Excavations at Broad Street, Abingdon

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SUMMARY

Three main phases of activity were identified on the site. The Roman period is represented by ditches of second-, third- and fourth-century date. Pits of eleventh- to fifteenth-century date and the remains of a stone building were associated with the medieval period. The third phase of activity occurred in the post-medieval period, with evidence of malting, horticulture and pit digging.

INTRODUCTION

THE Broad Street site is on the second gravel terrace of the River Thames.[1] Excavation took place throughout July, August and September, 1973, in areas limited by non-archaeological factors, i.e. the presence of existing buildings and the location of the foundations of the proposed new buildings.

HISTORICAL BACKGROUND

The earliest documentary evidence for activity on the site of Abingdon is to be found in the charters which relate to the foundation of a monastery to the east of the present town in the late seventh century.[2] The fortunes of the monastery fluctuated throughout the eighth and ninth centuries, but by the late tenth century it had entered into a period of rapid growth and economic prosperity.[3] The reference in the Domesday Book to the ' ten traders before the gate ', is a clear indication that the abbey maintained a dominant position in the economic life of the town in the eleventh century. A street plan of medieval Abingdon shows the Abbey Gate and Market Place as a focal area, with St. Helen's Church forming another to the south.[4] The documentary evidence therefore suggests that these two focal areas and their accompanying streets were probably in existence by the tenth century.

Broad Street is some distance from these two areas. It is hardly surprising, therefore, that there is little evidence of activity on the site in the post-Roman period until the eleventh century, for which there is numismatic evidence, a coin of Cnut dated 1031–5,[5] from Pit 26, Trench III. The first documentary reference to Broad Street occurs in 1316.[6] ' Brodestrete ' is referred to in 1404[7] and in 1473 the Broad

[1] Geological Survey Map, sheet 253.

[2] M. Biddle *et al.*, ' The Early History of Abingdon, Berkshire and its Abbey ', *Medieval Archaeology*, XII (1968), 26.

[3] Sir F. Stenton, *Anglo-Saxon England* (1971), 433–67.

[4] *Op. cit.* note 2, 28.

[5] The coins have been examined and dated by the staff of the Ashmolean Museum coin room. The coins from the site are described on pp. 45–6.

[6] A. C. Baker, *Historic Streets of Abingdon* (1957), 22.

[7] J. Townsend, *A History of Abingdon* (1970), 170.

Street area was being worked as a farm by the monks of Abingdon Abbey.[8] The site was let to tenant farmers before the Dissolution, and was the location of a homestead and farm buildings which accompanied the lease of a ninety-two acre farm.[9] The site consequently assumed the names of the various tenants and last took the name of ' Goodlucks Farm ', in the sixteenth century.[10]

At the time of Amyce's survey in 1554 there were twelve houses on the south side of Broad Street and four tenements and three separate gardens on the north side.[11] A lease of 1762 between Michael Rawlins and the Borough of Abingdon refers to the construction of a Malthouse and various other buildings which comprise ' the entry oast kitchen, screening house and brewhouse to the said messuage and malthouse belonging and the barley granary and malt granary '.[12]

The lease also refers to an earlier malthouse which stood on the same site and which was ' demolished and pulled down ' by the grandfather of Michael Rawlins at some unspecified date. On the Christ's Hospital map of 1844[13] the area is shown as open and the use of the land for malting purposes must have ended by that date. The 1960 Ordnance Survey six inch map of Abingdon shows the area behind Broad Street as a nursery garden.

THE EXCAVATION

Trench I (FIGS 2, 3, and 7 ; PL. I, A)

Trench I, 3 m. E.–W. × 10 m. N.–S., was adjacent to the frontage of Broad Street, and it was hoped to locate the foundations of the pre-nineteenth-century buildings which had stood on the site. The east section of the Trench (FIG. 7) shows the stratigraphy. Below a layer of modern concrete, layer 1, was a layer of black garden soil, layer 8, up to 40 cm. thick, down to the level of the natural clay. Layer 8 was cut by various service trenches, including a concrete drain, Feature 2. After the removal of layer 8, the natural clay was trowelled and a number of archaeological features were recognized cut into the clay and underlying gravel.

The Features

The earliest feature in Trench I was Feature 35 (FIG. 3), a Roman ditch cut into the natural at the southern end of the trench. The ditch was of ' palisade ' type, having a V-shaped profile overcut at the bottom by the width of a shovel. The ditch was sectioned longitudinally but no post voids were observed. The ditch was 1·30 m. wide and 80 cm. deep. The fill was reddish-brown, silty clay overlying cleaner clay. The pottery from the ditch dates it to the early second century.

Two post-holes, Features 16 and 17 (FIG. 3), were also located at the south end of the trench. Feature 16 was cut into the natural to a depth of 50 cm. Its fill was brown loam, flecked with gravel and charcoal. Three sherds of unglazed medieval pottery of 12th-13th-century date were recovered from the fill of Feature 16. Post-

[8] A. E. Preston, *St. Nicholas, Abingdon and other papers* (1971), 46.
[9] *Ibid.*, 46.
[10] *Ibid.*, 46.
[11] *Op. cit.* note 6, 22.
[12] This lease is one of a large collection of leases stored in the County Hall Museum, Abingdon.
[13] This map is stored in the County Hall Museum, Abingdon.

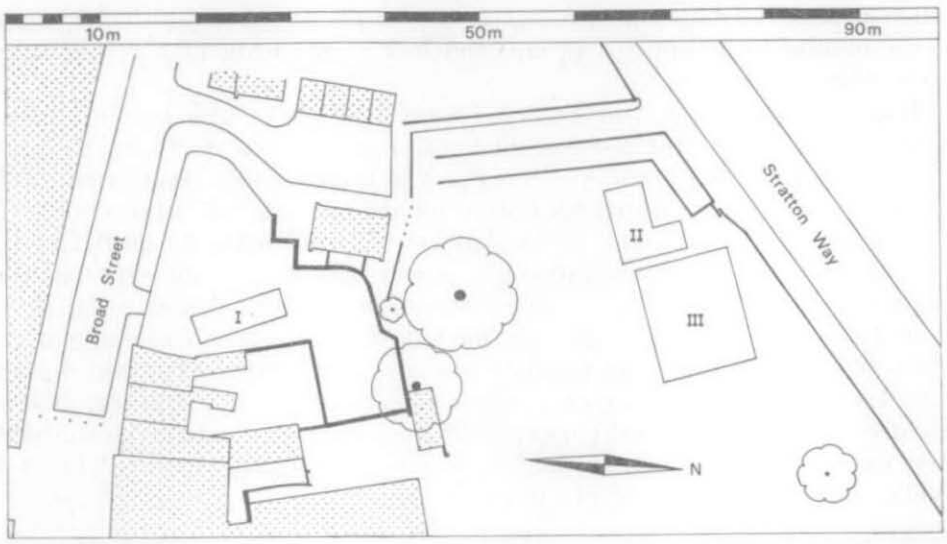

FIG. 2
Site Plan.

hole 17 was cut into the fill of 16. It was cut into the natural to a depth of 75 cm. and had a fill of brown clayey-loam. 26 sherds of medieval pottery were recovered from the fill, six of which were glazed. This pottery is late 13th- or 14th-century. Both post-holes were sectioned but no post voids were recognized. Fragments of stone (possibly the remains of packing stones) were recovered from each post-hole.

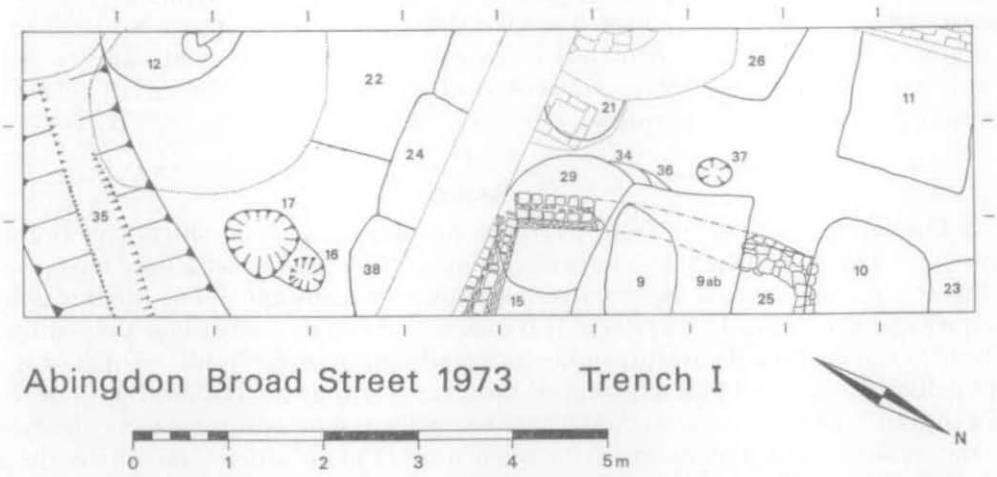

FIG. 3
Trench I, Plan.

Another post-hole, Feature 37 (FIG. 3), in the northern end of the trench, was cut into the natural to a depth of 15 cm. and had a grey loam fill. No finds were recovered from the feature.

The remaining features in Trench I were pits, two of which were medieval, Pits 12 and 15a (FIG. 3), the rest post-medieval, Pits 9, 9a, 9b, 10, 11, 15, 21, 22, 23, 24, 25, 26, 29, 36, and 38 (FIG. 3). Pit 15a was disturbed to a great extent by Pits 9, 9a, 9b, 15, 25, and 29, which cut into its fill and left very little of it intact. The pit was lined with unmortared limestone blocks which survived at the north and south ends. Two fine, semi-complete 13th-14th-century jugs[14] were recovered from the fill, which was greenish-brown loam. The other medieval pit in Trench I, Pit 12, had had most of its fill removed by an early modern pit, and consequently only a small quantity of pottery of indeterminate date was recovered from it. The post-medieval pits in Trench I contained larger amounts of pottery, but a great deal of it was residual Roman and medieval pottery. The noteworthy sherds of post-medieval pottery from these pits is discussed in the post-medieval pottery report. The section through most of these pits is shown in FIG. 7.

Trench II (FIGS 4, 5, 6, 10, and 11 ; PL. I, B)

Trenches II and III were 50 m. north of Broad Street in the car park, and were designed to sample the hinterland of the site in an area where contractors' test bores had revealed substantial depths of made-up ground.

Trench II was 8 m. E.-W. × 7 m. N.-S. The north-west corner of the trench, an area 3 m. N.-S. × 5 m. E.-W., was not excavated because of its proximity to a known modern disturbance. The south section (FIG. 10) and the centre section (FIG. 11) show the stratigraphy encountered in Trench II. Layer 1, the tarmac of the car park surface, and layer 2, the compacted gravel make-up for the car park, were removed. Below layer 2 was a layer of black stoney soil, layer 5. A large early modern pit, Pit 3, was cut through layer 5. After the removal of layer 5, another layer of black loamy soil, layer 6, was located. This was similar to layer 5, but was looser and less stoney. Various post-medieval features were cut into layer 6. These features were removed and then layer 6 was removed down to the natural clay. At the level of the natural, more archaeological features were located, cut into the natural clay and underlying gravel.

The Features

The earliest features in Trench II were two Roman ditches, Ditches 41 and 23 (FIG. 4). The fill of Ditch 41 was brown, clayey, loam flecked with limestone, over a layer of red clay, which in turn overlay a layer of sandy silt. The ditch was U-shaped and was *c.* two metres deep, two metres wide, and was cut into the natural. The *terra sigillata* from the feature indicates a Hadrianic date for its fill. Ditch 23 was of ' palisade ' type and had a V-shaped profile, overcut at the bottom by the width of a shovel. The ditch was sectioned longitudinally, but no post voids were observed in the section. The dimensions of the ditch were 1·30 m. wide by one metre deep. The fill of the ditch was reddish-brown, clayey loam flecked with limestone above a

[14] Numbers 135 and 136, Fig. 35.

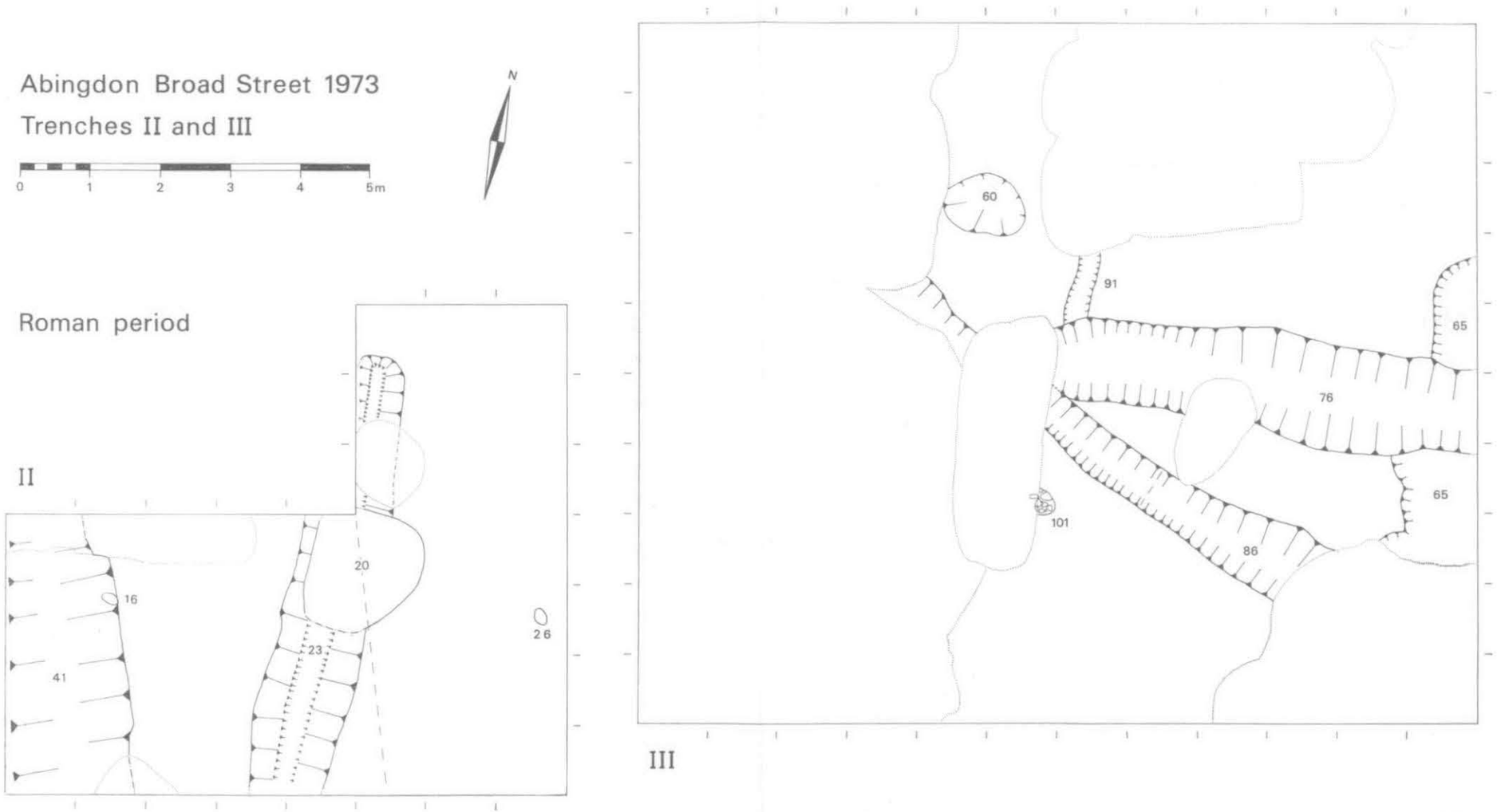

FIG. 4
Trenches II and III, Roman Period Plan

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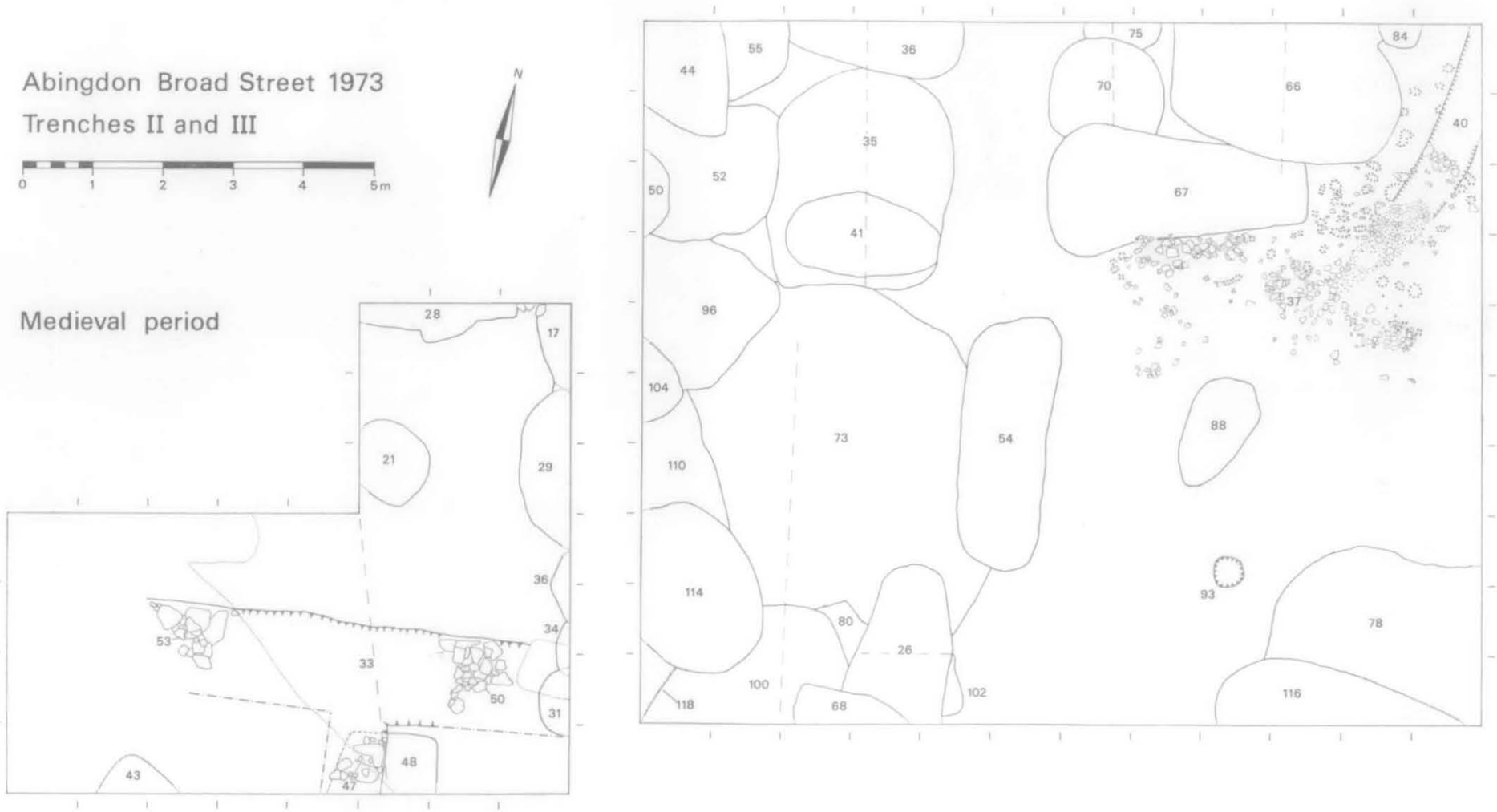

FIG. 5
Trenches II and III, Medieval Period Plan.

