaf-shaped arrowhead proper, though this has its base missing. Also present is a leaf-shaped roughout.

Fabricators (fig 4: 8-9)

Neither of these display signs of use as pressure flakers or punches and they are perhaps better identified as strike-a-lights than fabricators (but see below).

Each has its own characteristics; fig 4:9 is a slender bipolar core 89 mm long with a diamond section, both tips appear to have been used and the facets at one end are polished as if used with a rotary motion. No clear striae are visible under plain light at 100x magnification. Fig 4:8 is made on a sturdy blade 63 mm in length. Both edges exhibit steep retouch. The facets at one end are shaped and polished as if the implement was used in a rotary fashion. Criss-cross striae visible at 100x magnification however suggest that this may not have been the case. Function as strike-a-lights seems possible since repeated striking on iron pyrites or other material is likely to have developed a polished surface. Whether it was worth while fashioning a slender artifact so liable to breakage for such a function is open to question. Any piece of flint can be used to create sparks as was done throughout the historic period. Manufactured strike-a-lights were made in the form of horseshoe scrapers, and sometimes resembled horseshoe-shaped gunflints (Skertchly 1879, 76-8). The regular, slender shape of these implements would on the other hand be consistent with their use in a bow drill, perhaps for use in fire-lighting, or as drill bits.

Knives

Fragment of a plano-convex knife (fig 5:1) pressure flaked completely over the upper surface. Not illustrated are two large blade fragments, one with abrupt retouch on both edges, the other with shallow retouch on both edges; a backed knife on a blade with regular retouch along the dorsal surface of the blade and with a burin blow for its backing; a thick well made backed knife on a sturdy flake 72 mm long; and a thick cutting implement on a long, pointed core remnant, 112 mm long, with a triangular section.

Awls (fig 4: 4-7)

Three of these have triangular sections at the tip and the fourth a diamond shaped section. Retouch is present at the tip and along the edges of all examples either as deliberate shaping or as evidence of use. Three are on flakes.

Hammerstones

These are simply large flint pebbles of a size not normally encountered in terrace deposits of this part of London. All exhibit evidence of bruising and chipping on the surface. There is some evidence too that they may have been used as cores and one may have been a failed axe roughout. They were originally accessioned as pounding stones.

Miscellaneous tools

Fig 5:5 a leaf shaped knife bifacially pressure flaked, but broken, possibly intended as a missile point. Such foliate forms are characteristically Neolithic. Fig 5:4 a cutting implement or unusually shaped pressure flaked scraping tool. Fig 4:10 a slender pointed blade 44 mm long. It

