

IRON AGE OCCUPATION, A MIDDLE SAXON CEMETERY, AND TWELFTH TO NINETEENTH CENTURY URBAN OCCUPATION: EXCAVATIONS IN GEORGE STREET, AYLESBURY, 1981

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The excavation took place in advance of an office development. It was directed by David Allen of Buckinghamshire County Museum, assisted by Hal Dalwood, and an area of approximately 400 sq. m was investigated. The earliest evidence found was traces of a Middle Iron Age settlement. In the Middle Saxon period the area lay within a Christian cemetery. Eighteen graves were discovered, but the quantity of human bone from the site showed that they were the surviving fraction of a much greater number. From the late 12th century onwards the site lay in back-plots and contained thirty medieval and ten post-medieval pits.

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A microfiche is included.

Aylesbury's most prominent feature is a low rounded hill of Portland limestone, one of several such 'islands' in the clays of the Vale, which are clearly preferred settlement locations (Farley *et al.* 1981, Allen forthcoming). The hill, which is today dominated by St. Mary's Church, must have been the focus of settlement for many centuries. Evidence for early occupation in this area, however, is not prolific, and before 1981 was limited to a single discovery of Iron Age pottery (Waugh *et al.* 1974, 391), localised evidence for Roman activity (Allen 1982), a single ditch section of probable Late Saxon date (Farley 1974) and a number of discoveries of human skeletal remains, made over a long period and a wide area. These latter were sufficiently numerous to encourage Farley (1979) to consider their possible origins as part of a Saxon Christian Cemetery but, in common with the other discoveries, all were the result of chance finds and salvage work; there had been no formal excavation in the area of the old town.

In May 1981, however, the redevelopment of land formerly owned by Messrs. Curtis and Horn provided the opportunity to examine just such a site, and with the full co-operation of the developers, Bryant Properties Limited, Buckinghamshire County Museum carried out an excavation on the north side of George Street (Fig. 1). The work lasted for six weeks and employed a digging team which normally numbered about 15. The area examined totalled 420 sq. m but whereas excavation was thorough on the southern two-thirds of the site, to the north it was of limited depth as the eventual use was to involve only minimal disturbance.

The main objectives of the excavation were to see if evidence could be found for Iron Age occupation and if the skeletal remains, several of which had come from immediately adjacent areas, could be dated and interpreted. Both of these objectives were achieved, the cemetery proving to date from the Middle Saxon period.

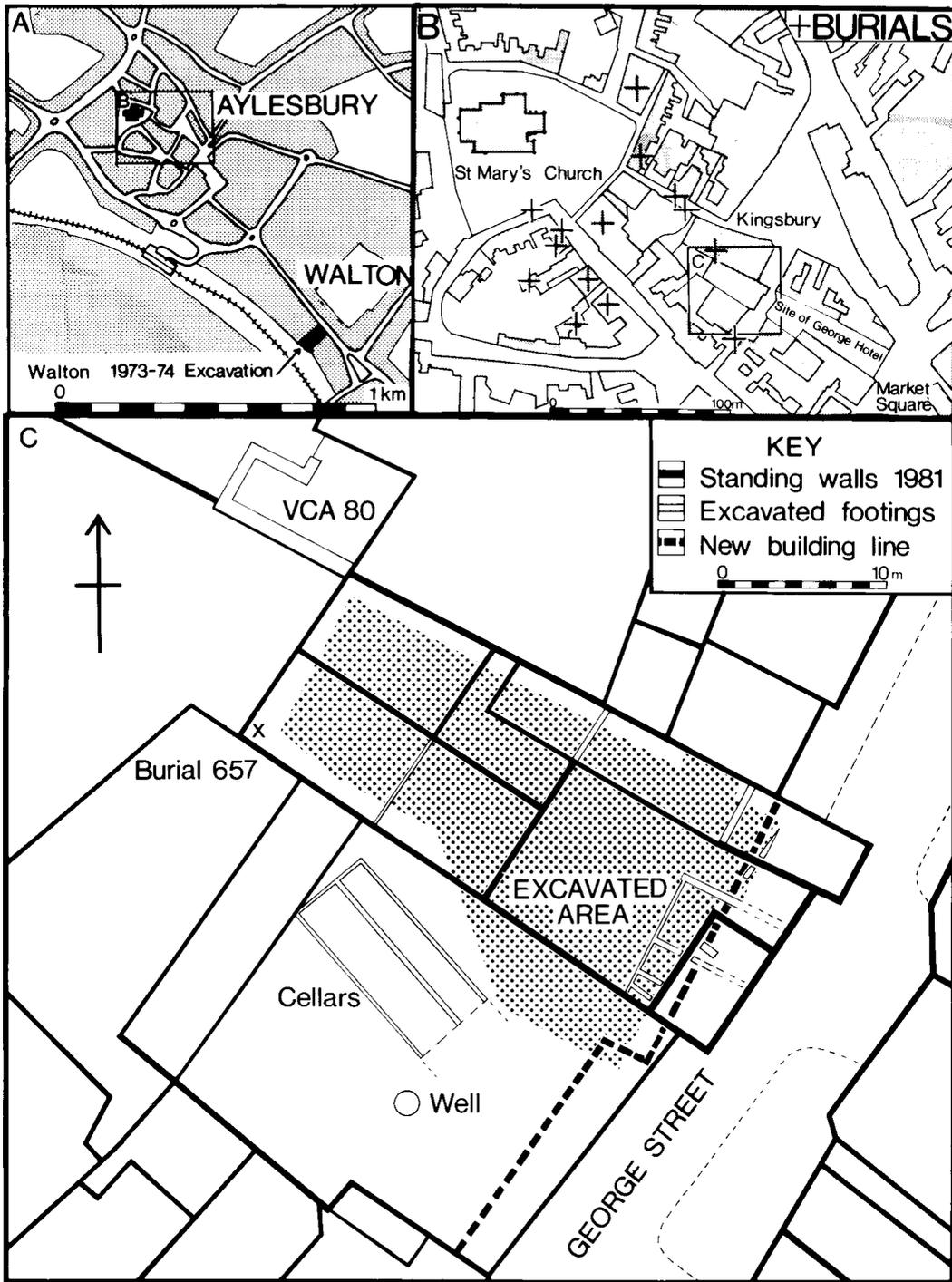


Fig. 1. George Street, Aylesbury: location map.

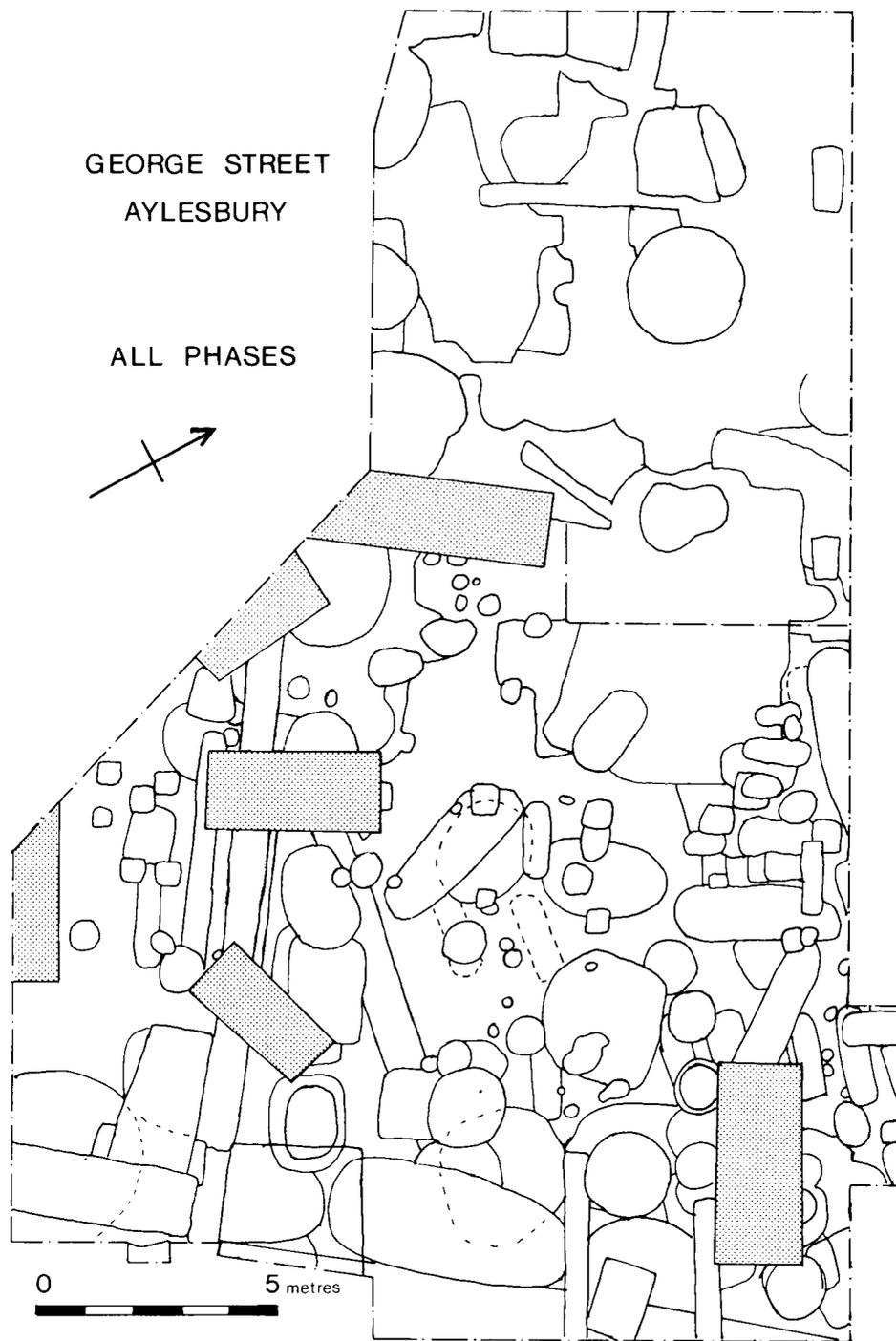


Fig. 2. All phases: recent features stippled (1:150).

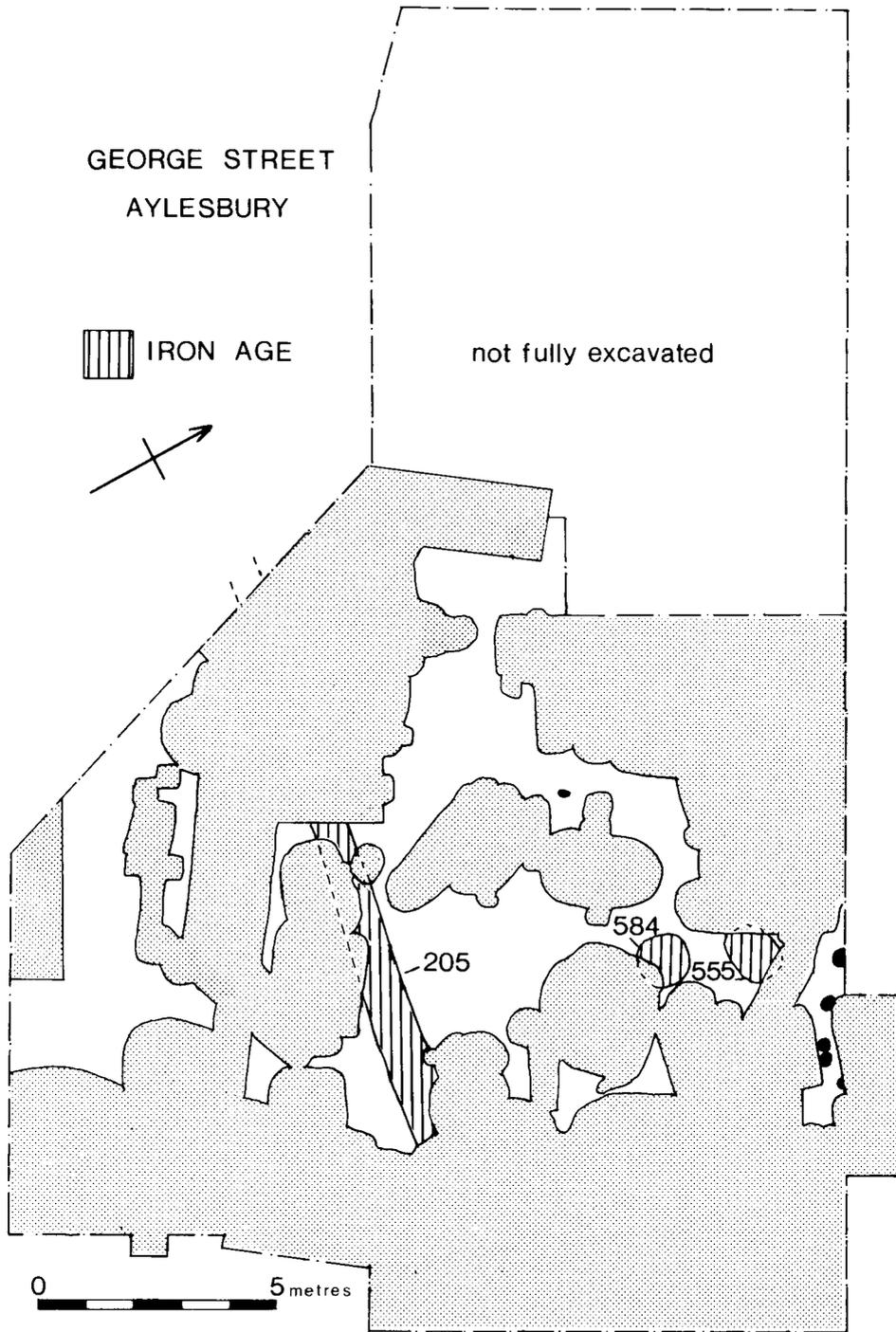


Fig. 3. Iron Age occupation: later features stippled (1:150).

In addition, evidence was found for considerable medieval activity, in the form of pit digging and rubbish disposal, and the post-medieval period was represented by pits, and from the late 17th century on, structures (Pl. I).

The excavation resulted in the recording of

566 contexts (see Fig. 2 and fiche p. 3-23: A3-B9) and produced 15,000 finds. The excavation archive is stored at the County Museum (CAS 4991) and a microfilm copy deposited at the County Record Office. The finds were donated to the Museum by the developers and are stored there as Accession No. 381.1982.

THE EXCAVATION

The Middle Iron Age Occupation (Figs 3 & 4)

Traces of an Iron Age settlement were identified on the basis of pottery contained in three features, which can be confidently placed in this phase. The quantity of Iron Age pottery in residual contexts, however, suggests that other features have been destroyed by subsequent activity. The principal surviving feature (205) was a linear, V-shaped gully, 0.90 m wide and 0.45 m deep, running approximately east-west across the site. It had been badly disturbed by later activity, but could be traced for a length of 7.0 m and in the section at the western edge of the site. As well as Iron Age pottery, it contained animal bone and two fragments of human cranium lying on its bottom at the eastern end. The fill was a homogeneous, dark brown clay, containing small pieces of limestone and flecks of charcoal. The latter was collected to provide a sample for C-14 dating, to support the evidence of the pottery, but the resultant reading of 250 ± 80 ad (HAR-4937) is clearly at odds with the Middle Iron Age character of the sherds. This discrepancy is presumably attributable to later disturbances in the vicinity of the gully which resulted in a contaminated sample.

lay to the north of the gully. Their original function is unclear, but they contained large joining fragments of pottery and saddle quern, as well as animal bone and flint flakes.

A curving line of postholes was revealed on the northern limits of the site. One (326) contained twelve sherds of Iron Age pottery; however, both this and some of the other postholes contained small sherds of medieval date, possibly intrusive. The dating of these postholes is thus open to doubt, but their uniform character and appearance allow the possibility that they represent a structure contemporary with the gully and pits.

The pottery recovered from these features, as well as the equal quantity of residual material (see p. 14-16) is comparable to Phase Two of Saunders' Chilterns typology (Saunders 1971). A Late Hallstatt/Early La Tène brooch (Fig. 11:5) which came from the same locality as the pits and postholes, but which was unfortunately a residual find in a Saxon context, supports this view. The archaeological evidence all indicates a Middle Iron Age date for this occupation, that is, between the 5th and 3rd centuries B.C.

Two shallow, sub-square pits (555 and 584)

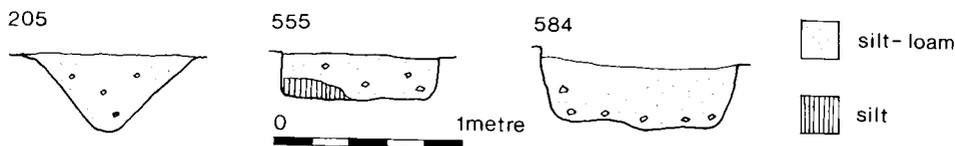


Fig. 4. Iron Age: sections of gully and pits (1:40).

The Roman Period

No Roman features were found at George Street, although there was some residual pottery and one coin, which suggests limited utilisation in the 3rd to 4th centuries, with no evidence of earlier Roman activity. Excavations in Buckingham Street and on the Bull's Head site (Allen 1982) have revealed pits and

gullies, part of a Roman settlement in the vicinity of Akeman Street, which skirts the eastern flank of the town. The nature of this occupation could not be ascertained, although the pottery indicated activity from the 1st to 4th centuries.

The Early Saxon Period

No datable Early Saxon features were encountered although a small amount of pottery and some other finds (Fig. 12:1-3) occurred in Middle Saxon grave fills and later features. Except for these few finds, no archaeological evidence exists for pagan Saxon

settlement on the site of medieval and later Aylesbury. The town is usually accepted as an Early Saxon settlement on the basis of the place-name, and the nearby site at Walton is certainly of this date (Farley 1976). The significance of this is discussed below (p. 50).

The Middle Saxon Cemetery (Fig. 5, Pls. II-IV)

Since the expressed aim of the excavation was to recover evidence of the probable Saxon cemetery in the centre of Aylesbury, a careful search was made for human bone in all features and for graves which might only survive in a fragmentary state. The site was heavily disturbed in the medieval and post-medieval periods and it is clear from the quantity of skeletal material recovered that many graves had been totally destroyed by this later activity.

In all, eighteen graves were identified (Fig. 5), varying from almost complete skeletons, in graves cut 0.30 m into the limestone bedrock, to a few *in situ* bones positioned on the bedrock with no surviving grave cut. The latter type (such as graves 4-6, Fig. 5) must have been shallow graves, dug only into the original topsoil. Where the grave cuts survived, they were rectangular with vertical sides and flat bottom, the skeletons lying on the bottom.

The rectangular shape and size of some of the graves, rather larger than the skeleton required, suggests the use of coffins, but no nails or wood stains were recorded and it seems probable that they were not used (cf.

Rodwell 1981b, 152). No shroud pins were found.

The burials were unaccompanied, although a few residual Iron Age and Early Saxon finds were present. Most of the grave fills contained small sherds of intrusive medieval pottery, probably introduced into the shallow graves by rodents or worm action (cf. Meaney and Hawkes 1970, 21).

The skeletons were all extended and supine, with the hands resting either over or beside the pelvis. Two of the graves, nos. 13 and 15 (Fig. 5) were recut; in each case the second burial was inserted directly above the first, although the axis of the grave cuts differed slightly.

The burials all lay with the head to the west, with a certain degree of variation in orientation. This may indicate that the burials were aligned on the sunrise: they varied between 82° and 116°, within the solar arc of 52°-173°. Of the thirteen orientations that could be accurately determined, twelve lay between 90° and 120°, which may indicate winter burial if a solar alignment theory is accepted (Rahtz 1978). No great stress is placed on the

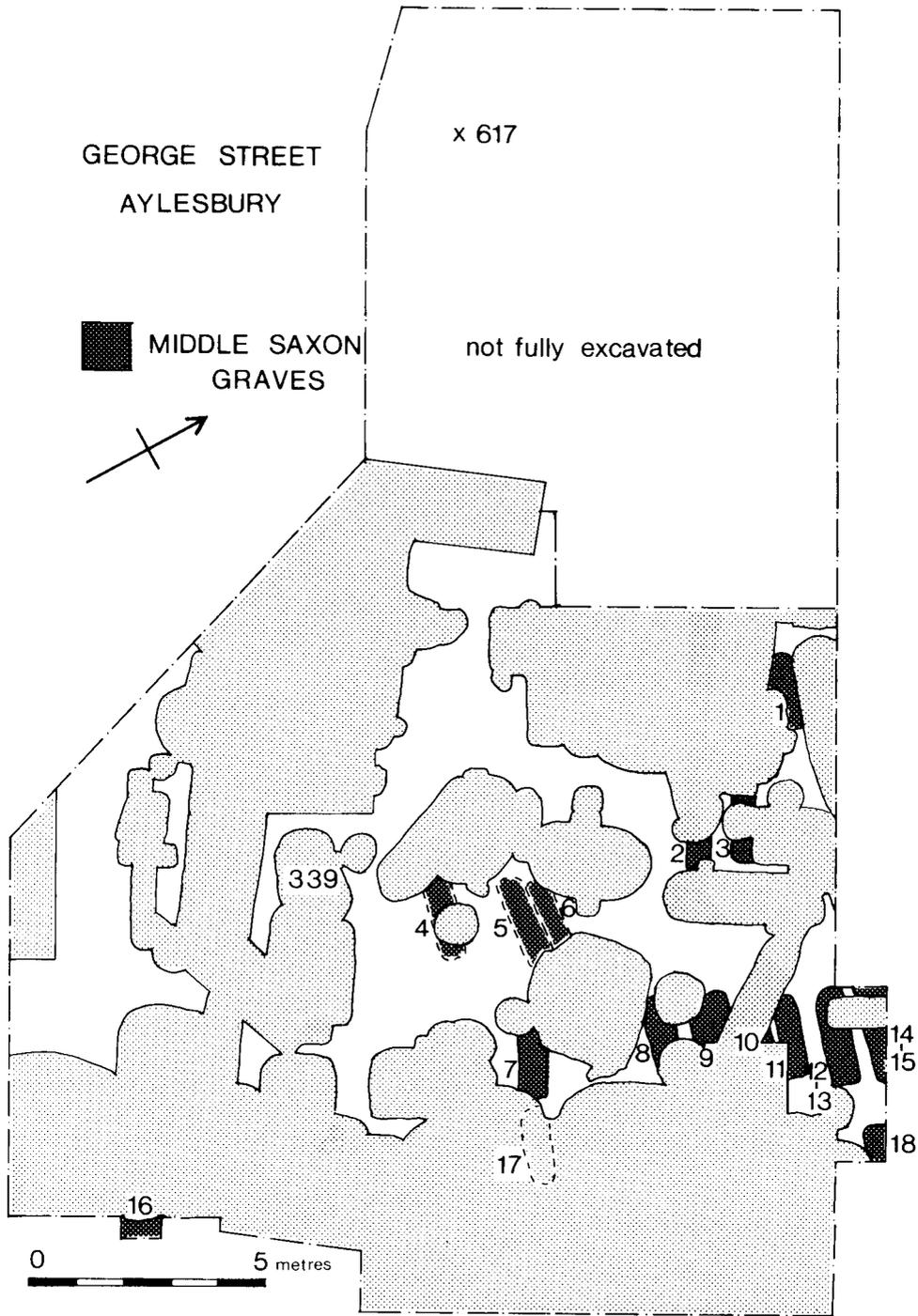


Fig. 5. The Middle Saxon Cemetery: later features stippled (1:150).

variations in alignment here, in view of the small sample size.

The burials lay in orderly rows across the site and the presence of fragments of human bone in 50% of the c. 300 fill contexts excavated suggests that gaps in the rows are largely due to medieval and post-medieval disturbance. The shallowness of some of the graves would have made them vulnerable to superficial disturbances such as gardening, as well as the more destructive pit digging (Pls. II-III). Grave 17 is worthy of note as it is a virtually complete burial redeposited whole in a medieval pit (637) when the sides of the pit collapsed (Fig. 7, middle).

Large scale disturbance from the 17th century onwards led to a number of skeletons being discovered and reburied; the skulls and long bones of at least nine individuals were collected and placed in a pit (339) (Pl. IV), and another single burial (196) was similarly reburied (see p. 12). Gardening activity in the 19th century certainly disturbed nearby burials (Gibbs 1885, 58).

Only eighteen burials escaped complete removal but if the density of surviving graves

is representative, the excavated area could have contained c. 100 burials. However, it was not possible to assess the minimum number of individuals from the residual bones (see p. 18).

The stratigraphic evidence placed the graves between the Middle Iron Age and Early Medieval periods, whilst the few residual finds provided a *terminus post quem* in the Saxon period. In view of the paucity of closely datable evidence, four samples were submitted for C-14 determinations.

Grave 1	Burial 581	780 ± 80 ad	HAR-4941	830-890 AD
Grave 14	Burial 605	760 ± 70 ad	HAR-4938	770-870 AD
Grave 15	Burial 608	800 ± 80 ad	HAR-4939	860-920 AD
Disturbed bone	617	770 ± 80 ad	HAR-4940	840-900 AD

Calibration of C-14 dates after method of Stuiver (1982)

Table 1. C-14 determinations on burials.

These dates are statistically indistinguishable and suggest that the cemetery, or this part of it at least, was in use by the 9th century (see p. 50-52).

During construction work in 1982, a single burial was encountered outside the excavated area (657, Fig. 1:C); it was at least partially *in situ* before being disturbed.

The Medieval Occupation (Figs. 6-8)

The medieval use of the site is represented by a large number of rubbish and cess pits. There was no evidence for Late Saxon activity on the site and the pits were dug when this area of the cemetery had gone out of use. On the basis of pottery in the fills, the pits are grouped in three phases. All the pits are shown together on the plan (Fig. 6) and a number are shown in section to illustrate differences in form (Figs. 7 and 8).

The Medieval Pits

Phase 1: 12th to early 13th century

Only three pits were dug in this period; 337 and 628 were large, square cess pits (2.15 m and 2.40 m deep respectively), which were redug and refilled in phase 2, leaving the lower

0.50 m of organic fill *in situ*. These fills produced 12th to early 13th century pottery (Figs. 13:7, 13:9 and 14:6). A shallow rubbish pit (531), 0.50 m deep, lay on the northern edge of the site and contained 12th century pottery.

Phase 2: Late 13th to early 14th century

Ten pits of varied shape and size were of this phase. The two large phase 1 cess-pits (337 and 628) were largely redug and filled with organic, cess-pit material containing near-complete vessels, suggesting primary deposition (Fig. 13:1, 4-6), as well as a hone, from 628 (Fig. 16:4) and an iron key, from 337 (Fig. 16:6).