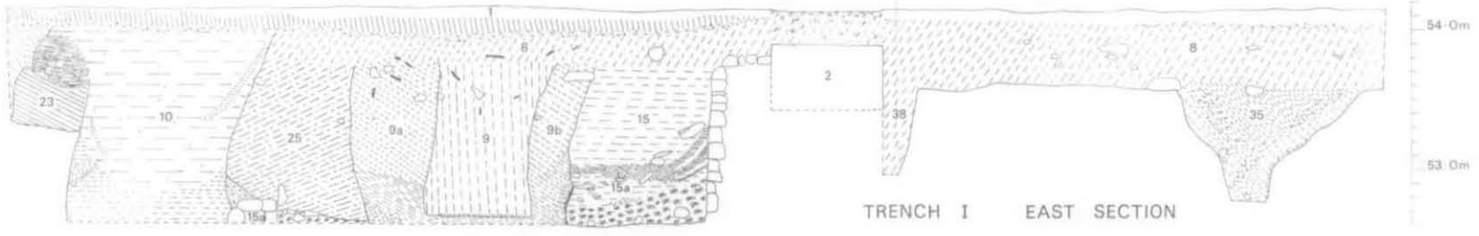

FIG. 7
Trench I, East Section.

Layers:

1 Concrete.
2 Concrete drain.
8 Black soil.
9 Grey-brown powdery soil with tile and stone fragments.
9 a&b Black loamy soil becoming gravelly toward bottom.
10 Dark grey loamy soil becoming gravelly toward bottom.
15 Brown stoney loam overlying charcoal and ashy soil.
15a Stone lining of a cess-pit and fill of greenish brown loam.
23 Grey-black loam underlying layer of flat stones
25 Grey-brown loam.
35 Reddish-brown silty clay overlying cleaner red clay flecked with small stones.
38 Black loamy soil.

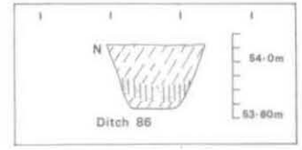

FIG. 9
Trench III, Ditch 86.

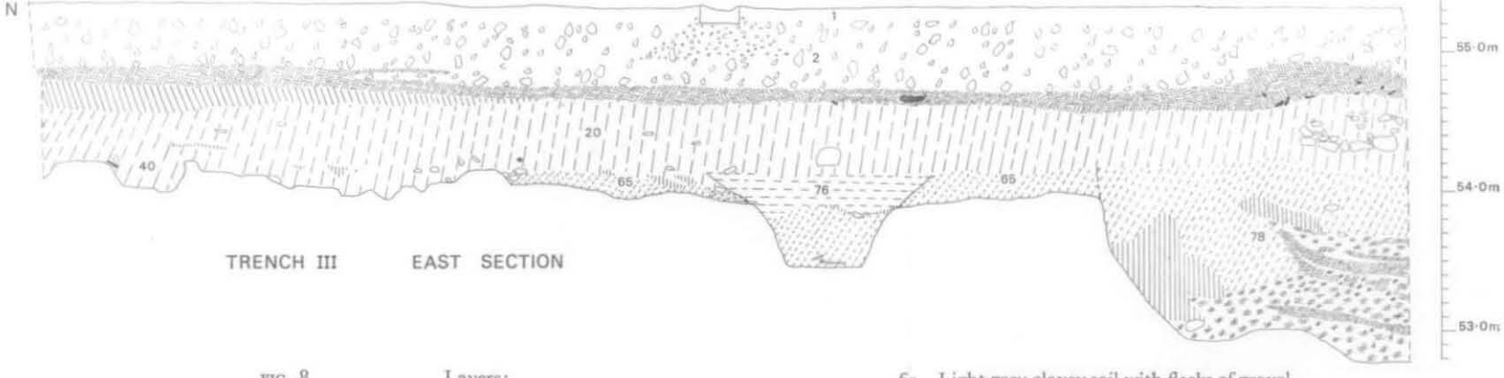

FIG. 8
Trench III, East Section.

Layers:

1 Tarmac.
2 Gravel and ballast.
20 Black soil.
40 Brown loam.
65 Light grey clayey soil with flecks of gravel.
76 Grey soil above grey clayey soil with patch of ashy charcoal at the bottom.
78 Grey soil with lenses of clay, charcoal and ash and greeny brown loam.

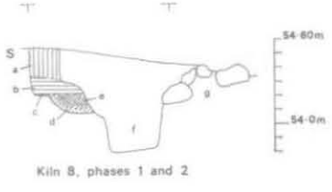

FIG. 10
Trench II, Kiln 8 Section.

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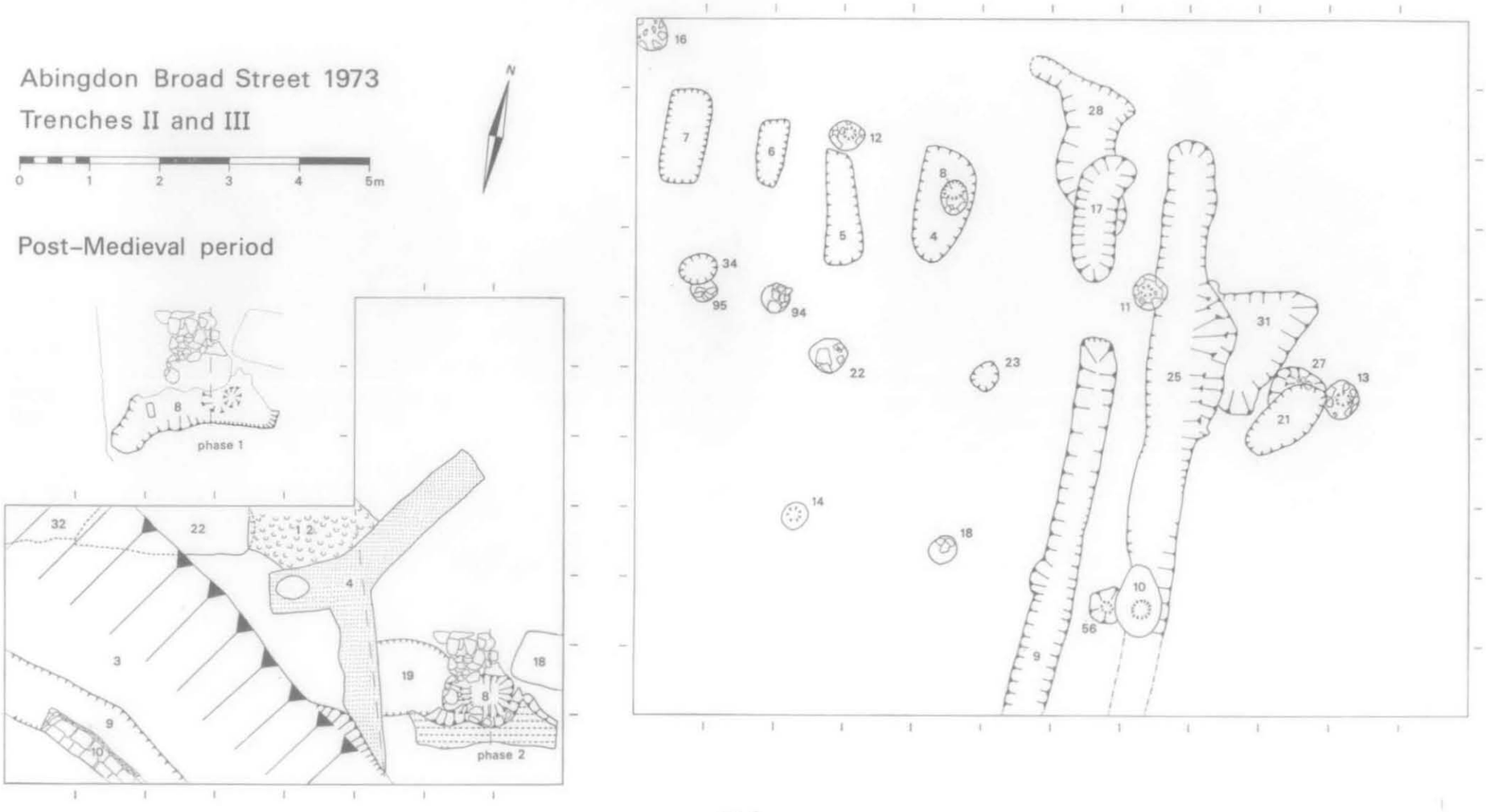

FIG. 6
Trenches II and III, Post-medieval Period Plan.

layer of charcoal and ash. The charcoal and ash layer overlay silty sand and clay. The pottery from the ditch dates it to the first half of the fourth century. A shallow Roman pit, Pit 20, was cut into the fill of Ditch 23. The fill of the pit was black, humic soil. The pottery from the feature and its stratigraphic position indicate a date in the second half of the fourth century for Pit 20.

Two baby burials were excavated in Trench II, Features 16 and 26 (FIG. 4). Burial 16 was cut into the top fill of Ditch 41 and was disturbed by a large early modern pit, Pit 3. Burial 26 lay in a small shallow feature which may have been a grave, and was disturbed by medieval Pit 36.[15]

The medieval features in Trench II consisted of pits and the remains of a robbed-out building of probable late medieval date. Because of the physical position of the Trench II pits adjacent to the sections of the trench (Pits 17, 28, 29, 31, 34, 36, 43 and 48, FIG. 5), it was only possible to excavate small portions of them. Consequently, the amount of material recovered from them was not sufficient to make them significant archaeological features. It was possible to excavate most of Pit 21 (FIG. 5), but a large proportion of the pottery recovered from the pit was residual Roman (probably derived from Ditch 23 into which it was cut) and only a small number of sherds were medieval and suitable for dating the feature. The Trench II medieval pits were similar in date and character to the medieval pits in Trench III. Only Pit 48 (FIG. 5) is discussed further in this report.

Pit 48, whilst it contained only a small amount of material, has some significance in dating the late medieval building mentioned above. It had a fill of grey-brown clay-flecked loam, and was cut into the natural to a depth of 60 cm. Feature 47 (FIG. 5), part of the surviving foundation of the late medieval building, overlay Pit 48. The pottery from the feature indicates a date in the 12th century for its fill. The foundations of the late medieval building were composed of unmortared coral rag and limestone. Two other portions of the foundations had survived the robbing, Features 53 and 50 (FIG. 5). The line of the wall of the building was indicated by Robber Trench 33 (FIG. 5), which was cut from the level of layer 6. The fill of Robber Trench 33 was brown, mortary loam containing fragments of tile and limestone. A small amount of pottery was recovered from it. The pottery was fragmentary and not readily datable, but the stratigraphical position of the robber trench (FIG. 12) dates it to the post-medieval period.

The other features cut through layer 6 were Features 4, 8, 18, 19, 22, and 32 (FIG. 6). Feature 4 was the foundation of the wall of a building with an obtuse-angled north wall and with a buttress on its corner. The composition of the foundations was a mixture of sandy mortar, charcoal and brown soil, which was cut into layer 6 to a maximum depth of 25 cm. A shallow, circular depression on the buttress foundation may indicate the position of a post-hole. A patch of tile cobbling, Feature 12, in the angle formed by the buttress and the north wall of the building was below layer 5 and above layer 6. Feature 12 was cut by Pit 22.

Feature 4 enclosed an area of burnt clay and ash, Feature 8, and two small pits, Features 18 and 19. Feature 8 was sectioned and interpreted as the ash pit of a kiln with two phases of use. (The section of Feature 8 is shown in FIG. 10.) The phase 1 ash pit comprised layers a, b, c, d, e and probably layer g. Layer e was the fill of

[15] The two baby burials have been examined by Mr. Eric Edwards and are discussed on pp. 48–9.

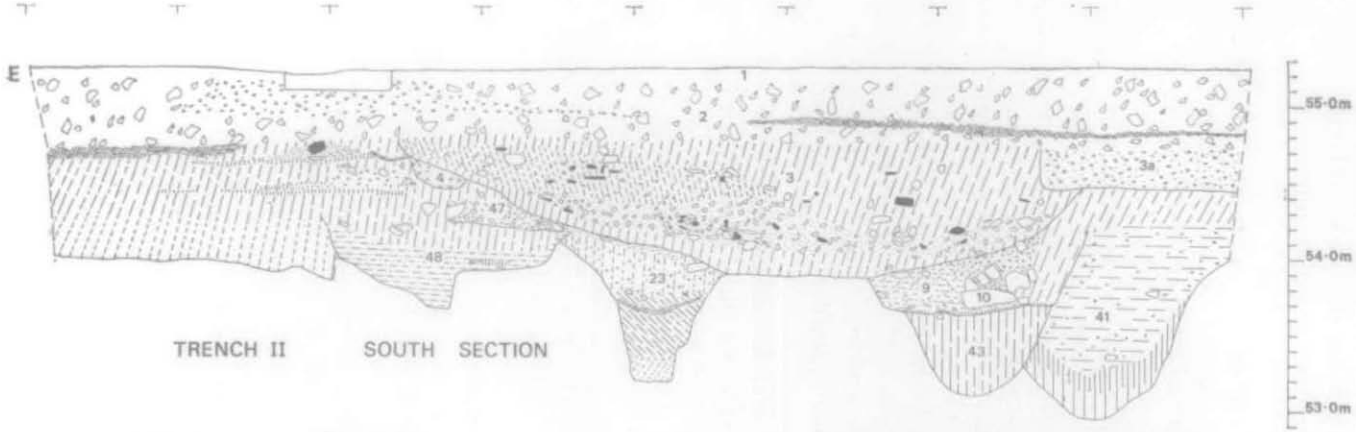

FIG. 11
Trench II, South Section.

Layers:

1 Tarmac.
2 Gravel and ballast.
3 Brown loam with tips of layers of gravel, mortar, stone and tile.
3a Brown very gravelly soil.
4 Mortary charcoaly soil.
9 Grey-brown loam flecked with clay and mortar.
10 Mortared limestone wall foundation.
23 Reddish brown clayey loam above layer of charcoal and ash, and layer of clayey loam and sandy silt.
41 Brown clayey loam flecked with limestone above layer of red clay over sandy silt.
43 Dark brown loam.
47 Limestone wall foundation.
48 Grey-brown loam with clay flecks.

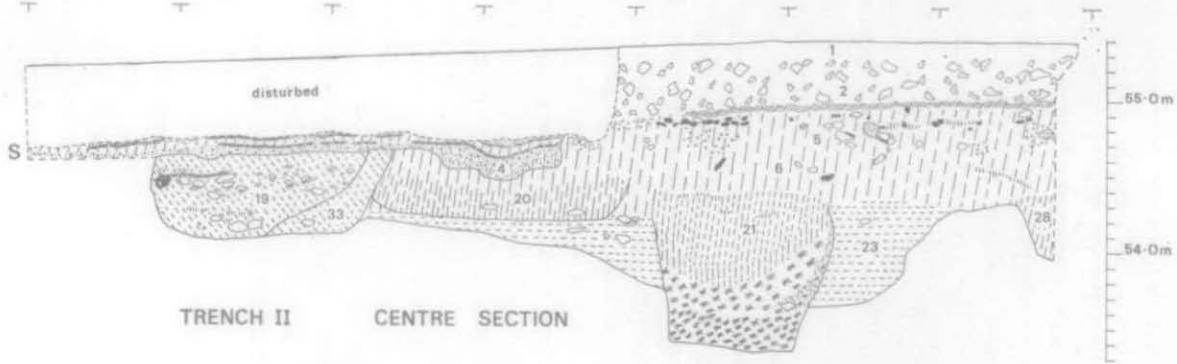

FIG. 12
Trench II, Centre Section.

Layers:

1 Tarmac.
2 Gravel and ballast.
4 Mortary, charcoaly soil.
5 Black stoney soil.
6 Black soil.
19 Brown loam with clay, ash, stone and tile fragments.
20 Black soil.
21 Black clay flecked soil above green-grey gravelly soil.
23 Grey stoney loam.
28 Black soil.
33 Brown mortar flecked loam.

the phase 1 ash pit and layers a, b, c and d the collapsed clay superstructure of the phase 1 ash pit. Layer g (Feature 50) was a portion of the surviving foundations of the late medieval building mentioned above and probably formed the north side of the phase 1 ash pit. In phase 2 a square hole 80 cm. wide and 80 cm. deep was cut through the phase 1 layers to form a new deeper ash pit. The hole was 35 cm. square at the base and was filled with a mixture of clayey loam, ash and fragments of tile and limestone, layer f. A few sherds of post-medieval pottery, of indeterminate date, were recovered from layer f. Layer g formed the north side of the ash pit.

Feature 18 may be associated with Feature 8 but its function is difficult to define. Feature 19 was partially below Feature 4, but cut Feature 8 and Feature 33. The fill of 18 was a mixture of brown loam and limestone rubble and the fill of 19 was brown clayey loam, ash and limestone rubble.

Pits 22 and 32 were situated outside Feature 4. Pit 22 was cut into the natural to a depth of 1·50 cm. and was cut by the early modern Pit 3. The fill of 22 was very ashy grey loam flecked with charcoal. Pit 32 had a similar fill to Pit 22. It was not possible to define the relationship of 22 and 32, as most of the fill of 32 had been cut away by Feature 3. Pits 18, 19, 22 and 32 all contained very small amounts of pottery and are not readily datable. Their stratigraphical position, however, indicates that they are post-medieval.

After the removal of layer 2 a large pit, Pit 3 (FIG. 6), was recognized in the south-west corner of the trench. The fill of Pit 3 was a mixture of brown loam, gravel, mortar, stone and tile. The pit was cut through layers 5 and 6 and had disturbed the fills of Features 41 and 43. The latest pottery from the pit was late 19th- and 20th-century. Below Pit 3 was the mortared limestone foundation of a wall, Feature 10 (FIG. 6). Feature 9 (FIG. 6) is interpreted as the construction trench for the wall ; it was parallel to Wall 10, and was *c.* 40 cm. wide. Feature 9 was cut into Features 43 and 41 to a depth of *c.* 35 cm. The pottery from the feature was similar in date to that from Feature 3.