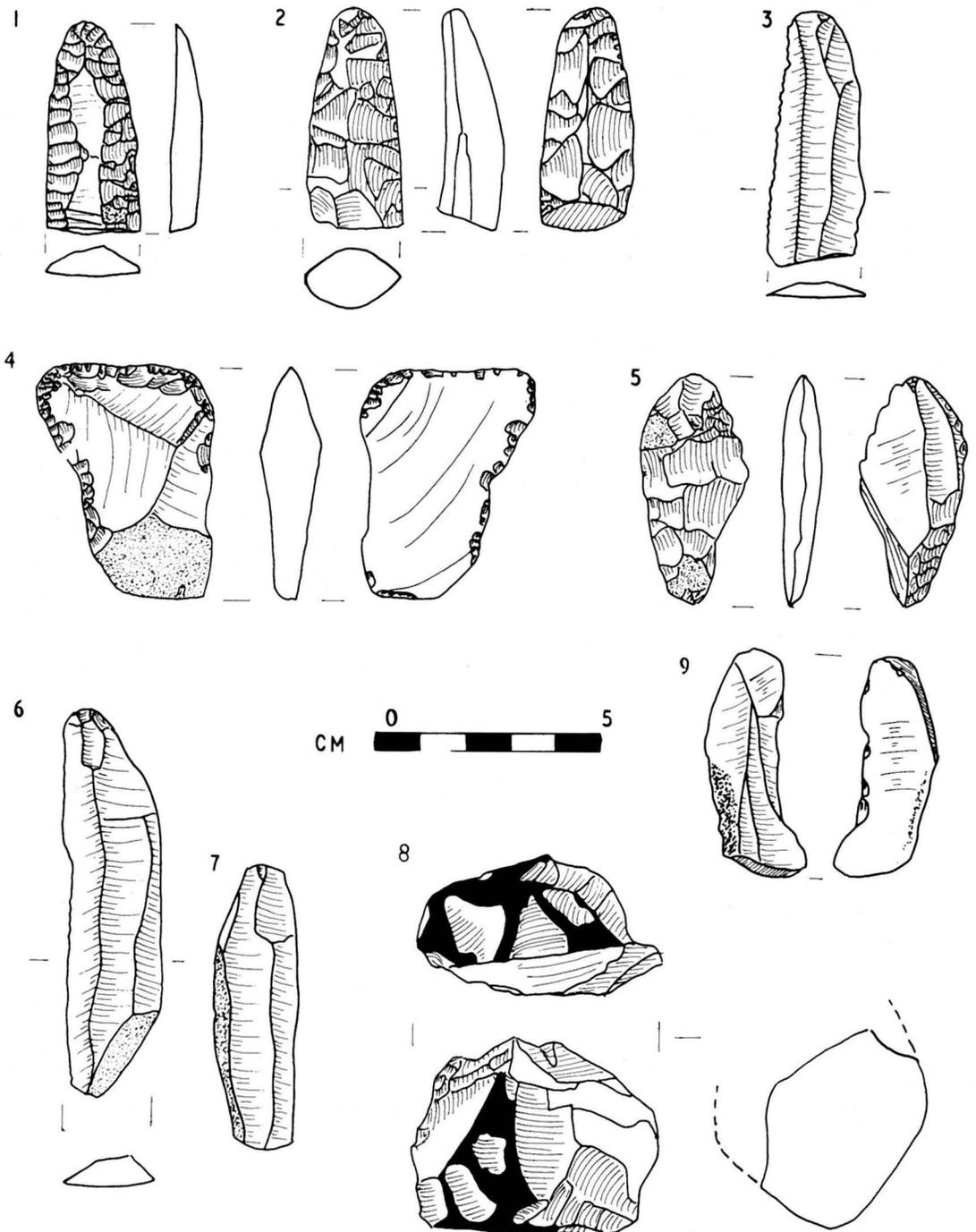


Fig 5. Ham: The Edwards Collection — plano-convex knife (1), chisel fragment (2), blades (3, 6, 7), miscellaneous tools (4-5) and blade with glue adhering (9). 2/3