637 was a similarly large cess pit; however, the pottery was mostly fragmentary. Finds

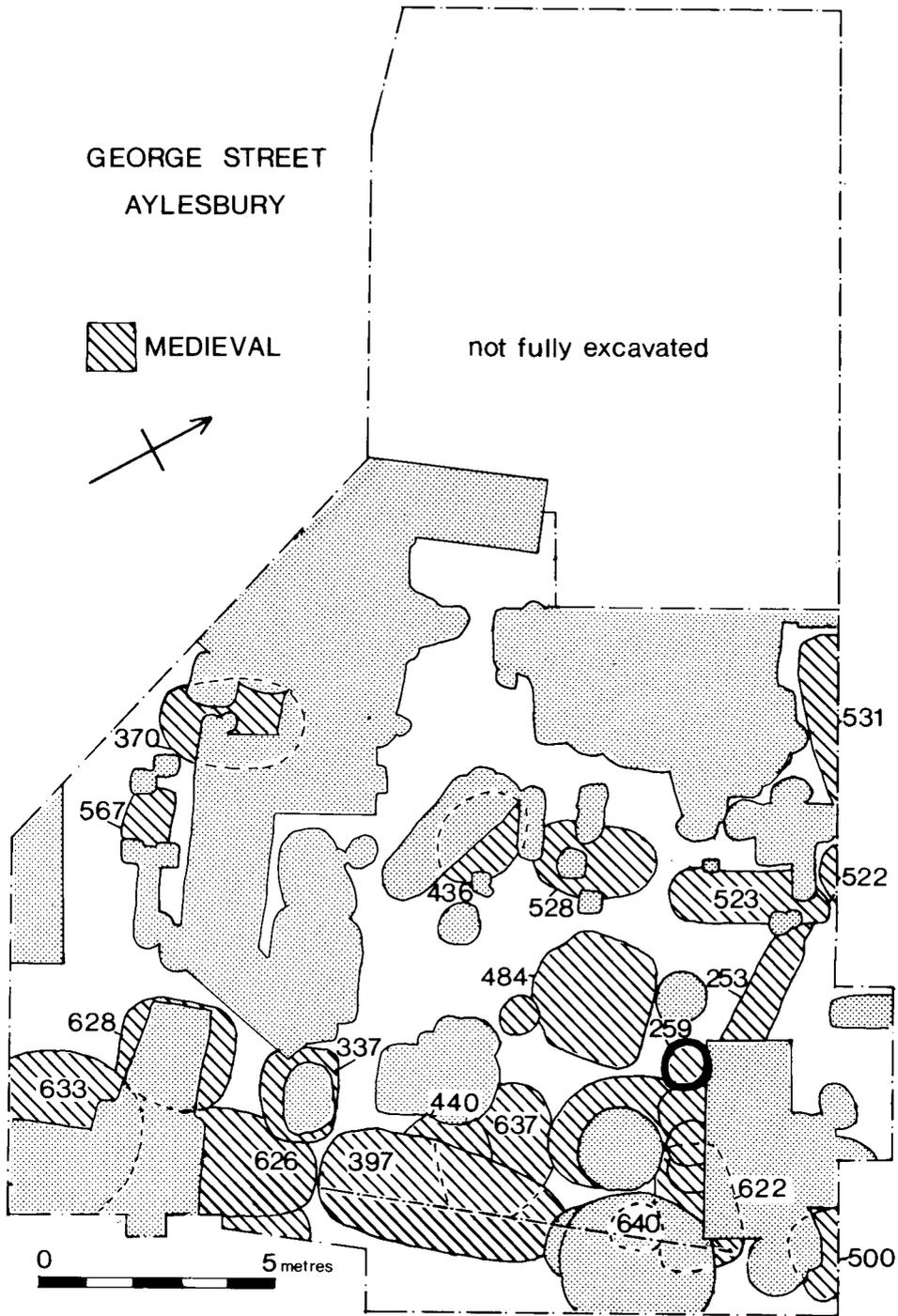


Fig. 6. Medieval occupation: later features stippled (1:150).

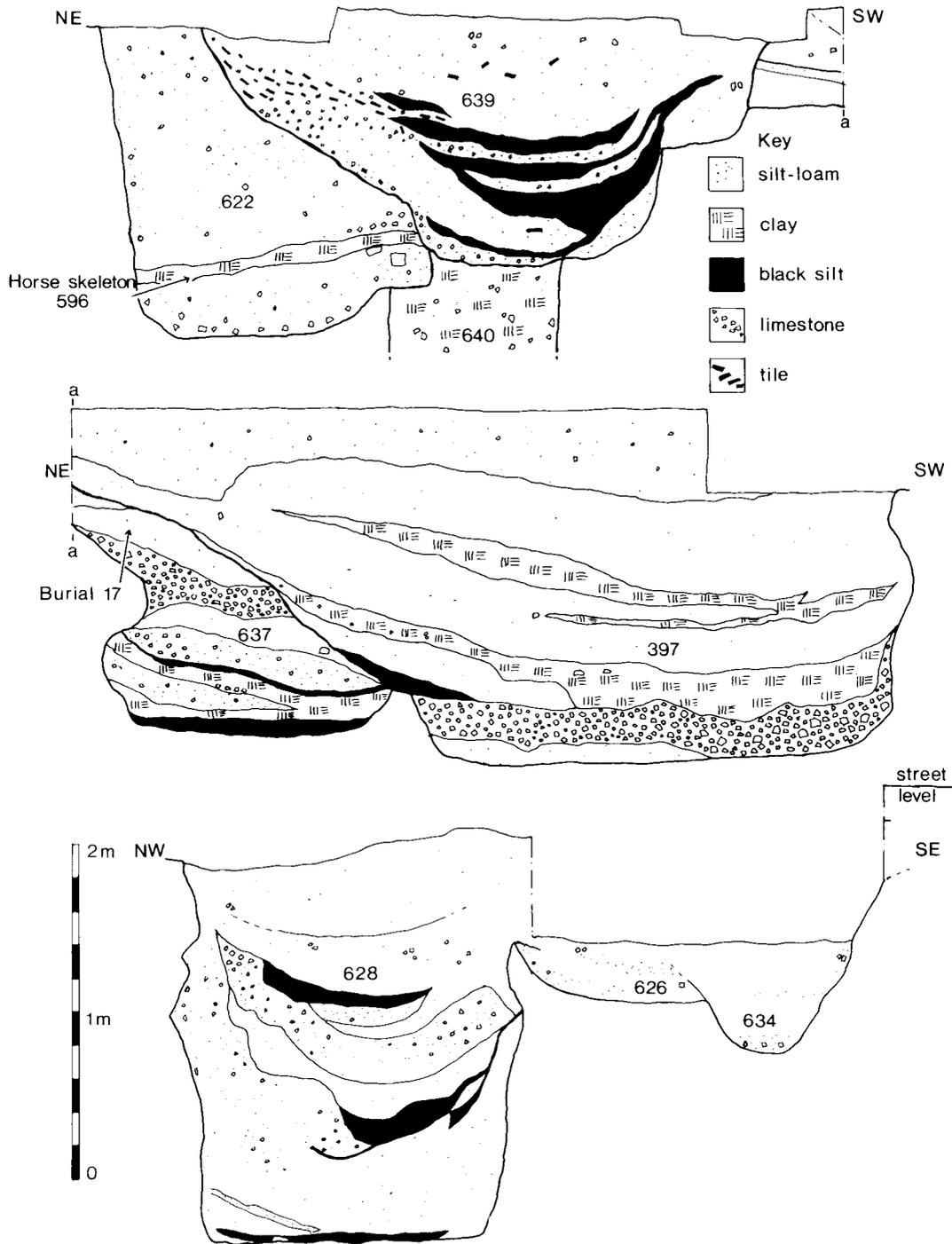


Fig. 7. Medieval: sections of pits and well (1:40).

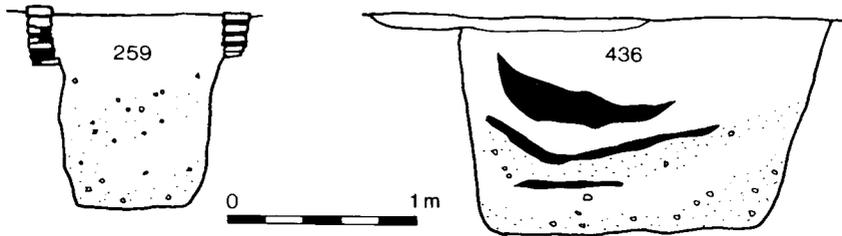


Fig. 8. Medieval: sections of pits (1:40).

from 637 included a stone spindle whorl, a bronze annular object (possibly a weight) and a bone toggle (Fig. 16:3, 12 and 15). 637 also contained a near-complete human skeleton, a Middle Saxon burial which had eroded into the half-filled pit (Burial 17 on Fig. 7). A small hoard (coin nos. 13-18) of six cut silver pennies also came from 637, and the suggested deposition date of 1258-1281 corroborated the dating evidence of the pottery it is associated with (see p. 31).

Pit 259 was a 1.0 m deep circular pit with a drystone lining of limestone and roofing tile around the top where the pit had cut through Saxon grave fills (Fig. 8). It was probably a cess-pit and regularly emptied; however, it was finally used to dispose of domestic rubbish, including two almost complete jugs (Fig. 15: 7-8) and a bone writing implement, possibly a pen (Fig. 16:16).

Pit 436 contained similar high quality objects, including jugs (Fig. 15:1-2), another bone writing implement (Fig. 16:14), and notable quantities of fish bone and mollusca as well as bones of calf, piglet, fowl, goose and duck.

Five other pits (370, 484, 522, 523 and 636) contained homogeneous rubbish-pit fills, incorporating large quantities of small pottery sherds and animal bone, probably indicating secondary deposition.

Phase 3: mid-14th to late 14th century

Six pits were dated to this phase and could also be divided between cess-pit and rubbish-pit use. Two large, deep pits (397 and 622, 1.40 m and 1.90 m deep) had cess-pit fills, but with more fragmentary and mixed pottery unlike the earlier cess-pits. A silver penny of

1371-90 came from 622 (coin no. 11), which supports the dating evidence of the pottery (p. 31).

Four other pits (440, 528, 567 and 633) had homogeneous, rubbish-pit fills. Pit 633 contained a piece of carved stone (the only architectural fragment from the excavation), as well as a broken piece of lava quernstone (Fig. 16:1-2).

Other Medieval Features

Well 640

This 1.0 m diameter well contained a fill of green-grey clay with 14th century pottery, and the skeletons of three dogs and seven cats, along with bones of goose, chicken and red kite. Only a small amount of the shaft could be excavated as seepage from a nearby diesel storage tank in previous years had saturated the fill. The resultant fumes made working in the shaft extremely unpleasant and dangerous, and feature 640 was only explored to 2.50 m below ground level. A post-medieval well just beyond the excavated area was examined during construction work on the site and found to be 6.0 m deep (see Fig. 1:C and p. 14).

Gully 253

This shallow, U-shaped linear gully was contemporary with the phase 1 pits. The gully may represent a property boundary; its line to the south is interrupted by medieval pits, and it may have been dug for surface drainage.

A number of postholes contained a few sherds of medieval pottery; however, the lack of stratigraphic evidence and the high incidence of medieval pottery in post-medieval contexts, as well as the lack of any discernible pattern in these features, makes their phasing and interpretation problematic.

The Post-Medieval Occupation (Fig. 9)

15th to 16th Century Features

After the intensity of 13th to early 14th century pit digging, there was a marked falling off in this activity. No pits have fills datable to the 15th and only two to the 16th century (639 and 647). A few 15th century finds were recovered; a bronze belt chape (Fig. 21:13), a coin and a jetton (coin nos. 6 & 10) occurred as residual finds in later features. There is a general absence of pottery of this date range.

17th to 18th Century Features

This period saw the renewed digging of pits for the disposal of domestic rubbish, with no evidence of use as cess-pits (124, 207, 280, 338, 339, 463, 574 and 618). An ovoid, round-based pit (339), 1.60 m wide and 0.45 m deep, contained a homogeneous rubbish-pit fill, with late 17th century pottery and a number of personal objects (Fig. 21:3, 9 and 10), as well as the residual belt chape noted above (Fig. 21:13). At the base of the pit was a jumble of human bone, the skulls and long bones of at least nine individuals. The position of the bones suggested that these had all been interred together, probably in a sack or bag. Undoubtedly, these bones account for some of the "missing" graves in the Middle Saxon cemetery.

Other features dated to this phase included a square, 0.60 m deep pit (207), originally containing a brick or stone lining, subsequently robbed out. There was also a row of square postholes (indicated by a dashed line on Fig. 9), and a shallow gully (187).

The fragmentary cobbled area to the west of the site was also dated to this phase and was covered by a thick soil deposit (571) containing large quantities of 17th century pottery and other artefacts (Fig. 21:1, 7, 16 and 20). In this area a quantity of human bone was recovered (617 on Fig. 5); most of this material was probably contained in the fill of features cut through the cobbled surface and must have come from graves sealed beneath the cobbles. Excavation in this area was limited by agreement with the developers, as

noted in the Introduction. The limestone footings at the eastern edge of the site probably belong to this period (Building H on Fig. 9). The shallow footings cut 16th century deposits and it is likely that they represent a small building, subsequently replaced by a number of brick structures.

19th Century Features

The main feature of this period was a row of small structures fronting George Street (called Hog Lane up to at least 1885). The deep, solid brick foundations cut through those of Building H.

These structures (Buildings A, B and C on Fig. 9), and the limestone wall which replaced gully 187, can all be traced on the 1878 1:2500 Ordnance Survey plan of Aylesbury. Building A was sunk 1.0 m into the ground to form a small cellar (268), and there was an access between Buildings B and C to the area behind them. This access lay opposite the rear entrance to the George Hotel (Fig. 1:B).

Somewhat later in the 19th century (post-1878) the three small structures were replaced by another brick structure, Building D, on a slightly different alignment. At the same time the sunken floor of Building A was infilled, and covered with a cobbled floor.

Contemporary with this building was a network of earthenware drains leading off from brick soakaways into a large brick storage tank (166). These features are certainly connected with the use of the site for stables, when it formed part of the George Hotel (see p. 56). It is not clear, however, how long the area was part of the property of the hotel before the late 19th century.

Post-medieval Features Adjacent to Excavated Area

Two features were recorded during demolition and construction work on the site, which were certainly post-medieval, and probably 18th or 19th century (Fig. 1:C).

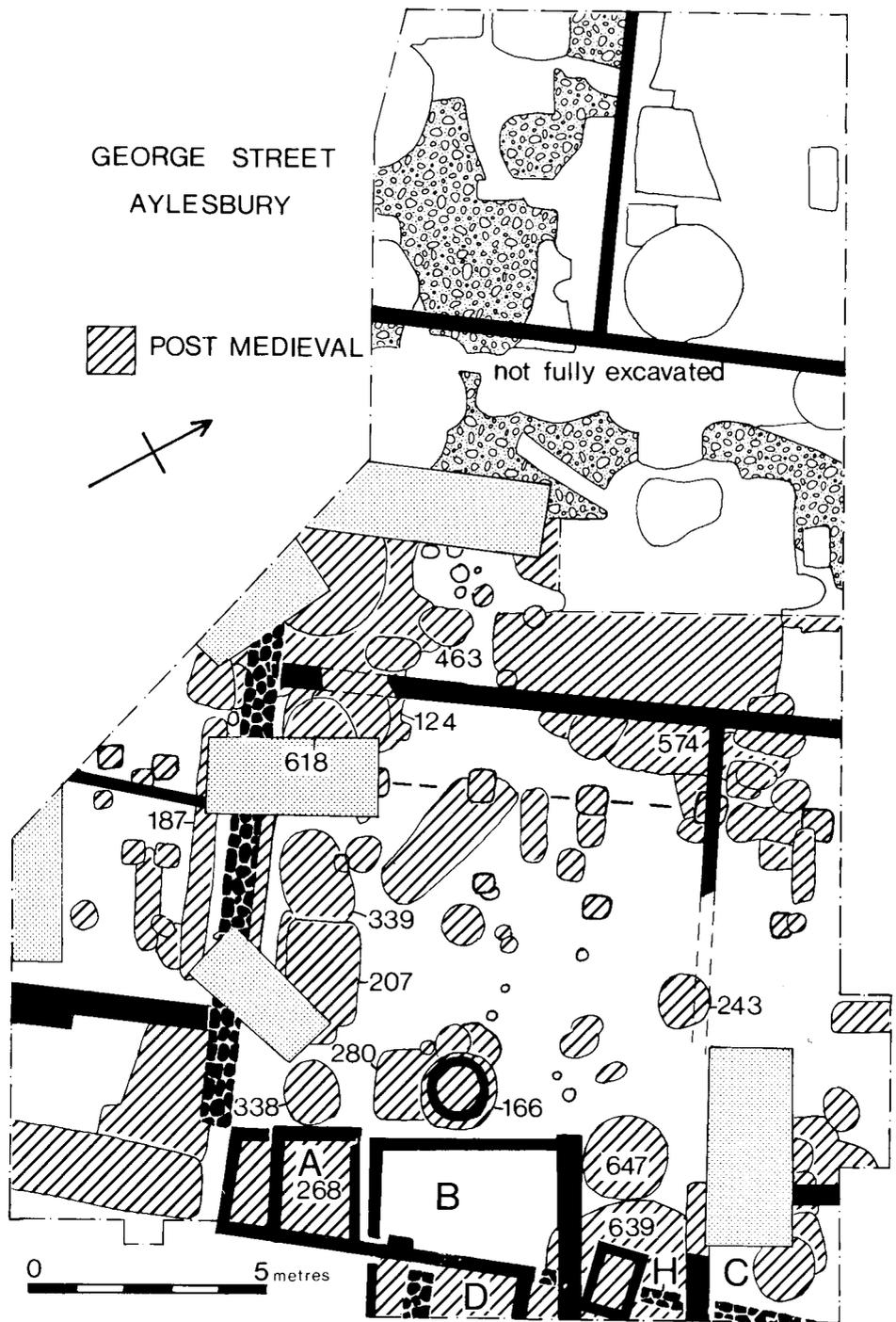


Fig. 9. Post-medieval occupation: later features stippled (1:150).

One was a well (659) which was over 6.0 m deep and contained a wooden pump, consisting of a bored elm pipe with a valve at the lower end. This type of elm-wood pump was used in rural districts up to the end of the 19th century (Rose 1937, 77-93); most of the old pumps extant in Aylesbury have lead pipes so this example may be 18th or early 19th century.

The other was a cellar which was broken into during demolition; it was rock-cut, with a

brick barrel-vault and a brick wall divided it in two. Its general appearance seems to place it in the 18th or 19th century.

No structure survived over the cellar and none is observable on the 1878 plan. This cellar, about 10 m long, was known to employees of Curtis and Horn, the previous occupiers of the site, and gave rise to rumours of a "tunnel" running from St. Mary's Church to the King's Head (Market Square).

THE FINDS

The Iron Age Finds

The Pottery

A total of 185 sherds were recovered from Iron Age contexts and a further 179 as residual finds in later contexts. In view of the small quantity of sherds, a detailed statistical analysis was not undertaken.

The Fabrics

Four fabrics were distinguished, three of which were already known from local Iron Age sites.

Fabric 1. Fine-gritted, sandy textured (34%).

Fabric 2. Flint gritted (38%).

Fabric 3. Calcareous (usually shell) gritted (15%).

Fabric 4. Vegetable tempered (12%).

A selection of pottery is illustrated (Fig. 10: 1-19). Rims included simple rounded and expanded forms, often T-shaped or inturned; no full profiles could be reconstructed. The fine ware (fabric 1) pottery was mostly carinated bowls (i.e. Fig. 10:1-2, 9, 11-12, 14-15), although there was also a smaller element of round-shouldered jars (Fig. 10:13). The coarse wares (fabrics 2-4) were predominantly shouldered jars (Fig. 10:5, 17, 19) although there was also one small cup-like vessel (Fig. 10:4).

The Decoration

Decorative motifs were concentrated on

fabric 1, which was often burnished; the decoration was mostly zig-zag lines below the rim or above the shoulder (Fig. 10:11-12, 14) as well as one example of the chevron motif (Fig. 10:9). There was some fingertip decoration on fabric 2, and some scoring on fabric 3 (not drawable).

Chronology

The forms and decorative techniques used place this material in the Chilterns Middle Iron Age pottery series, specifically Phase Two of Saunders' typology (Saunders 1971, 9-17), and Cunliffe's groups A9-A10 (Cunliffe 1974, 324-5). This phase is conventionally seen as beginning in the mid-6th century B.C. and ending somewhere in the 3rd century B.C. The Late Hallstatt/Early La Tène brooch (Fig. 11:5) is broadly contemporary with this pottery.

Summary

The material from George Street is mostly comparable in fabric, form and decoration to a number of Middle Iron Age sites in the Chilterns/Vale of Aylesbury area (Saunders 1971, 23-24), as well as pottery from Aylesbury itself (Waugh *et al.* 1974, 391, Fig. 11: 19-23).

The vegetable tempered pottery (fabric 4) is not part of this series, although it is clearly associated with local Iron Age material. The

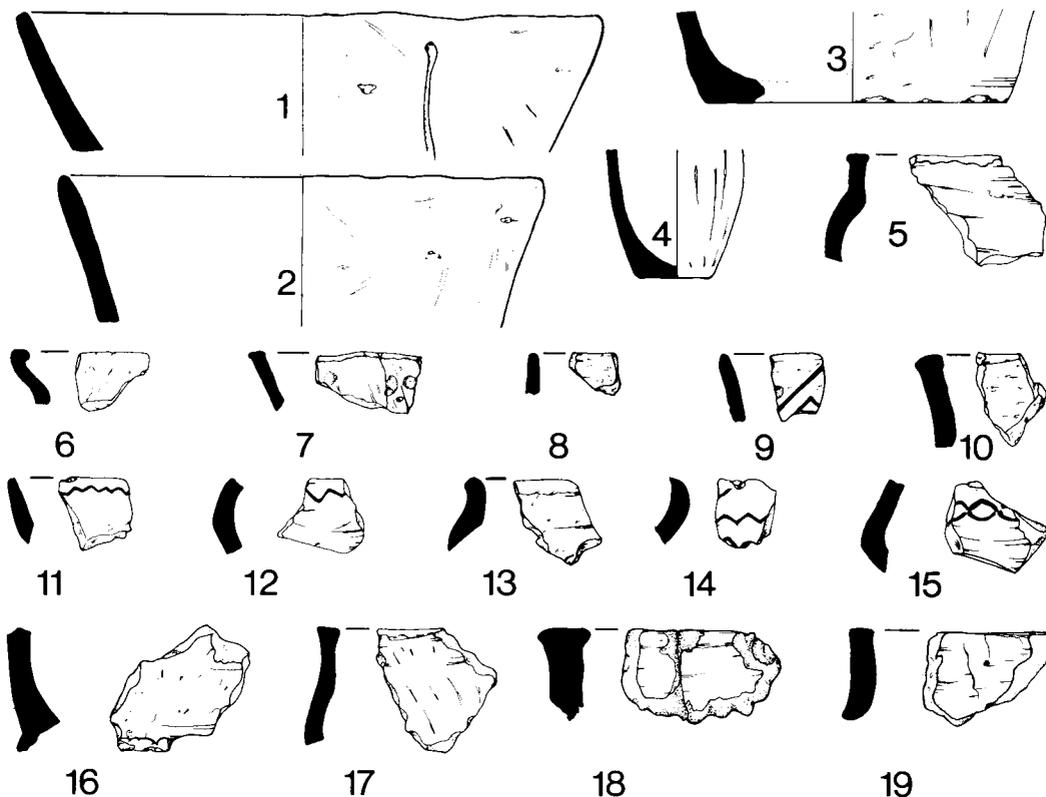


Fig. 10. Iron Age pottery (scale 1:4).

sherds recovered were all from one pit (584) and were too fragmentary to be illustrated. This fabric is similar to Early Saxon grass-tempered pottery, but can be distinguished by its more open texture and lack of burnishing.

There is some difficulty in distinguishing between undecorated sherds of Iron Age fabric 1, and undecorated Early Saxon fine ware: 339 sherds of this fine pottery, here termed 'Iron Age/Saxon' pottery, were recovered from medieval or later contexts. In view of the presence of datable Iron Age features, it is likely that most of this residual pottery is in fact Iron Age.

Flint-gritted coarse pottery (Iron Age fabric 2) makes up a large element of the George Street material. A similar fabric has been found on local Late Iron Age sites such as Berton (Allen forthcoming) as well as in residual Roman contexts at the Buckingham Street, Aylesbury, excavation (Allen 1982).

Iron Age Pottery Catalogue (Fig. 10:1-19)

Stratified Pottery (1-10)

1. Pit 555 (fill 535), fabric 1, rim of (?) carinated bowl.
2. Pit 555 (fill 504), fabric 1, rim of (?) carinated bowl.
3. Pit 584 (fill 583), fabric 2, base.
4. Pit 584 (fill 583), fabric 2, base of small cup.
5. Pit 555 (fill 504), fabric 2, T-shaped rim of shouldered jar.
6. Pit 584 (fill 583), fabric 1, inturned rim.
7. Pit 555 (fill 535), fabric 2, slightly expanded rim.
8. Gully 205 (fill 158), fabric 2, simple upright rim.
9. Gully 205 (fill 158), fabric 2, simple rim of (?) carinated bowl, incised chevron motif.
10. Gully 205 (fill 158), fabric 3, slightly expanded rim.

Residual Pottery (11-19)

11. Post-medieval pit 639 (fill 462), fabric 2, rim of (?) carinated bowl, burnished with incised zig-zag motif.
12. Post-medieval pit 639 (fill 462), fabric 1, shoulder of carinated bowl with incised zig-zag motif.
13. Medieval pit 436 (fill 381), fabric 1, rounded rim of shouldered jar.
14. Medieval pit 436 (fill 381), fabric 1, neck of carinated bowl with incised zig-zag motif.
15. Post-medieval layer 156, fabric 1, shoulder of carinated bowl with incised 'chain' motif.
16. Post-medieval layer 156, fabric 3, footring of vessel.

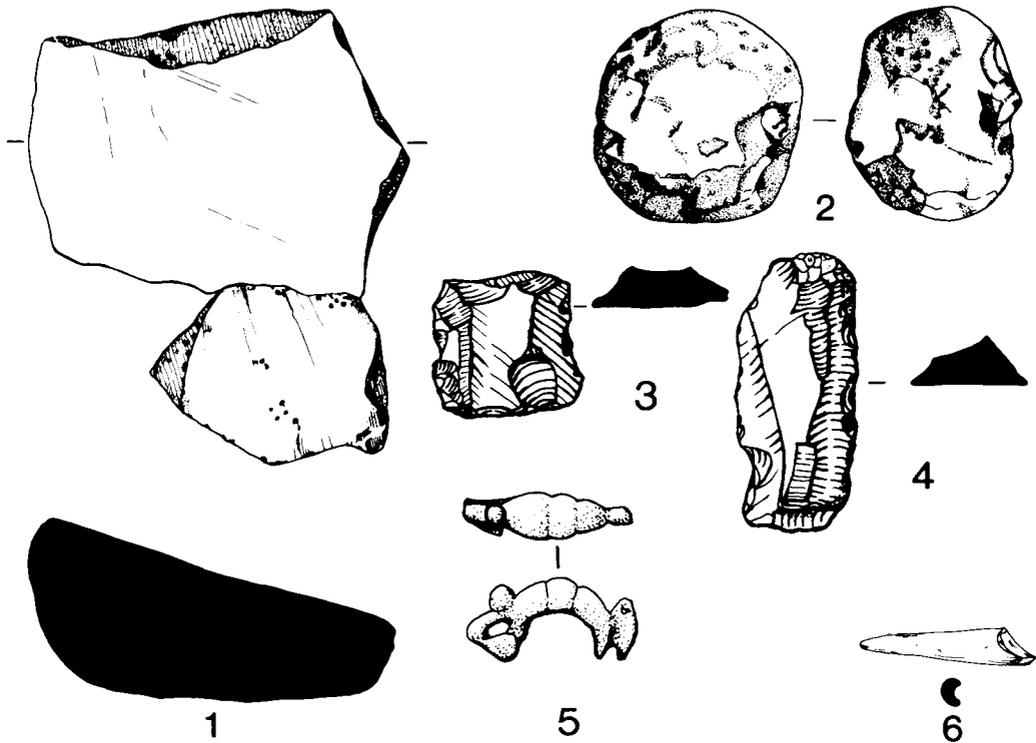


Fig. 11. Iron Age finds: 1, stone; 2, flint; 3-4, flint; 5, bronze; 6, bone.
(Scales: nos. 1-2, 1:3; nos. 3-6, 2:3.)

- 17. Medieval pit 484 (fill 461), slightly expanded rim of shouldered jar.
- 18. Medieval pit 484 (fill 454), fabric 2, thick, T-shaped rim.
- 19. Medieval pit 484 (fill 454), fabric 2, flat, square rim of (?) shouldered jar.
- 4. Flint blade with retouch along one side, grey flint, 50 mm long. Iron Age gully 205 (fill 158).