Trench III (FIGS. 2, 4, 5, 6, 8–10, 13 and 14 ; PL. II, A, B)

Trench III was 12 m. E.-W. × 10 m. N.-S. The stratigraphy is shown in FIG. 8. Layers 1 and 2, the car park surface and the gravel make-up for the car park were removed onto a layer of black soil, layer 20. Layer 20 was removed in 10 cm. spits and was trowelled after the removal of each spit. The first 10 cm. spit was compacted and stoney, the equivalent of layer 5 in Trench II. After the first spit was removed various post-medieval features were recognized, cut into layer 20. A late medieval pit, Pit 26, was also recognized at this level. Layer 20 was removed down to the level of the natural clay. At the level of the natural, various pits and ditches were located, cut into the natural clay and underlying gravel. Soil changes which were observed within layer 20 coincided with the position of some of the pits, but it was not possible to define any of the pits until the level of natural was reached. It was possible to define the edges of most of the pits on the east side of the trench at the level of the natural. The pits on the west side of the trench were more difficult to define as they were nearly all cut into each other and the fills were very similar. The soil above the western pits was lowered in 5 cm. spits until the edges of the pits were

recognized. By careful trowelling it proved possible to define all the pits and to see the relationship of some of them in plan. The relationships of the remaining pits were defined by sectioning them at the appropriate point.

The Features

The earliest Trench III features were two Roman ditches, Features 76 and 86 (FIG. 9), two slots of Roman date, Features 65 and 91, a pit, Feature 60, and a stone-packed post-hole, Feature 101 (FIG. 4). One sherd of Roman pottery was recovered from Pit 60, which was cut into the natural to a depth of 10 cm. and one sherd of Roman pottery was recovered from 101, which was cut into the natural to a depth of 15 cm. and was cut by medieval Pit 54. The fill of both features was brown loamy soil. Slot 65 was irregular in shape with a maximum width of *c.* 1·20 m. It was cut by Ditch 76 (FIG. 8). The fill of 65 was grey soil with flecks of clay, limestone and gravel. Pottery from the fill and its relationship with Ditch 76 suggests a date of *c.* 250 A.D. for 65.

Ditch 76 was flat-bottomed and cut into the natural. Its depth was 70 cm. and its maximum width 1·60 m. The ditch was sectioned longitudinally but no post voids were observed in the section. The fill was grey soil streaked with clay above a layer of dirty yellow clay which overlay a layer of charcoal and ash at the bottom of the ditch. The pottery from the feature dates it to the second half of the third century A.D.

Ditch 86 was also flat-bottomed and cut into the natural. Its depth was 45 cm. and its maximum width 70 cm. The feature was sectioned longitudinally but no post voids were recognized in the section. The fill was brown clayey loam, flecked with limestone, with a band of dirty clay near the bottom over material similar to the top fill. The ditch is dated to the late fourth century by a coin of Theodosius I[16] minted 379–395 A.D.

Medieval features in Trench III are chiefly represented by pits, a total of 27 being excavated altogether. As was the case with Trench II, many of the pits were adjacent to the sides of the trench and it was not possible to excavate them fully. Consequently, a smaller amount of pottery and bone was recovered from these pits than was recovered from pits where it was possible to excavate all or most of the fill. Some of the pits were similar in date and the pottery material from them was the same as in other pits. For these reasons a selection of ten of the Trench III pits has been made which reflects the date range of medieval activity on the site. The known relationships of all the Trench III pits are shown in Figure 14 and the sections of nine of the pits selected are shown in FIG. 13. These pits are numbers 80, 73, 100, 70, 66, 35, 41, 36, and 26. The section of the other pit selected, Pit 78, is shown in FIG. 8. The plan of all the Trench III medieval pits is shown in FIG. 5.

Other medieval features in Trench III were a shallow post-hole, 93, a spread of small stones, 37, and a shallow trench, 40 (FIG. 5). Post-hole 93 was cut partially into the fill of Ditch 86 and partially into the natural. It was *c.* 12–15 cm. deep and had a light grey loamy fill. A few sherds of medieval pottery of indeterminate date were recovered from the fill. Feature 37 was a scatter of small limestone fragments

[16] See note 5.

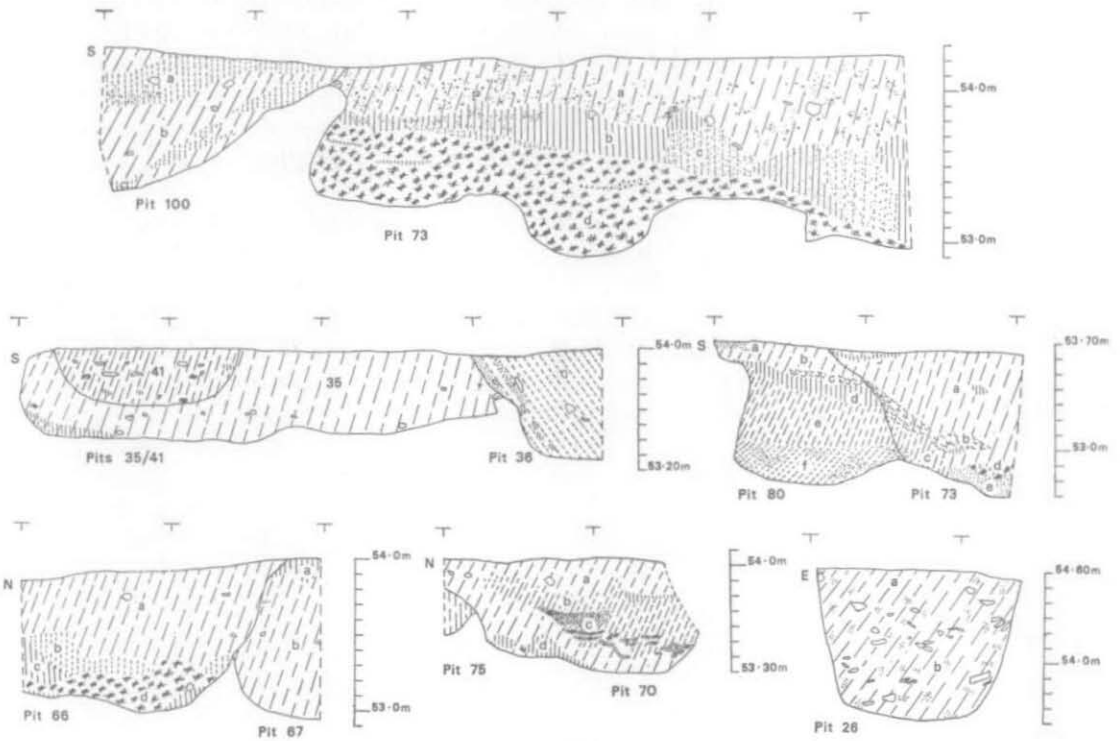

FIG. 13
Trench III, Medieval Pit Sections.

Pit 80. Layers
- a Clayey sand.
- b Brown loam.
- c Ashy loam.
- d Red clay.
- e Grey-brown loam.
- f Thick greenish-brown loam with flecks of limestone and sand.

Pit 73. Layers
- a Brown loam with flecks of clay and sand.
- b Ashy loam.
- c Grey-brown loam.
- d Greenish-black loam.
- e Sand.

Pit 100. Layers
- a Clayey loam with mortar flecks in places.
- b Clean grey soil.

Pit 78. See description of east section, Trench III.

Pit 70. Layers
- a Dark brown loam.
- b Black-brown loam.
- c Charcoal and ash.
- d Clay.

Pit 66. Layers
- a Dark brown loam.
- b Reddish-brown clayey loam.
- c Red clay.
- d Green-grey loam.

Pit 35. Layers: Dark brown loam with stained clay layer in places at bottom.

Pit 41. Layers: Dark brown loam flecks of stone, burnt clay and charcoal.

Pit 36. Layers: Dark green-brown loam with flecks of charcoal and clay, and flecks of sand at junction with 35.

Pit 26. Layers
- a Dark brown earth with small stones.
- b Brown loam flecked with yellow gravel.

embedded in the natural clay. The scatter of stones was cut by Pits 66 and 67 and overlay the fill of Ditch 76 in places. A few indeterminate medieval sherds were recovered when 37 was removed. Feature 40 was a shallow trench cut into natural to a maximum depth of 20 cm. The trench was 70 cm. wide at its widest point and it merged into Feature 37. The fill of the trench was brown loam with a few small fragments of limestone at the bottom. A small quantity of medieval sherds, including glazed sherds, was recovered from 40.

The earliest post-medieval features were two parallel ditches, Features 9 and 25 (FIG. 6), which were both cut into layer 20 to a depth of *c.* 40 cm. The fill of Ditch 9 was ashy grey loam and that of Ditch 25 black stoney soil. The maximum width of Ditch 9 was 60 cm. Ditch 25 was less regular than Ditch 9 and varied in width from 60 cm. to 1·20 m. The pottery from the two features included a great deal of residual Roman and medieval pottery and a small amount of post-medieval pottery which indicates a 16th-17th-century date for the ditches.

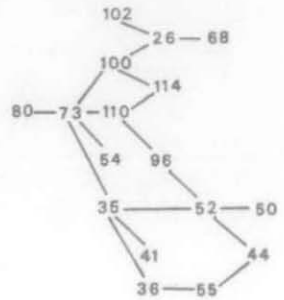

FIG. 14
Trench III, Medieval Pits, Flow Diagrams.

Thirteen post-holes, numbers 8, 11, 12, 13, 14, 16, 18, 22, 23, 34, 56, 94 and 95 (FIG. 6), were cut into layer 20 to an average depth of 50 cm. The majority of the post-holes retained fragments of tile and limestone packings in their black soil fill, and a few of them contained sherds of post-medieval pottery of the late 18th century. Various shallow scoops, Features 4, 5, 6, 7, 10, 17, 21, 27, 28 and 31 (FIG. 6) were also cut into layer 20. The depth of the scoops varied between 10 and 20 cm. and their fill was black, loamy soil, similar to layer 20, but more stoney. The shallow scoops were the latest features on the site. The finds from them indicate a late 19th–20th-century date.

DISCUSSION

Roman Period

Excavations conducted in the town centre of Abingdon have generally produced evidence of Roman occupation,[17] and the presence of a settlement underneath the

[17] *Cf.* M. Parrington, ' Small Excavations in Abingdon ', *Oxoniensia*, XXXIX (1974), 34–43, and the Lombard Street site, forthcoming. *Cf. C.B.A. Group 9 Newsletter*, 3 (1973), 23.

modern town is by now accepted, requiring only a summary here of the most recent evidence. Mrs. Lambrick drew a comparison between the topography of Dorchester and that of Abingdon, while noting the probable duration of the Abingdon settlement and the proximity of an early Saxon cemetery.[18] Excavations in the town have shown that the earliest Roman occupation, apparently most in evidence on the south side of the town centre, close to the river, overlies a site which has produced traces of earlier, Iron Age occupation.[19] In this respect, indeed, the Roman settlement at Abingdon is not unlike many along the Upper Thames which appear to have been continuously occupied at least from the Iron Age onwards, most not being abandoned until the end of the Roman period.[20] Even then, Saxon settlement is sometimes to be observed in close proximity, although no longer exactly on the same site.[21]

The Broad Street excavations have in small part confirmed the long duration of the Roman settlement, although the restricted nature of the site and the large number of medieval pits have served to leave little for archaeological interpretation. Nevertheless, there were several sealed groups of Roman pottery, including a ditch with a coin of Theodosius.

Small as the evidence is, it is a measure of the problem of this aspect of Abingdon's history that there is no larger plan of any part of the settlement which underlies the town centre. The principal features were ditches, two of which were of 'palisade' type (Ditch 35, Trench I, FIGS. 3 and 7, and Ditch 23, Trench II, FIGS. 4 and 11). The two ditches in Trench III (Ditch 76, FIGS. 4 and 8, and Ditch 86, FIG. 4) were slighter and less substantial than the other ditches and may have been field boundaries. Ditch 41 in Trench II (FIGS. 4 and 11) was more substantial than the other ditches and could be considered defensive. Two of the ditches, Ditch 35 and Ditch 41, had a fill of material similar to the natural clay and gravel into which they were cut, suggesting the levelling of banks composed originally of the extracted material. The dates of the filling of all the ditches spans the period from the early second century to the end of the fourth century. It is clear, however, that occupation in the areas excavated, especially Trenches II and III, was principally late Roman in date and most of the residual Roman pottery was of fourth-century date. The Broad Street area therefore contrasts with the areas nearer the river where occupation so far has proved to be predominantly of the first and second centuries.[22]

In order to place the Roman features at Broad Street in a truer local perspective, it must be recalled that ditched enclosure systems of the Iron Age and Roman periods are very common in the neighbourhood of Abingdon, along the banks of the Thames.[23] Nor are these systems only villas, but in some cases quite clearly villages or hamlets, dispersed settlements and field systems interlinked by ditched tracks or droveways rather than by official 'Roman roads'. An example of such a landscape is particularly apparent in the composite cropmarks around Long

[18] *Op. cit.* note 2, 27.
[19] *Cf.* Lombard Street, forthcoming. *Cf. C.B.A. Group 9 Newsletter*, 3 (1973), 23.
[20] *Cf.* M. Gray, 'Excavations at Northfield Farm, Long Wittenham, Berks', *Oxoniensia*, XXXV (1970), 107–9; also Barton Court Farm (forthcoming).
[21] *Op. cit.* note 2, 41; also Barton Court Farm (forthcoming).
[22] *Op. cit.* note 17.
[23] *Cf.* D. Benson, *et al.*, *The Upper Thames Valley : an Archaeological Survey of the River Gravels* (1974), Maps 30–35.

Wittenham, some twelve kilometres east of Abingdon and close to the banks of the Thames.[24] In view of the density and extent of known Roman find-spots in the immediate proximity of Abingdon,[25] it seems possible that the modern town itself now covers a nucleus of enclosure complexes, perhaps more similar to the Long Wittenham settlement area than to the latter's urban neighbour, Dorchester, across the river. In this case it would seem that the function of the Broad Street ditches was to define areas enclosed for fields or for buildings[26] and served to drain the ground and to divide off cattle. Elsewhere in the town, ditches and pits observed under controlled situations have been characteristic of the Roman settlement from its earliest phases.[27] This would seem to be in keeping with a rural or 'native' system, the primary function of which was agricultural. Dorchester, therefore, with its Roman fortress, Roman road and Roman town is not the best parallel for the Abingdon settlement. The Long Wittenham complex, however, does seem to consist of similar elements. It also happens to be most comparable to Abingdon in terms of the ratio of known cremations to inhumations in its pagan Saxon cemetery.[28]

Medieval Period

The medieval period on the Broad Street site is characterized by an 'excess' of pit digging which was the major medieval activity detectable by excavation. The only pit with any associated structure was Pit 15a in Trench I (FIGS. 3 and 7) which was stone-lined and of late thirteenth- to fourteenth-century date. A stone-lined pit of this date has been excavated in Oxford on the Church Street site, where it has been suggested that it was lined in this way to give it a longer life and that it could have been emptied and reused.[29] The other medieval pits on the site were of various shapes and sizes. A large proportion of the pits contained greenish organic soil in their fill and seem likely to have been used as cesspits. The large size of some of the pits may indicate that the primary purpose for digging them was to extract the underlying gravel and sand into which they were cut. Some element of order can be perceived in the date and distribution of the pits in Trench III. In the twelfth century the south-west corner of Trench III was used for pit digging. In the fourteenth century the north-west corner of the trench was filled with pits and by the late fourteenth century pits were being dug again in the south-west corner of Trench III. The density of pit digging in this area suggests that the area of land available for pit digging was restricted. These restrictions may have taken the form of property boundaries. The 16th-17th-century Ditch 9 (FIG. 6) defines the area where this concentration of pit digging took place during the twelfth and fourteenth centuries and it seems possible that it represents the survival of a medieval land division into the post-medieval period. The geographical position of the Trench II and III pits in what was until comparatively recently the outskirts of the town indi-

[24] *Ibid.*, Map 35.
[25] H. Peake, *The Archaeology of Berkshire* (1931), 108–9, 171–2.
[26] The presence of Roman building debris, painted wall plaster, *tesserae* and roof tiles in a residual context on the site indicates the presence of a building in the vicinity, see p. 48.
[27] *Op. cit.* note 17.
[28] *Op. cit.* note 2, 35.
[29] T. G. Hassall, 'Excavations at Oxford 1968, First Interim Report', *Oxoniensia*, XXXIV (1969), 10. This pit contained a baluster jug, Fig. 4, No. 6 ; see note 14.

cates that Abingdon was expanding at a relatively early date in its history. The medieval pits from Broad Street provide the beginnings of a ceramic chronology for Abingdon, which can be improved and adapted as more sites are excavated. The animal bones from the pits give an insight into the agricultural economy and eating habits of a proportion of the populace of medieval Abingdon.

The remains of the robbed-out stone buildings in Trench II are not readily datable. A sherd of tripod pitcher was recovered from the surviving foundations and part of the foundations overlay a pit of late 11th-12th-century date.[30] It would seem from this evidence that the building was constructed during or after the twelfth century, possibly during the twelfth- to fourteenth-century period when the Broad Street area was being used for digging pits. In view of the proximity of some of the pits to the building it would seem more likely that it was built after the use of the site for digging pits had ceased. The documentary evidence for the construction of 'Goodlucks Farm' in the Broad Street area[31] in the fifteenth or sixteenth century would tend to support this view.

In the fifteenth century, pit digging activities in the Trench II and III area ceased and a layer of black humic soil accumulated over the site. This black soil layer (layer 6 in Trench II, layer 20 in Trench III) was relatively stone-free and its deposition would seem to be the result of agricultural or horticultural use of the area. This use of the land is consistent with what is known about the area from fifteenth-century documentary sources.[32] The black soil layer contained a large quantity of Roman and medieval pottery probably derived from the earlier features on the site which had been disturbed by the agricultural use of the land. A few sherds of post-medieval pottery, the latest eighteenth century in date, were also recovered from the layer.

Post-Medieval Period

Post-medieval documentary evidence for the site refers to the construction of a malthouse and various ancillary buildings in the eighteenth century. The archaeological evidence for this activity on the site consists of the post-medieval structures in Trench II (47), the ash pit it encloses (8), a patch of cobbling (12), a robber trench,[33] and Pits 18, 19, 22 and 32 (FIG. 6). The post-medieval post-holes in Trench III are also probably eighteenth-century (FIG. 6). No reliable dating evidence was recovered from any of the above features but the most likely explanation is that they are the remains of the malthouse and its associated buildings, Features 4 and 8 (FIG. 10) being the remains of the malthouse and kiln, and the Trench III post-holes being the remains of the other buildings. Pits 22 and 32, with their ashy charcoaly fill, may have been for waste from the kiln, and Pits 18 and 19 may have been associated with an earlier phase of the kiln construction.[34]

The black soil layer observed in Trenches II and III was not present in Trench I where pit digging activities seem to have taken place chiefly in the post-medieval

[30] Pit 48, Trench II.
[31] *Op. cit.* note 8, 46.
[32] *Op. cit.* note 6, 22.
[33] Lease in Abingdon Museum, see note 12.
[34] Large quantities of burnt clay and tile fragments were observed in a contractor's excavation three metres to the south of Kiln 8 which may indicate that the kiln had more than two phases.

period. Documentary evidence for Broad Street indicates that the street was in use continuously from at least the fourteenth century[32] and the date of the Trench I post-medieval pits indicates that whilst the area to the rear of Broad Street was being farmed, rubbish pits were being dug in close proximity to the street, presumably for the use of the inhabitants of Broad Street. The latest pits in Trench I are of eighteenth-century date, after which date the area became a garden and layer 8 accumulated.