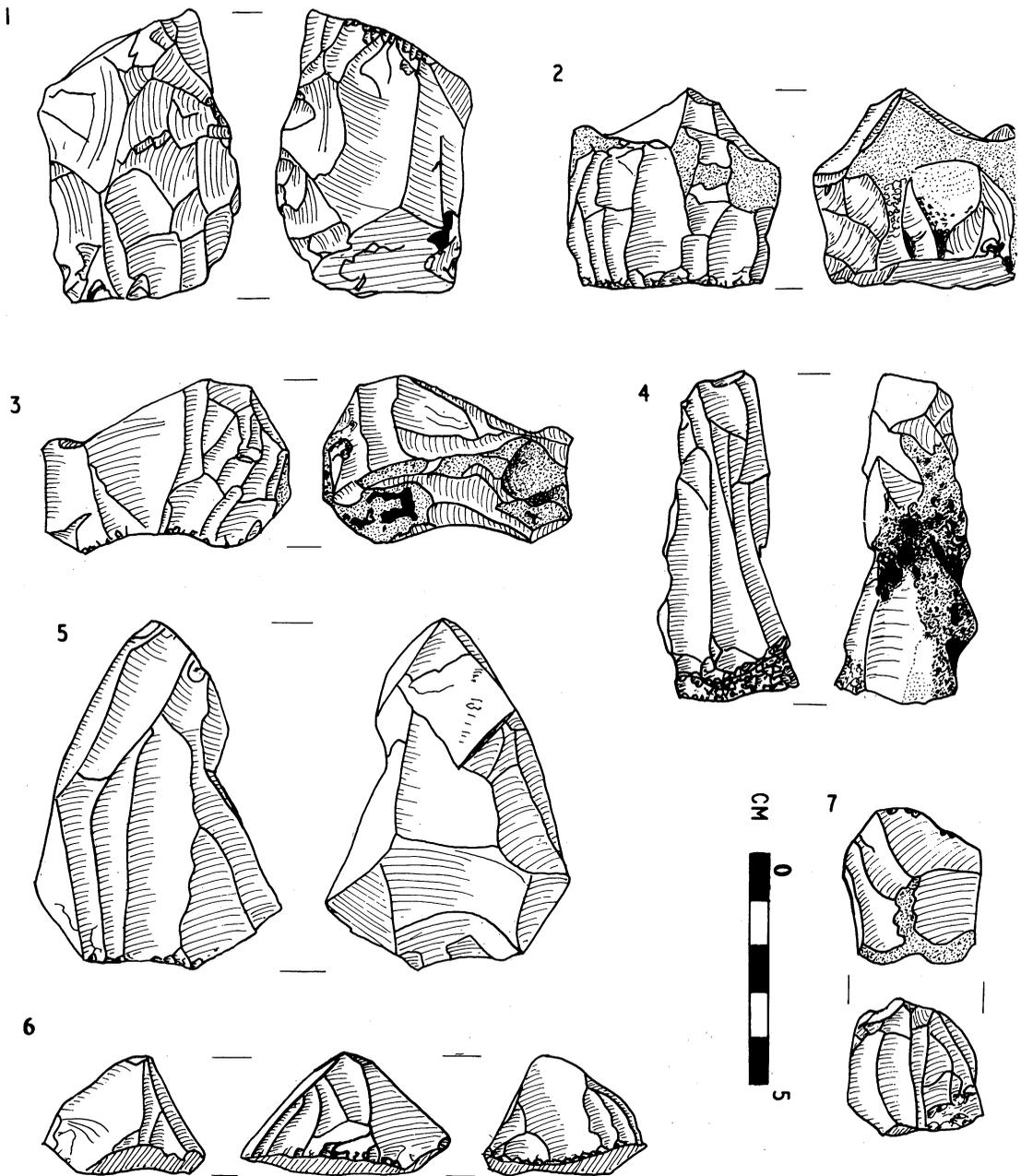


Fig 6. Ham: The Edwards Collection — flint cores. 2/3

is abruptly retouched along one edge and scale flaked all over the dorsal surface. It is neatly curved and resembles in shape a miniature sickle. Neither striae nor polish is visible in plain light at 100x magnification.

Cores (fig 3: 10–11, fig 6: 1–7)

Of these one has one platform, nine have two platforms; three have three platforms and two are multi-platformed. The majority were for micro-blades, though larger blades and flakes were struck as well. One core is a polished axe fragment (fig 5:8).

Rejuvenation flakes

These are more accurately core trimming flakes. None represent a total base removal. All sizes are present and the majority are from blade cores, only five coming from flake cores. A number display signs of use and it is conceivable that some were deliberately struck as sturdy flakes or thick blades for specific purposes.

Core Waste

Nucleoform pieces of worked flint too small and irregular for classification as cores, they are described elsewhere as 'bashed lumps' (Froom 1976, 28). One appears to have been utilized for cutting.

Flakes

Included here are both primary and secondary types. They display a degree of variety in both size and extent of patination, ranging from 73 x 64 mm down to 17 x 21 mm, and from heavily patinated white flakes through to those without patination. A large number (45) have been utilized to a greater or lesser extent especially the larger flakes, and 29 have been snapped at either the bulbar or distal end. One flake comes from a ground and polished implement, probably a broken axe.