The Other Iron Age Finds (Fig. 11:1-5)

- 1. Saddle quern, Millstone Grit (identified by F.B. Atkins). Two joining fragments, total width 185 mm, upper surface worn smooth. One each from Iron Age pits 555 (fill 504) and 584 (fill 583).
 - 2. Flint pounder, 85 mm diameter. Spheroidal nodule of grey flint with areas of white cortex chipped off. Iron Age pit 555 (fill 535).
 - 3. Flint blade (broken), black flint, 30 mm long. Residual; from post-medieval garden soil 156.
 - 5. Bronze fibula, 35 mm long. Identified by Professor Hodson as 'one of a group of disparate insular fibulae with continental very late Hallstatt/earliest La Tène features'. Other examples have been found along the Thames Valley, at Hammersmith (Hodson 1971, 50-53, Pl. 13:A), Mortlake (Cotton 1979, 180-184, Fig. 1:A) and at Woodeaton, Oxon (Harding 1972, 171, Pl. 74:H). Residual; from Saxon grave 12 (fill 449).
 - 6. Point of pin or awl, polished bone, 34 mm long, broken. Iron Age pit 555 (fill 535).
- No other Iron Age finds were recovered, except for six other stratified flint flakes, and sixteen from residual contexts.

The Iron Age Animal Bone

by G. G. Jones

The Iron Age features contained some fragmentary animal bones, predominantly cattle, sheep and pig, with horse, fowl, goose and frog or toad also present (see Table 6, p. 32). It is of interest that even in a small sample (147 identified bones) both fowl and goose were present, fowl forming 7.5% of the sample by fragment count and 20% by the minimum number method, which is unusually high. Two bones were of particular note. In part of a bovine maxilla, the alveoli (sockets) for the deciduous molars were present and alveoli for the permanent premolars were also present, forming a second, inner row of teeth. A sheep metacarpal bore marks suggesting it may be bone-working waste. Chopmarks on the upper end done after separation from the carpal bones, appear to be an unfinished attempt to split the bone, and similar marks on the lower end have split the lower third of the bone. Two metatarsals of cattle may also have been split intentionally. A bone point is described elsewhere (Fig. 11:6).

The Human Skeletal Remains

Two joining skull fragments from a juvenile /sub-adult individual (J. D. Henderson, Archive report) were found lying together on the bottom of the Iron Age gully (205, fill 158, Fig. 3) in such a location that they were clearly of Iron Age date, despite the high incidence of redeposited human bone from the Middle Saxon cemetery throughout the site. The presence of fragmentary and disarticulated human bone on Iron Age settlement sites has recently been discussed (Wilson, C. E. 1981) and the material from George Street, given its limited nature, is comparable to that from a group of Iron Age sites in Oxfordshire. At Ashville, Barton Court Farm, and other sites, fragments of human cranium were found in enclosure ditches and pits (*ibid.*, 150, Fig. 7). The fact that on these sites cranium fragments were found without other parts of the skeleton being present has led to theories of trophy-hunting in war, or retention of relatives' skulls in an ancestor cult (*ibid.*, 162-164).

The Roman Finds

The Pottery

Eighty-two sherds of Roman pottery were recovered. The material consists almost exclusively of grey ware sherds. The absence of Oxfordshire colour-coated wares, which are common on Roman sites in the area, suggests that the area was not being utilised after the 3rd century A.D., although the sample is too small to draw any definite conclusions. One fragment of Roman flue tile and one small chip of samian were also recovered.

The Roman Coin

Residual coin, from medieval well 640 (fill 529), identified at the Ashmolean Museum.

Coin no. 12:

Bronze follis, Constantine, A.D. 330-335.

Obv. CONSTAN-TINOPOLIS, helmeted bust.
Rev. Victory standing on prow with spear and shield.

Mint mark: TRP (Trier).

cf. Trier coin no. 543 (*RIC VII*, 217).

Early Saxon Finds

The Pottery

A total of six sherds of Saxon grass-tempered pottery were recovered. This was the only type of pottery that could confidently be dated as Saxon.

Fine-tempered Saxon wares cannot at present be distinguished from fine-tempered Iron Age pottery, when these both occur as residual

finds in later contexts.

A total of 339 sherds of this intractable "Iron Age/Saxon" pottery were found. In view of the quantity of datable Iron Age pottery and features on the site, it may well be that most of this material is Iron Age also (see p. 15). None of the pottery is illustrable.

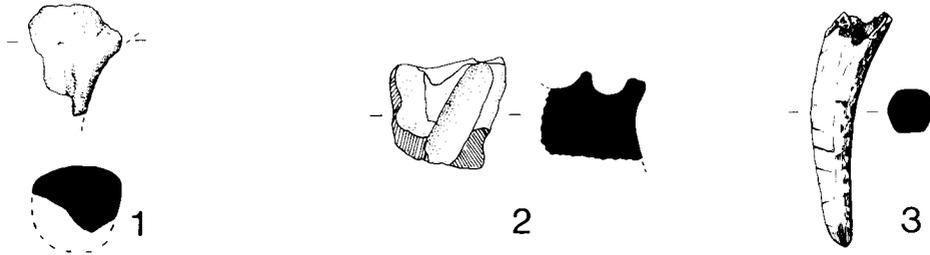


Fig. 12. Early Saxon finds: 1-2, fired clay; 3, antler. (Scale 1:3.)

Other Early Saxon Finds (Fig. 12:1-3)

1. Fired clay: loom weight fragment. 40 mm across. Fragment of circular Saxon loom weight, similar to a number found at Walton (Farley 1976, 204, Fig. 19, 1-2; Fig. 27, 1-7). Residual find from post-medieval pit 243 (fill 218).
2. Fired clay: daub fragment, 40 mm across with two linear wattle impressions and the impression of a wooden upright. Grave 12 (fill 449).

3. Antler tine. 95 mm long, broken. S. J. Greep writes: 'A number of similarly worked tines have been recovered in Anglo-Saxon contexts at York where it has been suggested that they may have been used to peg out hides (Radley 1971, 51) or simply as some form of wedge (MacGregor 1982, 100).' Grave 13 (fill 485).

No other early Saxon objects were recovered except two possible fragments of loomweight from post-medieval contexts (218 and 303).

The Middle Saxon Cemetery

The Human Skeletal Remains

by J. D. Henderson

Ancient Monuments Laboratory

The human skeletal remains from 18 inhumation burials and a quantity of disturbed finds of human bones from specific locations were examined, resulting in a total of 26 individuals. Preliminary observations of the miscellaneous bone from residual contexts quickly showed that the material was too scattered and the samples too small for any attempt to be made to assess the total number of individuals. Bone preservation varied from good to very poor with most of the sample (two-thirds) being in a poor condition. Individual details are summarised in Appendix I (fiche, p. 53-56: E3-6); complete inventories of the bone and teeth present, by individual, are kept in the archive.

The material was examined for details of demography (sex, age and stature), health, and skeletal and dental metrical and morphological variables. Analysis of this last category was not considered justifiable with the small

samples available. However, it was noted that there was nothing unusual present: the observations fitted well within the bounds of the variability that might normally be expected. Individual results are listed in Appendix 4 (fiche, p. 61-71: E11-F9).

Demographic Results

Note: individual results for sex, age and stature are given together with a note of the method(s) used in Appendix 1 (fiche p. 53-56: E3-6). Appendix 2 (fiche p. 57:E7) is a simple list for quick reference. Appendix 3 (fiche p. 58-60:E8-10) gives details of the methods and the relevant references.

Sex: Table 2 gives the results for sexing for this site. Attribution of sex was either probable (male/female), possible (?male/?female) or impossible. The last category includes those adult individuals for whom data were unavailable and infants, juveniles and sub-adults for whom sexing was not attempted owing to the inaccuracies involved.

<i>Sex</i>	<i>Number</i>
Male	11
?Male	0
?Female	3
Female	6
Not sexed	6
Total	26

Table 2. Results of sexing.

There was very little that could be said about these results owing to the small size of the sample involved. However, it was noted that there was a relatively even distribution between the sexes with no predominance of one over the other.

Age: Table 3 gives the results for ageing of this sample. Ages have been standardised into five-year groups, with the exception of the 50+ group for which accurate ageing is not generally feasible. Given the small size of the sample it was felt that this did not in any case render that group disproportionately large.

<i>Age</i>	<i>Number</i>
0-5	-
5-10	-
10-15	2
15-20	-
20-25	2
25-30	2
30-35	1
35-40	-
40-45	-
45-50	-
50+	3
Juvenile	1
Adult	15
Total	26

Table 3. Results of ageing.

There was nothing that could be said about the results of ageing of this sample largely because of the extremely limited nature of the data available, nor was it considered justifiable to examine the age distribution by sex.

Stature: poor preservation of the material inhibited estimation of stature, so that only 12 individuals could be assessed. The results are

given in Table 4. With such a small number there was little opportunity for comment on the results. The sexual dimorphism shown was similar to that which might be found in a larger sample and was not unexpected.

<i>Stature</i>	<i>Female</i>	<i>Male</i>
1.50-1.54 m	1	-
1.55-1.59	2	-
1.60-1.64	1	-
1.65-1.69	-	-
1.70-1.74	1	5
1.75-1.79	-	1
1.80-1.84	-	1
Total	5	7

Table 4. Results for stature by sex.

Observations on Health

Evidence for health (i.e. pathology) in this sample was very slight owing to the size of the group and the poor degree of preservation. However, some observations were made on both teeth and bones. Results by individual are given in Appendix 5 (fiche p. 72-74: F10-12).

The Teeth: teeth were examined for wear, caries, abscesses or cysts, impaction, deciduous retention, periodontal disease, enamel hypoplasia and calculus. Observations of dental wear were used for ageing of individuals only. Of the remainder there were no examples of impaction, deciduous retention or enamel hypoplasia present.

Cariou infection of the teeth was found to be present in three individuals only and abscesses in two. However, since only four individuals out of 27 had dentitions available for examination this could not be regarded as significant. Further, given that the teeth came from such a small number of individuals it could not be considered justifiable to attempt any more detailed analysis of the results (this included abscesses or cysts, periodontal disease and calculus).

Bone Pathology: there were few examples of bone pathology present in this sample and none of any major disease. There were two examples of fractures: Burial 250 where there

was a healed fracture of the neck of the left scapula (Pl. VIa, b) and medieval pit 397 (fill 396), where there was a healed fracture of a femur. Two individuals presented hip trauma (Burial 250 and 450, Pls. Va, b and VIIa) and there was one case of spina bifida occulta and congenital fusion of vertebrae (Burial 306). There was also one case of fused thoracic vertebrae for which no diagnosis could be made (miscellaneous bone 617, Fig. 5).

The most interesting case was Burial 608 where there was evidence for head wounds in the form of two cranial cuts: one on the frontal extending back to the temporal and the other on the right parietal (Pl. VIIb). The location of the injuries was unusual in that they occurred on the right side of the skull. Courville (1965) found that only 31% of such wounds were on the right side and that only 3.5% had been delivered horizontally. However, the frontal and parietal are the commonest sites for cuts (Brothwell 1961). The indications from the injuries seen here were

that the victim was upright and bare-headed, and that the blows were delivered with a sharp instrument directed by an assailant most probably standing to the right and behind. The appearance of the injuries was similar to that observed by Manchester (1980) at Eccles, Kent, in that a sharp weapon had been employed and also that in the absence of other evidence these wounds were almost certainly the cause of the individual's death.

Summary: 26 individuals and a quantity of miscellaneous bone from Aylesbury, George Street were examined in the Laboratory. Data were limited owing to small sample size and poor preservation although most of the individuals could be assessed for sex and age at least. Other information concerning stature, anatomical variability and health was necessarily limited.

Acknowledgement: I should like to thank Alison Locker for her help in sorting and identifying the animal bone.

The Medieval Finds

Large quantities of pottery and animal bone were recovered from the site. The phasing of the medieval features is based on analysis of the pottery, and a selection of the material is illustrated, with a report by P. A. Yeoman. The animal bone report is by G. G. Jones, with a discussion of relevant historical data concerning medieval agriculture in the Vale of Aylesbury.

Other finds included objects of stone, iron, bronze and bone, which are selectively illustrated and catalogued in the text, as well as a small hoard of silver pennies, a single penny, and one small piece of linen cloth. In addition, small quantities of roofing tile, and mussel and oyster shell were found.

A full catalogue of small finds is included

on microfiche (fiche p. 24-51: B10-E1).

The Medieval Pottery by P. A. Yeoman

Introduction: Method

The c. 3500 medieval sherds retrieved during the excavation were processed with a view to establishing an Aylesbury fabric series. The fabric chart and chronology published here are the results of this work (p. 21 and fiche p. 30-35:C2-13). The other aims were: to create a chronology by examining form, development and decoration, establish a dating sequence for glazed Brill/Boarstall wares, examine cooking-pot to glazed-ware ratios, attempt to relate these to spatial distribution, differentiate between primary and secondary deposition processes in pit fillings, and to identify any imported wares. Each sherd was recorded

using the Oxford system of recording sheets, with decoration and form charts supplied by Maureen Mellor (Mellor *in* Durham 1977, 111).

Twenty-five fabrics were identified, divided into three groups by their inclusions: Group I, shelly limestone; Group II, flint; Group III, sand and quartz. The likelihood of a considerable overlap between Oxfordshire and Buckinghamshire fabrics has already been established (M. Mellor pers. comm.). In this case however, the only definite Oxford fabrics discovered were Oxford AM and AW which are equated with Aylesbury 4 and 5 respectively (Durham 1977, 118).

Thin sections of most fabrics were sent to Dr. Williams in Southampton for petrological examination, together with comparative material found at one of the Brill kiln sites (report on fiche p. 36-38: C14-D2). All context groups were examined to provide a *terminus post quem*, but only ten could be examined in detail, approximately 30% of the total number of sherds. The author was greatly assisted in the preparation of this report by Hal Dalwood, Mike Farley and especially Maureen Mellor.

(N.B. cp is used throughout as the accepted abbreviation for cooking pot, singular and plural.)

The Fabrics (full details, fiche p. 30-35: C2-13)

Group I

Shelly limestone: fabrics 6, 7, 12, 16, 22. Mainly reduced bodies, both wheel-thrown and hand-rotated. Predominantly cp, with a few jugs and bowls. Unglazed, occasionally with groove decoration, or rouletting. Many with purple surfaces. Heavily influenced by developed St. Neots ware tradition.

Group II

Flint: fabrics 2, 9, 23, 24, 25. Dark bodies, both wheel-thrown and hand-rotated. Mainly cp, some jugs and bowls. Occasionally green glazed, although generally plain. Some grooved decoration.

Group III

Sand and quartz: fabrics 1, 3, 4, 5, 10, 11, 13, 14, 15, 17, 18, 19, 20, 21. By far the largest group, containing twelve fabrics, mainly 4 and 5. Many of the other fabrics are textural variations on these, which are equivalent to Oxford fabrics AM and AW respectively. The finer wares, mainly represented by fabric 4, consisted of well-made wheel-thrown, orange oxidised jugs, either glazed overall or only down to the shoulder. Common features were: applied red/brown slip and strips, mottled green glazes, horizontal neck grooves and stabbed strap handles.

The coarser wares, represented especially by fabric 5, were cp, bowls, saucepans, jars, curfews and plain jugs. Mainly cp with thickened rims, grey cores and black surfaces. Occasionally used to make finer jugs similar in form to fabric 4 examples, with green glazes and other decoration.

Fabric Chronology

The phasing was established from a combination of the stratigraphical relationships, the coin evidence, and cross-referencing with the sequence already established for Oxford.

Phase 1, 12th to early 13th century: five contexts from three pits could confidently be attributed to this early medieval phase, although one of these was heavily disturbed (318) and another partially (513).

All the fabrics in Group I were represented, forming about 50% of the total. The commonest single fabric represented was fabric 6. A small quantity of Group II was found, mainly fabric 2. Later in this phase the coarser fabrics, full of quartz, of Group III were recorded, especially fabrics 5, 11, 17 and 18. The third and fourth of these were barely represented in the subsequent phases, whereas fabric 5 was ubiquitous.

Phase 2, late 13th to early 14th century: the ceramic from these contexts was predominantly Brill/Boarstall fabrics of Group III,

fabrics 1, 4, 5, 21, along with a fair proportion of fabrics 3, 11 and 19. Earlier in this phase, fabric 5 appears to have been in much greater use than the finer fabric 4. It is possible that this situation was reversed by the end of the phase. Most notable is the general absence of Group I fabrics, although the most important of these, fabric 6, was the last to disappear from the archaeological record.

Small numbers of Group II sherds were found, notably fabrics 2 and 9. Dating was aided by the discovery of a coin hoard of Henry III in context 637 (deposition dated to 1258-1281, p. 31).

Phase 3, mid-14th to late 14th century: following the pattern emerging in the previous phase, fabric 4 was by this time predominant among Group III fabrics. Fabrics 11 and 19 were still important, with 19 in some cases forming over 20% of some context groups. Again, small numbers of Group II fabrics were represented. A coin of Robert II, found in context 622, gave a *terminus post quem* of 1371 (p. 31).

Summary: from what is hoped to be a representative sample (17% of medieval contexts or c. 30% of the sherds), Group I fabrics formed the second most important group although, within this, fabrics 12, 16 and 22 were relatively unimportant. From the total sherd count, fabric 6 was probably the fifth most numerous on the site, and appears to have been longest in use. Generally, Group I fabrics are not recorded after the mid-13th century. Group II was the least numerous, representing around 4% of the sample, and was found in all phases. However, secondary deposition and the disturbed nature of many pit fillings may have complicated the overall pattern. Group III was by far the most numerous, including Brill/Boarstall and other fabrics, increasing in number with time. In phase 3 the finer fabrics within this group dominated the coarser examples.

A number of fabrics (8, 12, 16, 20, 21, 22, 23, 25) each individually represented less than 1% of the total sherd count. It is possible that

these were a small number of individual vessels from more remote kilns, or else that their fabric identification is wrong. If the latter is true then they simply represent variants within the main fabrics.

Brill/Boarstall Kiln Products

The earliest vessels on the site, both fine and coarse wares, which could be stylistically attributed to the Brill/Boarstall production centres appear to date from the mid-13th century. Comment will be restricted to the decorated table wares which are more suitable for study than the mass of plainer cooking pots and kitchen ware (fabrics 1, 5, 11, 21). The same fabrics and fabric variants were used both in the cooking pots and the jugs, with practically all of these being made in fabrics 4 and 5.

Fabric colour changed with time. It seemed to start as buff, becoming increasingly pinker into the 14th century, and then brickier and redder into the late 14th century and beyond, associated with some heavier, thicker forms.

The mid to late 13th century forms consisted of predominantly globular and baggy jugs; with the long-necked variety and the "triple-deckers" possibly beginning in the later 13th century and continuing into the 14th century. Baluster jugs have been identified elsewhere as being a fairly standard 14th century development, although the George Street site produced no reconstructable vessels of this type. Biconical jugs probably date from the late 13th century into the 14th century.

Handle forms are unfortunately not useful as dating indicators as both rod and strap handles appear to co-exist from the mid-13th century onwards. It is possible that the finer rod handles were later. Stabbed and oblique grooved decorations were used on both handle forms.

Laverstock-style decoration appears to be restricted to the late 13th century (Fig. 13:1 and 13:6).

The earliest jugs were characterised, in

terms of decoration, by a mixture of clear and mottled green glazes down to the shoulder of the vessel, with single long vertical grooves alternating with single iron-rich red-brown lines of slip. By c. 1300 green mottles possibly became predominant to the exclusion of other glazes. Similarly, by this time all-over glazes were in use, with the very attractive, mid to dark green uniform glazes being produced from the early 14th century. These became more high-gloss and regular during the century.

Applied decorative strips, often of contrasting coloured clay, along with applied blobs, grooves and rouletting, appeared on the earliest forms, associated with the complete range of glazes. A diagnostic feature of the mid to late 13th century was broad, double-square, vertical rouletting. More regular, single, triangular rouletting was probably a slightly later technique.

The Ratios of Cooking Pot to Glazed Wares and their distribution on site

To enable this relationship to be established, sherd groups were divided simply into glazed and unglazed. Precise statistical analysis of such coarse grade data is unwise, owing to the many unknown factors, such as: actual vessel numbers, whether or not unglazed sherds form part of partially glazed vessels, and the amount of disturbance of contexts. The fact that cooking pots were expendable, and that glazed wares lasted longer, must be taken into account. However, it is possible to obtain overall impressions.

Phase 1, 12th to early 13th century: the general ratio was approximately 10:1 (cp: glazed) in the two eastern cess pits (337, 628). In the northern rubbish pit (531) no assuredly original glazed sherds were found. It is possible that some of the glazed sherds in the cess pits were intrusive.

Phase 2, late 13th to early 14th century: the ratios varied considerably from 1:2 to 17:1, although the average again was around 10:1. The highest proportion of glazed sherds came from the central-eastern group of pits (259,

337, 436, 484), most of which were rubbish rather than cess pits.

Phase 3, mid 14th to late 14th century: in this phase the spread was from 1:1 to 10:1, with the average around 6:1, indicating the generally higher proportion of glazed wares present as time went on. The glazed wares were found spread fairly evenly overall, precluding any comments concerning pit uses and economic changes.

<i>Cut No.</i>	<i>Filling Nos.</i>	<i>Phase</i>	<i>Prim.</i>	<i>Sec.</i>	<i>Date (century)</i>
259 R	220, 259	2	*		late 13th/early 14th
337 C	302	2	*		late 13th/early 14th
370 R	116, 122	2	*		early 14th
397 C	396	3		*	mid 14th
436 R	381	3		*	late 13th
440 R	392, 457	3	*		early/mid 14th
484 R	431, 454	2		*	early 14th
	461				
522 R	515	2		*	late 13th/early 14th
523 R	505, 534	2		*	late 13th/early 14th
528 R	509	3		*	mid 14th
531 R	513, 573	1		*	late 12th
567 R	566	3		*	mid 14th
622 C	456, 488 487, 489	3		*	late 14th
626 R	502, 257 383, 384	2		*	late 13th/early 14th
628 R/C	281, 317	2	*		late 13th/early 14th
628 C	318, 319 (disturbed)	1	*		late 12th/early 13th
633 R	437, 616	3		*	mid 14th
637 C	451, 458 459, 480 482, 496	2		*	mid/late 13th
640 W	529	3		*	14th

C = cess-pit fill R = rubbish-pit fill W = well

Table 5. Primary and secondary deposition of pottery.

Primary and Secondary Deposition

The pottery assemblages from the pits, both rubbish and cess types, consisted either of small and often abraded sherds, or of large sherds and almost complete vessels. Unfortunately the former were overwhelmingly predominant, representing 90% of the material.

Accepting the premise that this indicates secondary deposition, the contexts were divided into two groups, primary and secondary. The process of secondary deposition may have involved the incidental dumping of sherds within other forms of rubbish, in some cases at a time considerably after the vessels had originally been discarded. In turn, this partially explains the quantity of residual material in many contexts, creating problems in establishing a firm chronology.

Most of the complete or reconstructable vessels were dated within phase 2, and were found in four pits situated in the eastern and south-eastern parts of the site (259, 337, 436, 628).

Imported Pottery

1. Context 458. Late 13th century, unknown source.
One sherd of a large, well-made storage jar. Brown exterior, buff-brown interior, grey core, wheel-thrown, obvious rilling. (Examined by M. Mellor.)
2. Context 469. Second half of 13th century, Aardenburg type.
One sherd from shoulder of jug with green-fired slip-trailing, vertical lines with triangular section, with lines of applied scales between. Small quartz and other mineral inclusions in fabric. Grey-brown core with brick-red margins and surfaces. Produced at kilns in Flanders, notably Brugge, northern France and Dutch Zeeland. (Verhaghe 1983, 70; Baker 1979, 176.)
3. Context 488. Mid to late 14th century, Merida type.
One sherd from neck of costrel or oil jar. Micaceous fabric. Grey core with red-buff margins and surfaces. Produced in Spain/Portugal. Oxford fabric AR. (Durham 1977, 119; Platt and Coleman-Smith 1975, 2, 171, Fig. 205, no. 1280.)

Medieval Pottery Catalogue (Figs. 13-15)

Fig. 13. All from pit 628

1. Context 317, fabric 5, Globular Jug. Laverstock style decoration (Rackham 1953, Pl. 23, identical form and

decoration). Applied neck-ring, bridge spout, thumbled foot-ring. Alternate sets of vertical wavy lines with short vertical 'ladder' grooves, terminating on a single set of regular, horizontal grooves around the bottom. Grooved strap handle with thumb-stop to produce an almost rope-like effect. Even buff colour throughout core and surfaces. Streaky mottled dark green glaze. Late 13th century.

2. Context 319, fabric 5, Cooking Pot. Thickened internal bevelled rim. Grey core, black surfaces. Early 13th century.
3. Context 317, fabric 1, Cooking Pot. Very regular, fingertipped rim with internal bevel. Even smokey-grey colour throughout. Late 13th century.
4. Context 317, fabric 22, Storage Jar. Straight sided. Thickened external flange rim. Smoothed surfaces, slightly convex base. Dark grey core, dull brown surfaces with purplish tinge. 13th century.
5. Context 317, fabric 5, Squat Cooking Pot. Small vessel with a rolled rim and convex base. Black exterior, light grey/brown core. Late 13th century.
6. Context 319, fabric 5, Globular Jug. Thin applied rope neck-ring, continuous vertical grooves, with oblique short grooves. Very similar glaze and form to 13:1, except this has wider neck splay. Also 'Laverstock' decoration. Light buff interior, grey/buff core. Late 13th century.
7. Context 318, fabric 6, Globular Jar. Quite straight sided, convex base. Thumb strap-handle base 5 cm wide. Narrow irregular horizontal bands of triangular rouletting. Dark grey core, light grey/brown surfaces. Possibly double handled. Late 12th/early 13th century. Stamford ware copy? (Rackham 1953, Pl. 6, almost identical handle-base on two-handled, spouted pitcher from Oxford).
8. Context 317, fabric 5, Pipkin/Saucepan. Squared rim, almost flat-based. Green glaze with yellow mottles on interior, handle base and spout. Rim decorated with alternating horizontal and vertical grooves. Fingertip applied strips of clay on handle. Spinal strip joins handle and rim. Equivalent strip under handle. Two side strips, one either side of handle, continuing on to body and curving upwards. Buff/orange exterior smoke-blackened. Dark grey core. Late 13th century.
9. Context 319, fabric 5, Baggy Jug. Rolled rim, simple small pinched spout. Three horizontal grooves around neck. Broad strap handle with symmetrical oblique grooves. Light brown core, even black surfaces. Early 13th century. (Similar to Fig. 14:6.)
10. Context 319, fabric 5, Curfew Handle. Heavy strap handle, pierced at base. Fingertipped decoration. Grey core, even black surfaces. Early 13th century.
11. Context 317, fabric 15, Globular Jug. Simple external flange rim, 10 cm diameter. Rod handle with symmetrical deep oblique grooves. Grey/brown core, red/brown interior, grey/brown exterior. Unglazed. 13th century. (Very similar to Fig. 14:3.)
12. Context 317, fabric 5, Jug Handle. Strap handle, deeply cut overlapping oblique grooves. Light green glaze over most of exterior, splashes underneath. Grey core, orange brown surfaces. 13th century.