Most of the evidence for nineteenth- and twentieth-century activity in the Trench II and III area had been disturbed during the construction of the car park. The latest features in Trench III were the shallow scoops, Features 4, 5, 6, 7, 10, 17, 21, 27, 28 and 31. On the 1960 Ordnance Survey six inch map of Abingdon the area to the rear of Broad Street is shown as a nursery. In view of this it seems likely that the scoops are the result of early modern horticultural practices.

THE FINDS

POTTERY

Roman

Mr. Warwick Rodwell has kindly reported on the *Terra Sigillata* from Roman features. He has also reported on the decorated *Terra Sigillata* and two stamped bases from medieval features. Mr. B. R. Hartley has kindly provided dating and die numbers for the potters' stamps.

TERRA SIGILLATA. By WARWICK RODWELL

Abbreviations used in this section :

Oswald	*Index of Figure-Types on Terra Sigillata*
Stanfield and Simpson	J. A. Stanfield and G. Simpson, *Central Gaulish Potters* (1958)

Slot 65 (Trench III, FIG. 4)
f 31*r* Fragments, Central Gaulish, Antonine.
f 31 Footring, Central Gaulish, Antonine.
f 37 Decorated sherd, chipped and abraded. Style of Paternus or one of his associates : his ovolo (*Stanfield and Simpson*, Fig. 30.1) and leaf (*Stanfield and Simpson*, Fig. 30.30). Lezoux, Antonine.

Ditch 76 (Trench III, FIG. 4)
Fragments of forms 31, 33, 35, 38 and Lud. Tg, mainly Central Gaulish and Antonine. One of the F. 35 sherds is earlier second-century, residual. The group as a whole must date to after *c.* A.D. 160.

Ditch 86 (Trench III, FIG. 4)
f. 33 Rim sherd, Central Gaulish, Antonine.
f. 37 Chip, Central Gaulish, Antonine.

Ditch 23 (Trench II, FIG. 4)
f. 37 or 38 Rim, slightly burnt, Hadrianic or Antonine.

Ditch 41 (Trench II, FIG. 4)
f. 18/31 Rim, Central Gaulish, Trajanic.
f. 37 Several fragments of rim and decoration, with a high gloss and in unabraded condition. The decoration is in the Sacer-Attianus style. The panelled design incorporating leafy festoons with running animals was used by both potters ; the ovolo is Attianus' (*Stanfield and Simpson*, Fig. 23.1) and the ' triangle ' is common on Sacer's work (*Stanfield and Simpson*, Pl. 83.11). The winged cupid is O.378 and the Hercules figure O.783 ; the small female figure with her hands raised over her head is not illustrated by Oswald. Lezoux, Hadrianic.

Medieval Pit 73 (Trench III, FIG. 5)
f. 37 Small decorated sherd, showing part of a running-scroll design with interspersed birds, in the Medetus-Ranto style (*Stanfield and Simpson*, Pl. 34.409, 410). Central Gaulish, Trajanic-Hadrianic.
f. 37 Decorated sherd in the style of Casurius ; his characteristic leaf (*Stanfield and Simpson*, Fig. 40.9). Lezoux, Antonine.

General Layer 57 (Trench III)
f. 33 Centre of base, stamped]AMILIANIM[Namilianus of Lezoux, die 1a, *c.* A.D. 160–195.

Medieval Pit 67 (Trench III, FIG. 5)
f. 80/tx Centre of base, stamped PRI]ΛNI Primanus iii of Lezoux, die 6f, *c.* A.D. 165–195.

THE ROMAN COARSE POTTERY

Abbreviations used in this section :

Shakenoak	A. C. C. Brodribb, A. R. Hands, and D. R. Walker, *Excavations at Shakenoak*, I–IV (1968–73).
Farrar	R. A. H. Farrar, ' The Techniques and Sources of Romano-British Black-Burnished Ware ', *C.B.A. Research Report 10*, ed. A. Detsicas (1973), 67–103.
Dorchester	S. S. Frere, ' Excavations at Dorchester on Thames ', *Arch. J.*, 119 (1962), 114–149.
Verulamium	S. S. Frere, *Verulamium Excavations*, I (1973).
Young	C. J. Young, ' The Pottery Industry of the Oxford Region ', *C.B.A. Research Report 10*, ed. A. Detsicas (1973), 105–115.
Harris	E. Harris and C. J. Young, ' The Roman Kiln Site at " Overdale ", Boars Hill ', *Oxoniensia*, XXXIX (1974), 12–26.

Apart from the usual grey wares, the pottery from Broad Street is chiefly notable for the preponderance of white, pink or orange fabrics of local origin, known to have been in use for pottery manufacture along the north and east banks of the Thames, and especially at Oxford (*Young*, Fig. 1). In the absence of any other chronological indicator, red colour-coated vessels are assumed to give a date of *c.* 250 or later (*Shakenoak*, I, 52 ; III, 34, 85). Painted vessels without all-over colour-coat are known to have been in use before the third century, as seems to be the case with number 3.

The only other distinctive fabric to which attention will be drawn here, is that which generally accompanies a black-burnished finish. For the sake of brevity, this ware is termed BB1 since it matches the description provided by Farrar (*Farrar*, 69–71). It is always of medium or dark grey colour, with a brownish tinge, sandy in texture and with small white inclusions or flecks. One or two examples were observed to contain larger fragments of chalk, and where the form was more complete, could be seen to be hand-made. It should be noted that the finish was not always black, occurring rarely with a surface

buff in places. Nor was the firing always even throughout, so that a grey core was sometimes sandwiched by brown outer layers, the final surface still being black. This ware was present in all features except Ditch 35 in Trench I. Several features contained vessels of orange ware which had black surfaces and which had been well burnished (*e.g.* Ditch 35, Trench I, no. 5), apparently imitations of the former ware.

Ditch 35 (Trench I, FIG. 15)

1 Jar with carinated shoulder. Hand-made, with signs of wheel finishing internally and knife-trimming on outer surface. Light grey sandy fabric with darker grey finish inside and outside.
2 Jar. Buff sandy fabric.
3 Body sherd of (?) carinated jar. Fine white ware of Oxford type. Pinkish staining on surface, streaks of applied pink paint. One other similar sherd.
4 Jar. Pinky, sandy fabric with red inclusions causing surface streaks in places. Fire-blackened on one side.
5 Bowl with slightly beaded rim. Very coarse reddish sandy ware with quartz inclusions, poorly fired, dark grey surfaces well burnished. Possibly hand-made with wheel finishing.
6 Jar. Fine buff fabric, grey surfaces.

Other sherds : total 47, of which four are from different storage jars, one being hand-made with large shell inclusions, apparently Iron Age. Mainly coarse, wheel-made wares with grey finish. One sherd of fine, thin grey ware from shoulder of jar similar to no. 1 but wheel-made.

Date : first half of second century. The presence of carinated jars argues for an Iron Age tradition, which elsewhere continues until *c.* 150 A.D. (*cf.* Verulamium type-series, in which the shoulder appears to slacken progressively ; *Verulamium*, nos. 65, 151, 267, 385, 432, and also the undecorated form no. 445). Local wheel-made parallels, generally smaller and with more rounded shoulders and less distinct carination were found in the nearby kiln at Overdale, Boar's Hill, Oxford (*Harris*, 22), dated to the late first century. The white-ware vessel with pink-painted decoration is paralleled in pre-rampart desposits at Dorchester (*Dorchester*, 137, Fig. 15, 74), where a vessel probably not of the same form but of similar ware had applied streaks of brown slip. Sherds of buff ware with orange slip were

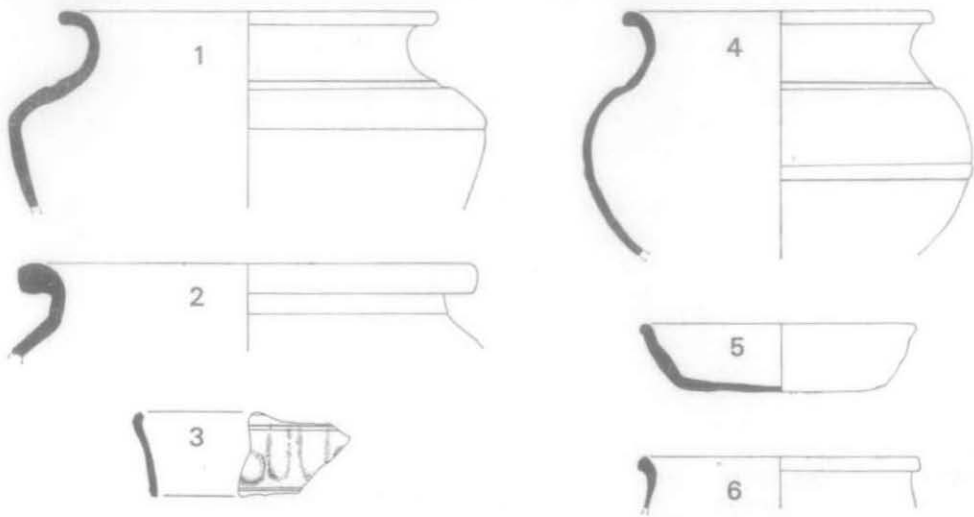

FIG. 15
Roman Pottery, Ditch 35, Trench I. Scale ¼.

stratified at Verulamium in a layer dated 105–115 (*Verulamium*, 265, no. 524). The burnished bowl with slightly beaded rim would suggest a second century rather than earlier date. The jar (no. 4) is similar in form to second-century types from Shakenoak where the cordon, however, was at the top of the shoulder (*Shakenoak*, IV, 56–57, nos. 487, 489, *c.* 150 A.D.).

Ditch 41 (Trench II, FIG. 16)

7 Storage jar. Coarse grey sandy ware with dark grey inclusions (grog?).
8 Bowl. Grey ware with white surfaces giving marble appearance.
9 Bowl. Fine, light grey ware, smoothed external surface.
10 Poppy-head beaker neck. Grey ware.
11 Body sherd with barbotine decoration. Grey ware with polished silvery outer surface.
12 Jar. Grey ware. Burnished bands on shoulder.

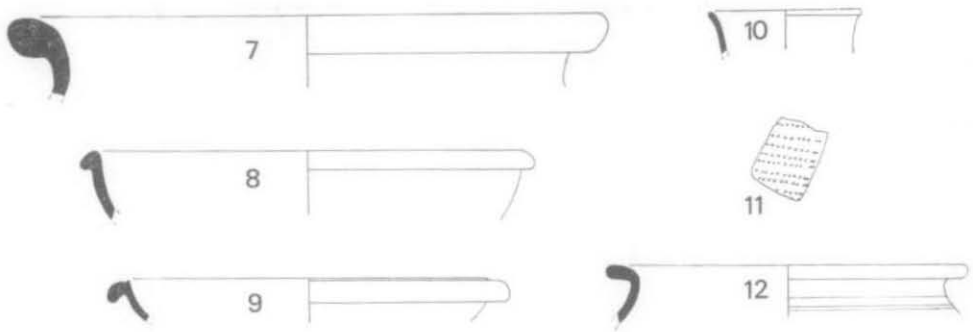

FIG. 16
Roman Pottery, Ditch 41, Trench II. Scale ¼.

Other sherds : total 68. Thirteen sherds of flagon in pink sandy fabric with white slip on outer surface. Six other sherds of vessel no. 11. Remainder a mixture of grey wares and white, buff, or pink sandy fabrics, except two sherds of BB1 from side of bowl, and one sherd of fine white ware with dark, metallic colour-coat both sides and rough-cast outer surface.
Date : The *terra sigillata* from Ditch 41 indicates a Hadrianic date.

Slot 65 (Trench III, FIG. 17)

13 Bowl. Grey ware. Traces of white slip on rim.
14 Jar. Grey ware.
15 Wide-mouthed jar. BB1. Burnished inside and outside with burnished lines and lattice below rim.
16 Jar. Orange fabric with grey surfaces.
17 Jar. Buff fabric with matt grey colour-coat externally.
18 Jar. Grey ware.
19 Small jar. Light grey fabric with polished rim and outer surface.
20 Bowl. Similar fabric and finish.

Other sherds : total 128. One sherd of orange fabric, one orange and grey, both with red colour-coat.
Date : The presence of red colour-coated sherds suggests a date of *c.* 250 A.D., on present evidence for the introduction of this variety of Oxford ware (*Young*, 110). Ditch 76 contained pottery of similar character, without examples of the later Oxford products with painted decoration, and cut 65. Both were presumably filled by *c.* 300 A.D.

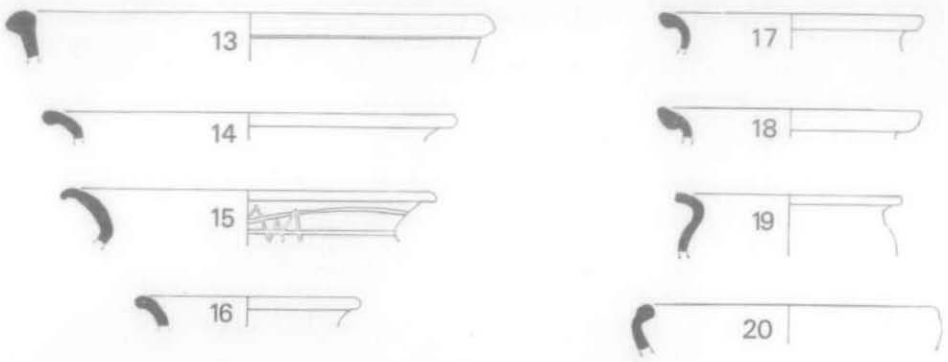

FIG. 17

Roman Pottery, Slot 65, Trench III. Scale ¼.

Ditch 76 (Trench III, FIG. 18)

Jars :

21–22 Rolled rims. Grey ware.
23–25 Everted rims. BB1.
26–28 Sharp, triangular rims. Grey ware.
29 Body sherd in grey ware with burnished scroll decoration.

Funnel necks :

30–31 Grey ware.

Bowls :

32 Orange fabric with applied red colour-coat inside and out. Rouletted decoration below rim. Copying Samian form 37.
33 Similar, but without rouletting. Much abraded sherd.
34 Orange fabric.
35 Grey ware. External burnishing.
36 Ware as nos. 23–25. Buff outer surface.
37 Orange fabric.
38 Fine, light grey fabric.
39 Grey ware with external burnishing.
40 As 38.
41 Ware as nos. 23–25 but slightly lighter. Dark grey surfaces burnished inside and out, with burnished lattice decoration.

Beakers :

42 Orange, sandy fabric.
43 Grey ware, burnished externally. Rouletted decoration.
44 Orange fabric with red colour-coat.
45 Grey ware.
46 Grey ware, darker outer surface with slightly micaceous appearance.
47 Light grey ware.

Other sherds : total 296. Includes one sherd of orange fabric with matt black colour-coat on outside (shoulder of beaker), two sherds of Castor ware type, one sherd of Rhenish or Lezoux ware.

Date : Second half of third century. *Terminus post quem* of *c.* 250 A.D. suggested by the Oxford colour-coat vessels 32 and 33, as also for Slot 65 which 76 cuts. Probably filled earlier than Ditch 23 (Trench II), since no painted colour-coat wares are represented in 76, although the sample is large.

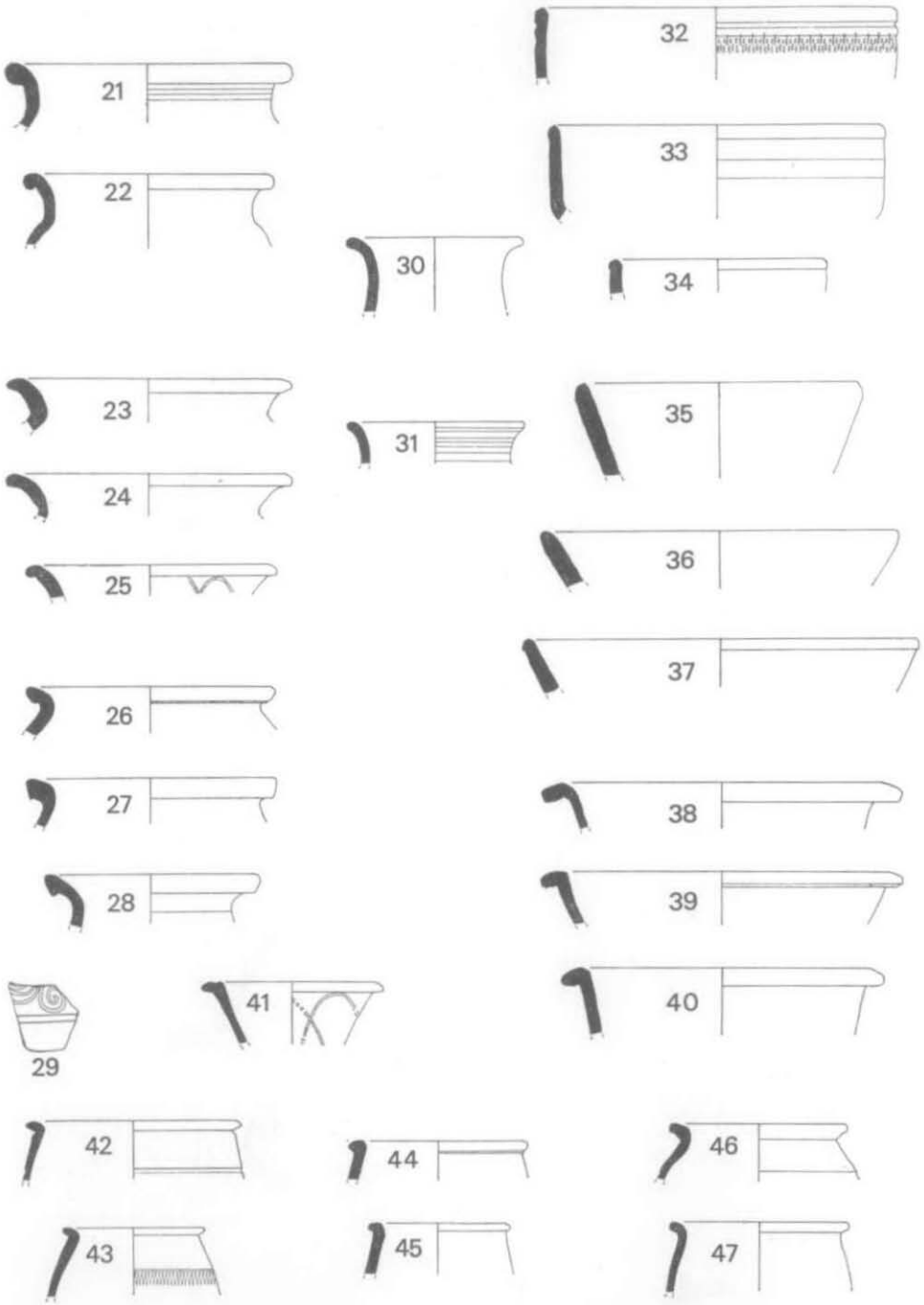

FIG. 18
Roman Pottery, Ditch 76, Trench III. Scale ¼.