Blades (fig 5: 3, 6, 7, 9)

These too exhibit a range of sizes from 90 x 25 mm to 20 x 9 mm and display the same range of patination as the flakes. An equally large number have been utilized and 17 snapped at the distal end. The latter point is a feature of Mesolithic industries (Rankine 1954, 86). One blade may be a polished axe fragment and another (no 9) exhibits a smearing of glue along both faces of one edge. At 100x magnification this appears to be fibre-based and suggests that the blade was set in a handle. There remains the possibility however that it represents the remnants of an early archaeological experiment by Edwards or was perhaps hafted as part of a display by Richmond Library.

Discussion of Prehistoric material from Ham

1 Edwards Collection

The variety of waste material suggests that flint knapping was taking place on site. Waste flakes and blades sometimes of a considerable size were recovered and while these were often utilized in some way, it remains surprising that they were not knapped into regular tools. There is little evidence of earlier material being re-knapped for use in later periods suggesting that the supply of flint was constant. The raw material is mostly though not exclusively Downs flint. This is in marked contrast to other flint sites in the area where use was made of poor quality river gravel flint, and it perhaps indicates that the site was of sufficient importance and stability for material to be regularly transported from the North Downs.

The assemblage itself is difficult to separate into industries, though on typological grounds it might be presumed that the blades and blade cores along with tranchet axes and some of the scrapers are products of Mesolithic settlement. Other diagnostic artefacts, the arrowheads, chisel, and plano-convex knife might be assigned a Neolithic or early Bronze Age date. Much of the material especially the waste might be the product of a number of periods, and when

seen in conjunction with material from the site in other collections it becomes evident that the site has seen almost continuous though perhaps intermittent occupation from the early prehistoric periods through to the present day.

2 Mesolithic

The Mesolithic evidence has been considered elsewhere (Lacaille 1966, 21–9) and the Edwards material adds supporting evidence. No microliths are present amongst the Edwards material though clearly they were present on site (Lacaille 1966, 28). While Edwards during the early years of this century may not have been aware of 'pygmy flints' he certainly recovered small flakes and blades of comparable size. Any collection bias is therefore unlikely and it may be that the microliths found by Marsden (1932–4, 429) and Lacaille come from a separate part of the site perhaps unavailable during Edwards's searching. Marsden recorded twelve microliths, one a hollow based point, while Lacaille recovered some eighteen with non-geometric types predominating. The presence of geometric types however together with the hollow based point led him to indicate a late Mesolithic date and suggested that the site had affinities with the Wealden greensand sites.

An important element of all Ham collections consists of core axes or adzes. Currently some eleven are recorded (Wymer 1977, 193–4) and the present note brings the total to eighteen. Most of these have tranchet edges.

It has been suggested that tranchet axe distribution may reflect more accurately areas of Mesolithic settlement, since if microliths be accepted as hunting implements their distribution may simply represent hunting areas (Mellars & Reinhardt 1978). In addition the predominantly riverine distribution of axes has been noted. Nowhere is this more pronounced than along the West London stretch of the Thames and while this is not the place to develop further the arguments concerning riverine finds it must be acknowledged that Mesolithic settlement, of which Ham would perhaps be a typical example, was relatively intense along this stretch of the river.

Though not present amongst Edwards material, sharpening flakes were recovered by both Marsden and Lacaille. These to some extent reflect the function of the site. The numbers of small axes present, both Mesolithic and Neolithic, perhaps indicate that tree felling was not their primary function; and together with the adzes, they may represent a considerable degree of woodworking.

3 Neolithic

Considerable settlement is indicated at Ham by the Neolithic material, though habitation does not appear to have been as intense as during the previous period. Surprisingly no pottery has come to light. Arrowheads and ground axes provide the main evidence.

The Edwards Collection contains no polished axe, though a fragment and two ground flakes are present. The Finny Collection (Kingston Museum, unpublished) contains two broken axes and other collections have similar numbers. The largest number however are the nine axes and thirteen fragments assembled by Knowles (Museum of London 60.176, unpublished). All the complete axes display evidence of heavy use and most were probably discarded because either the blade or butt became damaged.