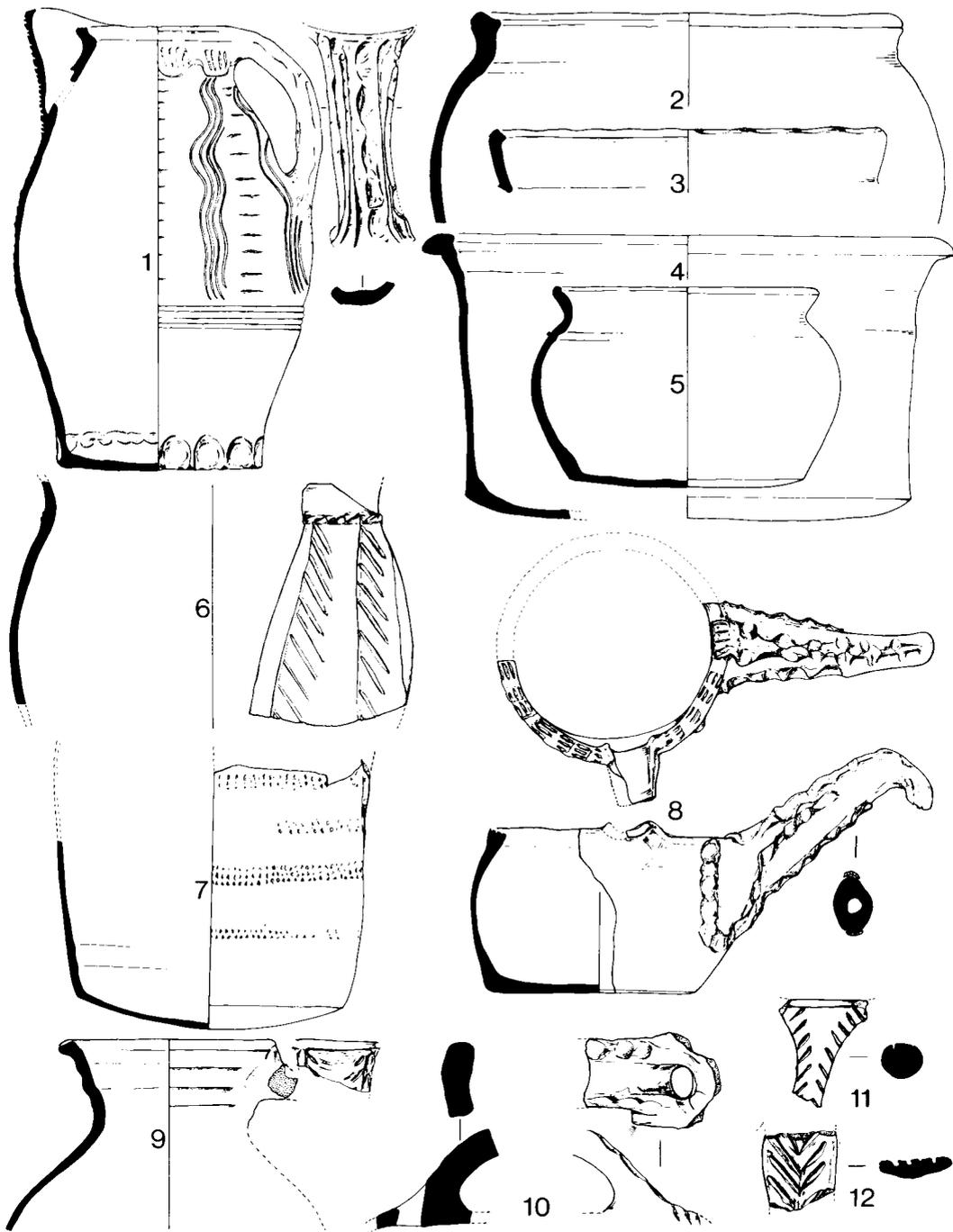


Fig. 13. Medieval pottery: all pit 628. (Scale 1:4.)

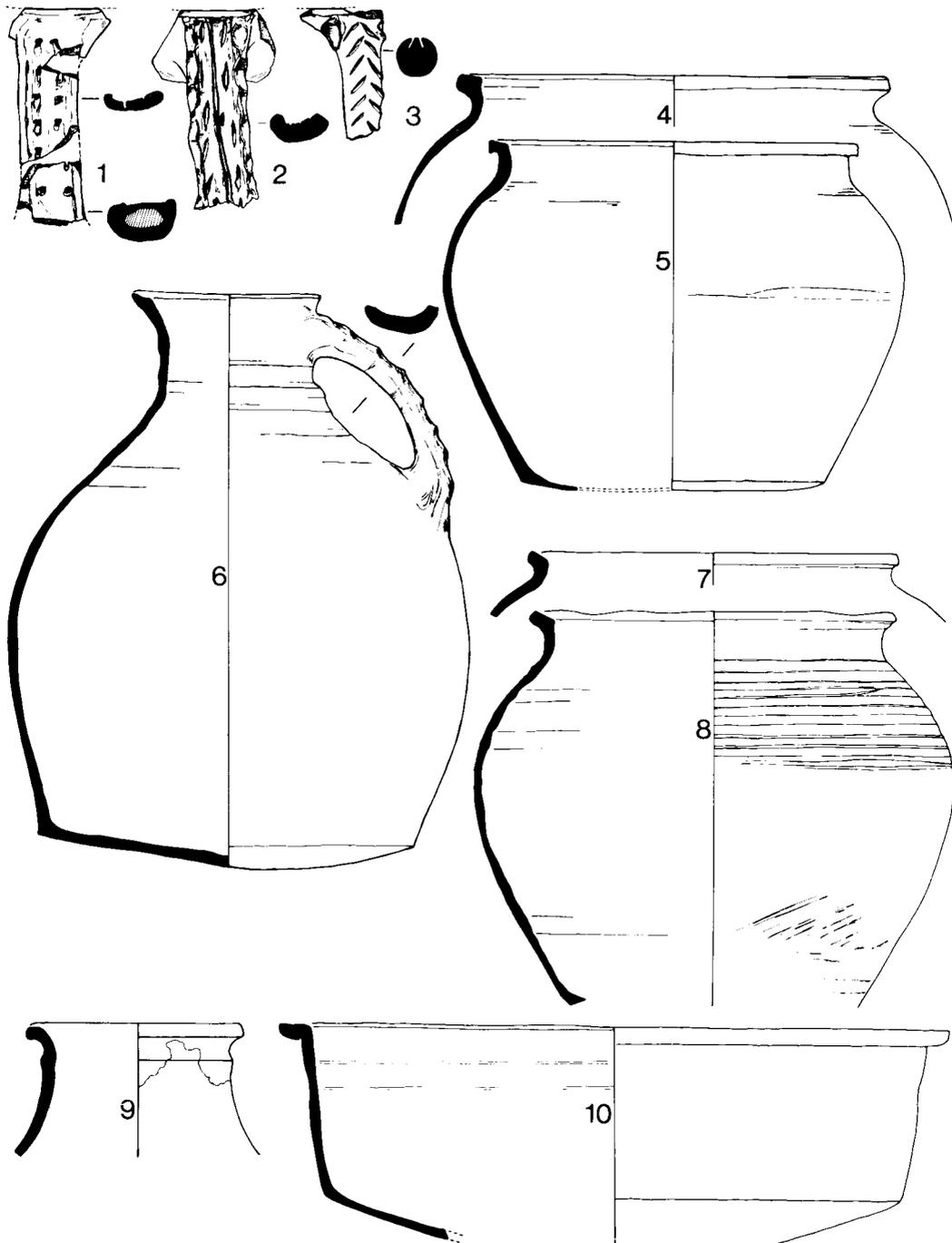


Fig. 14. Medieval pottery: 1-6, pit 337; 7-9, pit 484; 10, pit 622. (Scale 1:4.)

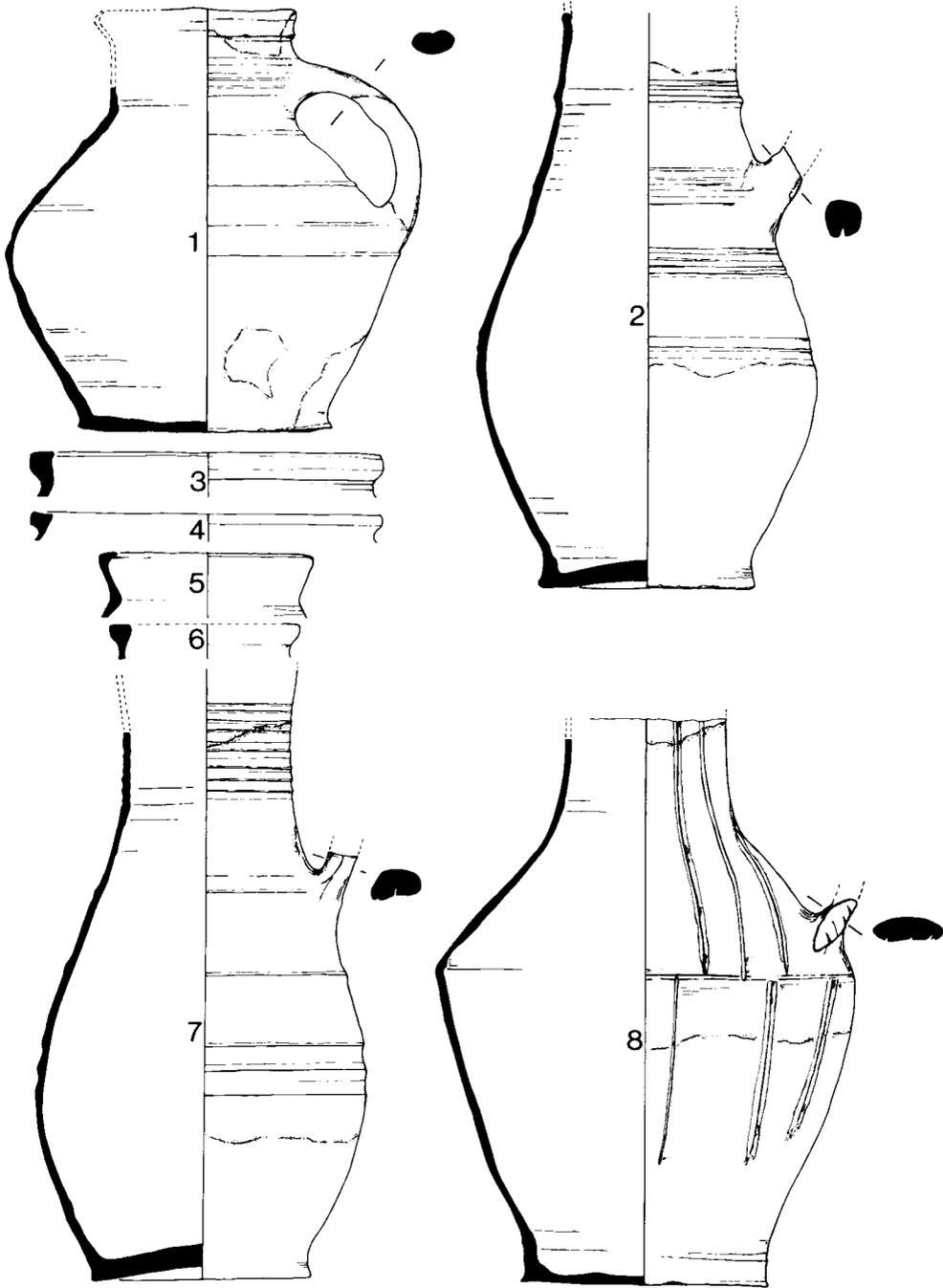


Fig. 15. Medieval pottery: 1-2, pit 436; 3-8, pit 259. (Scale 1:4.)

Fig. 14. 1-6, pit 337; 7-9, pit 484; 10, pit 622

1. Context 302, fabric 18, Baggy Jug Handle. External flange rim, 12 cm diameter. Strap handle with double parallel row of rectangular vertical stabs. Unglazed. Dark grey core, smooth, even light brown surfaces. Late 13th century.
2. Context 318, fabric 18, Baggy Jug. Simple flange rim, 11 cm diameter. Strap handle with double offset row of short vertical rectangular grooves, separated by continuous vertical groove. Fingertipped on edges. Unglazed. Grey core, grey/black surfaces. Not wheel-thrown. Early 13th century.
3. Context 302, fabric 17, Globular Jug. External flange rim, 10 cm diameter. Rod handle with symmetrical double row of oblique rectangular grooves. Double finger-holes at joint with rim. Unglazed. Grey/brown core, dark grey surfaces. 13th century. (Very similar to Fig. 13:11.)
4. Context 302/314, fabric 5, Squat Cooking Pot. Rolled flange rim. Smoothed surfaces. Grey/brown core, black surfaces. 13th century.
5. Context 314, fabric 5, Squat Cooking Pot. Slightly splayed, overhanging external flange. Smokey-brown core, black surfaces, except brown bottom half interior. Early 13th century.
6. Context 302/314/319, fabric 5, Baggy Jug. Curved, internal bevel rim. Horizontal neck grooves. Broad strap handle, fingertipped decoration. Pinched spout. Convex base. Green glazed apart from bottom quarter. Grey core, buff/brown interior. 13th century. (Similar to Fig. 13:9.)
7. Context 431, fabric 1, Cooking Pot. Rolled rim. Light brown core, black surfaces. Early 14th century.
8. Context 431, fabric 5, Squat Cooking Pot. Rolled rim. Horizontal grooves on neck and shoulder. Buff/orange core and surfaces. Blackened around bottom. Early 14th century.
9. Context 454, fabric 5, Spouted Jug. Rolled rim with neck carination. Pinched spout. Decayed external dark green glaze. Brown core, buff/orange surfaces. Early 14th century.
10. Context 487/488, fabric 5, Bowl. Elongated, slightly undercut angular flange rim. Convex base. Grey core, black surfaces. 13th century.

Fig. 15. 1-2, pit 436; 3-8, pit 259

1. Context 381, fabric 4, Biconical Jug. Upright rim with external groove. Internal thickening. Horizontal grooves on neck, shoulder and belly. Narrow strap handle with vertical stabbing. Flat base. Streaky copper-green glaze, clear yellow glaze in patches on exterior. Mottled green glaze over most of interior. Buff core. Fine fabric, well-made vessel. Late 13th century/early 14th century.
2. Context 381, fabric 4, Long-necked Jug. Four bands of horizontal grooves. Rod handle with vertical stabbing. Mottled green glaze, absent on part of neck and below belly. Foot-ring and concave base. Buff-pink throughout. Late 13th century. (Very similar to 15:7.)
3. Context 220, fabric 5, Cooking Pot. Squared rim. Buff fabric throughout. Unglazed. Late 13th century.
4. Context 220, fabric 19, Cooking Pot. Very thin-

- walled. Squared, external flange rim with top groove. Red-brown core, black surfaces. Late 13th century.
5. Context 220, fabric 5, Jug. S-shaped, rolled rim. Grey core, buff interior, blackened exterior. Unglazed. Late 13th century.
6. Context 220, fabric 4, Jug. Squared rim. Buff-pink fabric throughout. Dark green glaze on exterior and on top inside of rim. Late 13th/14th century.
7. Context 220, fabric 4, Long-necked Jug. Horizontal grooves around neck. Rings and grooves around shoulder and belly. Narrow strap handle, with oblique and vertical stabbed grooves. Streaky copper-green glazed exterior, absent on lower belly. Foot-ring and concave base. Buff-pink throughout. Late 13th century. (Very similar to 15:2.)
8. Context 220, fabric 4, Biconical Jug. Large, high-shouldered vessel. Single horizontal groove at shoulder. Alternate vertical grooves and applied red strips, in places not matching on belly. Strap handle with vertical stabbed grooves. Streaky mottled green glaze to shoulder, some areas of clear-yellow glaze. Foot-ring (blackened) and flat base. Buff-pink throughout. Late 13th century.

General Discussion and Conclusions

The coin evidence from two fairly secure contexts aided the construction of a pottery chronology, although in general the secondary nature of many deposits, combined with considerable post-medieval disturbance and the lack of a detailed stratigraphic sequence, made precise dating difficult.

The pottery from pit 637, associated with the coin hoard (1258-81) of Henry III, contained fairly characteristic phase 2 pottery, including both Brill cooking pots and baggy jugs, along with a reasonable quantity of fabric 19 glazed-slip ware. This pit also contained the base of a bung-hole pitcher, not of Brill manufacture, and two fragments of continental imports. The first of these was a body sherd from a large, well-made storage jar, of unknown origin. The second was from the shoulder of an Aardenburg type jug, made in Holland in the second half of the 13th century (p. 24). A coin of Robert II of Scotland, dating from 1371-90, was found in pit 622, associated with late 14th to early 15th century pottery, including Brill types. This dating was supported by the presence of one neck sherd from a Merida type costrel/oil jar, produced in Spain or Portugal, and by the presence of so-called early Tudor green wares.

These imports and the proportional increase with time in the quantities of good quality glazed wares, indicate that the owner of the plot was wealthy. This was particularly highlighted in pit 436 which contained an unusually high proportion of quality tableware. It is possible, however, that the increased proportion of glazed ware can partly be explained by its greater availability in the 14th century. It was almost completely lacking from phase 1 contexts. Spatial analysis revealed little, and all the pits probably lay within one plot in the backplot of a house (p. 53). Fabric 19, the third most numerous on the site, is of particular importance as it appears to be from another local kiln which had possibly been set up in direct competition with the Brill/Boarstall industry. The cooking pot and characteristic glazed-slip wares are of similar forms. This fabric is not found around Oxford or London, and may have been produced close to, or to the east of, Aylesbury. Brill had possibly won in popularity by the end of phase 3.

Kiln sources for most of the non-Brill material are unknown and unfortunately the petrological report (fiche p. 36-38: C14-D2) did not resolve this. Comment can be made on the negative aspect, as no fabrics were found from known Buckinghamshire kilns, i.e., Olney, Denham and Bolter End. A source for the Group I fabrics has been suggested close to Aylesbury by D. Williams (fiche p. 38: D2). Unfortunately the Brill kiln sherd provided for comparative purposes did not relate to Brill/Boarstall fabric thin sections from George Street. There is no real doubt that the Brill/Boarstall fabrics have been correctly provenanced, particularly on decorative grounds, and this further highlights the variability within this industry related to the number of individual potters and locations in the Brill/Boarstall area.

The Other Medieval Finds (Fig. 16:1-16)

1. Architectural fragment, limestone. Broken on two sides. 206 × 122 mm, 46 mm thick. Rectangular, with front and two sides smoothly finished with rounded bevel along the edge. The back is roughly

dressed. Traces of white plaster remain in the bevel.

14th century context, medieval pit 633 (fill 616).

2. Quernstone (broken fragment), dark grey lava, worn smooth on one surface. 94 mm wide, too fragmentary to estimate original diameter.

14th century context, medieval pit 633 (fill 616).

3. Stone spindle whorl, calcareous mudstone, probably a concretion of Kimmeridge Clay (identified by F. B. Atkins). 31 mm diameter, complete, perforation 10 mm diam. Late 13th century context, medieval pit 637 (fill 458).

4. Hone, broken, worn on four sides. Mica schist from Norway, Ellis Group IA (Ellis 1969, identified by F. B. Atkins). 49 mm long.

Late 13th/early 14th century context, medieval pit 628 (fill 281).

5. Iron horseshoe, broken, 120 mm long. Four square nail holes (cf. Goodhall 1982, 61, Fig. 60:2).

Late 13th/early 14th century context, medieval pit 370 (fill 116).

6. Iron key, complete, 65 mm long, London Museum Type II/III (*LMMC* 1940, 136.7, Fig. 42).

Early 13th century context, medieval pit 337 (fill 314).

7. Iron nail, 96 mm long, complete, head 37 mm diameter.

14th century context, medieval pit 397 (fill 396).

8. Iron nail, 83 mm long, complete, head 14 mm diameter.

Late 13th century context, medieval pit 637 (fill 480).

9. Iron plate, 62 mm long, triangular with three rivet holes (broken), (?) fitting for wooden container.

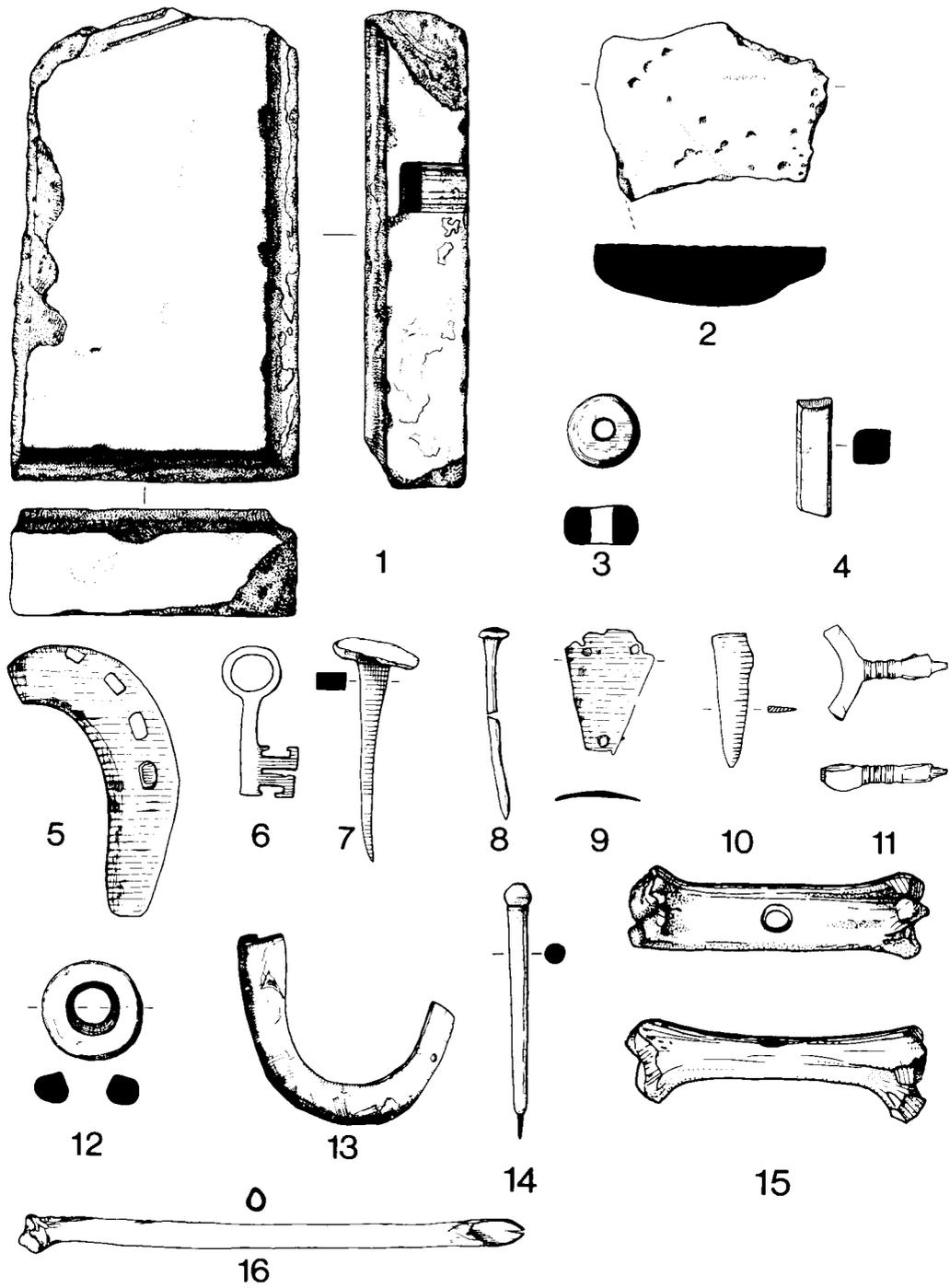


Fig. 16. Medieval finds: 1-4, stone; 5-11, iron; 12-13, bronze; 14-16, bone.
 (Scales: 1-11, 1:3; 12-16, 2:3.)

14th century context, medieval pit 622 (fill 489).

10. Iron blade, 58 mm long (broken).
14th century context, medieval pit 622 (fill 488).
11. Iron prick-spur, arms broken, 50 mm long, no traces of tinning.
Probably 10th/11th century (cf. Jope 1956a, 39, Fig. 13:4): identified by B. Ellis. Residual find, post-medieval garden soil 278.
12. Bronze annular object, crudely finished with worn perforation. 20 mm diameter, perforation 8 mm diameter, 11.3 g, (?) a small weight.
Late 13th century context, medieval pit 637 (fill 458).
13. Bronze scabbard chape (broken on one side). 40 mm long, with two small attachment holes. Simple U-shaped medieval type (cf. *LMMC* 1940, 280, Fig. 86:1).
16th century context, residual find, post-medieval pit 639 (fill 462).

Bone objects

by S. C. Greep and G. G. Jones

14. Turned bone pin with iron point inserted in tip, 55 mm long, complete. This belongs to a class of objects known as 'parchment prickers' used to perforate the edges of manuscripts, serving as a guide for the horizontal layout of the page (cf. Brown forthcoming).
Late 13th/early 14th century context, medieval pit 436 (fill 381).
15. Toggle or bobbin, 62 mm long, complete. Pig metacarpal with single central perforation 5 mm diameter. Although known from earlier periods elsewhere (Lund 1981, Pl. 6:c, where they are interpreted as buzz-discs, a simple musical instrument) they are typical of late Saxon and medieval contexts in Britain (e.g. Robinson 1973, Fig. 26:28), and usually interpreted as clothes-fastenings.
Late 13th century context, medieval pit

637 (fill 482).

16. Writing implement, 109 mm long, complete. Goose radius with obliquely cut and pointed end, a type of object only tentatively identified as pens due to their lack of split ends, but which are certainly associated with writing (MacGregor forthcoming).
Late 13th/early 14th century context, medieval pit 259 (fill 220).

The Medieval Coins

The Single Penny

Identified by N. J. Mayhew, Ashmolean Museum, Oxford.

Coin No. 11: Robert II penny, Scotland, 1371-1390. Perth mint. 14th century context, medieval pit 622 (fill 456).

The Coin Hoard

Identified by M. Archibald, British Museum.

Coins 13-18: a small hoard of six cut silver pennies, two half pennies and four farthings. All long-cross issue of Henry III, probably deposited 1258-1281 (fiche p. 48-49: D12-13). 13th century context, medieval pit 637 (fill 272).

The Textiles

by E. Crowfoot

Two fragments of tabby weave linen cloth, original length probably 100 mm. This is cloth suitable for a woman's head- or neck-cloth, or a fine shirt, here folded and twisted over to use perhaps as a stopper in a bottle (for details see fiche p. 51: E1).

Early 13th century context, medieval pit 628 (fill 319).

The Medieval Animal Bones

by G. G. Jones

The majority of animal bones studied were medieval, of 12th-14th century date; the medieval and Iron Age bone (see also p. 17) is summarised on Table 6. In addition, *Anatomical Analysis* (Table 15) and *Measurements of the bones* are included on microfiche (fiche p. 75-79: F13-G3).

	Iron Age			Medieval Total			Phase 1 12th- e 13th C		Phase 2 late 13th- e 14th C		Phase 3 mid 14th C		
	BN	%	MN	BN	%	MN	BN	MN	BN	MN	BN	MN	
Cattle	56	38	4	509	33	44	21	4	292	20	196	20	
Sheep	55	37	6	425	28	38	28 + 1sk	6	248	18	148	14	
Pig	22	15	3	194	13	29	21	2	83 + 2sk	13	87 + 1sk	14	
Horse	1		1	29	2	7			11	3	17 + 1sk	4	
Dog				118	8	11	1 + 1sk	2	2	1	111 + 1sk	8	
Cat				24	2	14			10	3	7 + 7sk	11	
Fallow deer				2		2					2	2	
Rabbit				2		2			1	1	1	1	
Water vole				1		1					1	1	
Rat				1		1					1	1	
<hr/>													
Fowl	11	7.5	4	168	11	34	100 + 2sk	11	46 + 1sk	14	18 + 1sk	9	
Goose	1		1	39	3	15	1	1	19	7	18 + 1sk	7	
Duck				2		2			2	2			
Red kite				7		1					7	1	
Partridge				1		1			1	1			
<hr/>													
Total mammal and bird bone:													
	147			1520			177		709		624		

BN - number of bones MN - minimum number of individuals sk - skeleton

Table 6. The animal species present.

For post-medieval animal bone see p. 49.

The total number of bones enumerates all fragments except partial skeletons, which were treated each as a single bone. The minimum number of individuals (MN) generally treats each pit as a separate entity, which assumes that bones from one carcass were not spread among more than one pit; in two pits the lower layers were from phase 1 and the upper were from phase 2, and were taken therefore as four features for the MN. Pit 622 and well 640 were related; they contained matching dog bones and were treated as one.

There was residual Iron Age pottery in most of the pits, 10% or less by sherd count. There may thus be some small amount of residual Iron Age bone. The bone was collected by hand, with considerable care to judge from the often very small pieces recovered. 46% were identified and a further 21% were ribs and vertebrae, recorded as cattle-, sheep- or small mammal-size (see Table 15, fiche p. 75: F13).