Ditch 23 (Trench II, FIG. 19)

48 Carinated bowl in 'parchment ware'. Orange fabric fired evenly throughout. White slip inside and out, with applied bands of red paint on rim and around the outer wall. Internal scroll- and wheel-decoration in red paint. From central layer of charcoal and ash.

49 Wide-mouthed bowl. Grey ware, polished outer surface.

50 Wide-mouthed jar. Coarse orange fabric with quartz inclusions. Grey finish inside and out, burnished on rim and shoulder.

51 Wide-mouthed jar. Grey ware.

52 Beaker. Orange fabric with red colour-coat and white scroll-decoration within rouletted bands. Fire-blackened on one side. From central layer.

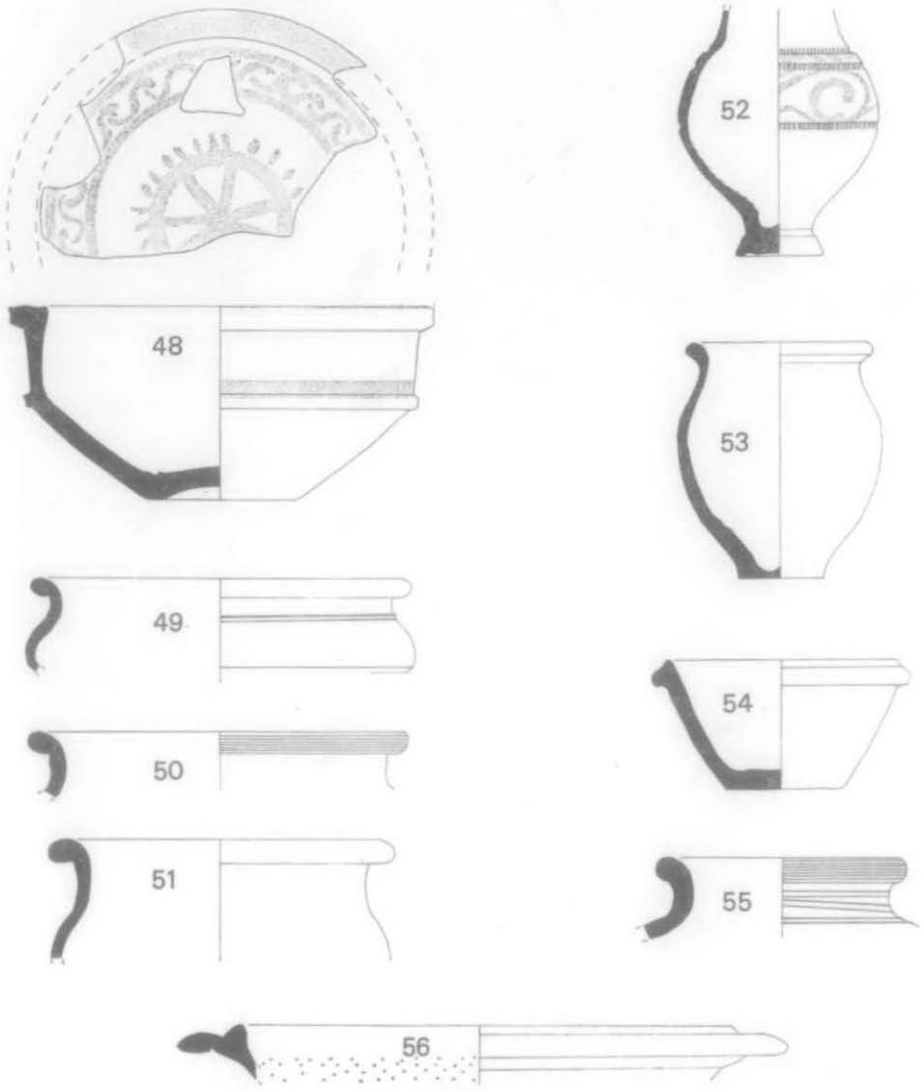

FIG. 19

Roman Pottery, Ditch 23, Trench II. Scale ½.

53 Small jar. Orange fabric with small quartz inclusions, white surfaces (apparently a slip or colour-coat). Fire-blackened in places. From central ash layer.
54 Flanged bowl. BB1. Light grey core inside brown sandwich. Appears to be hand-made. From central ash layer.
55 Narrow-necked jar. Grey ware with burnished bands on rim, neck and shoulder.
56 Flanged mortarium. Orange fabric, white inside and out, quartz grits.

Other sherds : total 59. Two storage jars represented. One sherd of orange ware with matt black colour-coat. At least one other vessel of fabric similar to no. 50.
Date : First half of fourth century. The best indication is provided by the two Oxford-ware colour-coat types, represented here by nos. 48 and 52 (*Young*, 110–111). We are grateful to Mr. C. J. Young and Mr. M. Fulford for their comments on this group.

Ditch 86 (Trench III, FIG. 20)
57 Jar. Grey ware. Burnished bands below rim.
58 Wide-mouthed jar or cooking pot. BB1.
59 Jar. Grey ware.
60 Small jar or beaker. Grey ware, polished externally.
61 Upright-necked jar. Coarse, orange-brown sandy fabric.
62 Beaker. Grey ware.
63 Flagon. Orange fabric with applied white slip inside and out.
64 Flagon. Reddish finish with grey core. Applied white slip inside and out.
65 Carinated bowl (as 48). White fabric throughout. Red paint along top of rim. 'Parchment ware.'
66 Bowl. Grey sandy fabric with white flecks. Brown outer surfaces highly burnished giving 'laminated' effect. Burnished lattice decoration. BB2.

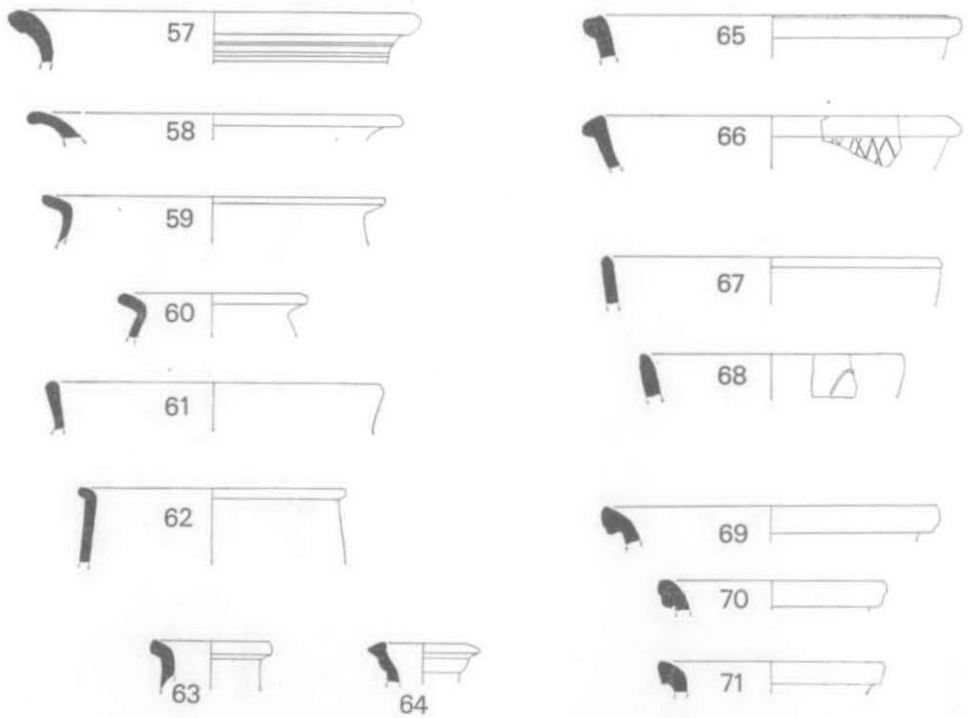

FIG. 20
Roman Pottery, Ditch 86, Trench III. Scale ¼.

67 Bowl. Grooved rim. Ware similar but black finish. BB1.
68 Bowl. BB1. Black-burnished appearance inside, buff polished outer surface.
69 Jar. Triangular rim. Grey, shell-tempered ware as 73.
70 Jar. Grey ware.
71 Jar. Grey ware with chalk inclusions.

Other sherds : total 166. Predominantly grey wares. Seven red colour-coated sherds, one with black colour-coat, two with white slip on orange surfaces as nos. 63, 64. Of the twelve sherds with ' calcite ' (mainly crushed shell) grits, one is rilled, as 81.
Date : Filled not earlier than 379 (coin of Theodosius I, 379–395 A.D.).

Pit 20 (Trench II, FIG. 21)
72 Jar. Grey fabric with many crushed shell inclusions. Rough external surface, smoother buff finish on inside.
73 Jar. Ware similar but smoother finish, dark grey outside neck and inside rim.
74 Jar. Buff fabric with slightly pinkish appearance. Chalk inclusions.
75 Jar. As no. 73.
76 Jar. Buff ware.
77 Carinated bowl (as 48). Orange fabric with white slip and applied red paint on side and rim. ' Parchment ware. '
78 Bowl. Grey ware, light internal burnishing, highly polished exterior below groove.

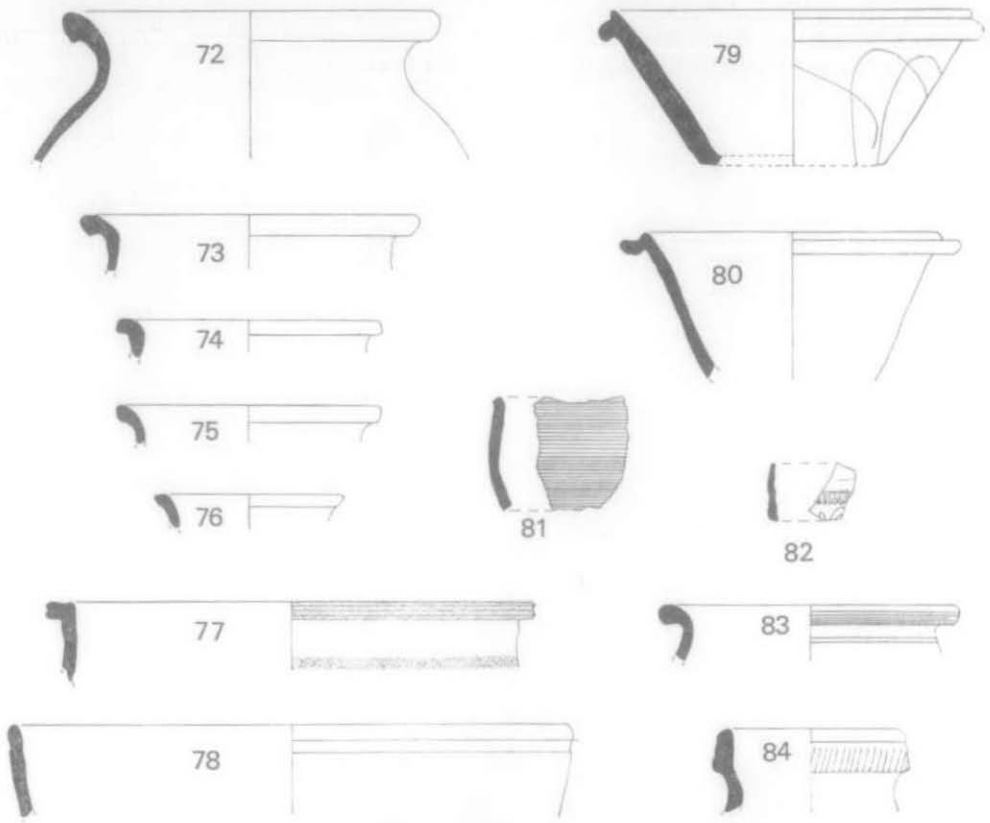

FIG. 21
Roman Pottery, Pit 20, Trench II. Scale ¼.

79 Flanged bowl. BB1. Chalk inclusions. Burnished lattice decoration. Hand-made?
80 Flanged bowl. Grey ware. Slight burnishing on outside. Hand-made? Wheel-marks on bottom of flange.
81 Ware as no. 73, buff internal surface. Light rilled decoration.
82 Orange fabric with dark metallic colour-coat. Rouletted decoration with barbotine below. Possibly an Oxford product.
83 Jar. Grey ware.
84 Narrow-necked vessel. Grey ware with slashed decoration below rim.

Other sherds : total 50.

Date : Cut into the fill of Ditch 23, a date at least as late as *c.* 350–400 seems probable. The triangular-rimmed, calcite-gritted jars (nos. 72–75) and the rilled sherd (no. 81) support this date (*cf.* Ditch 86 with coin of Theodosius ; *Shakenoak*, III, 54–6, nos. 388–396 ; IV, 70–73, nos. 640–659). The vessel with the slashed cordon (no. 84) may also be a late fourth-century type (*Shakenoak*, IV, 66–69, nos. 606–609).

Residual Pottery (FIG. 22)

Mortaria :

85 Flanged. Orange fabric, off-white slip.
86 Flanged. Orange fabric with grey core. White slip. Quartz grits begin level with flange.
87 Wall-sided, hammer-headed. White ware, slightly pink core. Apparently coated on outside with yellow slip. Added band below rim has indented lower moulding.
88 As above, but without yellow outer appearance. White throughout.
89 Depressed flange, against body of vessel. White throughout, with white quartz grits.
90 Orange fabric. Red colour-coat. Copying samian form 45.
91 Bowl or mortarium with hooked flange. Orange fabric. Red colour-coat with dark, metallic appearance on flange. Samian form 38.

Colour-coated wares other than Oxford type :

92 Beaker. White ware with green-brown metallic colour-coat. Nene Valley.
93 White fabric. Scalloped decoration. Brown colour-coat.
94 Orange fabric. Rouletted band decoration. Highly polished, metallic green-brown colour-coat.

Beakers :

95 Grey ware. Another similar in orange fabric with polished outer surface.
96 Grey ware. Burnished externally. Vertical burnished lines.
97 Grey ware. Dark inner surface. Lightly incised, combed line decoration.

Small jars :

98–101 Grey ware.
102 Sherd of waster. White ware.

Bowls : (FIG. 23)

103 Carinated bowl. White surfaces with orange core. Applied bands of red paint on rim and inner and outer surfaces.
104 Form uncertain, but possibly as above. White throughout. Red paint at carination inside and out. Slashed decoration on outer moulding.
105 Flanged pie-dish. Orange sandy fabric with grey core. Burnished surfaces.
106 Slightly beaded rim. BB1. Burnished latticing on outer surface.
107 Orange ware with large white inclusions. Burnished outer surface. Barbotine decoration on rim consists of trailed, red-stained clay. Copying samian form 35–36.
108 Pink fabric. White slip inside and out.

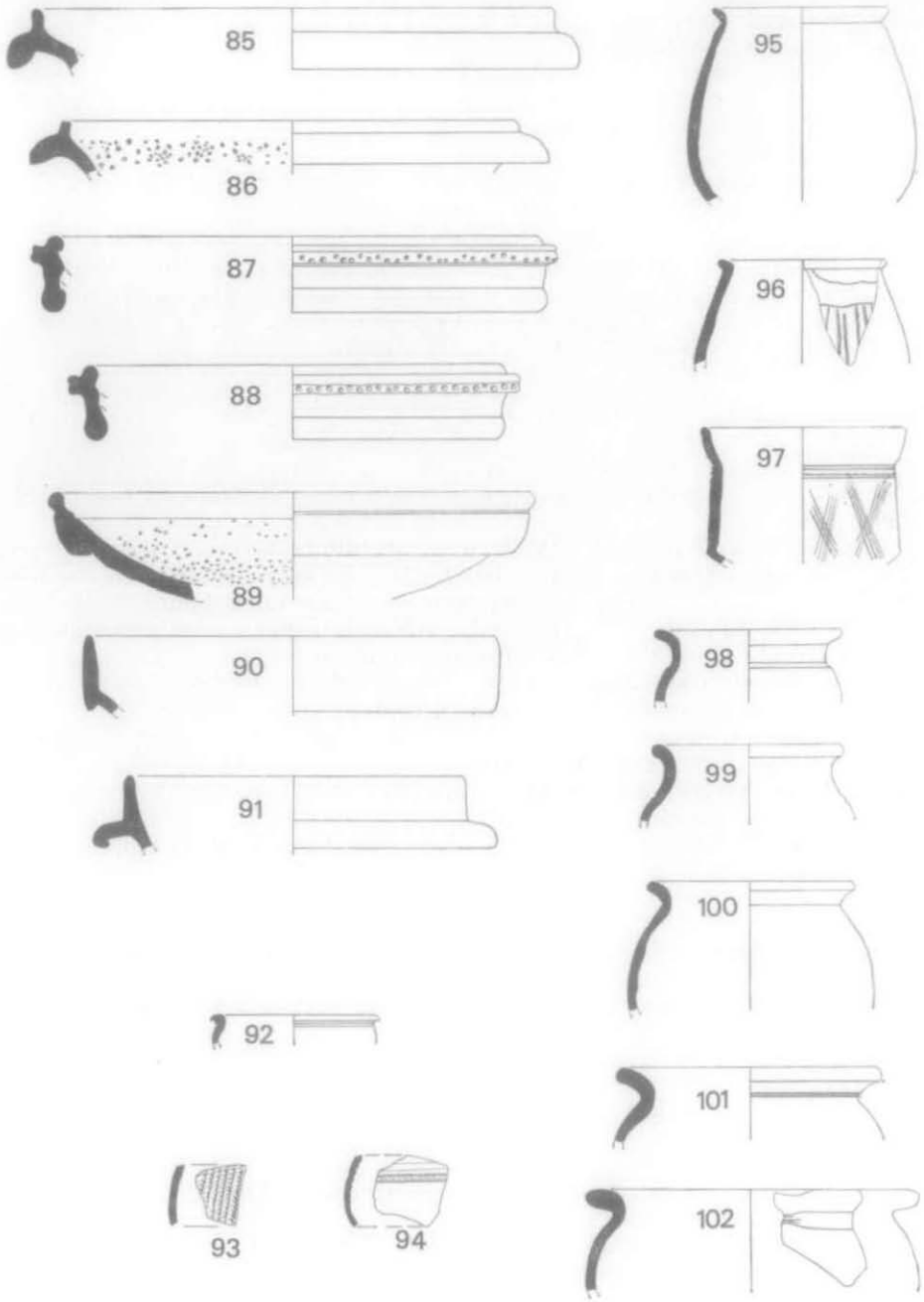

FIG. 22
Residual Roman Pottery. Scale ½.