Whether ground axes were used for tree felling, woodworking or agriculture, the numbers used and broken fragments are indicative of a permanent rather than a nomadic existence.

Most collections from Ham contain numbers of arrowheads. Edwards recovered only three and only one of those was a finished bifacial implement. By contrast Knowles assembled 49, about half of them being leaf shaped examples. It is not clear how widely they were scattered and consequently impossible to infer use of the area for hunting, or warfare. Ten leaf shaped arrowheads were however found at the Walkers Farm site.

4 Bronze Age

Distinctive flint types of the Later Neolithic and Early Bronze Age are less in evidence, though the plano-convex knife fragment may be attributable to this period. Other collections include numbers of barbed and tanged arrowheads, and a beaker of Clarke's Wessex Middle Rhine type (Clarke 1970, 499) was recovered from the gravel diggings and is currently in the Museum of London. Three collared urns are also present amongst the Knowles material and it is worth noting that Knowles recorded the presence of 'many urns being found which break up when touched' (unpublished, Museum of London 60.176). No bones were found in association. The urns were found near the 'Red Barn in Ham Gravel Pits', which presumably refers to Coldharbour.

LATE IRON AGE/ROMANO-BRITISH MATERIAL

Pottery

Several pieces of pottery are present in the collection. They tend to be large fragments or near-complete vessels and can be categorised as Late Iron Age or early Romano-British in nature.

Fig 7:1–2. Two carinated jars of a soft soapy pink-grey matrix with a grey exterior and polished above the carination. Both have a moulded collar and can be assigned to the mid 1st century though they are more likely to be Late Iron Age than Romano-British. The type is common to Hertfordshire and to a lesser extent Essex. They also occur in a different fabric during the first phase of the Highgate Wood kiln. They are previously unknown from Surrey (pers comm P Tyers).

Fig 7:8. Two sherds almost certainly from the same vessel. Grey 'porridgy' material with smooth brown slip on the exterior and with orange and grey patches perhaps due to deliberate unequal firing. Decoration consists of grooved horizontal bands. A similar sherd was recovered from the Iron Age/Romano-British site at Old Malden (Kingston Museum ER 23, unpublished).

Fig 7:7. Sherd from a decorated barrel beaker. The exterior and interior are of a pink/buff friable fabric. Decoration consists of a series of vertical grooved arcs confined between two grooved horizontal bands.

Fig 7:3–4. Three (one not illustrated) carinated jars with cordon and groove at the base of the neck; buff core, and the interior and exterior faces are charcoal grey. All or part of the base is missing from all three vessels, perhaps indicating that they were in an inverted position when struck during ploughing. Similar vessels were associated with burials at Haslemere and Charterhouse (Holmes 1949, figs 4, 5) and at Green Lane, Farnham (Lowther 1939, 230) where a similar vessel contained calcined ashes. In Southwark all three vessels would fall into Marsh & Tyers (1978, 557–9) type II C 2.

Fig 7:6. A flagon base with neck and rim missing. Marsh & Tyers (1978, 548–50) type I B. It is of fine sandy ware, buff coloured, and probably attributable to the Verulamium or Brockley Hill potteries.

Fig 7:5. A ring necked flagon. Marsh & Tyers (1978, 548–50) type I B2 of fine sandy ware, buff in colour, similar to fig 7:6.

Quernstone

Five pieces, two from the upper and three from the lower stone. Approximately half of each stone is present. Both upper and lower are of sandstone (see below) and petrologically may support Tomalin's (Hanworth & Tomalin, 1977, 85) view of a rock source in the neighbourhood of the Holmbury hillfort. The upper stone is 37 cm in diameter and 7 cm at its maximum thickness. The lower stone is of similar diameter though only 6 cm thick. The grinding surfaces are angled at an average 10° and display masons tooling marks though neither