N	Total 12-14th C		13th- e 14th C		mid 14th C	
	BN	MN	BN	MN	BN	MN
Cattle	45	40	47	39	45	42
Sheep	38	34	40	35	34	29
Pig	17	26	14	25	20	29

Table 7. Percentages of the three main species.

Intra-site Variation

The contents of the different features varied to some extent (Table 8). Cattle, sheep and pig bones were present in them all, the relative numbers of the first two varying somewhat but in all cases, except for the well, being more numerous than pig.

Goose and fowl were present in 11 and 13 of the 15 features, respectively, and dog and cat in 9 and 7 of them.

Comparison was made of the bone finds in relation to the type of fill. The contents of the

	N	Percentages				Other
		Cattle	Sheep	Pig	Horse	
<i>12th-early 13th C</i>						
cess	176	12	16	12		60: dog, cat, goose, fowl (58%); frog/toad
<i>Late 13th-early 14th C</i>						
cess	112	32	35	17	1	15: goose, fowl (19%)
rubbish	455	45	34	10	2	9: dog, cat, goose, fowl, duck; fish, frog/toad
pit 436	180	43	38	11	3	6: water vole, goose, fowl, duck; fish, frog/toad
<i>Mid 14th C</i>						
cess	103	41	31	15	2	13: dog, cat, goose, fowl (3.5%); fish
rubbish	213	46	27	14	0.5	12: fallow, dog, cat, goose, fowl (6%)
well 640	142	8	7	14		71: dog (56%, MN 3), cat (5%, MN 7), goose, fowl, red kite
pit 622	167	26	29	14	9	22: dog (16%), cat, rat, rabbit, goose, fowl

Table 8. Analysis of bone debris by date and type of feature.

well were strikingly different; the three main species formed only 29% and half of these were of pig. The well had been used to dispose of at least three dogs and seven cats, two geese, a chicken and the red kite. (Further remains in the well were not excavated for safety reasons connected with diesel leakage into the feature.)

Variation in the proportions of species in the other features was not great. Some of the pits contained general domestic rubbish while others were cess pits. The range of species found was greater in the rubbish pits, but this may simply be because the sample sizes were larger.

The pottery from pit 436 included good quality table ware. From the point of view of the bones, no cats or dogs had been deposited and the diet had included fowl, goose and duck, conger eel and cod, oyster, mussel and winkle. Of the main species a piglet and a few calf bones might suggest a good table. The sheep, though, were not dissimilar from the general pattern and included teeth, skull fragments and metapodials, and remains of both lamb and mutton (more varied sheep-meat fare than is generally available today). The cattle bones were an untypical group. There were a few calf bones, but the rest of the identified bones comprised a few phalanges and numerous fragments from at least four skulls,

including five horncores, which suggests that cattle had been slaughtered nearby in the case of this one pit. There were among the unidentified cattle-size fragments some vertebral, rib and long bone fragments (7, 17 and 80 respectively) which are doubtless food waste. What logical connection if any exists between the pottery found and the cattle bone group remains obscure. Possibly richer households were handling the live beast, whether from the market or more probably from their own land or rented pasture, whereas in other households meat was bought in smaller amounts and the primary butchery waste (skull, feet) was deposited elsewhere.

Description of Material by Species

Cattle

The majority of cattle reached adulthood before slaughter, though some animals were killed as calves or when young (Table 9). This age distribution is typical, reflecting the use of cattle for plough and cart.

The deposits contained cattle bones from all parts of the skeleton, as shown in Table 15. (fiche p. 75: F13). There were differences in the types of bones found from different deposits, for example between pits 436 and 637. The former pit contained mostly remains of skull and feet (phalanges) while the latter, conversely, contained mostly bones of the body plus metapodials.

Jaws		Long bones	U	Y	F	
1	birth - M ₁ up, unworn	2(2)	d humerus, p radius, phal 1 & 2	8	0	47
2	M ₁ in wear - M ₂ unworn	4(3)	(which fuse at 1-1½ y, modern figures)			
3	M ₂ in wear - M ₃ unworn (2-3 y, modern)	1(1)	d metacarpal, d tibia	8	1	8
4	M ₃ in partial wear	1(0)	(2-2½ y)			
5	M ₃ wear on all cusps	7(3)	p femur, calcaneum, p tibia,			
6	M ₃ in heavy wear	5(1)	d radius (3-4 y)	16	1	5

In addition, there were 5 calf bones (min. number 3).

M₁ - lower first molar; d - distal; p - proximal; phal - phalanx; U - unfused; Y - partly fused/fusion line clearly visible; F - fused; in wear - wear visible on the enamel of the tooth. The jaw stages are defined in Bourdillon and Coy 1980. The figures show the minimum number of individuals at each stage, using data from upper and lower jaws and loose teeth. The figure in brackets uses only lower jaws.

Using the method of Grant (1982) the mandibles were at stages 2, 4, 10, 14, 14e, 24e, 41, 45e and 48.

Table 9. Cattle age data.

In general, though, the anatomical analysis of each pit shows that householders made use of all parts of the carcass. All the pits, for example, contained cattle teeth. Although pieces from the skull were common, horn cores were found in only two deposits (five, of only six horncores in total, from 436, mentioned above). If one can argue from negative evidence, horn working perhaps took place in another part of the town.

Butchery marks were observed on 11% of the cattle bones. Most of them were made by a cleaver or heavy knife and about a fifth were finer marks probably from a knife. All cattle bones with butchery marks were separated and looked at together.

Skull. Two horn cores had small knife cuts probably from the removal of the horn sheath. Four others were unmarked, though it is unlikely that the horn itself was not utilised. All the horn cores are thought to be from cows.

In three cases the mandible had been chopped through below the condyle; one malar bone and one zygomatic process were sliced through very cleanly: the mandible seems to have been detached from the rest of the skull. Surface marks on several mandibles were probably done in removing the cheek meat.

Axial skeleton. Splitting of the carcass into sides did occur, though it was not the universal practice it is now. Nine vertebrae were chopped through roughly sagittally. 16% of ribs bore chop marks and most of these chopped sections were 8-16 cm long. (Ribs were not identified to species level, but doubtless most large ribs were bovine.)

Long bones. Some indication of how the carcass was butchered can be given but the sample was too small to see how regular, and by inference how specialised, butchery practice was. The humeri were generally chopped just above the distal articulation (9 cases); several but not all were chopped through at the distal articulation and no surviving ulnae retained their olecranon; three proximal tibiae and a distal femur were chopped through the cancellous bone near the knee joint: in these cases the carcass was separated at elbow and knee joints. With the exception of seven metapodials all the long bones were broken. Other long bones were chopped roughly in the middle, to extract the marrow.

Small knife marks on the distal end of metapodia (3) and phalanges (3) might be from skinning or from removal of the tendons (one use of which was in making crossbows: MacGregor, personal communication).

One cattle radius was worn smooth on the anterior surface. The position of the wear is rather like that on a bone skate but the striations run laterally not along the length of the bone.

There were no cases of the second premolar being absent or the third molar being two-cusped, either in the cattle or in the sheep.

Sheep and Goat

Goats seem to have been kept in small numbers. Those elements of the skeleton which are most useful in differentiating sheep and goats, namely, horn cores, scapulae, distal humeri and radii, metapodials and phalanges, were separated and looked at together. Of only six horncores and pieces of five polled skulls all were sheep. Of the other bones all were considered to be from sheep except one metacarpal (breadth proximal end 27.7 mm, shaft width 17.9 mm) and a first phalanx (immature), both of the late 13th/early 14th century.

Some indication of the type of sheep can be given from the size and form of the bones. Such bones as were complete enough to measure showed little size difference (see Measurements) from those from Saxon Walton or those more than a millennium earlier at Bierton. Shoulder height estimates of 54 and 59 cm were obtained from a radius and metatarsal (von den Driesch and Boessneck 1974). Hornlessness occurs only occasionally on pre-medieval sites. At Lincoln it became more frequent from the 12th century onwards and

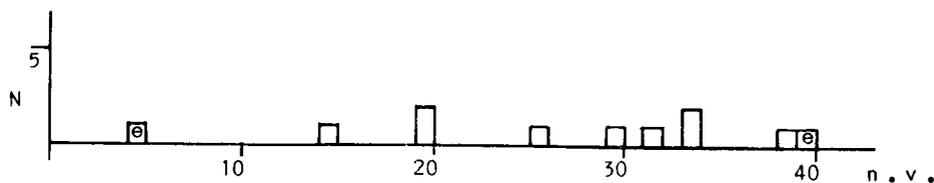
	U	Y	F
d humerus, p radius	4	1	15
d tibia, d metacarpal	14	2	13
d radius, p femur, calcaneum, p humerus	11	1	11

Table 10. Sheep age data from long bones.

was common by the 15th (O'Connor 1982). At George Street one polled skull was from the 11th or 12th century and the rest were from the mid 14th century. In this phase there were four pieces from polled skulls and four from horned, one being very small (basal diameter 14 × 14 mm). No polled sheep were found at Saxon or medieval Walton, but one was found from the late pre-Roman Iron Age at Bierton.

The shape of the shoulder blade gives an indication of change in sheep, the neck of the scapula in modern sheep being shorter and thicker. The six specimens (see Measurements) from George Street are shorter necked than at Bierton and are consistent with the trend, observed by Noddle at Saxon to post-medieval North Elmham, of a continuing change in scapula shape (Noddle 1980 & 1976, Fig. 51).

Information on the age at death is given in Fig. 17 and Table 10. The sample size is small, but the results are very similar to those from Walton, lambs and immature sheep forming about half of the total, the rest being adults: ewes, wethers and rams primarily kept for wool.



n.v. - numerical value e - estimated (method of Grant 1982)

A	B	C	D	E	F	G	H	I
1	0	0	4	2	2	2	0	0

(method of Payne 1973)

Fig. 17. Sheep mandible wear stages.

All parts of the skeleton were present (Table 15). The lower percentage of bones of the foot of sheep and also pig, in comparison with cattle, may reflect a survival and recovery bias because of the small size of these bones.

As with cattle, chopmarks on vertebrae show that the carcass was split longitudinally. Vertebrae so chopped were found only in the late 13th century and later. However, the phase 1 bones were a small group. Work on bone from Lincoln suggests that the practice of hanging the carcass and splitting it into sides became gradually more common after the mid 11th century (O'Connor 1982, 24). Two skulls were split, also roughly sagittally, indicating use of the brain. General patterns of butchery were not observed on other bones. 8% bore chopmarks or knifemarks. Only eight bones were burnt and seven were gnawed, probably by dogs.

Skeleton. The partial skeleton of a lamb was found in the bottom of cess pit 628. It is dated to the 11th/12th century. The skull was polished with no scur and from its shape it was a sheep not a goat. The dental development suggests it was about a year old at death (second molar just in wear; Grant 1982: g, b, C, stage 20). Of the long bones only the distal humerus and proximal radius were fused. Most of the vertebrae (including two coccygeal vertebrae) and ribs were present. On none of the bones were butchery marks observed, nor was there evidence of disease. However, most diseases leave no sign on the skeleton, and this may well have been the reason for its disposal.

Pig

Pig bones were fairly numerous, forming 17% of the bones of the three main species by fragment count and 26% by the minimum number method (Fig. 19, p. 42; Table 16, fiche p. 76:F14). The proportion of pig was greater in the mid 14th century phase than in the late 13th/early 14th. Pig bones formed about a fifth of the animal bones at local sites of Iron Age (Bier-ton), Saxon (Walton) and medieval date (Walton and this site).

The stage of development of jaws and long

	N	Y	F
d humerus, p radius	12	0	3
d tibia, metapodial III/IV, calcaneum	16	0	0
Ulna (olecranon), d femur, p tibia	16	1	0

Table 11. Pig age data from long bones.

bones indicates the presence of several piglets, with one- and two-year-olds and adults also present (Table 11, Fig. 18). Of sixteen mandibles five were of piglets (less than six months, M₁ unerupted) and of a total minimum number of 29, nine were piglets. An unusually high proportion of pigs seem to have been killed before they reached six months in comparison with other sites of the period (O'Connor 1982, 33) and also in comparison with Iron Age Bier-ton, where no mandibles at all with the first molar unerupted were found. At Walton 29% were under a year old. O'Connor has suggested that at Lincoln the small proportion of pigs killed before six months (2.5%) must mean that pigs were bred outside the city itself. At George Street perhaps pigs were being kept and bred nearby, as may be the case with the poultry. It is also possible, of course, that the piglet bones are the sucking pigs from a wealthier household. Whichever explanation is nearer the truth, the difficulty in drawing conclusions about general husbandry from the debris from only one area in the town can be seen.

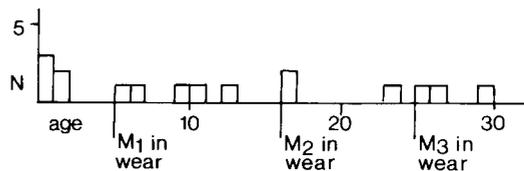


Fig. 18. Pig mandible wear stages.

Skeleton. The skeleton of a young pig, aged at death about 9 months, was excavated from pit 484 (layer 431), of early 14th century date. The meat does not seem to have been used, for no marks and few breaks were observed and the thin curved spines of the scapulae were undamaged. The pelvis and lower spine were missing but the rest of the skeleton was undis-

turbed, and recovery of very small epiphyses and sesamoids was good. There were no skinning marks or signs of disease. Burial of an apparently unused carcass does strengthen the suggestion of pig keeping in the immediate vicinity. The age at death is based on the teeth, the lower first molars showing wear on the enamel only (Grant numerical value 7). All the epiphyses including the tuber scapulae and the proximal radius were unfused.

Half a pig skull, of late 13th/early 14th century date, does not have the 'dished' profile of modern pigs, which have been bred with Chinese pigs. Although male, the length of the premolar tooth row (44 mm) is less than that of a wild sow in the writer's collection. The third molar is unerupted, so the shape of the lacrimal bone is incomplete. It is however interesting that, although the lacrimal bone certainly would have lengthened as the third molar erupted, the relative length of this bone was still greater than a more mature skull from 17th century Buckingham (Jones forthcoming c), and is less than the wild sow (see Measurements). That is, it is intermediate in form between the wild sow and the 17th century specimens.

The skull has been split sagittally.

10% of the bones of pig were chopped or cut with a knife. Less than 2% were burnt.

Evidence of pathology was confined to one bone. A fibula had broken and healed with the bone wrongly aligned. The jaws generally did not show overcrowding of the teeth; in only one case, the skull described above, was there some overcrowding, with the upper second molar slightly rotated.

Horse

Bones of horses were occasional finds, present in six of the fifteen features. Horses could of course have been disposed of elsewhere in the town, which would make this sample untypical, but horse bones are usually few at Walton and at Buckingham (only two bones, from the two excavations in Buckingham). At George Street the only chopmarks

observed were on a metacarpal and a first phalanx from a partial skeleton, both interpreted as skinning marks. Evidently the hide on the leg was made use of.

The partial skeleton was found in pit 622 (mid 14th century). Most of the axial skeleton was present but it had been buried in two sections, the upper part of the rib cage lying above the rest. Possibly after the hide was used it was more economical of time to dismember the carcass to permit burial in a smaller pit. Two of the hock bones were fully fused (the centrotarsal and third tarsal); there was no proliferation of extra bone around the other bones of this joint, so movement of the leg was probably not affected. The horse is estimated to have stood to about 13½ hands, which is typical of the period (based on three complete long bones, see Measurements).

One other complete bone gives a height estimate of 13 hands (late 13th/early 14th century). No immature horse bones were found.

Dog

Dog bones were present in all three phases and were particularly common in the mid 14th century features. In this phase dog bones formed 18% of the bone sample (9% by the minimum number method). In addition mineralised coprolites thought to be of dog were found in four of the phase 2 pits.

A small dog, buried in a late 12th/early 13th century pit had lived for some time with a fractured femur. The dog appears eventually to have been put down.

The right femur is broken just below the proximal end and although there is extra growth of bone, the two ends have not reunited. The femoral head has broken and has been displaced downwards by c. 20 mm (see Pl. VIIIb). An area 8 × 8 mm on the displaced head shows polish, as does the opposing part of the pelvis, which is much thickened. The right leg appears therefore to have been still of some use. The strain put on the good left leg has resulted in the growth of a bony extension

of the left lateral process of the last lumbar vertebra, the pelvis resting on this process as well as on the sacrum as is normal.

The right tibia is slightly shorter and more slender than the left one. The difference is least apparent in the total length (the right is 1% shorter: 130.6 against 131.5 mm), the ends of the bones (distal breadth of right 3% less than the left) and in the width of the central part of the shaft (5% difference), and most pronounced at the extremities of the shaft (19%). It is likely therefore that the injury occurred shortly before growth of the bone was complete, perhaps at about a year old, the later stages of bone development being more affected than the earlier. The distal end of the right femur is also more slender than the left. The right fibula is fused to the tibia but the left one is not.

There is a hole 18 × 10 mm in the top of the cranium caused by a blow from outside, two pieces of skull being pushed in. It is not a modern break and it may indicate that the dog was put down. A crack extends to the occiput. The dog was more than about 18 months old, all long bones and vertebrae being mature. But it may not have been much older than this as on none of the teeth was the enamel worn through to expose the dentine. The dog has an estimated shoulder height of 39 cm (Harcourt 1974, see Measurements).

Of the rest of the dog bones, almost all were from phase 3. Remains of at least four dogs were found in the well and related pit 622 and two more in pit 397, interpreted as a cess pit. The occurrence of dogs, cats and fowl in this phase is discussed later.

The dog buried in pit 397 (phase 3) was fully adult. All long bones and vertebrae were fused, as were the iliac crests of the pelvis, though the symphysis pelvis was unfused. Some dentine was exposed on the teeth, and the canines in particular showed marked wear. All the teeth showed an irregularity of development, probably due to nutritional stress at an early age. The enamel near the tip of each tooth was thinner than that on the rest of the

crown, a clear line or 'step' of thicker enamel being visible.

The size of the dogs was variable and included some large individuals (see Measurements). All were within the range of dogs from the Anglo-Saxon period studied by Harcourt (1974).

The bones from the dogs in the well (640), although not recovered as articulated skeletons, probably represent three individuals. One of these was a young dog, about a year old, and this specimen was the only immature dog found on the site. No knife or chop marks were observed.

Cats

The site produced the remains of a number of cats. Some occurred as partial skeletons, one was pathological and two appear to have been skinned.

All were from the two later phases. Cats formed 8% of the bone sample in these phases, using the minimum number method. The majority, at least seven cats, were from the well (640), which also contained at least three dogs.

On one of the cat skulls there were knife marks on both sides of the cranium behind the orbits, and on another the frontal bone had been chopped across, cutting right through the bone, again just behind the orbits. The most reasonable interpretation is to see these as skinning marks. Both were skulls with mature dentition but unfused sutures, i.e. adult but not old individuals.

The evidence from the other cat bones is that most were mature but not aged. Of at least three cats in phase 2, two were not yet adult, but of eleven phase 3 cats only one was young (proximal humerus unfused: less than 1½-2 years old [Smith 1969]).

One distal tibia had two light ?knife marks, perhaps also from skinning; one caudal vertebra had a small transverse knife mark, ventrally (both bones from the well). Marks

resembling knife marks on four femora, on the proximal anterior part of the shaft, were after close scrutiny considered to be natural channels.

Worth mentioning at this point is a tibia of 16th century date with a mark done by a sharp knife below and behind the proximal epiphysis, the direction of the cut being upward.

Two bones, a right and left femur probably from one animal, had broken and were healed out of alignment (Pl. VIIIa, from the well). The right femur was broken at both ends. The femoral head is missing and there is a concave facet of new bone, which shows polish and pitting, near the trochanter minor: the broken head appears to have articulated with this facet, and may have become united with the pelvis. The lower end of the bone is also broken; the distal end is displaced medially and a little rotated. The other bone had broken midshaft and had healed with the distal end displaced anteriorly; a bony process formed behind this and met the tibia, just below and behind the proximal articulation, resulting in alteration of the bone at this point, the tibia otherwise being normal. The fractures appear fully healed: the cat must have been very crippled but had survived some good while after the injuries.

No other pathology was noted save one lumbar vertebra, from the same layer, with exostosis on the centrum.

There was some variation in the size of the cats (see Measurements), including individuals larger than those found at medieval Exeter (Maltby 1979) or Middleton Stoney (Levitan forthcoming). None were thought to be from wild cat. The wild cat is larger than the domestic, although there is an overlap in size (Zeuner 1963). Measurements were all far smaller than a female wild cat in the British Museum (Natural History). Differences in mandible shape were similar to those observed at Lincoln (O'Connor 1982, Fig. 47) and may indicate males (two) and females (three).

Records of trade in native furs as opposed

to imported furs are rare. Cat skins are mentioned in export licences granted to a group of London fellmongers, merchants in sheep and lambfells, to export coney, cat, hare and fox skins to Flanders (late 14th century: Veale 1966). The pedlar written about by Langland was ready to kill cats for the sake of their skins, and one suspects that these would have been the domestic not the wild cat. Certainly most cat bones from archaeological sites are considered to be domestic.

Grover's book on fur cutting, printed in 1936, notes that at the time domestic cat skins were used occasionally, for trimmings and muffs (Grover 1936).

At a number of sites high numbers of immature cats have been found, and interpreted as probably indicating use of skins (Noddle 1975, sites in southern Britain, and 1976, 285; Hodgson forthcoming, from Perth, Scotland; Jones forthcoming a, late Saxon Thetford). This may well be so, though the cat is prolific and control either by human or natural agencies would result in a fairly high proportion of young mortalities. There were at George Street rather few young cats, which runs counter to the expected finding.

Other Mammals

Remains of other mammals were very few (see Table 6). They included two fallow deer bones. One, a centrotarsal (greatest breadth 31.5 mm) had three knife marks probably from skinning or removing the tendons; the other bone was a humerus, breadth distal end 36.5 mm. There was a medieval deer park at Aylesbury (Cantor and Hatherley 1977).

Rabbit was present in the later two phases. Though rabbit bones are a problem because of the possibility of their being intrusive, their presence is to be expected. A rabbit warren was part of the Aylesbury manor in the 15th century, and several references to the cost of its fencing were made in John Balky's notebook (Elvey, E. M. 1965).

Water vole was present in the middle phase and rat in the latest phase. The rat bone can be

dated to the late 14th century with about 80% confidence. There were two residual Iron Age sherds and 10% by sherd count of intrusive post-medieval pottery in the feature (622).

Bird

Poultry. Fowl and geese were numerous: of the total minimum number of animals they accounted for a quarter (49, of 202). The minimum number of individuals is probably the most useful measure of frequency for the birds, since a bird is usually eaten and its remains disposed of as a whole. Thus often where several fowl bones are found in one deposit they are likely to be partial skeletons rather than isolated bones. However, to calculate the number of fowl and goose bones (Table 6), all bones were enumerated unless a skeleton had been recognised as such on excavation, and then it was treated as one bone. Fowl was the commoner species throughout, though the goose seems to have increased in importance during the medieval period.

One goose bone was worked and is described elsewhere (p. 31; Fig. 16:16). Of at least fifteen geese present, a third were immature.

A useful number of fowl bones were measurable. In comparison with late Saxon Hamwih (Bourdillon and Coy 1980), the mean lengths of the bones are greater and the lower ends of the ranges are higher, i.e. there were fewer small fowl. Incidentally, the mean measurements (mostly thought to be from hens) were not very different from a male red jungle fowl (*Gallus gallus*), ancestor of the domestic fowl (specimen in the British Museum, Natural History), see Measurements (fiche p. 79:G3).

The tarsometatarsi were all apparently from hens as none of them had a spur (West 1982). One specimen had a rudimentary spur and was longer by 6 mm than any of the other bones. Present research indicates that this bone is probably from a large hen and not from a capon or cockerel. At Lincoln, also, there were a few unspurred but long tarsometatarsi.

Of at least thirty-four individuals nine were immature.

Bones were not drilled to look at medullary bone deposits but in two cases where the bone was already broken, medullary bone was present (a femur and a tibiotarsus).

A small piece of eggshell, probably from fowl, was recovered from phase 1.

The two duck bones, both from phase 2, could be from domestic ducks or mallard (*Anas platyrhynchos*). They were within the size range of the mallard (greatest lengths: humerus 90.2 mm, carpometacarpus 51.2 mm).

Butchery marks were few. The duck humerus bore knife marks. One fowl tarsometatarsus was chopped through. Two goose bones had knife marks; one was a furcula chopped through the midline, which perhaps means that the goose was jointed before cooking, i.e. it went in the pot not on the spit.

The poultry bones were all apparently healthy except one fowl with periosteal growth of bone around the distal end of the tarsometatarsal.

Wild birds. Part of the skeleton of a red kite (*Milvus milvus*) was found associated with 14th century pottery. The dating is secure, with no residual pottery. The red kite was formerly a town scavenger. Its numbers decreased in the late 18th and 19th centuries and in Britain it is now confined to Central Wales (Cramp 1980, 38). There was a small deposit of medullary bone in the tibiotarsus, indicating a female and a breeding bird. Medullary bone is a mineral store which may be present during and shortly before and after egg laying (Driver 1982).

The bird's wing was affected by a pathological condition. Two areas of the proximal articulation of the humerus showed polish and pitting, and extra growth of bone was present all round the joint. The sternum also has extra bone round the right articulation. The coracoid, which links the sternum and humerus, was unfortunately missing.

A single partridge bone was from phase 2.

The species was present at Walton in the Saxo-Norman period and is not unusual in the area at the present time.

It is worth noting that no dove bones were found. They were quite numerous in medieval layers at Walton.

Frog/Toad

Frog or toad was present in phase 1 (1 bone) and phase 2 (56 bones).

Molluscs

Oyster shells were noted in three deposits of phase 2. One of these, 436, also contained mussel shells and a winkle, and potsherds of good quality tableware.

Observations and General Discussion

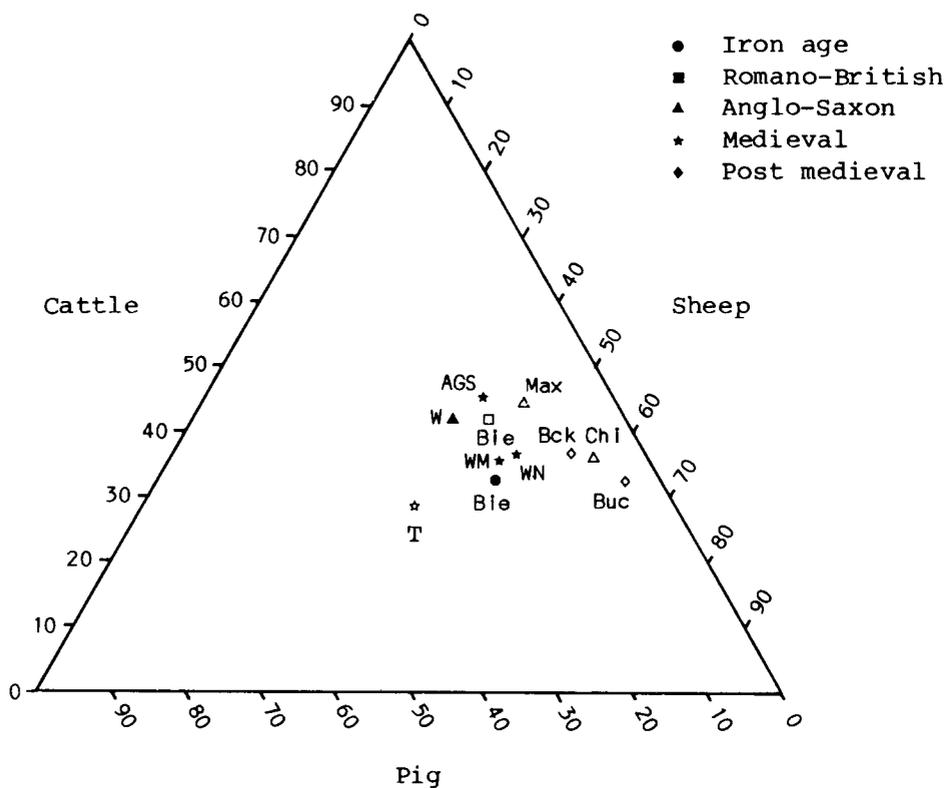
The excavation at George Street lay between the medieval market and the church. How far the animal bones can be taken to be representative of the town generally is partly conjectural. There certainly was variation in the contents of the pits but in most cases it was fairly small, so it is thought that the results give a general indication of species abundance. The proportion of the three main species for local sites is given in Fig. 19. The sites with more than 1000 identified fragments are shown by a solid symbol and these results are remarkably uniform over a long time span. Sheep in all cases formed more than 35% of the bones of the three main species. There is no large Roman site nearby for direct comparisons but one would expect that, as is the case in other areas (e.g. King 1978), cattle would have been kept in relatively greater numbers in the later Roman period than in the Iron Age or the medieval period. Pig bones were around 20%, which is rather high, especially since there does not seem to have been a great deal of woodland close to Aylesbury. Balky's notebook (15th century) mentions *hogges* being kept on Bonsel Park: the bailiff of Aylesbury had kept the manor pigs there for two years, and owed the swineherd 3s. 6d. (Elvey, E. M. 1965, 332). The Buckingham bone samples suggest a reduction in pig and increase in sheep keeping by the post-medieval period (Rackham 1975, Jones forthcoming c).