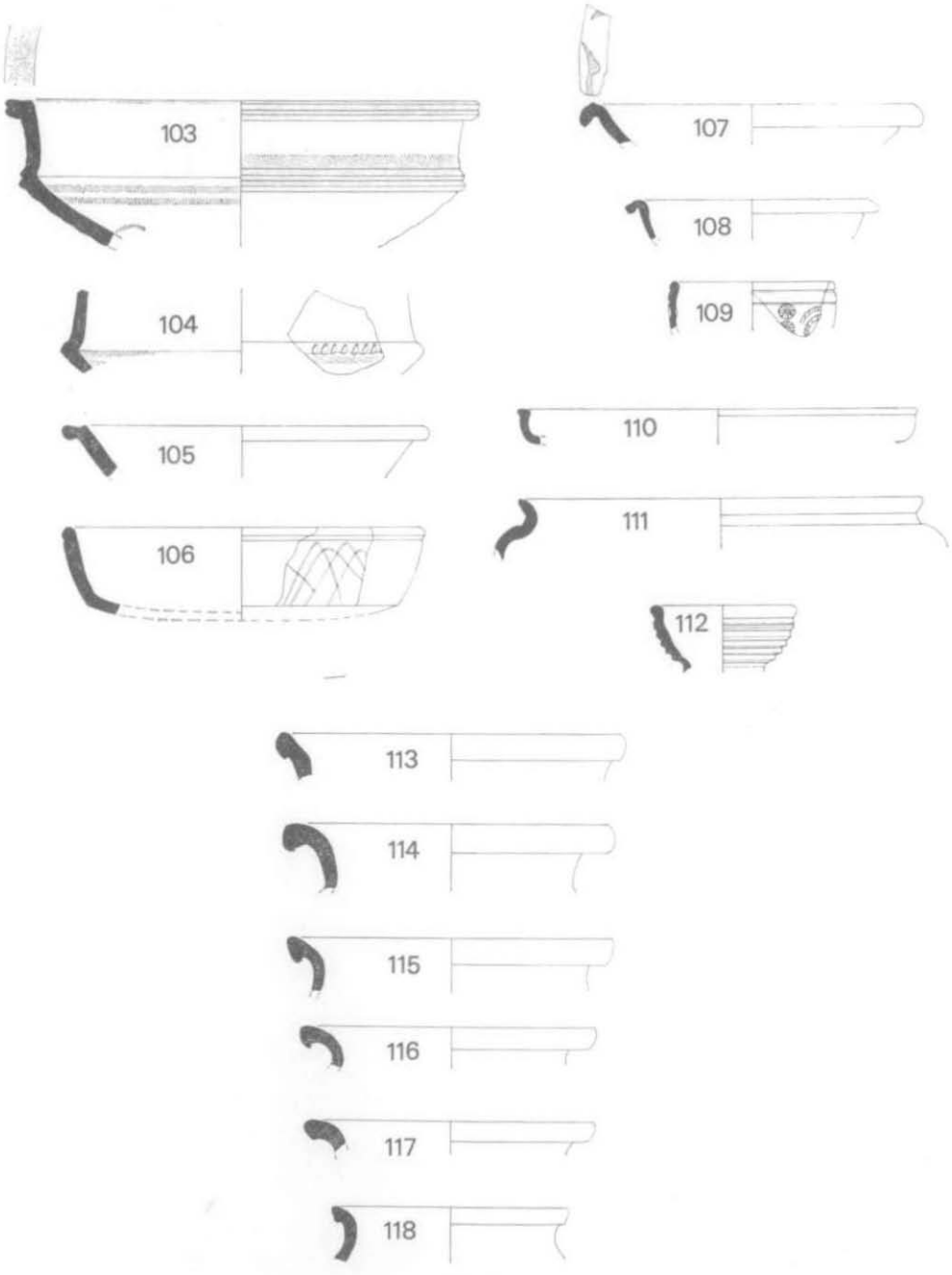

FIG. 23
Residual Roman Pottery. Scale ¼.

109 Orange fabric with grey core. Red-brown colour-coat. Deep circular stamped decoration.
110 Orange ware similar to 107, without inclusions. An unusual shape, possibly imitating a samian form such as Ritterling type I.
111 Jar with everted rim. Grey fabric with brown surfaces, burnished externally.
112 Ring-necked flagon. White ware.

Triangular-rimmed jars :
113 Shell-tempered. Grey rim and outer surfaces, buff inside.
114 Shell-tempered, grey throughout, with shrinkage cracks below rim.
115 Shell-tempered. Grey core, uniform buff surfaces.
116, 117 Shell-tempered. As 113.
118 Pink fabric with white slip inside and out, as 108.

Medieval

THE MEDIEVAL POTTERY. By REGINA HALDON and MICHAEL PARRINGTON

Over 10,000 sherds of medieval pottery were recovered during the Broad Street excavations. Of this total approximately 30% was stratified in medieval pits. The remaining pottery was recovered from residual contexts in post-medieval pits and general layers. For the purpose of this report attention has been concentrated on the 3,000-odd sherds from the medieval pits. This material has been examined in detail and a selection of the pottery from ten of the pits in Trench III which reflect the medieval date range of the site has been made for publication. As no medieval pottery in quantity has previously been published from Abingdon, the pottery is published as pit groups in order to illustrate the date range of pottery from one context, and to demonstrate the range of form and fabric in use in Abingdon during the medieval period.

The stratified pottery from the site has been divided into fourteen different fabrics. The fourteen fabrics, for the most part, display distinctive individual characteristics but variations do occur which are probably the result of different firing conditions. These variations manifest themselves as differences within the type, of the colour of the fabrics and surfaces. In the glazed sherds differences in the colours of the glazes are probably dictated by inadequate control of the composition of glazes, variations in firing conditions and the personal preferences of the potter, or the customer. Variations also occur in the amount of tempering in certain fabrics, chiefly Fabrics B and C. It may be that these variations have some significance, or it may be the result of fairly random admixture of the tempering of the clay. It has not been possible to classify a small percentage of the pottery from the pits. This pottery, a total of fourteen sherds, displayed indeterminate characteristics and has been called Fabric X. The examination of the unstratified pottery has revealed no variations from the basic fourteen fabrics.

In the absence of numismatic, architectural or documentary evidence the only criterion applicable to the Broad Street site for dating the medieval pottery is that of typology. Well-established sequences of medieval pottery exist in Oxford where the excavators of sites have had access to dating criteria absent so far in Abingdon. With the exception of Fabric D, which is consistent with the fabrics produced in the Brill kilns,[35] the Abingdon type fabrics are dissimilar to those of Oxford. The regionalization of local medieval pottery distribution has been discussed briefly by Stephen Moorhouse in a report on medieval pottery excavated from Reading Abbey,[36] and Professor Jope has discussed the subject in more detail.[37] The differences between the Abingdon and Oxford fabrics indicates that Abingdon was supplied with pottery from a different source to that which supplied

[35] *Cf.* E. M. Jope, ' Recent Medieval Finds in the Oxford Area ', *Oxoniensia*, x (1945), 96–99.
[36] Stephen Moorhouse, ' The Finds ', in C. F. Slade, ' Excavation at Reading Abbey ', *Berkshire Archaeological Journal*, LXVI (1971–2), 65–116, at 92.
[37] E. M. Jope, ' Medieval Pottery in Berkshire ', *Berkshire Archaeological Journal*, L (1947), 49–76.

Oxford and that they belonged to different distribution areas. In view of this it would seem undesirable to attempt to date the Abingdon material too closely, on the basis of material excavated in a different distribution area. It is proposed therefore to place only approximate dates on the Abingdon material based on the Oxford typology in the hope that future excavations in the town will yield pottery groups to which more exact dating criteria can be applied.

Table 1 shows the percentages of the different fabrics in the ten pits. Analysis of the figures shows that Fabrics A, B, C and D form 90% of the fabrics present, Fabric A comprising 43·5%, Fabric B, 16·5%, Fabric C, 17·5% and Fabric D, 12·5%. Fabric D is a product of the Brill kilns which were operating from the thirteenth century.[38] The

TABLE 1

Percentages of fabrics in the ten pits to the nearest half percent

Pit Number	80	73	100	78	70	66	35	41	36	26
A	—	59	57	50	60·5	44	45·5	31	39	47
B	59	17	17	18·5	5·5	24	18	5	—	—
C	32	10	6	18	26·5	18	8	31	20	6
D	—	—	—	—	2·5	11	24	26·5	37·5	24·5
E	—	—	—	0·5	—	2	—	—	—	—
F	—	10	8	2	—	1	3	1	—	2
G	9	—	1·5	—	—	—	1	—	—	—
H	—	—	1·5	0·5	—	—	—	—	—	0·5
I	—	0·5	—	—	—	—	—	1	—	0·5
J	—	1·5	6	8·5	—	—	0·5	—	—	6
K	—	1	3	2	—	—	—	—	1	4·5
L	—	—	—	—	—	—	—	1	—	—
M	—	—	—	—	—	—	—	—	1·5	4
N	—	—	—	—	—	—	—	—	—	3
X	—	1	—	—	5	—	—	3·5	1	2
Total Number of Sherds	44	408	65	265	38	106	218	81	112	136

association of Fabrics A, B, and C with Fabric D in the five later pits, may be partially attributed to residual material, but it seems likely that some of the A, B, C, material is contemporary with Fabric D. Nearly all the Fabric D sherds represent jugs or pitchers and, unless these were the only vessels in use in the later medieval period, it would seem likely that the A, B, C, material represents coarser vessels contemporary with the Fabric D vessels. If this is the case the medieval pottery of Abingdon displays a remarkable uniformity throughout the medieval period. The remaining 10% of the fabrics comprises shell-tempered and chalk-tempered fabrics and some fine glazed wares, and does not seem to have held a very significant position in Abingdon's ceramic hierarchy.

With due regard to the difficulty of identifying the function of vessels from small fragments of pottery, an attempt has been made to determine the proportions of different vessels in Fabrics A, B, and C. In Fabric A, 26 cooking-pots, 5 dishes or bowls and 9 pitchers or jugs were identified. In Fabric B, 12 cooking-pots and 6 dishes or bowls were identified. In Fabric C, 18 cooking-pots and 7 dishes were identified. Fabric D is almost exclusively used for fine ware jugs and pitchers. Of the remaining fabrics, the shelly and chalky fabrics are used for the ' kitchen ' wares and the fine sandy fabrics for jugs or pitchers.

On the limited evidence available, it would seem that cooking-pots were in use more than dishes or bowls and that certain fabrics were used more than others for making dishes or bowls. In Fabric B the ratio of cooking-pots to dishes or bowls is 2 : 1. In Fabric C the ratio is just over $2\frac{1}{2}$: 1, and in Fabric A, more than 5 : 1. It is noticeable in this analysis

[38] E. M. Jope, ' Medieval Pottery Kilns at Brill, Buckinghamshire ', *Records of Buckinghamshire*, XVI (1953–4), 39–42.

that the proportion of cooking-pots to dishes or bowls increases with the increase in the percentage of the fabrics. Thus Fabric A, which is the largest percentage of one fabric, has the highest ratio of cooking-pots to dishes or bowls. The study of material from future excavations may reveal whether the trends observed in this analysis are constant, or dictated by local conditions.

The Type Fabrics

Fabric A

Grey sandy fabric with small quartz inclusions. All the tripod pitchers were of this fabric and it was also common for cooking-pots and other vessels. The tripod pitchers usually have a grey core with bright orange surfaces The most common glaze is a dark olive green, although examples with orange or greenish-yellow glaze occur. Decoration is usually elaborate, with applied strips forming zones, finger-pressed applied decoration, horizontal rouletting, notching of rims and handles and one example of a handle with a twisted rope of clay inserted into it (No. 7) and one example with overall rouletted decoration on the body (No. 57). The other wares are fired grey and have grey surfaces.

Fabric B

Grey flint-tempered fabric with small quartz inclusions. This fabric is tempered with fragments of brown, white and black flint up to 4 mm. in size, and has occasional fragments of quartz and limestone. The fragments of flint show no signs of water rolling and are quite sharp. The fabric sometimes has a purplish tinge and the surfaces are usually grey, although some examples are buff or orange internally.

Fabric C

Grey flint- and chalk-tempered fabric. This fabric usually has pitted holes in the surfaces where the chalk has leached out. The majority of the sherds have bright orange external surfaces and grey internal surfaces. In a small proportion the colour of the surfaces is reversed or they are fired grey throughout. The chalk and flint inclusions are up to 4 mm. in size.

Fabric D

Fine orange sandy fabric which sometimes has a white or light grey core. Vessels made in this fabric are invariably jugs or pitchers and usually have an external mottled green glaze, although examples with an orange glaze occur. Some of the sherds have painted decoration in brown or yellow slip. This fabric is consistent with the products of the Brill kilns which were operating from the thirteenth century. On the evidence of the Broad Street excavations, the trade in Brill products in Abingdon was confined to jugs and pitchers, cooking-pots and other vessels being noticeably absent.

Fabric E

Fine light grey sandy fabric with a chalky appearance. Three examples of this fabric were recovered during the excavation, one rim (No. 65) and two body sherds. Two of the sherds had an external lime green glaze and one an internal lime green glaze.

Fabric F

Grey shell-tempered fabric. This fabric is usually quite soft and has orange surfaces, although some examples are grey throughout. The shell inclusions are up to 5 mm. in size.

Fabric G

Hard grey shell-tempered fabric. This fabric is harder than Fabric F and has a pitted appearance where leaching has occurred. The surfaces are light grey and the shell inclusions tend to be smaller in size than those of Fabric F.

Fabric H

Dark grey, crushed shell-tempered fabric (St. Neot's type). The crushed shell inclusions are aligned parallel with the surface of the pot and are up to 1 mm. in size. The surfaces are either purplish brown or dark grey.

Fabric I

Fine white sandy fabric (Stamford Type). This fabric has a fine pale green external glaze and has a light buff internal surface.

Fabric J

Grey chalk-tempered fabric. The chalk inclusions are up to 2 mm. in size and the surfaces are usually grey, and pitted where leaching has taken place.

Fabric K

Dark grey limestone-tempered fabric. This fabric has small limestone inclusions up to 2 mm. in size. The limestone fragments have rounded corners and may have been water rolled. The surfaces are usually dark grey or brown.

Fabric L

Fine white sandy fabric. Only one example of this fabric was recovered during the excavation, a body sherd from Pit 41. The surfaces are light orange and there is an external orange glaze over a red slip decoration.

Fabric M

Fine white sandy fabric. This fabric has a light buff internal surface and an external bright green and yellow glaze (Tudor Green Type).[39]

Fabric N

Fine white sandy fabric. This fabric is fired a light buff internally and has a mottled bright green and yellow external glaze.

The following abbreviations are used in this section :

Seacourt	Martin Biddle, ' The Deserted Medieval Village of Seacourt, Berkshire ', *Oxoniensia*, XXVI/XXVII (1961–2), 70–201.
Bodleian Extension	R. L. S. Bruce-Mitford, ' The Archaeology of the Bodleian Extension ', *Oxoniensia*, IV (1939), 89–146.
44–46 Cornmarket St.	T. G. Hassall, ' Excavations at 44–46 Cornmarket Street, Oxford, 1970 ', *Oxoniensia*, XXXVI (1971), 15–33.
Jope, 1947	E. M. Jope, ' Medieval Pottery in Berkshire ', *Berkshire Archaeological Journal*, L (1947), 49–76.
Jope, 1948	E. M. Jope, ' Recent Medieval Finds in the Oxford Region ', *Oxoniensia*, XIII (1948), 67–73.
Jope, 1950	E. M. Jope, *et al.*, ' Pottery from a late twelfth century Well-filling and other Medieval Finds from St. John's College, Oxford, 1947 ', *Oxoniensia*, XV (1950), 44–62.
Jope, 1951	A. G. Hunter and E. M. Jope, ' Excavations on the City defences in New College, Oxford, 1949 ', *Oxoniensia*, XVI (1951), 28–41.
Jope, 1951[a]	E. M. Jope, ' The Development of Pottery Ridge Tiles in the Oxford Region ', *Oxoniensia*, XVI (1951), 86–8.

[39] ' Tudor Green ' is discussed by Stephen Moorhouse with references in 'Finds from Basing House (*c.* 1540–1645), Part 1 ', *Post Medieval Archaeology*, IV (1970), 31–91. Mr. Moorhouse reviews the evidence for a late fourteenth- and early fifteenth-century date for ' Tudor Green ', 60–61. The presence of ' Tudor Green ' in Pits 36 and 26 on the Broad Street site, together with sherds of late fourteenth-century date, is also indicative of a late fourteenth- early fifteenth-century date for these sherds.

Jope, 1952 E. M. Jope, 'Late Saxon Pits under Oxford Castle Mound: Excavations in 1952', *Oxoniensia*, XVII/XVIII (1952–3), 77–111.

Jope, 1958 E. M. Jope, 'The Clarendon Hotel, Oxford, Part 1. The Site', *Oxoniensia*, XXIII (1958), 1–83.

Logic Lane F. Radcliffe, 'Excavations at Logic Lane, Oxford', *Oxoniensia*, XXVI/XXVII (1961–2), 38–69.

Rackham B. Rackham, '*Medieval English Pottery*', second edition (1972).

Pit 80 (FIG. 24)

1 Shallow bowl, Fabric B (*cf. Jope*, 1950, Fig. 18, no. 12).
2 Cooking-pot, Fabric C, finger-tip decoration on rim.
3 Bowl, Fabric B, finger-tip decoration on rim.
4 Bowl, Fabric G.
5 Cooking-pot, Fabric B, light finger-tip decoration on rim (*cf. Jope*, 1952, Fig. 33, no. 25).

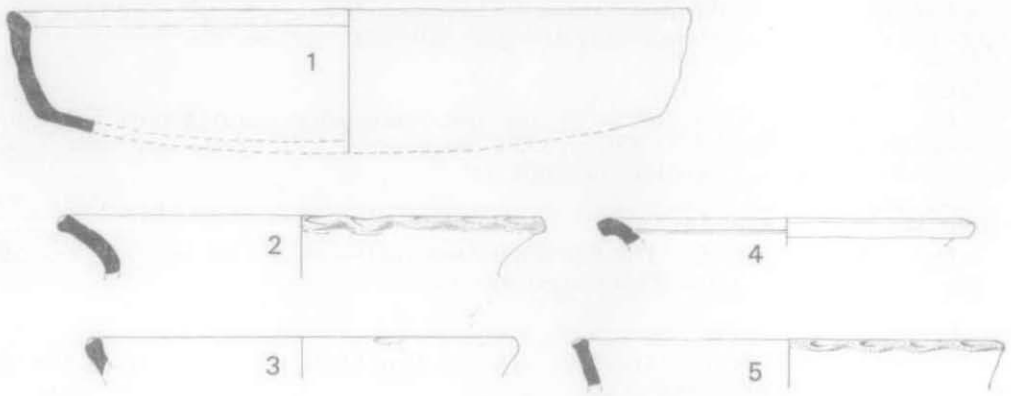

FIG. 24
Medieval Pottery, Pit 80, Trench III. Scale ¼.

This is the earliest medieval pit in Trench III on the stratigraphical evidence (FIG. 12). The evidence of the type fabric analysis (TABLE 1) also indicates an early date for the pit, sherds of 'tripod pitcher' and sandy wares (Fabric A) being absent. In Oxford 'tripod pitchers' and sandy wares are said to start in *c.* 1120, (Jope, 1958, 38). With due regard to the difficulties of dating Abingdon pottery by reference to the Oxford material, a pre-1120 date would seem appropriate.