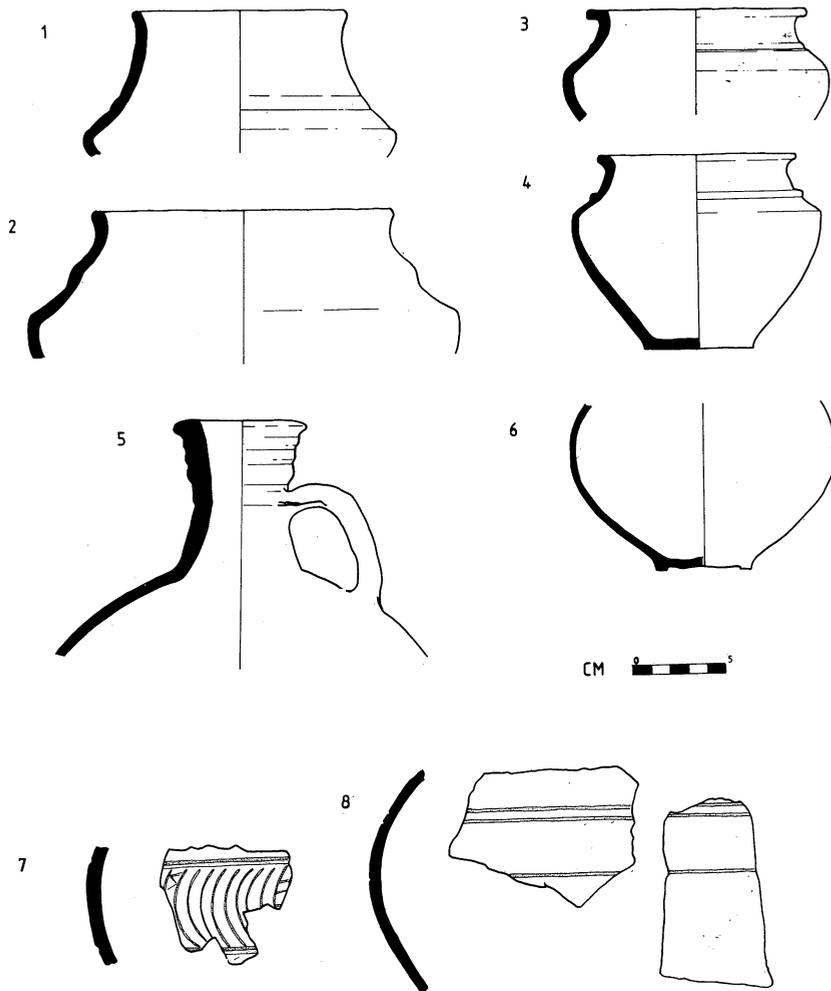


Fig 7. Ham: The Edwards Collection — Late Iron Age and Romano-British pottery. 1/4

is deliberately grooved. The under surface of the lower stone is left rough. There is no evidence for either a handle groove or a spindle socket though both features may have been present in the missing half of the quern. The central perforation appears to be oval though it is too incomplete to be certain. Flat querns are dated to the early Romano-British period (Curwen 1937) and it is suggested that those with an oval perforation tend to be earlier than those with square perforations. Early Romano-British querns also have a grinding angle of not more than 15° . The quern therefore would appear to be contemporary with the pottery.

Petrology of the Quernstone by John Penn

The upper and lower quernstones are petrologically identical, both being a fine-grained brown weathering sandstone. The bulk of the rock is made up of fine-grained angular quartz grains. In addition there is pelloidal glauconite — less than 5% — some of which is quite fresh. The grains are well sorted and tightly packed, to a degree greater than normally found in this type of sandstone. A clay matrix is dispersed throughout the rock, ie the pellets being squeezed into

pores by slight compaction, giving the rock a mottled texture. Slight compaction is also shown by occasionally sutured grain contacts. The cement is siliceous. Petrologically the rock is a glauconitic quartz arenite. The origin is more difficult to determine. It resembles sandstones of the Lower Greensand of the Leith Hill area of Surrey which also show similar quartz angularity and glauconite percentages, and cannot be equated with Ashdown sand or Kentish rag.