The bone sample was large enough in phase 2 (late 13th/early 14th century) and phase 3 (mid 14th/late 14th century) for comparisons to be made (Table 7, p. 32). Pig bones were proportionately more frequent in phase 3. Cattle bones were in both phases rather more numerous than sheep. Beef was in all phases by far the commonest meat eaten, given the greater carcase size. Poultry bones were remarkably frequent and although fowl were always more common than goose, the latter increased in frequency through time (see the MN figures in Table 6). The range of fish species was much the greatest in phase 2 (see p. 44).

There was some useful evidence about the size, form and age structure of the livestock. Nearly half the sheep skulls found were without horns, which is in contrast to Saxon and medieval Walton where no polled sheep were found (Noddle 1976, 280). Camden, writing in the 16th century, described the Vale sheep as 'well-fleeced' and as having 'soft and fine fleeces which are sought after' (Trow-Smith 1957, 207). The size of the sheep and cattle was typical of the period. A pig skull showed morphological traits which appear to be intermediate between wild and 17th century pigs. Bones of young animals of all three species, and especially pigs, were common. At late Saxon North Elmham (Noddle 1980) the majority of sheep and pig were adult whereas at the nearby town of Thetford (Jones forthcoming a) more young animals were present. A similar effect of taking young animals to market may be in evidence here. The proportion of adult sheep and pigs found from the excavation at Copt Hay, Tetsworth was much greater than at the present site (Pernetta 1973).

Burial of a pig carcase, and perhaps also the number of piglet bones, suggest that pigs were being kept in the vicinity. The high number of poultry bones might have a similar explanation. It may be that its Saxon use as a graveyard had inhibited building on the land.

In A.D. 1450, geese, capons and chickens were delivered in quantity to the Earl of Wiltshire and his servants, who stayed at the Bull



Solid symbol: 1000 fragments Open symbol: 100 - 1000 fragments

(see Table 16 fiche p. 76:F14)

AGS - Aylesbury, George Street
 Bck - Buckingham 1978 (Jones forthcoming c)
 Buc - Buckingham, Hunter Street (Rackham D. 1975)
 Chi - Chicheley (Jones 1980)
 Max - Maxey (Seddon *et al.* 1964)
 T - Tetsworth (Pernetta 1973)
 W - Walton, Saxon (Noddle 1976)

WM - Walton, Medieval
 WN - Walton, Saxo-Norman

Note: Values are plotted along lines parallel to the side of the triangle that originates at zero on each scale. Each site is plotted by the percentages of the three main food species in the bone assemblage.

Fig. 19. Percentages of cattle, sheep and pig bones from local sites.

Inn, the lord's hospice, for a month (Elvey, E. M. 1965, 328). Capons and cockerels appeared to be absent from the George Street sample, so if poultry was being kept locally, male birds were perhaps sold off the site. Eggs no doubt found a market. Goose seems to have increased in importance during the medieval period. This trend has also been observed at Lincoln (O'Connor 1982) and Middleton Stoney (Levitan forthcoming). At Walton there was a similar difference between the

Saxo-Norman and medieval phases, but in the Saxon bone sample goose bones were commoner than fowl (Bramwell 1976, 287-8).

Horse bones were few. The chief use of horses was for personal transport (Elvey, E. M. 1965), although they were used, usually with oxen, for ploughing on the stoney ground of the Chilterns. Some Chiltern demesnes used entirely horses (Langdon 1982). In some counties, especially Bedfordshire and Suffolk,

horses were sometimes held by the peasantry, and oxen by the demesne. A good horse well kept is more expensive than an ox, but an old horse can be bought more cheaply, because its only value when dead is its skin. Such a horse may be sufficient to plough a peasant holding, can be fed vetches rather than oats and can also do general work (*ibid.*). Generally, however, horses were not commonly used for ploughing until well into the 16th century, and by the early 19th century they had replaced the oxen. Priest, writing about Buckinghamshire in 1810, observed that very few cattle were kept for work in this area (Priest 1810).

Dogs and cats were numerous on the site; there were at least eight dogs and eleven cats in phase 2. Many occurred as partial skeletons. The size of the dogs was variable and included some large individuals. One dog, from phase 1, had lived for some time with a broken leg which had not healed properly. It appears eventually to have been put down (Pl. VIIIb, and p. 37-38). The dog had survived for six months or more on three legs, which is not exceptional, but perhaps to have done so it must have received a certain amount of care. Its small size suggests it was not a hunting dog. Fractures were also observed on two cat femora (perhaps one individual, Pl. VIIIa).

At Iron Age Bierton a single cat bone was found (Jones forthcoming b) and cats were present in small numbers at Saxon, Norman and medieval Walton (Noddle 1976, 272-4). At George Street they were numerous in phase 3, and came mostly from the one untypical well deposit (640). At Lincoln cats became more common after the 11th century.

From at least the 14th century at George Street, the skins of cats were used. Two skulls and two other bones bore skinning marks and although one can safely argue that cats were sometimes killed for fur, the significance of this in relation to the cat as mouser, pet or feral animal, is difficult to estimate. In a statute of 1363 listing the kinds of furs appropriate to each class of society, cat fur was one of the skins available to the poorer classes,

along with lamb, coney (rabbit) and fox (Veale 1966; 37 Ed. III, cc. 8-15; *Stats Realm* i, 380-1). Fur was used, for example, to trim the neck, hem, sleeve, vents or wrists of a surcoat or cloak. Fur linings were common in both winter and summer (Veale 1966, 3).

In the Domesday Survey, Aylesbury had meadow for eight ploughs (teams of eight oxen) plus 20 shillings worth of hay. Grazing was also an important resource. In the 14th century the chief cause of disputes between the townspeople and their lords was over rights of pasture. In 1342 the Countess of Ormonde complained that Elias le Draper and William de Bampton, tailor, and others (35 people in all) had depastured cattle on her crops and grass. Similar disagreements continued into the 16th and 17th centuries (*V.C.H. Bucks* III, 6).

The meadow on the Aylesbury demesne lands (the town remained a manor until it was incorporated in 1553) was valuable and was let to people from neighbouring villages as well as inhabitants of the town (Elvey, E. M. 1965). Further income for the manor was gained by provision of pens for livestock being sold at fairs and markets.

The Vale of Aylesbury was under the open field system during the Middle Ages. By Leland's time (1540) most had become sheep pasture and he observed that the Vale was almost devoid of wood (Toulmin-Smith 1964, 110). There is a concentration of deserted medieval villages immediately north of the Chiltern scarp. The likely date and causes of enclosure, including the effect of climatic deterioration on the low-lying heavy Vale soils are discussed by Reed (1979, 157). One would expect the change in land use to be reflected in the meat available at Aylesbury. The George Street site in fact spans the height of the open field system. The latest medieval phase is mid to late 14th century, and as far as the bone evidence goes, no increase in sheep or decrease in cattle seems to have occurred. At both of the post-medieval (16th-18th century) Buckingham sites sheep bones were numerous, but the paucity of 15th-16th century pits at George Street means that no evidence is available for

this period (Jones forthcoming c; Rackham D. 1975).

Photographs of the pig skull, dog and cat skulls and pathological bones, all of medieval date, are held in the archive.

Acknowledgement

The assistance of G. Cowles of the Ornithology section of the British Museum (Natural History) is gratefully acknowledged.

The Fish Remains

by A. K. G. Jones, Environmental Archaeology Unit, York University

A group of 43 identifiable fish bones has been recognised from material recovered by hand from pits and occupation layers dated to the 13th-15th centuries. The majority of the bones were collected from two late 13th/early 14th century rubbish pits (259 and 436). Six kinds of fish were present, comprising mainly large marine species, with trout (*Salmo trutta* L.) the only freshwater fish. Although none of the deposits was sieved to recover small bones, the deposits were clearly excavated with care as several small fish bones were retrieved. For example, mackerel (*Scomber scombrus* L.) was represented by a maxilla and a fragmentary vertebral centrum, and a whiting (*Merlangius merlangus* L.) cleithrum was present. Such bones are rarely present in archaeological assemblages unless sieving, using 1 or 2 mm mesh, is employed. The larger bones, for example cod (*Gadus morhua* L.), ling (*Molva* sp.) vertebrae and conger eel (*Conger conger* L.) head bones, are more frequently recovered by hand from archaeological deposits.

Identifications were made by comparing ancient specimens with modern reference material at the Environmental Archaeology Unit, University of York. Nomenclature follows Wheeler (1969).

While it is impossible to be certain that the fish bones recovered from the site are an unbiased and representative sample of the

food fish eaten in Aylesbury during the medieval period, it is likely that the assemblage reflects the major trends in fish consumption, at least for the late 13th and early 14th centuries. Thus marine species, both large fish like cod, ling and conger eel, and small species like whiting and mackerel, appear to have been far more important than freshwater fish. Unfortunately, it is not possible to be certain whether the marine fish were brought to the site as fresh wet-fish or if they were preserved by salting or smoking. Given the location of the site, it seems probable that some would have been imported preserved.

Trout, represented by a dentary and a maxilla, was the only freshwater species present. It is likely that other species were taken locally from rivers and streams but their small bones have not been collected from the excavated deposits.

In conclusion, the fish bones suggest that during the medieval period the inhabitants of the site ate a variety of marine fish and a few freshwater species.

Phase	Trout	Conger	Whiting	Cod	Ling	Mackerel
Late 13th-	*	*	*	*	*	*
E. 14th C						
Mid 14th C				*		
16th C.				*		

* = present

Table 12. The distribution of fish bones.

Note by G. G. Jones

Although much of the fish seems to have been sea fish, local fish may also have been available. Fish ponds were numerous in Buckinghamshire and some of them were large enough to suggest a commercial element (Reed 1979, 124). At the manor of Ilmer, in the Vale, south of Aylesbury, the customary tenants of the 14th century had to work on the demesne land every day except Saturday, in the autumn, and their meat was specified. Every day two men received bread, beer, meat or fish, to the value of 1d. each, and ½d. worth of cheese (V.C.H. Bucks II, 49).

The Post-Medieval Finds

Post-medieval finds from the site were recovered in quantity from the excavation, but have only been selectively published here. A selection of small finds is illustrated and catalogued in the text, and iron, bronze and bone small finds are listed on fiche (fiche p. 24-50: B10-D14). Other categories of finds present included plaster, brick and roof tile, bottle, window, and vessel glass, and glass slag, lead (mostly window came), dressmaking pins, and small amounts of leather, textile and wood. All these are listed in the site archive, and are mostly 19th century objects.

The Pottery

Large quantities of post-medieval pottery were recovered, dating from the 17th century onwards. Apart from the two groups of 17th century date (282 and 571) the earlier post-medieval pottery did not come from sealed contexts, but rather occurred as residual pottery in 19th century topsoil; in view of this it was considered unnecessary to publish this material, although it was used to date features on the site.

The Clay Pipes

by C. A. Jones

The site produced a total of 139 clay pipe bowls of which 86 were complete enough for the form to be identifiable, and of these, 57 were stamped or decorated. Fifteen of the unidentifiable bowl fragments were decorated. In the entire group 52% were decorated, as was one stem fragment.

The identifiable bowls have been grouped into ten types (Fig. 20:A-K), based on Oswald's typology (Oswald 1975). For details of bowl types and the historical identification of initial stamps see fiche p. 26-29: B12-C1.

Bowls

(Fig. 20: A-K)

The four commonest types are A-E, comprising 47% of all classifiable bowls. These four relate closely to initial stamps which can be identified as Aylesbury or Buckinghamshire pipemakers: they carry 82% of all such identifiable stamps.

Decoration

(Fig. 20: 1-24)

The identification of individual pipemakers from initial stamps is problematic, and such identifications must be treated with caution. The majority of stamps from the excavation were simple initial stamps; in addition, a few name stamps occurred.

The initials on six pipes, which occurred singly, could not be related to any known pipemakers in Buckinghamshire or surrounding counties (Fig. 20: 2, 5, 8, 13, 17, 18). Four stamps (Fig. 20: 6, 9, 11, 14) could be related to known Buckinghamshire pipemakers, working in other towns in the county (Oswald 1975, 161). Four stamps (Fig. 20: 16, 22-24) could be related to pipemakers working in other counties, the latter three quite positively since they are incised names rather than initial stamps. These stamps all occurred in small numbers.

It might be expected that the majority of stamps found ought to represent Aylesbury pipemakers. Four stamps (Fig. 20: 1, 4, 7, 15) could be related to pipemakers in Aylesbury, but these occurred in small numbers except the stamp T D (Fig. 20: 4), of which there were 23 examples, which supports Oswald's provenancing of this stamp (Oswald 1975, 64). Three other stamps (Fig. 20: 3, 10, 11) were relatively frequent (between 7 and 10 examples of each), and although these could not be related to any known pipemaker, their frequency suggests that these stamps belong to Aylesbury pipemakers. The products of the nearby Castle Street kiln, stamped EK, were not represented at George Street (Moore 1979).

The Other Post-medieval Finds

(Fig. 21: 1-20)

1. Hone, very worn. 75 mm long (broken). Mica schist from Norway, Ellis Group IA (Ellis 1969: identified by F. B. Atkins). 17th century context, post-medieval layer 571.
2. Hone, 67 mm long (broken), worn on four sides. Medium feldspathic sandstone with

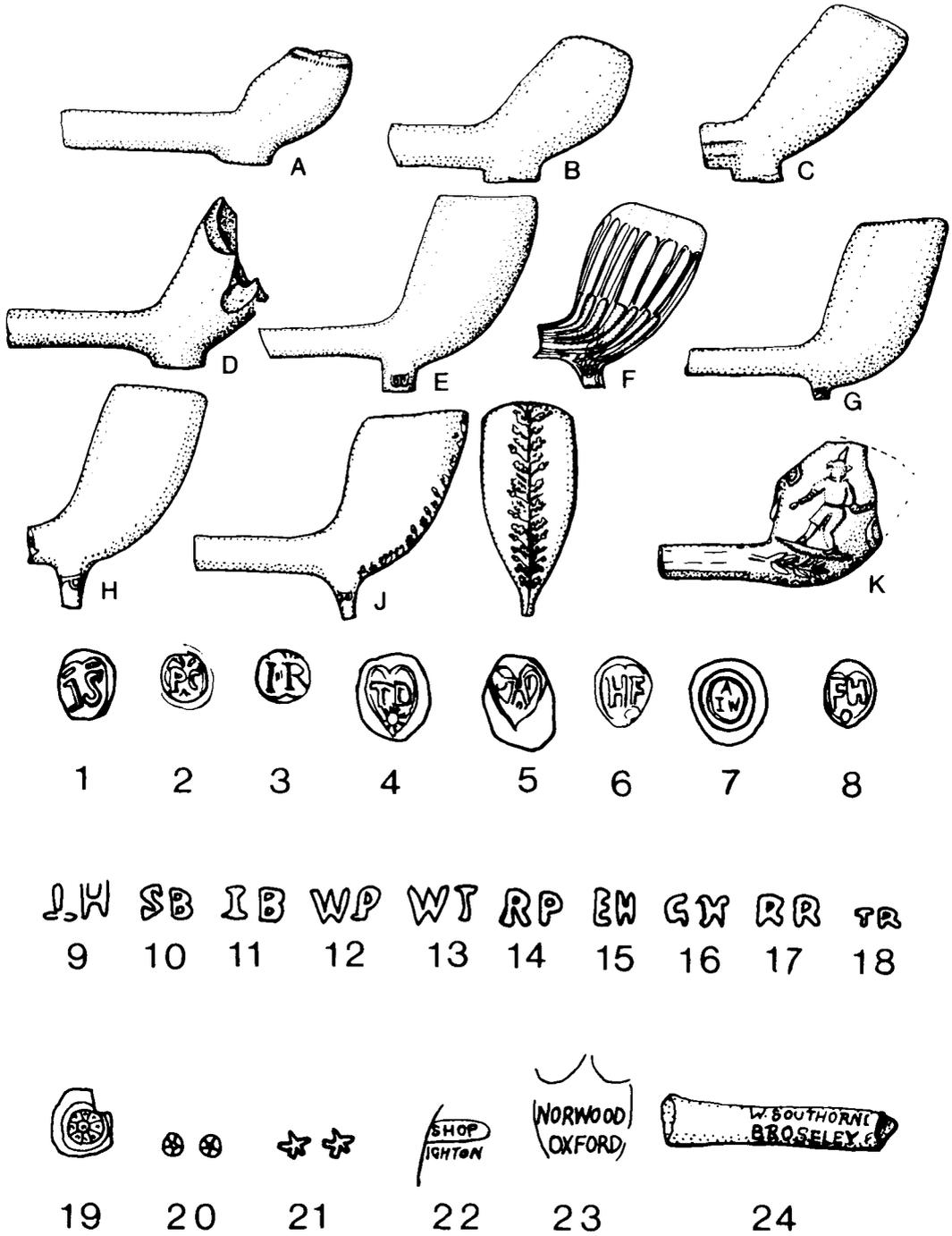


Fig. 20. Clay pipes: A-K, bowl forms (2:3); 1-24, stamps (1:1).

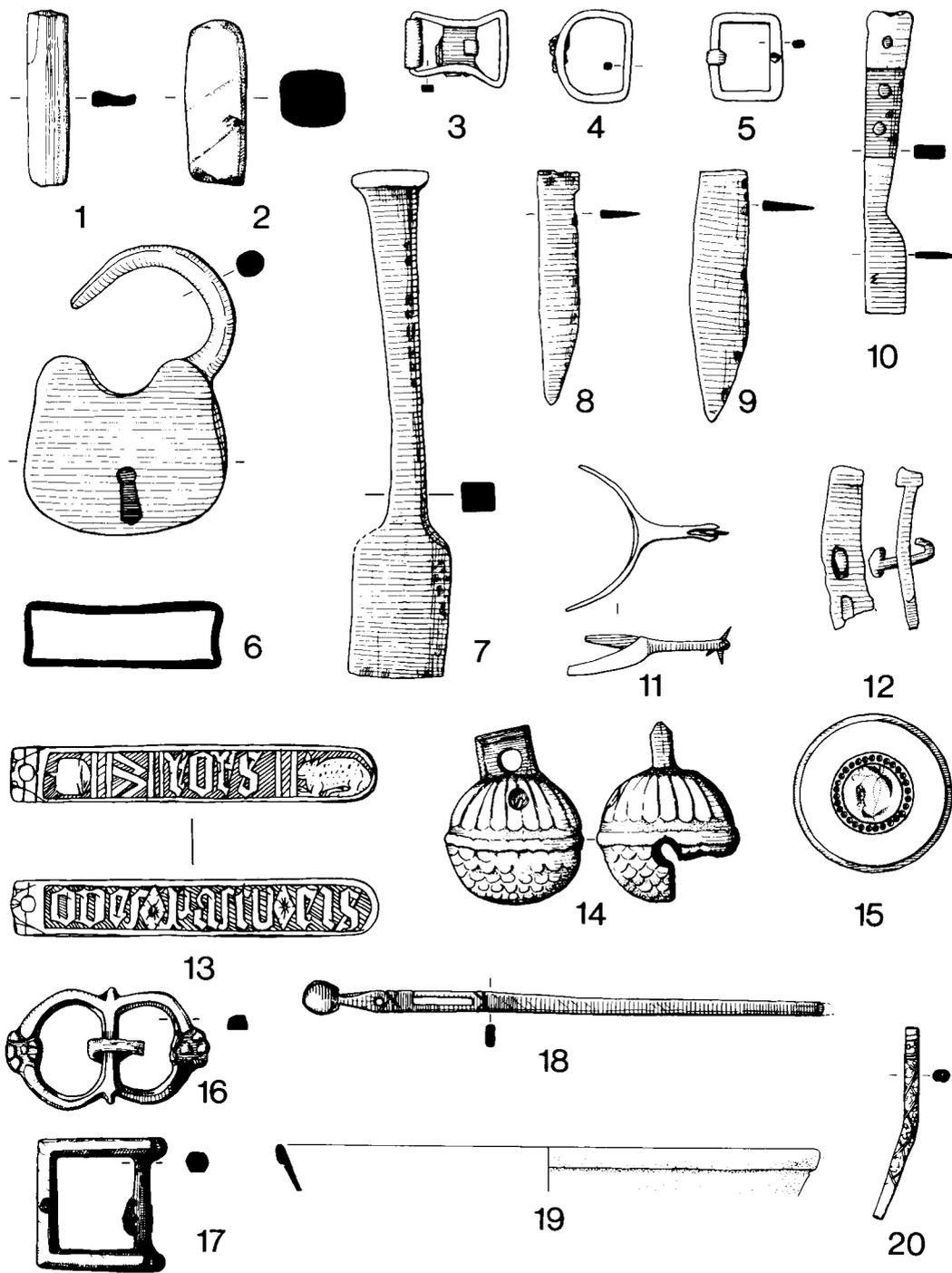


Fig. 21. Post-medieval finds: 1-2, stone; 3-12, iron; 13-20, bronze.
 (Scales: 1-12, 1:3; 13-20, 2:3.)

- mica — (?) Millstone Grit (identified by F. B. Atkins). Post-medieval layer 361.
3. Iron buckle, 45 mm long, pin broken, with roller bar. Late 17th/early 18th century context, post-medieval pit 339 (fill 282).
 4. Iron buckle, 32 mm across, pin broken. 18th century context, post-medieval pit 463 (fill 373).
 5. Iron buckle, 34 mm across, pin broken. 19th century context, post-medieval layer 310.
 6. Iron padlock, 89 mm across. 18th century context, post-medieval scoop 280 (fill 279).
 7. Iron chisel or gouge, carpenter's or mason's tool. 17th century context, post-medieval layer 571.
 8. Iron blade, 105 mm long, tang broken off. Late 17th/early 18th century context, post-medieval gully 187 (fill 186).
 9. Iron blade, 110 mm long (broken). 17th century context, post-medieval pit 339 (fill 282).
 10. Iron scale-tang knife, 135 mm long (blade broken), with three rivets in tang. Letter 'M' struck on blade, cutler's mark (cf. Goodhall 1982, 57). 17th century context, post-medieval pit 339 (fill 282).
 11. Iron rowel spur, 72 mm long; some of rowel points, and both arms, broken. Probably late 17th/early 18th century type (identified by B. Ellis). 19th century context, post-medieval garden soil 156.
 12. Iron horseshoe, 72 mm long (broken). Two nail holes, one nail still in place. Late 17th/early 18th century context, post-medieval gully 187 (fill 186).
 13. Bronze belt chape with lettering, 78 mm long, 11 mm wide, complete; two cast plates of bronze held together by one rivet. J. Cherry writes: 'One side of the fitting (Fig. 21:13, upper) has an unidentifiable object (possibly a cauldron), a letter W placed sideways, the word TOT[U]S or TOT[A]S and a dog, fox or sheep. There is no necessary connection between the inscription on this side and that on the other (Fig. 21:13, lower) which reads OVES PASCU[E] EI[U]S. This is a quotation from Ps. 99.3 (Vulgate): *Populus eius, et oves pascuae eius*, "(We are) his people and the sheep of his pasture." The style of lettering is black letter or gothic script of the 15th or early 16th centuries.' Residual find in 17th century context, post-medieval pit 339 (fill 282).
 14. Bronze rumbler bell, cast, split by narrow channel ending in two circular openings. Square suspension lug, and two roughly pierced holes to suspend clapper. 'Pine cone' cast decoration. 32 mm diameter, broken. Common medieval and post-medieval type (Moorhouse 1971, 59, Fig. 25:163). 19th century context, post-medieval garden soil 156.
 15. Bronze button, gilded, cast, 35 mm diameter, complete. Decorated with circle of punched dots and 'plant' motif. 19th century context, post-medieval garden soil 156.
 16. Bronze buckle, cast, with decorative 'flowers'. 42 mm across, complete except for iron pin. Probably a shoe buckle (cf. Moorhouse 1971, 60, Fig. 25:169, 170). 17th century context, post-medieval layer 571.
 17. Bronze buckle, cast, 27 mm across, complete except for iron pin. 19th century context, post-medieval layer 310.
 18. Bronze object, 112 mm long (tip broken off). Lower part of shaft has two openings and criss-cross decoration, and a shallow bowl, 7 mm diameter, with remains of silvering. Although apparently a ligula or unguent spoon, a very similar object excavated in Amsterdam has been identified as a kind of elaborate hair-pin in fashion

1610-1625, although the end of this example was spheroid rather than bowl shaped (*Amsterdam Historisch Museum* 1977, 217, Fig. 401). 18th century context, post-medieval pit 207 (fill 150).

19. Bronze bowl (fragment of rim), cast vessel, 120 mm diameter with thickened rim. Early 18th century context, post-medieval pit 574 (fill 395).
20. Bronze lace end, 42 mm long. Decorated with raised criss-cross lines and small flower-like ornamentation. 17th century context, post-medieval layer 571.

The Post-medieval Coins

by N. J. Mayhew, Ashmolean Museum, Oxford

Coin no. 1: Charles II farthing, Richmond, 1625-1634. Post-medieval garden soil 156.

Coin no. 2: George III halfpenny, 1807. Post-medieval garden soil 156.

Coin no. 5: George III farthing, 1771-1775 type. Post-medieval garden soil 156.

Coin no. 6: Jetton, Burgundian type, c. 1486-1507. Obverse: AVE MARIA (Barnard 1916, 188-189, no. 7). Residual in 17th century context, pit 499 (fill 190).

Coin no. 7: Charles II farthing, Richmond, 1625-1634. 16th-17th century context, pit 337, (fill 255).

Coin no. 10: Edward IV penny, 1471-1476. Bishop Lawrence Booth, Durham. The reverse is a regular type with trefoil stops. The obverse seems to be struck from local Durham-made dies. Residual in post-medieval layer 283.

The Post-medieval Animal Bone

by G. G. Jones

Animal bone from post-medieval contexts included skeletons of a dog, a calf and a goat of 17th, 17th-18th and 19th century date respectively. Measurements of the dog and goat, and details of dental and long bone development of the goat and calf are given on microfiche (fiche p. 80-81:G4-5).

Burial of a calf raises the possibility that stalled dairy cattle were being kept in the vicinity. Similarly the goat, an elderly nanny goat, was probably kept for milk.

CONCLUSIONS

The Middle Iron Age Settlement

The evidence shows that the area now occupied by the centre of Aylesbury was the site of a Middle Iron Age settlement. The excavation revealed a gully, two small pits and a possible structure (Fig. 3). Evidence for economic activity included a Millstone Grit saddle quern and a flint pounder (Fig. 11:1-2), and the animal bone evidence indicates the utilisation of cattle, sheep and pig, as well as fowl and goose (p. 17 and Table 6). The fragments of human cranium found in gully 205 are a phenomenon already known from local settlement sites of this period, although their interpretation is open to debate (Wilson C. 1981 and p. 17).