Pit 73 (FIG. 25)

6 Rim and spout of 'tripod pitcher', Fabric A, yellowish-green external glaze, notched decoration on rim, the tubular spout luted onto the rim with a strip of clay. Various body sherds of the same vessel (not illustrated) with decoration of applied horizontal and vertical finger-pressed strips, forming zones of horizontal rouletting.
7 Rim and handle of 'tripod pitcher', Fabric A, internal dark olive green glaze, greenish-brown external glaze and on handle.
8 Rim sherd, Fabric A.
9 Cooking-pot, Fabric B, light finger-tip decoration on rim.
10 Cooking-pot, Fabric A, finger-tip decoration on rim, knife-trimmed on shoulder (*cf. 44–46 Cornmarket St.*, Fig. 4, 8/4; *Seacourt*, Fig. 23, no. 14).
11 Cooking-pot, Fabric B (*cf. Jope, 1958*, Fig. 11, A3C.2).
12 Cooking-pot, Fabric C.
13 Cooking-pot, Fabric F.

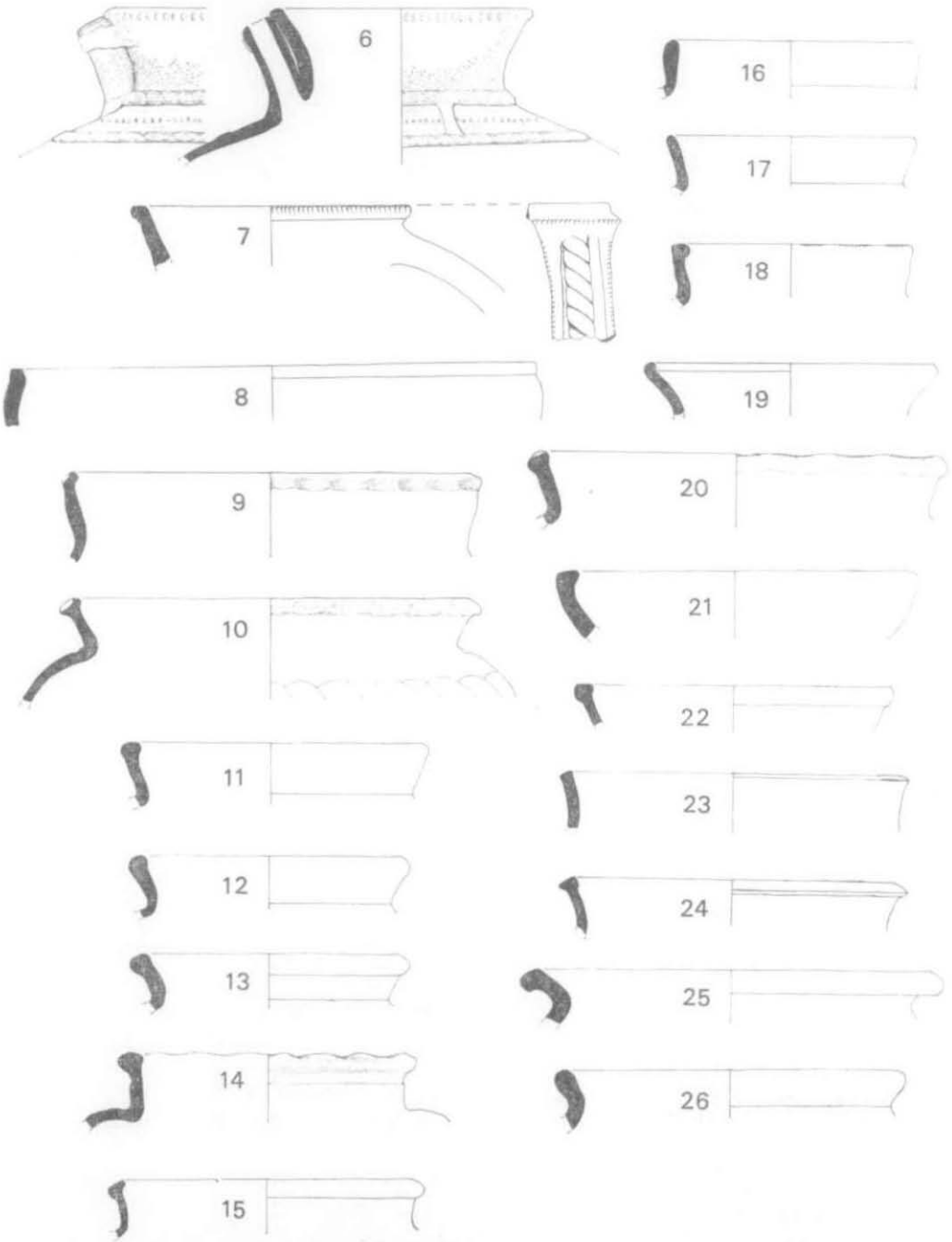

FIG. 25
Medieval Pottery, Pit 73, Trench III. Scale ¼.

14 Cooking-pot, Fabric A, finger-tip decoration on rim.
15 Cooking-pot, Fabric A.
16 Cooking-pot, Fabric B.
17 Cooking-pot, Fabric G.
18 Cooking-pot, Fabric B, light finger-tip decoration on rim.
19 Cooking-pot, Fabric A.
20 Cooking-pot, Fabric A, finger-tip decoration on rim.
21 Bowl, Fabric C (*cf. Logic Lane*, Fig. 11, no. 11).
22 Bowl, Fabric A.
23 Cooking-pot, Fabric A (*cf. Seacourt*, Fig. 23, no. 6).
24 Cooking-pot, Fabric A (*cf. Seacourt*, Fig. 18, no. 13).
25 Cooking-pot, Fabric F (*cf. Jope, 1958*, Fig. 10, A1C.1).
26 Cooking-pot, Fabric G.

On the evidence of the quoted parallels, a thirteenth-century date would seem appropriate for Pit 73. Numbers 10 and 23 have been dated to the late twelfth or early thirteenth century on other sites. The absence of any sherds with painted decoration, which are generally thought to be a thirteenth-century innovation in this region, in such a large group of pottery (408 sherds) may be indicative of a twelfth-century date for Pit 73.

Pit 100 (FIG. 26)
27 Rim sherd, Fabric G.
28 Cooking-pot, Fabric B, light finger-tipping on rim.
29 Cooking-pot, Fabric A (*cf. Jope, 1951*, Fig. 15, no. 5).
30 Cooking-pot, Fabric B, light finger-tipping on rim.
31 Cooking-pot, Fabric A (*cf. Jope, 1948*, Fig. 14, no. 4).
32 Cooking-pot base, Fabric A.

The assemblage of pottery from this feature is similar to that from Pit 73. As the pit is stratigraphically later than 73, a date in the late twelfth century would seem appropriate.

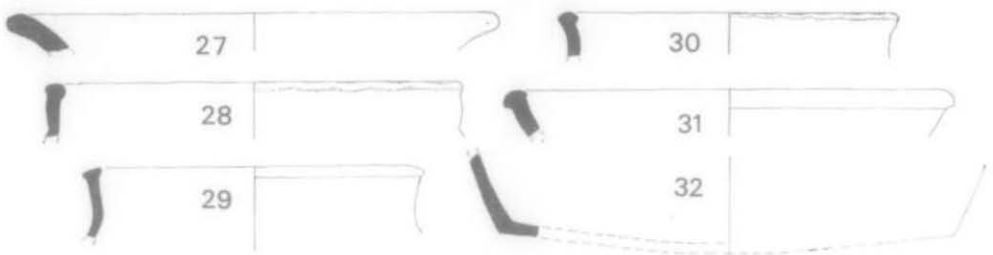

FIG. 26
Medieval Pottery, Pit 100, Trench III. Scale ¼.

Pit 78 (FIG. 27)
33 Cooking-pot, Fabric A (*cf. Seacourt*, Fig. 22, no. 6).
34 Small dish, Fabric A, finger-tip decoration on rim, knife-trimmed on body.
35 Cooking-pot, Fabric A.
36 Cooking-pot, Fabric K.
37 Dish, Fabric C.
38 Dish, Fabric C.
39 Cooking-pot, Fabric A, heavy finger-tip decoration on rim (*cf. Jope, 1951*, Fig. 15, no. 4).
40 Cooking-pot, Fabric A.
41 Cooking-pot, Fabric A.

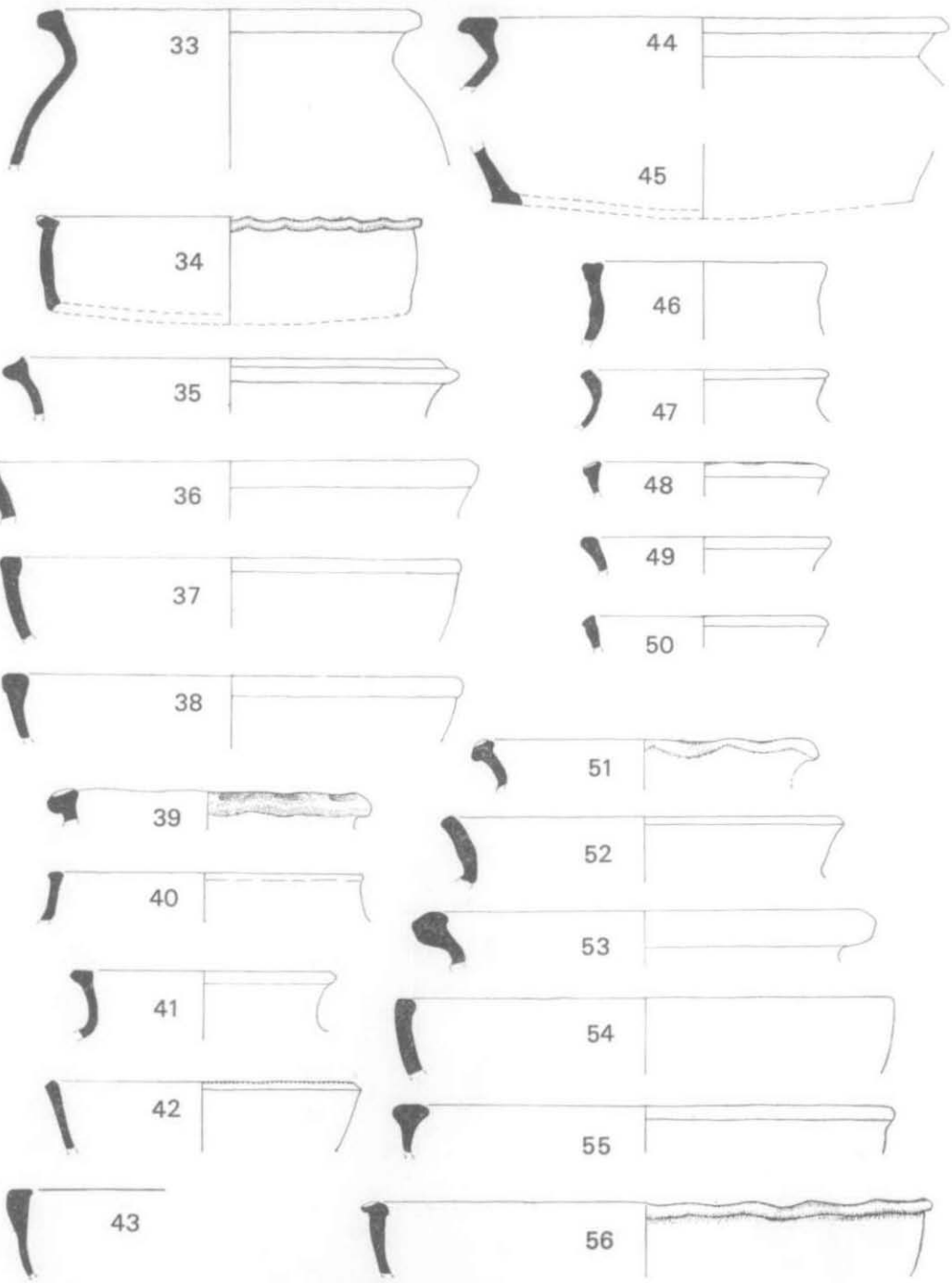

FIG. 27
Medieval Pottery, Pit 78, Trench III. Scale ¼.

42 Rim of jug or pitcher, Fabric A, orange glaze internally and externally, notched decoration on rim.
43 Dish, Fabric C (diameter uncertain).
44 Cooking-pot, Fabric J.
45 Cooking-pot base, Fabric C.
46 Pitcher or jug with lip, Fabric A, poor yellow glaze externally.
47 Rim sherd, Fabric J.
48 Rim sherd, Fabric A (*cf. Jope, 1958*, Fig. 21, Z.8).
49 Rim sherd, Fabric A.
50 Rim sherd, Fabric B.
51 Cooking-pot, Fabric B, finger-tip decoration on rim.
52 Cooking-pot, Fabric B.
53 Cooking-pot, Fabric C.
54 Dish, Fabric B.
55 Dish, Fabric C.
56 Dish, Fabric A, finger-tip decoration on rim.

The parallels with material from Oxford would indicate an early thirteenth-century date for Pit 78. Numbers 33 and 48 are dated to the early thirteenth century on other sites, but the absence of painted sherds in this large group (265 sherds) may indicate a twelfth- or early thirteenth-century date for Pit 78.

Pit 70 (FIG. 28)

57 Tripod pitcher, Fabric A, dark green external glaze, incised and rouletted horizontal decoration on body of vessel.
58 Rim sherd, Fabric A (*cf. Jope, 1958*, Fig. 16, B1B.7).
59 Jug or pitcher, Fabric D, patchy external yellow glaze.
60 Cooking-pot, Fabric C.
61 Cooking-pot base, Fabric A.

The presence of number 59 indicates a late thirteenth- or fourteenth-century date for this group. However, as 59 is the only sherd of Fabric D in the pit, it seems likely that its presence may be the result of contamination. The remaining material in the group displays characteristics consistent with an early thirteenth-century date and this would seem appropriate for Pit 70.

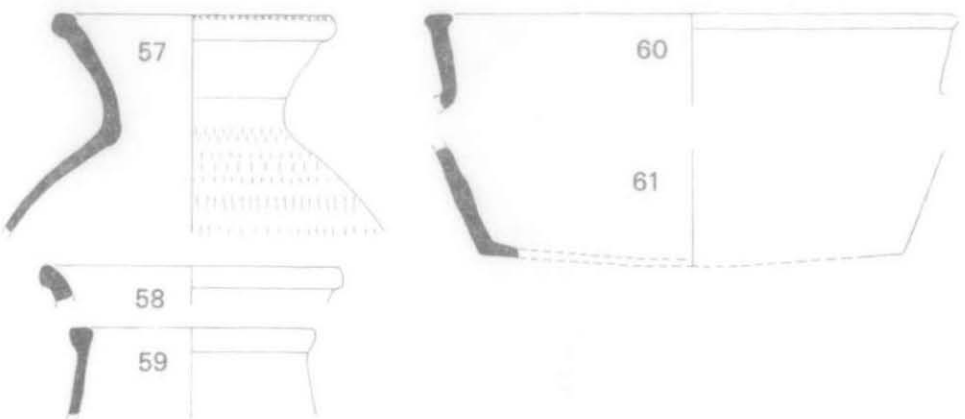

FIG. 28
Medieval Pottery, Pit 70, Trench III. Scale ¼.

Pit 66 (FIG. 29)

62 Large dish, Fabric C (*cf. Seacourt*, Fig. 25, no. 16).
63 Dish, Fabric C.
64 Cooking-pot, Fabric C.
65 Bowl, Fabric E, internal green glaze, incised zig-zag line on rim.
66 Cooking-pot, Fabric C.
67 Handle of jug or pitcher, Fabric A, olive green glaze over spots of yellow slip and stabbed decoration.
68 Base of jug or pitcher, Fabric D, patchy yellow glaze on base.
69 Cooking-pot base, Fabric C.
70 Base of jug or pitcher, Fabric D, green and yellow external glaze.

The presence of 62, paralleled at Seacourt in a later thirteenth-century context, and of 68 and 70, the last both fine quality jugs or pitchers in Fabric D, would indicate a date for this pit in the late thirteenth century or the fourteenth.

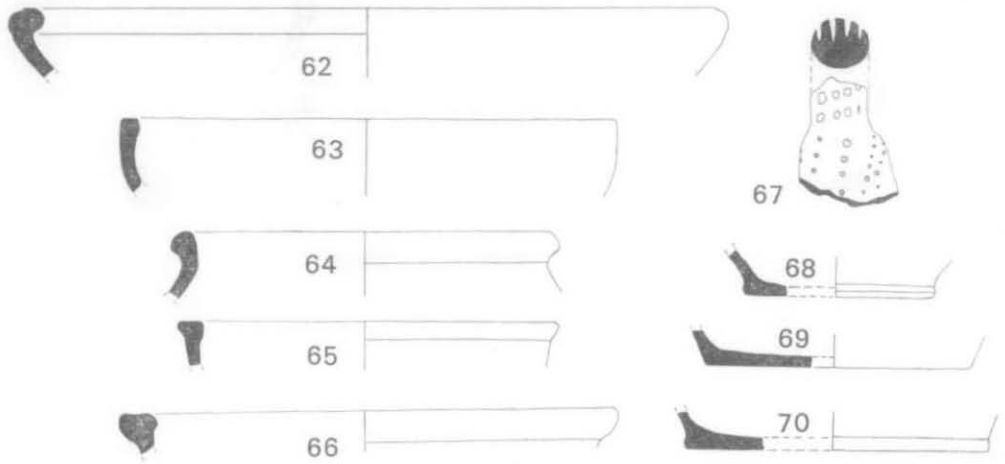

FIG. 29
Medieval Pottery, Pit 66, Trench III. Scale ¼.

Pit 35 (FIG. 30)

71 Large dish, Fabric B.
72 Cooking-pot, Fabric B.
73 Rim sherd, Fabric F.
74 Dish, Fabric B.
75 Cooking-pot, Fabric A, finger-tip decoration on rim.
76 Cooking-pot, Fabric F.
77 Shallow dish, Fabric B (*cf. Logic Lane*, Fig. 12, no. 7).
78 Ridge tile in grey quartz-gritted fabric, hole drilled through apex, thumb impressions on each side, hand moulded (*Cf. Jope, 1951*[a], Fig. 21, no. 1; *Seacourt*, Fig. 33, no. 3).
79 Bottle, Fabric D, yellowish glaze on outside (*Cf. Jope, 1947*, Fig. 8, no. 8).
80 Jug or pitcher, Fabric D, mottled external green glaze.
81 Cooking-pot, Fabric B, comb decoration on rim (*Cf. Jope, 1958*, Fig. 15, C3.24; *Jope, 1951*, Fig. 15, no. 11).
82 Jug or pitcher, Fabric D, mottled green glaze on outside, incised line below rim
83 Cooking-pot, Fabric A (*Cf. Jope, 1951*, Fig. 15, no. 1).
84 Cooking-pot, Fabric A.
85 Handle sherd, Fabric A, green glaze over yellow slip, incised decoration.