Discussion of Iron Age and Romano-British material

Two groups of pottery may be identified. The first consists of the two carinated vessels (fig 7:1–2) and possibly the ‘porridgy’ ware sherds (fig 7:8) dateable to the mid 1st century. The second, incorporating the ring necked flagon (fig 7:5) and cordoned grooved jars (fig 7:3–4) is dated to the late 1st or early 2nd centuries, though conceivably some is earlier. An early Romano-British date is also indicated for the quernstone. Added interest is provided in the place name of a group of farm buildings adjacent to the gravel quarry, Coldharbour, since it is alleged to be suggestive of Belgic or Roman settlement (Karslake 1922). There is no indication of the exact find spot of the pottery in the Edwards Collection. Amongst the Knowles Collection however are 36 pieces of a ‘Late Celtic bowl’. These were noticed projecting from the side of the cutting about 12–18 inches below the surface and buried in sand. This was about ‘200 yards from the river not far from a red-roofed barn’ which is probably identifiable as Coldharbour. Romano-British habitation at Ham therefore might be envisaged as a small farmstead practising some agriculture.

POST MEDIEVAL MATERIAL

Gunflints

Five are present. Two are Old English gun flints, one a carbine flint, one a German horse pistol and one probably a strike-a-light (Skertchly 1879, 46–64).

Coins by S Nelson

Worn ¼d Charles II — first issue 1672/79, actual date is undecipherable. Worn broken ¼d, William III, probably type 2 1698/99, actual date undecipherable. These two small copper coins of the later 17th century are fairly common and in view of their very worn and battered condition little can be added of relevance. They probably represent casual losses in the locality.

Clay pipes by A Penrose

There are seventeen clay tobacco pipes, dating from the early 17th century to the mid-18th century. The earliest is a type 3 bowl (Atkinson & Oswald 1969, 7) dated *c* 1580–1610. Six type 15 bowls (*c* 1660–80) were found, one with rolled milling around the stem. Examples of types 18 (*c* 1660–80), 20 and 21 (*c* 1680–1710) are represented. There are four bowls of the standard 18th century London type 25; one is marked SH, a mark commonly found in Kingston excavations. There is also a variant form, unusual in this area, of the type 20 bowl.

Wig-curlers by A Penrose

Five hair or wig-curlers were found. One is roughly hand moulded and possibly earlier than the others which are all of the typical 18th century dumb-bell shape (Le Cheminant 1978, 190). On three, the marks WB and WA occur; WA has been found in London and is dated to *c* 1750. This earlier exhibits shallow holes at each end, probably connected with a turning process. The mark WB, both crowned and uncrowned, is found in large numbers in the City, and also occurs at Stamford, Lincs, Bristol (Le Cheminant 1978, 191), Chester (Rutter & Davey 1980, 266) as well as Colonial America. This mark is dated to the second half of the 18th century.

The Settlement

A number of factors are likely to have influenced the choice of Ham as a settlement area. While we have no evidence on the ancient morphology of the Thames at this point, we might presume that it had a great deal of bearing on the choice of the Ham site. The present lock and weir at Teddington was opened in 1811 as an aid to navigation since the area had long been notorious for its shallows. Jams of up to 20 barges at a time were a common occurrence (Thacker 1920, 465). With a perhaps lower water level, and a braided channel, the river at Teddington was likely to have been fordable for centuries. Such a situation would also allow control of river resources, mammal, fowl and fish. Certainly a weir was noted at Ham in both AD 1253 and 1416 (Thacker 1920) presumably for fish. Clearly the shallows created a barrier to man in recent times and would probably have done so in prehistoric ones. Boats travelling both up and down stream may have had to be hauled up on shore and carried overland at Ham, an ideal stopping place. Such traffic may have encouraged a certain amount of permanent settlement, and it is possible that the number of axes from the site, both tranchet and ground, may be indicative of boat construction and maintenance.