The occupation is apparently contemporary with the possible features noted in Granville Street in 1964 (Vaughan *et al.* 1974, 391) some 100 m to the north-west of George Street, but if so the status of this extensive settlement cannot be deduced from the limited information obtained by the excavation. The theory that Aylesbury is the location of a hill-fort (*ibid.*, 405) remains untested, for although the site occupies a defensible position, none of the recent work in the town (Allen 1982) has recovered evidence for the necessary defences.

It is worth noting that Late Iron Age settlements have recently been excavated in the Aylesbury vicinity, at Walton Court (Farley *et*

al. 1981) and at Bierton (Allen forthcoming), but evidence for this period from the George Street site is limited to a few sherds of pottery in a residual context (122).

The Roman Period

The paucity of Roman material from the excavation, combined with the evidence of the Buckingham Street and Bull's Head sites (Allen 1982) indicates that the focus of Roman occupation in Aylesbury lay some distance from the core of the old town, probably along the line of Akeman Street. In this period the site presumably lay in fields attached to the settlement.

Early Saxon Aylesbury

The few Early Saxon finds from the site are the first archaeological evidence of this period found beneath the modern town. Such evidence has been anticipated for some time (e.g. Head 1946, 339) and Aylesbury has long been accepted as the site of an Early Saxon settlement. This is based on the reference to Aylesbury in the *Anglo-Saxon Chronicle* for A.D. 571. This annal has been the subject of a large amount of theorising, which has been summarised by Farley (1976, 174-175). The chronicle implies that Aylesbury, though having a Saxon name, was 'British' and a 'town' in the late 6th century. Research has thrown doubt on the annal, which clearly must be treated with the greatest caution. Although attempts have been made to combine archaeological and historical data to interpret the annal, its meaning and reliability remain open to debate (Stenton 1947, 27-28; Davis 1982). It need only be pointed out that the relationship between archaeological material and ethnic or political units is not at present demonstrable, despite some writers' continued insistence on such relationships in this period (cf. Wilson D. 1976, 4-5). It is unnecessary to labour the point, except to note that 'Saxon' is used here in a chronological rather than ethnic sense (Farley 1976, 175).

The excavation at George Street has thrown little light on the nature of Saxon settlement in the town since so little Early Saxon material was recovered. It is hard to interpret the iden-

tification of Aylesbury as a *tun* in the 571 annal, but its existence as an Early Saxon settlement is confirmed by the place-name itself. The discovery of the Middle Saxon cemetery suggests a church at an early date and that Aylesbury was some sort of focus before the church was built.

The archaeological evidence from the present excavation is very scanty in comparison to that from the Early Saxon site at Walton (Farley 1976). This site is less than 1 km from George Street (Fig. 1:A) and lies in a village that probably existed as a distinct entity even in the Early Saxon period (Elvey, G. R. 1976). The excavations in 1973-74 uncovered a 5th to 7th century Saxon site, with sunken-featured buildings, post-built structures, and a wide range of Early Saxon artefactual material including evidence of weaving and grinding, with a cemetery in the immediate area (Farley 1976, 154-155). The Early Saxon finds from George Street, though few in number, are entirely consistent with those from Walton, although no stamped pottery was found. This suggests that there was Early Saxon settlement within the area of the medieval town, contemporary with Walton, but not within the area of the excavation.

If the excavated graves are part of a large Middle Saxon cemetery (see below and Fig. 1:B), then it seems likely that the church was established in a previously unoccupied area and the cemetery grew in an unrestricted fashion outwards from the south door. The George Street evidence, though of a negative rather than positive nature, tends to support the model of a dispersed settlement pattern in the Early Saxon period beneath the modern town area (Farley 1979, 121).

Middle Saxon Aylesbury and its Cemetery

The total number of graves originally contained in the excavated area is estimated as 100. However, large-scale medieval and post-medieval activity removed most of these, the disturbed bone being incorporated in later fills. The identifiable graves numbered only 18, and even when the residual human bone is included the number of identifiable individuals totalled

only 26. This relatively small sample size does not permit many conclusions to be drawn about the community they represent, nor about their age, stature or general health (see p. 20). Some points, however, are worthy of comment.

The average stature of males was 5 ft. 9 in. (1.74 m) and of females 5 ft 3 in. (1.60 m), and these are closely comparable to a number of Early or Middle Saxon cemeteries in the South Midlands (Robinson and Wilson 1983, 131-2). The burials of this period display a marked increase in stature over Romano-British examples, which has been interpreted as a result of the presence of ethnic Saxons interbreeding with the Romano-British population, as well as improved nutrition and less communal stress. The Aylesbury burials discussed below are apparently those of a rural population using a centralised cemetery, a population that was presumably spared the pressures of urban life which resulted in a decrease in human stature in the early medieval period (*ibid.*, 150-151). The fatal head wounds of burial 608 (Grave 15) are perhaps an indication of the nature of Saxon society (Pl. VIIb).

Four radiocarbon dates indicate that the burials were made between the late 8th and early 10th centuries; 760 ± 80 ad to 800 ± 80 ad can be calibrated to a range between 770 and 920 (Table 1). These dates are comparable with dated burials from Christian contexts, e.g. Brixworth, 750 ± 80 ad (Eversen 1977, 72-74) and Wells, 730 ± 70 ad (Rodwell 1981a, 106), and the proximity of the burials to St. Mary's Church immediately suggests that they form part of a Christian churchyard. In addition, the east-west orientation of the graves, the orderly rows of extended burials, and the absence of grave goods are attributes that have been taken as indicative of Christianity in the late Roman and Saxon periods. It is clear, however, that the interpretation of religious belief from burial rite is problematic (Ucko 1969), and this realisation has influenced archaeological interpretations (Rahtz 1978, 5; Morris 1983, 49-50). Considering structural features alone, the cemetery could be placed among the group of Middle Saxon

'Final Phase' cemeteries exemplified by Winnall II (Meaney and Hawkes 1970). These cemeteries are characterised by extended, east-west graves with few or no grave goods, and proximity to an earlier, typically pagan, Saxon cemetery with a varied burial rite and range of grave goods. The relocation of these 'Final Phase' cemeteries is dated to the Middle Saxon period and interpreted as due to the influence of Christianity (*ibid.*, 52-54).

The George Street cemetery, however, must be distinguished from the group of 'Final Phase' Saxon cemeteries typified by Winnall II, Beacon Hill (Chambers 1973) and Leighton Buzzard II (Hyslop 1963). The Aylesbury cemetery lies within or beside an Early Saxon settlement focus, achieved a large size by the Late Saxon period, and has a direct relationship to a church of almost certain Middle Saxon origin.

The excavated area of c. 400 sq. m forms only a small part of an apparently extensive cemetery (Fig. 1:B and Farley 1979, Fig. 1). The boundaries of the cemetery are not known but it is probable that the distribution of skeletal material reflects the original area since there is no reason to suppose that the various activities that revealed human bone were limited to one area of the town (Farley 1979, 116-119). The total area of the cemetery may be estimated at 2.5 hectares, of which the excavated area forms approximately 1.5%. If the whole of this area was utilised to the same density, the total number of graves might be as high as 6,000.

Such a large cemetery, with so many inhumations, is of quite a different character from the relatively small relocated Middle Saxon cemeteries discussed above and implies that the cemetery was drawing on a wide area, combined with a long period of use. However, no grave goods have been found with any of the burials in the cemetery area, which suggests that, even if the cemetery had a pagan origin, it is unlikely to have commenced before the 6th century (*ibid.*, 119).

Saxon churchyards are known in a few cases

to have had pre-Christian origins (Morris 1983, 49) but the majority of such burials must be Christian in origin.

It is known that the earliest churchyards, surrounding minster churches, drew on large areas of country before the growth of the parish church system, and this may well have been the order of events at Aylesbury, where a large area of the churchyard had been taken out of use before the early medieval period, as the 12th century rubbish pits which cut into it testify. This presumably reflects the change in Church organisation, as the daughter churches of the minster became responsible for burial (*ibid.*, 64-65). Gibbs (1885, 58) in seeking to interpret burials uncovered near the George Street excavation, found evidence that the Church had formerly owned a large area in the core of Aylesbury, and suggested that this area had been a churchyard 'at a very early date'.

The present structure of St. Mary's Church is largely 13th century, but the original foundation was certainly Saxon, the *ecclesia* at Aylesbury appearing as one of four churches in the County in Domesday (*DB Bucks*, 143d). The church is recorded as receiving revenue from almost half the county, and this has been taken to be a survival of the minster system and evidence that Aylesbury was the original *monasterium* for Central Buckinghamshire (Farley 1979, 120). It is probable that the original foundation at Aylesbury was on the same site as the present church, and small scale excavations inside it have uncovered traces of two earlier phases of construction (Durham 1978). The excavator believed these to be Late Saxon but an earlier date could now be considered.

Presuming that the excavated burials do not predate the church foundation, and that the churchyard conformed to the normal model, i.e. growing outwards from the south door, then the cemetery was already large by the end of the 8th century, suggesting that the church had been founded at least a century earlier.

Such a date does not conflict with what is known about the early Church in this area and

the foundation of the church at Aylesbury could relate to the proselytising of Archbishop Birinus and his successor Agilbert at the see at Dorchester-on-Thames from c. 633 (Deansley 1964, 77). Alternatively, Wilfred in the kingdom of Mercia may have been responsible; Aylesbury lay in Mercia in the late 8th century under Offa. The church at Wing, twelve miles from Aylesbury, may be as early as the 7th century, although this is also open to doubt (Cherry 1976, 170).

An interesting sidelight on this is the medieval *Life of St. Osyth*, who was believed to have been buried at Aylesbury. The legend relates that she was the second Abbess of Aylesbury and the granddaughter of King Penda of Mercia. Such *Lives* cannot be treated as history, and the *Life* is full of contradictions and probably conflates the legends of two Saxon saints with the same name (Hohler 1966). However, the legend does point to an origin of the church in the 7th century and implies that it was originally a nunnery and held by the King of Mercia.

Nothing is known of the contemporary settlement and no datable Middle Saxon material was found at the George Street excavation and only doubtfully at Walton (Farley 1976, 167). However, a minster church would probably be associated with a centre of secular administration, in view of the dependence on royal patronage in this early period. There is no historical evidence that Aylesbury was of major importance in this period, and so it is unlikely that an impressive palace complex such as that at Northampton awaits discovery (Williams 1982).

In short, the most convincing interpretation of the burials is that they lie in a Middle Saxon Christian cemetery, attached to a minster church. This is supported by both archaeological and historical evidence and is entirely consistent with current research into the development of Christian cemeteries and churchyards.

Late Saxon Aylesbury

Aylesbury does not appear in the early 10th

century *Burghal Hidage*, although Farley has suggested that the presence of a mint in the later 10th century implies that Aylesbury had become a *burh* (Farley 1974). It was certainly an estate held by the King from c. 970 until 1204. Aylesbury was less important than Buckingham, the chief *burh* of the shire from the 10th century, and whereas in Domesday twenty-six burgesses are recorded in Buckingham, there are none recorded in Aylesbury (*DB Bucks*, 143b). Aylesbury does not appear in Domesday as a town, but rather as a valuable royal estate. However, there was probably a market here by the Late Saxon period as well as the annual fair of St. Osyth (Reed 1978, 566).

This growing economic importance was not reflected in the evidence from the excavation, although the site lay near Kingsbury (Fig. 1:B), usually regarded as the Late Saxon market place (*V.C.H. Bucks* III, 1), although hopes of testing this archaeologically are slight (Farley pers. comm.). It may be that the site, once part of the Saxon churchyard, was still venerated and still owned by the church, so that the site was not used in a way that would disturb the burials. In addition, the churchyard would have had a substantial boundary, delimiting the church's property from other landowners, so casual encroachment would have been unlikely.

Medieval Aylesbury

Secular use of the George Street site was fairly continuous from the late 12th century until the present day. Initially, the area was given over to rubbish pits and cess pits, and clearly lay in the back plots of medieval houses. This is a rather surprising development since churchyards are usually seen as inviolable and likely to expand as pressure on space increased. However, such a change in utilisation occurred at Aylesbury and may relate to changes in ecclesiastical organisation, as the centralised minster churches were replaced by parish churches. Accepting the George Street cemetery as Christian, it is clear that even churchyards were subject to change and were not necessarily a fixed feature of settlement topography (Morris 1983, 5, 91). It may be

that the demand for street frontage on Kingsbury led to the encroachment with or without the Church's consent. The extent of the medieval cemetery is not known, but may be reflected by its present boundaries (Fig. 1:B).

Historical evidence shows that in the 12th to 13th centuries Aylesbury acquired some of the administrative functions of the county town from Buckingham, owing, no doubt, to its more central position in the county (*V.C.H. Bucks* III, 1). This growth in administrative importance would have been accompanied by increasing economic activity and population growth. Aylesbury did not become a chartered borough until 1554, although it had various privileges before then, and this has been attributed to the fact that in 1204 the town was granted by King John to the Earl of Essex, and that succeeding lords did not foster the town's growth towards independence (*V.C.H. Bucks* III, 6).

There were no medieval property boundaries on the site and it is uncertain whether the area related to properties on Kingsbury or on Market Square (Fig. 1:B). However, there is evidence that in the 18th century at least the site lay in back gardens of buildings on Kingsbury and it is likely that this reflects the earlier situation.

The medieval use of the site was confined to the disposal of domestic refuse and effluent. There was also a well (640) at an early period although this was abandoned and infilled by the end of the 14th century. Pit digging dated from the late 12th to mid 14th centuries, after which there was a marked falling off in this activity; and no pits are datable to the 15th century. In Southampton a similar absence was related to the medieval association of noxious odours with the Black Death, and the consequent development of night cartage (Platt and Coleman-Smith 1975, I, 34).

The medieval pits produced evidence for the economic and social life of the people who used them, as well as rather limited evidence for contemporary buildings. This included a small quantity of roofing tile, as well as one

fragment of daub and a broken piece of building stone. Medieval buildings in Aylesbury would have been timber framed, with tiled or thatched roofs. Reed was an important crop from the wet lands surrounding Aylesbury (Elvey, E. M. 1965, 322) and its availability may have meant that reed-thatched roofs were commoner than tiled ones.

The fragment of carved limestone (Fig. 16:1) is unlikely to have come from a domestic building, and may have come from rebuilding of St. Mary's Church, or perhaps from the Hospital of St. John, located in the Market Square area, which fell into decay in the 14th century.

The absence of medieval property boundaries suggests that most of the excavated area lay in one tenement, c. 15 m (50 ft.) wide; it may be that the house on Kingsbury was of Pantin's *parallel, extended* plan type (Pantin 1962-3). This might be expected in a small medieval town such as Aylesbury, where the demand for street frontage would have been less intense than in larger towns (*ibid.*, 203). Following this, the excavated pits would have lain c. 30 m from the street frontage, quite close to the back of the house.

The pottery sherd size in the pits suggests that two deposition processes were in operation. Large sherds and near-complete vessels indicated primary deposition of freshly broken vessels, which was observed in two rubbish pits (259, 436) especially (p. 23-24, Table 5). The majority of the pottery was much more fragmentary, indicating secondary deposition. This material may have lain in a midden before final disposal or, more likely, represents pottery trampled into rush or straw floors which were subsequently cleaned out and dumped (Keene 1982, 27). The deeper pits were certainly primarily dug for the disposal of human effluent; other unpleasant refuse was disposed of either in the deep pits, or in the shallower features, and included carcasses of sheep, pig and horse. The high quantity of unstructured 'organic' matter in the pit fills is probably largely made up of decomposed rush and straw (*ibid.*).

The archaeological evidence from the rubbish pits may be used to deduce something of the social status of the houseowners.

The two writing implements (Fig. 16:14 and 16) indicate literacy here in the 13th century. Some of the evidence of food remains suggested a high-quality diet, especially the group from one pit (436) which included fowl, goose and duck, conger eel and cod, oyster, mussel and winkle, a piglet and a few calf bones (p. 33).

The high incidence of pig and poultry on the site may indicate that these were kept on the land behind the house, no doubt along with dogs and cats which were found in large numbers as well.

The beef and mutton that formed the bulk of the meat diet of the inhabitants of the property would have come from the commons and other pasture lands of the Vale of Aylesbury. Four cattle skulls (from pit 436) may indicate butchery on the site (p. 33); however, the majority of the bones are from food joints which would have been purchased from butchers in the market. These cattle skulls may indicate that this household occasionally handled live animals, perhaps indicating a relatively wealthy owner with land outside Aylesbury in the rich agricultural area of the Vale.

A flayed horse carcass (pit 622) and eleven skinned cats (well 640) are evidence of other uses of animals.

The pits themselves are evidence of social status; their depth and capaciousness indicate a certain degree of wealth to pay for their initial digging, which would have been a laborious task in the Portland limestone bedrock. This site can be imagined to have contained a number of cess pits and rubbish pits open at any one time, with pigs and poultry allowed to range over it. The archaeological evidence indicates the rubbish pits were those of a fairly high-status household, despite the impression of insanitary conditions gained

from the contents of the pits. Aylesbury certainly had wealthy inhabitants in the 13th century, although these were probably few in number. The town's central position in Buckinghamshire led to it becoming the administrative and economic focus of the county in the Middle Ages, and it was undoubtedly the residence of landowners and the wealthier kind of tradesman; indeed 'Aylesbury was far from being a remote provincial town . . . (it) was the centre of a rich agricultural district and its markets and fairs were attended by people from a wide area. There must have been many opportunities for men of all ranks to engage in trade and the inns of Aylesbury . . . bear witness to the prosperity of the town, (Elvey, E. M. 1965, 331).

The archaeological evidence illustrates the fact that Aylesbury was the centre of a local market system. The animals consumed were driven in from surrounding farms and sold and butchered in the town, and inhabitants had large enough tenements to keep pigs and poultry. Little evidence was found for other products marketed in Aylesbury, although large quantities of pottery were no doubt available, not only the well-known products of the Brill/Boarstall pottery industry, but also of another, unlocated and previously unrecognised, kiln (p. 29). The goods sold by 'outsider' traders, from the other small market towns near Aylesbury, remain largely obscure (Elvey, E. M. 1965, 324). There was little archaeological evidence of wider economic contacts, except for the quantity of marine fish and oyster shells; the small quantity of non-local pottery may be evidence of a generally rather restricted range of imported goods available in Aylesbury and indicate the town's position in the regional hierarchy of markets in the medieval period.

Post-medieval Aylesbury

The small number of features dating between the late 14th and late 16th centuries may partly be ascribed to fear of the Black Death and the consequent development of night cartage, but other factors may also be involved. Little is known about the development of the topography of Aylesbury, but it is

possible that a shift in the main market place from Kingsbury to Market Square (Fig. 1) may have led to Kingsbury becoming less densely occupied.

Archaeologically detectable activity was renewed on the site from the 17th century onwards, and it was in this period that a number of Saxon burials were uncovered, possibly during gardening, and re-interred in a rubbish pit (339: Pl. IV). A line of postholes and a linear gully (Fig. 9) are datable to this phase and it is suggested that these represent property boundaries. The fence line separates the south-eastern half of the site from the cobbled area to the north-west, and it is probable that in this period the site lay in the back plots of two houses on Kingsbury. It is suggested above that the site lay mostly in one tenement in the Middle Ages, and the post-holes may represent a subdivision of this broad medieval property.

The remains of a building (Building H, Fig. 9) with limestone footings have been dated to this phase, and it seems likely that this represents an outbuilding with access from Hog Lane (renamed George Street after 1885). The building partly underlay the present street, which was clearly rather narrower before the 19th century. On the earliest plan of Aylesbury, the 1809 *Eye Draft*, Hog Lane is not named and only appears as a break in the street frontage on Kingsbury and Church Street, and no shops or houses are indicated along its length; Hog Lane was well established by 1878 when the 1:2500 Ordnance Survey plan was published.

Hog Lane presumably originated as access to the rear of properties on Church Street (formerly Broad Street) and Kingsbury, and whilst it connects these two medieval thoroughfares, it was not an important feature of the street pattern before the 19th century, contrary to Gibb's view (1885, 426-427). The name of George Street was derived from the George Hotel on Market Square, an inn from the 16th century.

In the 19th century the site was still occupied

by back yards and gardens, with brick out-buildings appearing along the line of Hog Lane. The site is known to have formed part of the property of the George Hotel and the explanation for the drainage system on the site is that the area was used as stables, the access to which lay directly opposite the rear entrance

to the George Hotel yard (1878 plan). The George Hotel was closed in 1921 and demolished in 1935 and from then until 1981 the George Street site was occupied by Curtis and Horn, a firm supplying agricultural machinery. The site has now been redeveloped as a block of offices which has been named Saxon House.

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BIBLIOGRAPHY

- Acsadi, G. and Nemeskeri, J. 1970. *A History of Human Life Span and Mortality*, Budapest.
- Allen, D. 1982. 'Salvage Excavations at 13-19 Buckingham Street and the Bull's Head Redevelopment Site, Aylesbury, in 1979 and 1980', *Recs. Bucks* 24, 81-106.
- Allen forthcoming. 'Excavations at Bierton, 1979: a Late Iron Age Settlement and Evidence for a Roman Villa and a 12th to 18th Century Manorial Complex', *Recs. Bucks*.
- Amsterdam Historisch Museum*, 1977. *Opravingen in Amsterdam, 20 Jaar Stadskernon Dezoek*, Amsterdam.
- Anderson, J. E. 1960. 'The Development of the Tympanic Plate', *Nat. Mus. Canada Bull.* 180, *Contributions to Anthropology* 1.
- Baker, E. and Hassal, J. 1979. 'The Pottery', in Baker, D. *et al.* (eds), 'Excavations in Bedford, 1967-1977', *Beds Arch. J.* 13, 147-217.
- Barnard, F. P. 1916. *The Casting Counter and the Counting Board*, Oxford.
- Bourdillon, J. and Coy, J. 1980. 'The Animal Bones in Holdsworth, P. (ed.), *Excavations at Melbourne Street, Southampton, 1971-76*, CBA Res. Rep. 33, 79-121.
- Bramwell, D. 1976. 'Report on the Bird Bones', in Farley, M. E., 'Saxon and Medieval Walto, Aylesbury, Excavations 1973-4', *Recs. Bucks* 20, 287-288.
- Brooks, S. T. 1955. 'Skeletal Age at Death: the Reliability of Cranial and Pubic Age Indicators', *Am. J. Phys. Anthropol.* 13, 567-597.
- Brothwell, D. R. 1961. 'The Palaeopathology of Early British Man: an Essay on the Problems of Diagnosis and Analysis', *J. Roy. Anthropol. Inst.* 91, 318-344.

- Brothwell, D. R. 1981. *Digging Up Bones*, 3rd edn, London.
- Brown, D. forthcoming. 'Writing Implements of Saxon and Later Times', *Winchester Studies: The Small Finds*.
- Cantor, L. M. and Hatherley, J. 1977. 'Medieval Parks of Buckinghamshire', *Recs. Bucks* 20, 431-450.
- CAS. County Antiquities Survey (Sites and Monuments Record), held at Buckinghamshire County Museum, Aylesbury.
- Chambers, R. A. 1973. 'A Cemetery Site at Beacon Hill near Lewknor, (M40 Site 12)', in Hinton, D. A. and Rowley, R. T., 'Excavations on the Route of the M40', *Oxoniensia* 38, 138-145.
- Cherry, B. 1976. 'Ecclesiastical Architecture', in Wilson, D. M. (ed.), *The Archaeology of Anglo-Saxon England*, London, 151-200.
- Cotton, J. 1979. 'Three Iron Age Brooches from the Thames Foreshore at Mortlake, Syon and Wandsworth', *Trans. London & Middx Arch. Soc.* 30, 180-184.
- Courville, C. B. 1965. 'War wound of the Cranium in the Middle Ages', *Bull. Los Angeles Neurol. Soc.* 30, 27-33.
- Cramp, S. 1980. *Handbook of the Birds of Europe, The Middle East and North Africa* II, Oxford.
- Crowfoot, E. forthcoming a. 'The Textiles', in Biddle, M. and Keene, D. J., *Winchester Studies* 7, II.
- Crowfoot, E. forthcoming b. 'The Textiles', in Hurst, J. G., *The Church at Wharram Percy*, for Medieval Archaeol. Monograph Ser.
- Cunliffe, B. 1974. *Iron Age Communities in Britain*, London.
- Darby, H. C. 1977. *Domesday England*, Cambridge.
- Davis, K. R. 1982. *Britons and Saxons: the Chilterns Region AD 400-700*, Chichester.
- D B Bucks*. Morris, J. (ed.) 1978. *Domesday Book: Buckinghamshire*, Chichester.
- Deansley, M. 1964. *The Preconquest Church in England*, London.
- Deniz, E. and Payne, S. 1982. 'Eruption and Wear in the Mandibular Dentition as a Guide to Ageing Turkish Angora Goats', in Wilson, R., *et al.* 1982, 155-205.
- Driver, J. C. 1982. 'Medullary Bone as an Indicator of Sex in Bird Remains', in Wilson, R., *et al.* 1982, 251-254.
- Durham, B. 1977. 'Archaeological Investigations in St. Aldates Oxford', *Oxoniensia* 43, 83-203.
- Durham, B. 1978. 'Traces of a Late Saxon Church at St. Mary's, Aylesbury', *Recs. Bucks* 20, 621-26.
- Ellis, S. E. 1969. 'The Petrography and Provenance of Anglo-Saxon and Medieval English Hone-stones', *Bull. Brit. Mus. (Nat. Hist.) Mineralogy* 2, 135-187.
- El-Najjar, M. Y. and McWilliams, K. R. 1978. *Forensic Anthropology*, Illinois.
- Elvey, E. M. 1965. 'Aylesbury in the Fifteenth Century', *Recs. Bucks* 17, 321-335.
- Elvey, G. R. 1976. 'Note on the History of Walton', in Farley, M. E. 1976, 155-156.
- Eversen, P. 1977. 'Excavations at the Vicarage Gardens at Brixworth, Northants, 1972', *J. Brit. Archaeol. Ass.* (½ ser.) 130, 55-120.
- Farley, M. E. 1974. 'Aylesbury - a Defended Town?', *Recs. Bucks* 19, 429-448.
- Farley, M. E. 1976. 'Saxon and Medieval Walton, Aylesbury; Excavations 1973-4', *Recs. Bucks* 20, 163-290.
- Farley, M. E. 1979. 'Burials in Aylesbury and the Early History of the Town', *Recs. Bucks* 21, 116-121.
- Farley, M. E., Nash, D. and White, R. F. 1981. 'A Late Iron Age and Roman Site at Walton Court, Aylesbury', *Recs. Bucks* 23, 51-75.
- Flander, . B. 1978. 'Univariate and Multivariate Methods for Sexing the Sacrum', *Am. J. Phys. Anthropol.* 49, 103-110.
- Gibbs, J. 1885. *A History of Aylesbury*, Aylesbury.
- Gilbert, B. M. and McKern, T. W. 1973. 'A Method for Ageing the Female Os Pubis', *Am. J. Phys. Anthropol.* 38, 31-38.
- Giles, E. 1970. 'Discriminant Function Sexing of the Human Skeleton', in Stewart, T. D. (ed.) 1970, 99-109.
- Goodall, I. H. 1982. 'The Medieval Blacksmith and his Products', in Crossley, D. W. (ed.), *Medieval Industry*, CBA Res. Rep. 40, 51-62.
- Grant, A. 1982. 'The Use of Tooth Wear as a Guide to the Age of Domestic Ungulates', in Wilson, R. *et al.* 1982, 91-108.
- Grover, F. 1936. *Practical Fur Cutting and Furriery*, London.
- Hanihara, K. and Suzuki, T. 1978. 'Estimation of Age from the Pubic Symphysis by means of Multiple Regression Analysis', *Am. J. Phys. Anthropol.* 48, 233-240.
- Harcourt, R. A. 1978. 'The Dog in Prehistoric and Early Historic Britain', *J. Archaeol. Sci.* 1, 151-75.
- Harding, D. W. 1972. *The Iron Age in the Upper Thames Basin*, Oxford.
- Head, J. F. 1946. 'Buckinghamshire AD 450-700', *Recs. Bucks* 14, 301-340.
- Henshall, A. S. 1951-2. 'Early Textiles Found in Scotland, 1', *Proc. Soc. Antiq. Scot.* 86, 1-29.
- Hodgson, G. W. I. forthcoming. (The Animal Bones from Perth.)
- Hodson, F. R. 1971. 'Three Iron Age Brooches from

- Hammersmith', in Sieveking, G. de G. (ed.), 'Pre-historic and Roman Studies', *Brit. Museum Quarterly* 35, 50-53.
- Hohler, C. 1966. 'St. Osyth and Aylesbury', *Recs. Bucks* 18, 61-72.
- Houghton, P. 1974. 'The Relationship of the Pre-auricular Groove of the Ilium to Pregnancy', *Am. J. Phys. Anthropol.* 41, 381-390.
- Hyslop, M. 1963. 'Two Anglo-Saxon Cemeteries at Chamberlain's Barn, Leighton Buzzard, Bedfordshire', *Archaeol. J.* 120, 161-200.
- Jones, G. G. 1980. 'The Animal Bones', in Farley, M. E., 'Middle Saxon Occupation at Chicheley, Buckinghamshire', *Recs. Bucks* 22, 99-110.
- Jones, G. G. forthcoming a. 'The Animal Bones', in Rogerson, A. and Dallas, C., 'Excavations at Thetford 1949-59 and 1973-77', *E. Anglian Arch.*
- Jones, G. G. forthcoming b. 'The Animal Bones', in Allen, D. forthcoming (q.v.)
- Jones, G. G. forthcoming c. (The Animal Bones from Buckingham.)
- Jope, E. M. 1956a. 'The Tinning of Iron Spurs, a Continuous Practice from the Tenth to Seventeenth Century', *Oxoniensia* 21, 35-42.
- Jope, E. M. 1956b. 'Saxon Oxford and its Region', in Harden, D. M. (ed.), *Dark Age Britain: Studies Presented to E. T. Leeds*, London, 234-258.
- Keene, D. J. 1982. 'Rubbish in Medieval Towns', in Hall, A. R. and Kenward, H. K. (eds), *Environmental Archaeology in the Urban Context*, CBA Res. Rep. 43, 26-30.
- King, A. 1978. 'A Comparative Survey of Bone Assemblages from Roman Britain', *Bull. Inst. Archaeol. Univ. London* 15, 207-232.
- Krogman, W. M. 1962. *The Human Skeleton in Forensic Medicine*, Illinois.
- Langdon, J. 1982. 'The Economics of Horse and Oxen in Medieval England', *Agr. Hist. Rev.* 30, 31-40.
- Lawrence, L. A. 1912, 1913, 1914. 'The Long-cross Penny of Henry III', *Brit. Numis. J.* 9, 145; 10, 69-93; 11, 101-119.
- Le Patourel, H. E. J., 1976. 'Pottery as Evidence for Social and Economic Change', in Sawyer, P. (ed.), *Medieval Settlement*, London, 169-179.
- Levitan, B. forthcoming. 'The Animal Bones', in Rahtz, S. and Rowley, R. T., *Middleton Stoney*, Oxford.
- LMMC 1940. *London Museum Medieval Catalogue*.
- Lund, C. 1981. 'The Archaeomusicology of Scandinavia', *World Archaeol.* 12, 246-265.
- MacGregor, A. 1982. 'Anglo-Scandinavian Finds from Lloyd's Bank, Pavement and Other Sites', in Addyman, P. (ed.), *The Archaeology of York* 17, 67-174.
- MacGregor, A. forthcoming. *The Technology of Skeletal Materials*, London.
- Maltby, J. M. 1979. *Faunal Studies on Urban Sites: the Animal Bones from Exeter 1971-75*, Sheffield.
- Manchester, K. and Elmhirst, O. E. C. 1980. 'Forensic Aspects of an Anglo-Saxon Industry', *Ossa* 7, 179-188.
- McKern, T. W. 1970. 'Estimation of Skeletal Age: from puberty to about 30 years age', in Stewart, T. D. (ed.) 1970.
- McKern, T. W. and Stewart, T. D. 1957. *Skeletal Age Changes in Young American Males Analysed from the Standpoint of Age Identification*, Environmental Protection Res. Div. (Quartermaster Res. and Div. Center, Nantick, Mass.) Tech. Rep. EP-45.
- Meany, A. L. and Hawkes, S. C. 1970. 'The Anglo-Saxon Cemeteries at Winnall', *Soc. Med. Arch. Monograph* 4.
- Miles, A. E. W. 1963. 'The Dentition in the Assessment of Individual Age in Skeletal Material', in Brothwell, D. R. (ed.), *Dental Anthropology*, 191-209.
- Moore, J. 1979. 'The Remains of a Seventeenth Century Clay Pipe Kiln at 13 Castle Street, Aylesbury, and the Pipes from a Probable Kiln Site at Whitehall Street', *Recs. Bucks* 21, 123-132.
- Moorhouse, S. 1971. 'Finds from Basing House, Hampshire (c. 1540-1645): Part Two', *Post-Medieval Archaeol.* 5, 35-76.
- Moorrees, C. F. A., Fanning, E. A. and Hunt, E. A. 1963. 'Formation and Resorption of Three Deciduous Teeth in Children', *Am. J. Phys. Anthropol.* 21, 205-213.
- Morris, R. 1983. *The Church in British Archaeology*. CBA Res. Rep. 47.
- Noddle, B. A. 1975. 'A Comparison of the Animal Bones from Eight Medieval Sites in Southern Britain', in Clason, A. T. (ed.), *Archaeozoological Studies*, Amsterdam, 248-260.
- Noddle, B. A. 1976. 'The Animal Bones from Walton', in Farley, M. E. 1976, 269-289.
- Noddle, B. A. 1980. 'The Animal Bones', in Wade-Martins, P., 'Excavations at North Elmham Park 1967-72', *E. Anglian Archaeol.* 9, 375-412.
- O'Connor, T. 1982. *Animal Bones from Flaxengate Lincoln 870-1500*, The Archaeology of Lincoln XVIII-1, London.
- Oliver, G. 1969. *Practical Anthropology*, Illinois.
- Oliver, G. and Pineau, H. 1960. 'Nouvelle Determination de la Taille Foetale d'après les Longueurs Diaphysaires des Os Long', *Ann. Med. Leg.* 40, 297-301.
- Oswald, A. 1975. *Clay Pipes for the Archaeologist*, Brit. Archaeol. Rep. (Brit. Ser.) 14.
- Pantin, W. A. 1962-3. 'Medieval English Town-House Plans', *Medieval Archaeol.* 6-7, 202-239.

- Payne, S. 1973. 'Kill-off Patterns in Anatolian Sheep and Goats: the Mandibles from Asvan Kale', *Anatolian Studies* 23, 282-303.
- Pernetta, J. 1973. 'The Animal Bones', in Robinson, M. 1973, 112-115.
- Phenice, T. W. 1969. 'A Newly Developed Visual Method of Sexing the Os Pubis', *Am. J. Phys. Anthropol.* 30, 297-301.
- Platt, C. and Coleman-Smith, R. 1975. *Excavations in Medieval Southampton* 1-2, Leicester.
- Priest, St. J. 1810. *General View of the Agriculture of Buckinghamshire*, London.
- Putschar, W. G. J. 1976. 'The Structure of the Human Symphysis Pubis with special consideration of Parturition and its Sequelae', *Am. J. Phys. Anthropol.* 45, 589-594.
- Rackham, B. 1953. *Medieval English Pottery*, London.
- Rackham, D. J. 1975. 'The Animal Bones', in Hall, R. A., 'An Excavation at Hunter Street, Buckingham, 1974', *Recs. Bucks* 20, 125-133.
- Radley, J. 1971. 'Economic Aspects of Anglo-Danish York', *Medieval Archaeol.* 15, 37-57.
- Rahtz, P. 1978. 'Grave Orientation', *Archaeol. J.* 135, 1-14.
- Reed, M. 1978. 'Markets and Fairs in Medieval Buckinghamshire', *Recs. Bucks* 20, 563-585.
- Reed, M. 1979. *The Buckinghamshire Landscape*, London.
- RIC VII. Brunn, P. M. 1966. *The Roman Imperial Coinage* VII, London.
- Robinson, M. 1973. 'Excavations at Copt Hay, Tetsworth, Oxon', (M40 Site 4), in Hinton, D.A. and Rowley, R. T. (eds), 'Excavations on the Route of the M40', *Oxoniansia* 38, 41-115.
- Robinson, M. and Wilson, R. 1983. 'A Survey of Environmental Archaeology in the South Midlands', unpublished circulated typescript.
- Rodwell, W. 1981a. 'Wells', *Curr. Arch.* 7, 105-106.
- Rodwell, W. 1981b. *The Archaeology of the English Church*, London.
- Rose, W. 1937. *The Village Carpenter*, Cambridge.
- Saunders, C. 1971. 'The Pre-Belgic Iron Age in the Central and Western Chilterns', *Archaeol. J.* 128, 1-30.
- Schour, I. and Massler, M. 1941. 'The Development of the Human Dentition', *J. Am. Dent. Assoc.* 28, 1153-1160.
- Schranz, D. 1959. 'Age Determination from the Internal Structure of the Humerus', *Am. J. Phys. Anthropol.* 17, 273-277.
- Seddon, D. Calvoressi, D., Cooper, C., with Higgs, E. S. 1964. 'Fauna', in Addyman, P. V., 'Dark Age Settlement at Maxey, Northants', *Medieval Archaeol.* 8, 69-71.
- Sherlock, R. L. 1922. *The Geology of the Country around Aylesbury and Hemel Hempstead*, London.
- Smith, R. N. 1969. 'Fusion of Ossification Centres in the Cat', *J. Small Mammal Practit.* 10, 523-530.
- Steele, D. G. 1970. 'Estimation of Stature from Fragmentary Remains of Long Limb Bones', in Stewart, T. D. (ed.) 1970, 85-97.
- Steele, D. G. 1976. 'The Estimation of Sex on the Basis of the Talus and Calcaneus', *Am. J. Ohys. Anthropol.* 45, 581-588.
- Stenton, F. M. 1947. *Anglo-Saxon England*, Oxford.
- Stewart, T. D. 1970. 'Identification of the Scars of Parturition in Skeletal Remains of Females', in Stewart, T. D. (ed.), *Personal Identification in Mass Disasters*, Washington, 127-135.
- Stewart, T. D. 1979. *Essentials of Forensic Anthropology*, Illinois.
- Stuiver, M. 1982. 'A High Precision Calibration of the AD Radiocarbon Time Scale', *Radiocarbon* 24(1), 1-26.
- Suchey, J. M., Wiseley, D. V., Green, R. F. and Noguchi, T. T. 1979. 'Analysis of Dorsal Pitting in the Os Pubis in an Extensive Sample of Modern American Females', *Am. J. Phys. Anthropol.* 51, 517-540.
- Thieme, F. P. and Schull, W. J. 1957. 'Sex Determination from the Skeleton', *Human Biology* 29, 242-273.
- Todd, T. W. 1920. 'Age Changes in the Pubic Bone 1: the Male White Pubis', *Am. J. Phys. Anthropol.* 3, 285-334.
- Toulmin-Smith, L. (ed.) 1964. *The Itinerary of John Leland* 2.
- Trotter, M. 1970. 'Estimation of Stature from Intact Long Limb Bones', in Stewart, T. D. (ed.) 1970, 71-83.
- Trow-Smith, R. 1957. *A History of British Livestock Husbandry to 1700*, London.
- Ubelaker, D. H. 1978. *Human Skeletal Remains*, Chicago.
- Ucko, P. J. 1969. 'Ethnography and Archaeological Interpretation of Funerary Remains', *World Archaeology* 1, 262-280.
- Veale, E. M. 1966. *The English Fur Trade in the Later Middle Ages*, Oxford.
- V.C.H. Bucks. Page, W. (ed.), *The Victoria History of the County of Buckinghamshire* I-IV, London.
- Verhaeghe, F. 1983. 'Medieval Pottery Production in Coastal Flanders', in Davey, P. and Hodges, R. (eds), *Ceramics and Trade*, Sheffield, 63-94.
- von den Driesch, A. 1976. *A Guide to the Measurement of Animal Bones from Archaeological Sites*, Harvard.
- von den Driesch, A. and Boessneck, J. 1974. 'Kritische Anmerkungen zur Widerristhöhenberechnung aus Längenmassen vor- und frühgeschicht-

- lichen Tiernocken', *Saugetierkundliche Mitteilungen* 22 (4), 325-348.
- Washburn, S. L. 1948. 'Sex Differences in the Pubic Bone', *Am. J. Phys. Anthrop.* 6, 199-208.
- Waugh, H., Mynard, D. C. and Cain, R. 1974. 'Some Iron Age Pottery from Mid and North Bucks with a Gazetteer of Associated Sites and Finds', *Recs. Bucks* 19, 373-421.
- West, B. 1982. 'Spur Development: Recognising Caponised Fowl in Archaeological Material', in Wilson, R. *et al.* 1982, 255-261.
- Wheeler, A. C. 1969. *The Fishes of the British Isles and North-West Europe*, London.
- Williams, J. H. 1982. 'Middle Saxon "Palaces" at Northampton', *Curr. Archaeol.* 8, 38-40.
- Wilson, C. E. 1981. 'Burials within Settlements in Southern Britain during the Pre-Roman Iron Age', *Bull. Inst. Archaeol. Univ. London* 18, 127-169.
- Wilson, D. M. 1976. 'Introduction', in Wilson, D. M. (ed.), *The Archaeology of Anglo-Saxon England*, London.
- Wilson, R. forthcoming. (The Animal Bones from Market Place, Abingdon.)
- Wilson, R., Grigson, C. and Payne, S. (eds) 1982. *Ageing and Sexing Animal Bones from Archaeological Sites*, Brit. Archaeol. Rep. (Brit. Ser.) 109.
- Zeuner, F. E. 1963. *A History of Domesticated Animals*, London.

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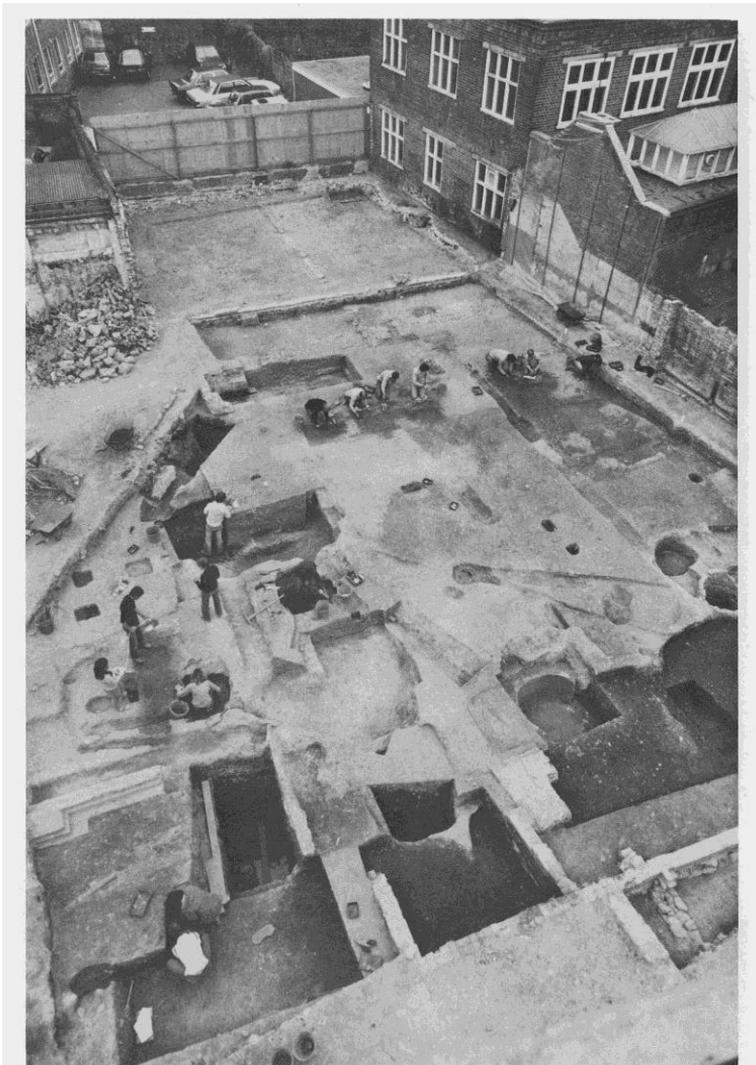


Plate 1 Overall view of George Street Excavation 1981.

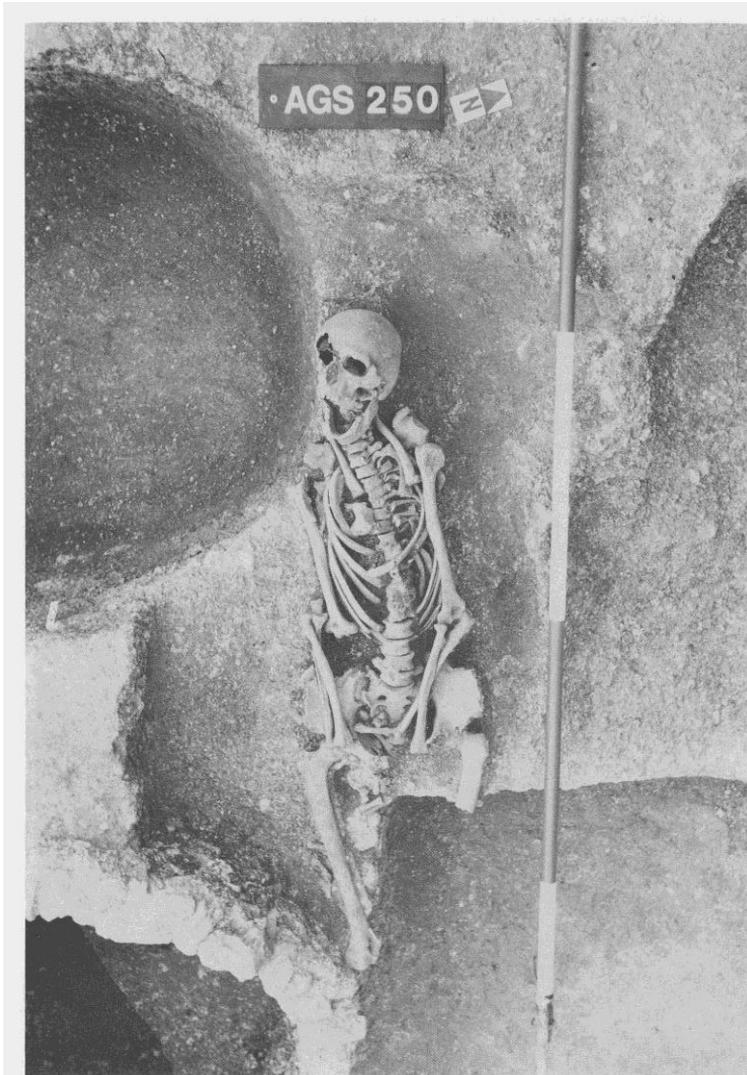


Plate II Middle Saxon burial 250 (grave 9), cut by modern features.

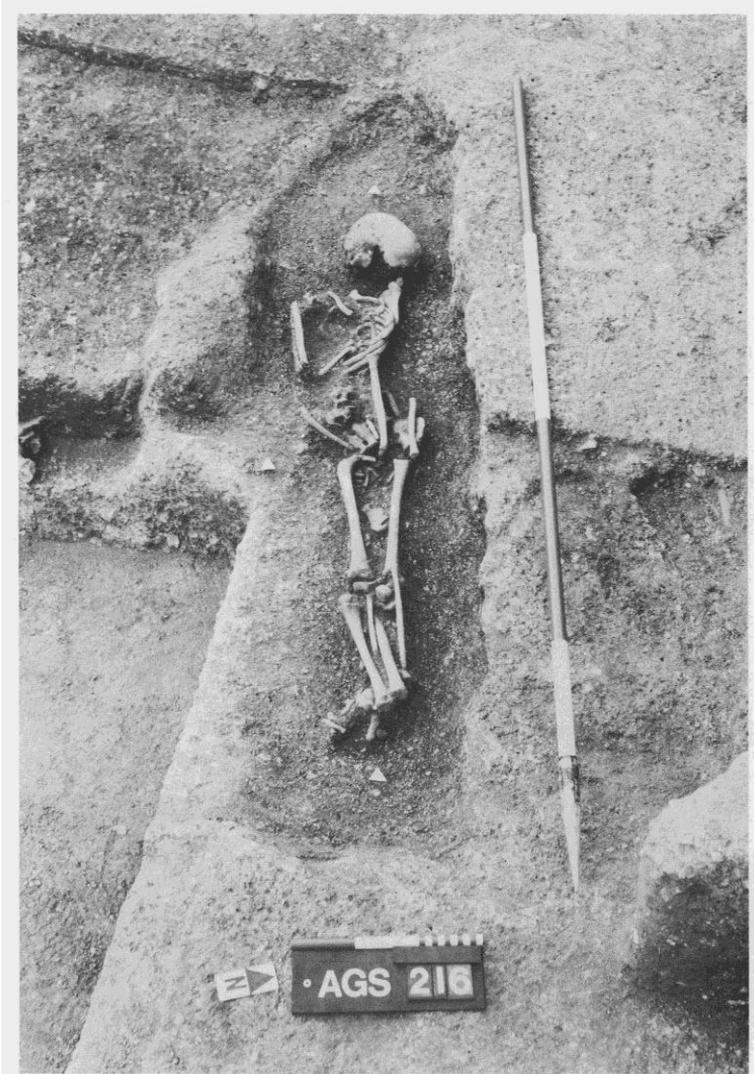


Plate III Middle Saxon burial 216 (grave 11), cut by modern features.



Plate IV Middle Saxon burials re-interred in a 17th century pit (context 282, pit 339)

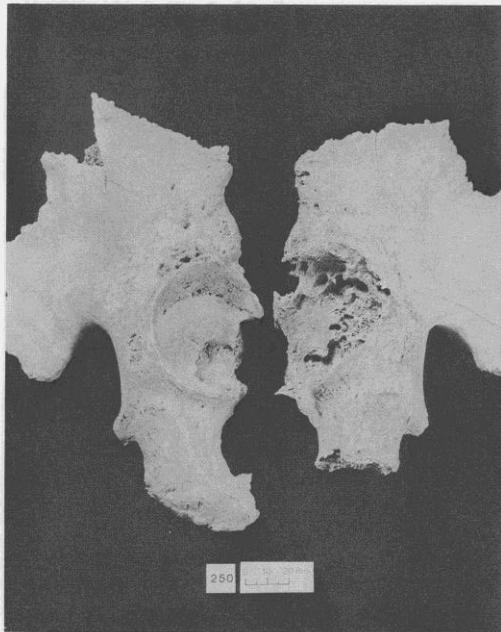


Plate V (a) Skeleton 250: Posterior view of innominates to illustrate hip arthritis. Left bone to the right of the photograph. (English Heritage).

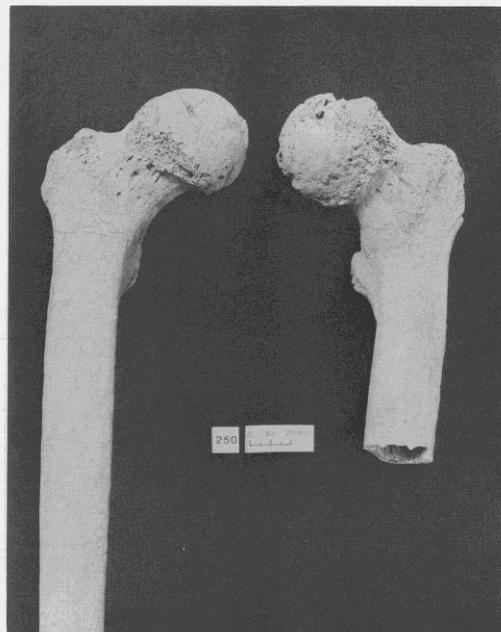


Plate V (b) Skeleton 250: Anterior view of femora to illustrate arthritis. Left bone to the right of the photograph. (English Heritage).



Plate VI (a) Skeleton 250. Anterior view of left scapula with fractured neck. (English Heritage).

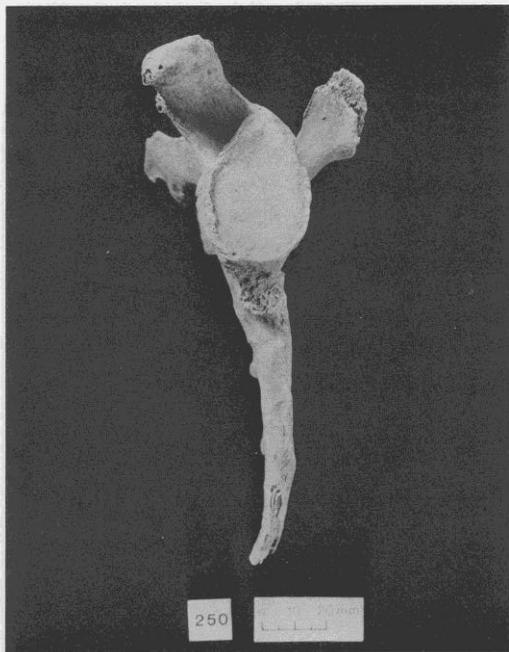


Plate VI (b) Skeleton 250: Medial view of left scapula with fractured neck. (English Heritage).

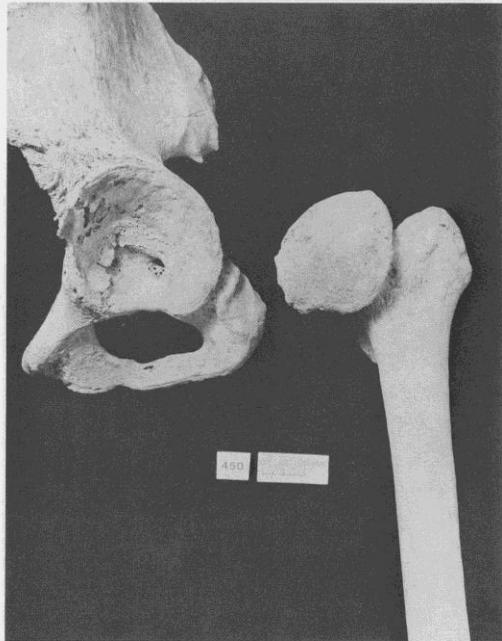


Plate VII(a) Skeleton 450: Probable joint dysplasia of the left hip with associated arthritis. (English Heritage).

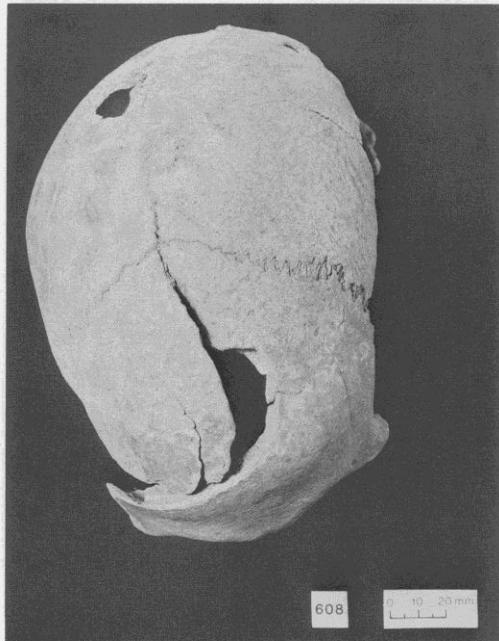


Plate VII(b) Skeleton 608: Superior view of skull showing cuts on the right parietal and frontal bones. (English Heritage).



Plate VIII (a) Two broken cat femora, with normal bone below for comparison. (S. Rahtz).



Plate VIII (b) Bones from an injured dog: the right femur (on the left of the photograph) is broken and not reunited. (S. Rahtz).