River resources, including fowl, mammals such as beaver, shellfish and fish may have catered for a large part of the diet. Salmon are likely to have been an important item and it is worth noting that immediately downstream at Petersham a fishery of 1000 eels and 1000 lampreys is mentioned in 1086 (Morris 1975). On land too a variety of resources were available for exploitation. The site is on well drained gravel though within a radius of 2½ miles a number of other soil types provided a range of habitats. As well as the Flood Plain gravels, sands and adjacent alluvium and brickearths, these include the higher terraces of the Kingston Leaf in Richmond Park and the no doubt heavily forested London Clay.

BIBLIOGRAPHY

- Anon, 1952 Saxon hut at Ham near Kingston SyAC, 52, 101-2
 Atkinson, D, & Oswald, A, 1969 London clay tobacco pipes *J Brit Archaeol Ass*, 32 171-227
 Brown, A E, & Sheldon, H L, 1974 Highgate Wood: the pottery and its production *London Archaeol*, 2, 9, 222-31
 Carpenter, L W, 1958 Some Mesolithic sites in north-east Surrey *Archaeol Newsletter*, 6, 7, 155-8
 Clarke, D L, 1970 *Beaker pottery of Great Britain and Ireland*
 Curwen, E C, 1937 Querns, *Antiquity*, 11, 133-151
 Froom, F R, 1976 *Wawcott III: a stratified Mesolithic succession* Brit Archaeol Rep, 27
 Hanworth, R, & Tomalin, D J, 1977 *Brooklands, Weybridge: the excavation of an Iron Age and medieval site* Res Vol SyAS, 4
 Holmes, J M, 1949 Romano-British cemeteries at Haslemere and Charterhouse SyAC, 51, 1-28
 Johnson, W, & Wright, W, 1903 *Neolithic man in north-east Surrey*, with a chapter on flint by B C Polkinghorne
 Karlake, J B P, 1922 On Coldharbours *Antiq J*, 2, 240-54
 Lacaille, A D, 1966 Mesolithic facies in the transpontine fringes SyAC, 63, 1-43
 Le Cheminant, R, 1978 The development of the pipe clay haircurler: a preliminary study *London Archaeol* 3, 7, 187-91
 Lowther, A W G, 1939 Roman and Saxon periods, in *A survey of the Prehistory of the Farnham district* (eds K P Oakley, W F Rankine, and A W G Lowther), SyAC, Special Volume, 218-59
 Marsden, J G, 1932-4 *Proc Prehist Soc East Anglia*, 7, part 3, 429-30
 Marsh, G, & Tyers, P, 1978 The Roman pottery from Southwark, in *Southwark Excavations, 1972-74*, (eds J Bird et al) London Middlesex Archaeol Soc & SyAS Joint Publication, no 1, 533-82
 Mellars, P, & Reinhardt, S, 1978 Patterns of mesolithic land use in southern England: a geological perspective, in *The early post-glacial settlement of Northern Europe* (ed P Mellars), 244-91
 Morris, J (ed), 1975 *Domesday Book text and translation — Surrey*
 Rankine, W F, 1954 Blade segment implements from Mesolithic sites *Archaeol Newsletter*, 5, 5, 86-7
 Rutter, J A, & Davey, P J, 1980 Clay pipes from Chester, in *The Archaeology of the Clay Tobacco Pipe III Britain: The North and West* (ed P J Davey), Brit Archaeol Rep, 78, 41-272
 Skertchly, S.B J, 1879 On the manufacture of gun flints *Memoirs of the Geological Survey*, HMSO
 Thacker, F S, 1920 *The Thames Highway*, Vol 2, *A history of the locks and weirs* (reprinted 1978)
 Wymer, J J (ed), 1977 *Gazetteer of Mesolithic sites in England and Wales* Councl Brit Archaeol Res Rep, 20

ACKNOWLEDGEMENTS

Many thanks are due to Derek Jones of Richmond Library for allowing the material to be transferred for study, to Jean McDonald at the Museum of London for access to the Knowles Collection, to Marion Hinton and Jon Cotton for commenting on various versions of the text, and to Clarice Condry for typing them. I would also like to add my appreciation to A Penrose and S Nelson for commenting on the clay pipes and coins.