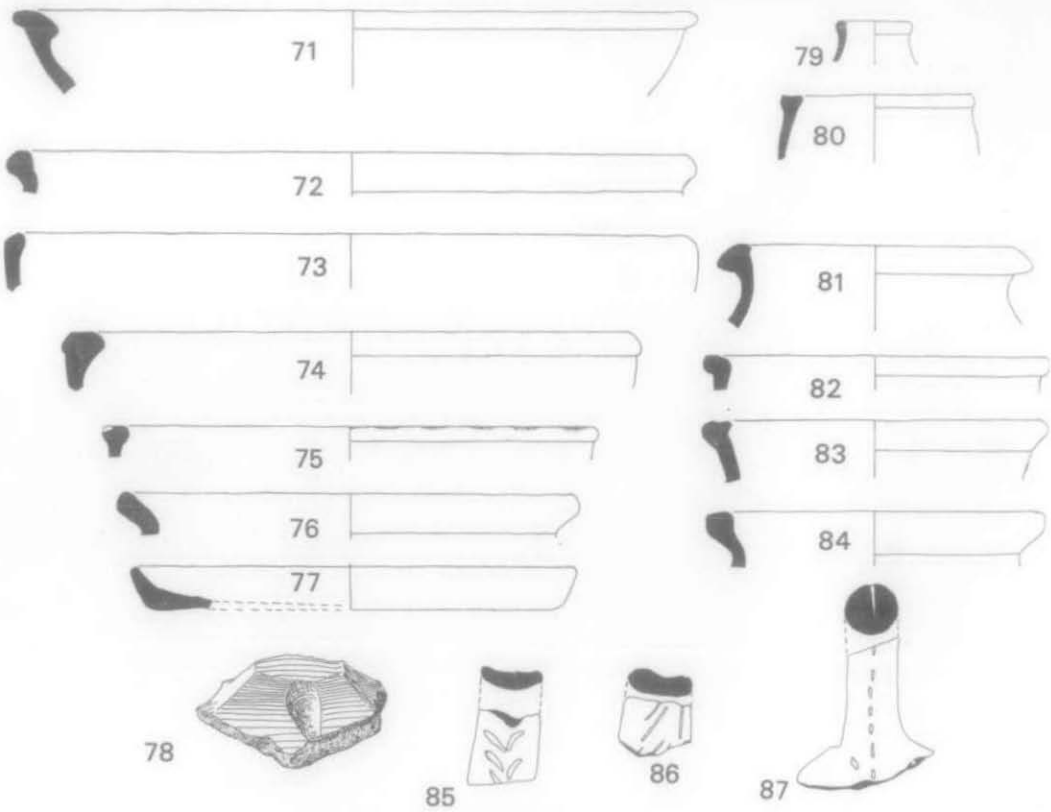

FIG. 30
Medieval Pottery, Pit 35, Trench III. Scale ¼.

86 Handle sherd, Fabric D, orange glaze, incised decoration.
87 Handle sherd, Fabric D, yellow glaze, traces of brown slip, stabbed decoration on handle.

The presence of Fabric D and the fine quality of the vessels in that fabric are indicative of a fourteenth-century date for Pit 35.

Pit 41 (FIG. 31)
88 Cooking-pot, Fabric A.
89 Cooking-pot, Fabric A, flecks of green glaze on inside.
90 Cooking-pot, Fabric C.
91 Cooking-pot, Fabric C.
92 Cooking-pot, Fabric C.
93 Handle sherd, Fabric D, patchy yellow glaze, slashed and incised decoration on handle.
94 Handle sherd, Fabric D, patchy yellow glaze, slashed and incised decoration on handle.
95 Jug or pitcher, Fabric D, mottled green glaze, pinched lip, three notches on rim.
96 Cooking-pot, Fabric C.
97 Rim sherd, Fabric C.
98 Jug or pitcher, Fabric D, patchy dark green glaze.

Fabric D is present here in similar proportions to Pit 35 and a similar fourteenth-century

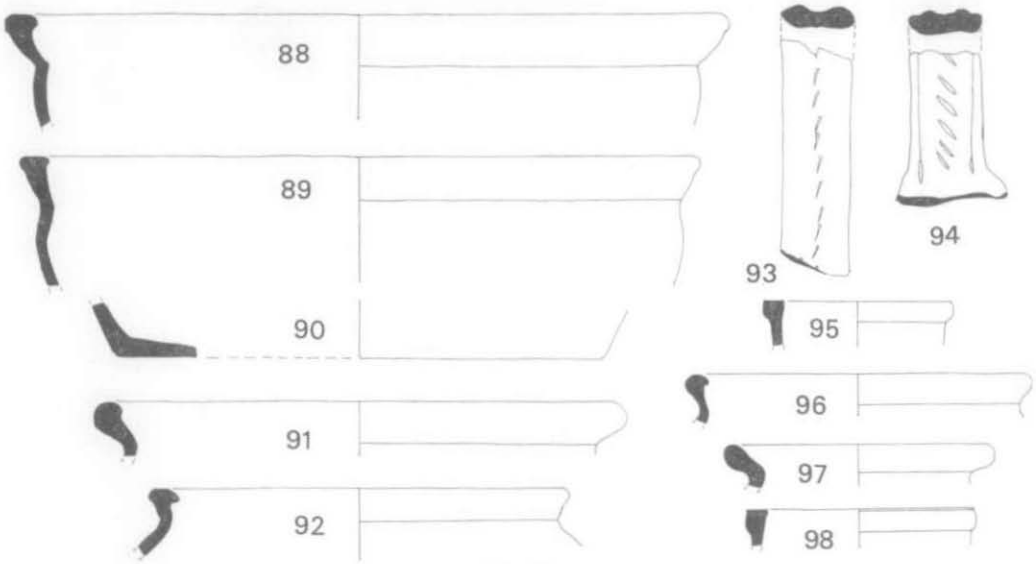

FIG. 31
Medieval Pottery, Pit 41, Trench III. Scale ¼.

date would seem appropriate for Pit 41. Its stratigraphical position with 35 and the small increase in the percentage of Fabric D, however, is indicative of a later fourteenth-century date.

Pit 36 (FIG. 32)

99 Rim sherd, Fabric A.
100 Cooking-pot, Fabric A.
101 Cooking-pot base, Fabric A.
102 Cooking-pot, Fabric C.
103 Cooking-pot base, Fabric C.
104 Cauldron foot. Pink flint- and chalk-tempered fabric. This is the only example of this fabric from the excavation and is not included in the type series.
105 Double-shelled lamp, Fabric D, brown speckled green glaze in bowl, patchy green glaze on stem (*Cf. Jope, 1950*, Fig. 21, no. 11).
106 Handle of jug or pitcher, Fabric D, yellow glaze and stabbed decoration.
107 Cooking-pot, Fabric A, finger-tip decoration on rim.
108 Jug or pitcher, Fabric D, patchy green glaze.

The presence of a high percentage of Fabric D suggests a fourteenth-century date for this feature and two body sherds of Fabric M (Tudor Green), also from the pit, would indicate a late fourteenth-century, or possibly early fifteenth-century, date.

Pit 26 (FIG. 33)

109 Dish, Fabric A.
110 Dish, Fabric A.
111 Rim sherd, Fabric F.
112 Cooking-pot, Fabric C.
113 Cooking-pot, Fabric A.
114 Cooking-pot, Fabric F.
115 Jug or pitcher, Fabric A.

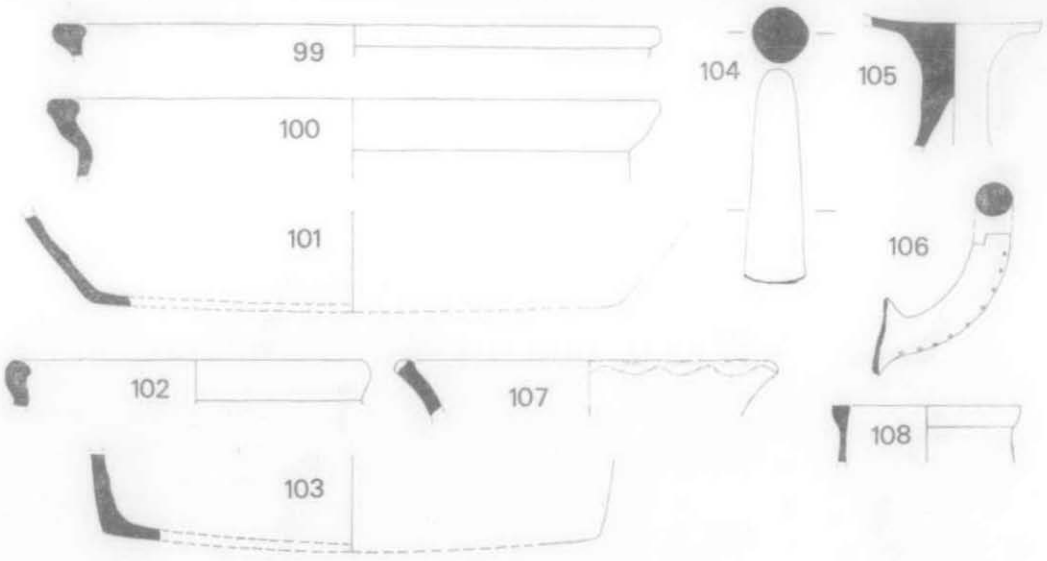

FIG. 32
Medieval Pottery, Pit 36, Trench III. Scale ¼.

116 Cooking-pot, Fabric A.
117 Cooking-pot, Fabric A.
118 Jug or pitcher, Fabric N, mottled greeny-brown glaze, pinched lip (*Cf. Bodleian Extension*, Fig. 25, G).
119 Jug or pitcher, Fabric D, transparent glaze, pinched lip.
120 Jug or pitcher handle, Fabric N, patchy pale green glaze, slashed decoration.
121 Jug or pitcher handle, Fabric D, slashed decoration (*Cf. Bodleian Extension*, Fig. 24, H).
122 Rim sherd, Fabric A.
123 Jug or pitcher, Fabric D, patchy greeny-brown glaze (*Cf. Seacourt*, Fig. 19, no. 8).
124 Jug or pitcher, Fabric D.
125 Rim sherd, Fabric J.
126 Lobed cup, Fabric M (*Cf. Seacourt*, Fig. 20, no. 7).
127 Rim sherd, Fabric D (*Cf. Seacourt*, Fig. 27, no. 12).
128 Jug or pitcher, Fabric A, brown glaze.
129 Base of jug or pitcher, Fabric D, pale green glaze.
130 Cooking-pot base, Fabric C.

Although the percentage of Fabric D decreases in this pit the five sherds of Fabric M (Tudor Green), and the fact that the pit was cut from the highest level in Trench III, would suggest an early fifteenth-century date for Pit 26.

Trench II, Pit 48 (FIG. 34)
131 Cooking-pot, Fabric B.
132 Cooking-pot, Fabric C.
133 Rim sherd, Fabric B.
134 Base sherd, Fabric A.

Of the 20 medieval sherds from this pit 60% are fabric B, 25% Fabric C and 15% Fabric A. The presence of Fabric A in the pit would suggest a twelfth-century date, the small percentage of Fabric A, an early twelfth-century date.

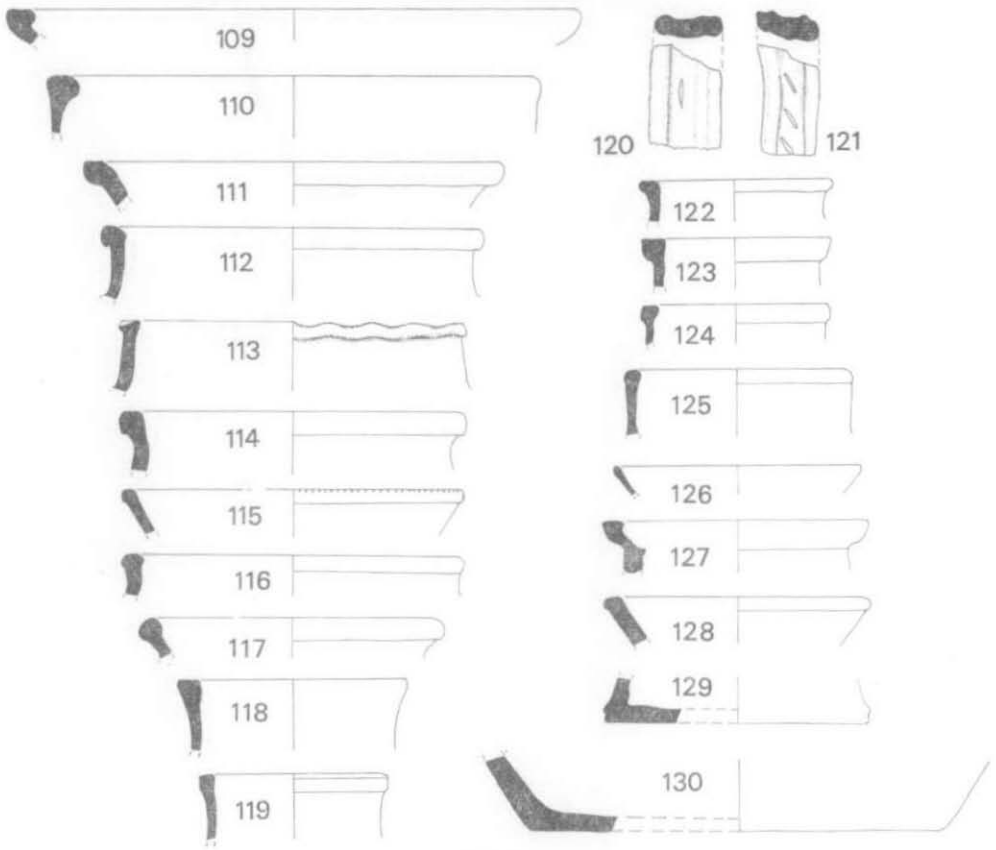

FIG. 33
Medieval Pottery, Pit 26, Trench III. Scale ¼.

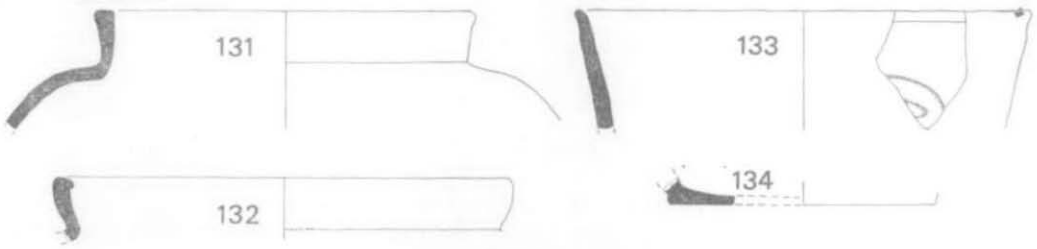

FIG. 34
Medieval Pottery, Pit 48, Trench II. Scale ¼.

Trench I, Pit 15a (FIG. 35)

135 Oxford type proto-baluster jug, Fabric N, dark green glaze, applied rouletted strips, grid stamps, applied chevrons, slashed strap handle (*Cf. Rackham*, Pl. 83).

136 Jug, Fabric N, brown speckled green glaze, tubular handle (*Cf. Bodleian Extension*, Fig. 25, D).

These two vessels are fine examples of the pottery produced in the Oxford region in the late

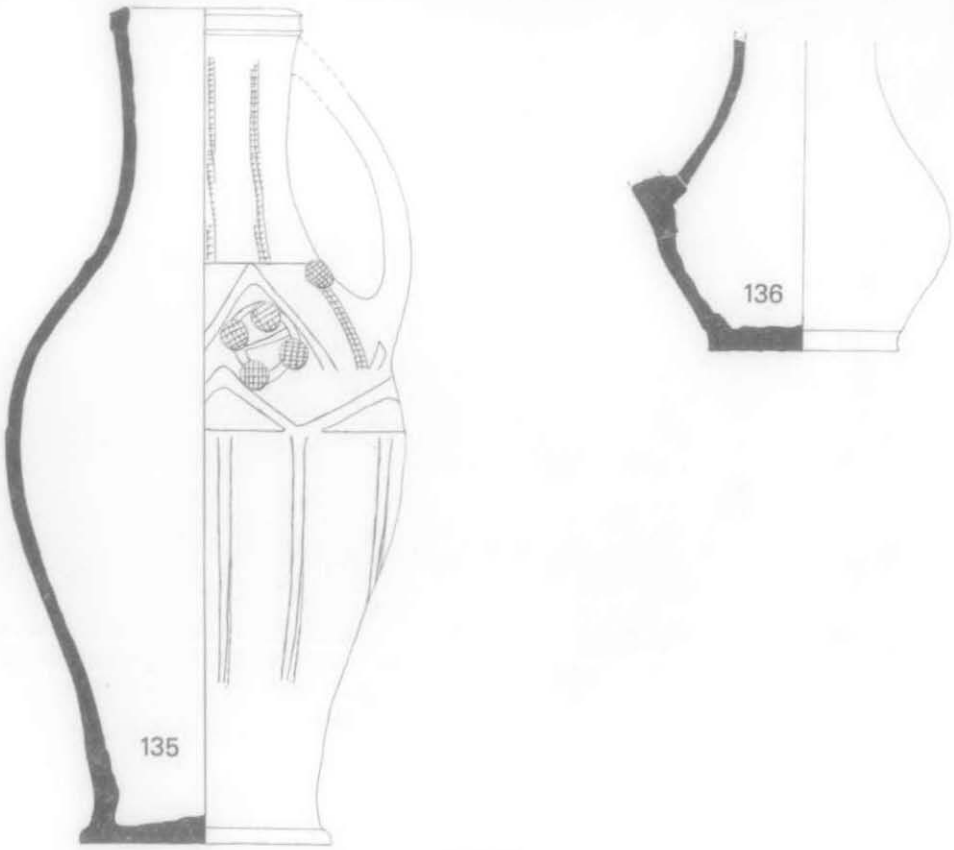

FIG. 35
Medieval Pottery, Pit 15a, Trench I. Scale ¼.

thirteenth and fourteenth centuries. The completeness of the two vessels contrasts sharply with the fragmentary condition of the other pottery recovered from the Broad Street site.

Post-Medieval

Trench I, Pit 22 (FIG. 36)

1 Small colander, fine orange fabric, yellow glaze inside and outside.
2 Bowl in orange fabric with quartz inclusions, light brown glaze inside, fired orange to buff on outside with traces of orange glaze.
3 Dish in orange fabric with grey core, green glaze on inside, fired brown on outside.
4 Jar in orange fabric, brown glaze on inside, fired orange on outside with a patch of orange glaze.
5 Jar in orange fabric, fine brown glaze on inside, fired a metallic brown colour on outside.
6 Bottle neck in fine white fabric, fired light buff inside and outside, patchy bright green glaze inside and outside.
7 Stoneware mug in fine grey fabric, mottled brown glaze inside and outside.
8 Stoneware mug in fine grey fabric, fired grey on inside, light grey glaze on outside.

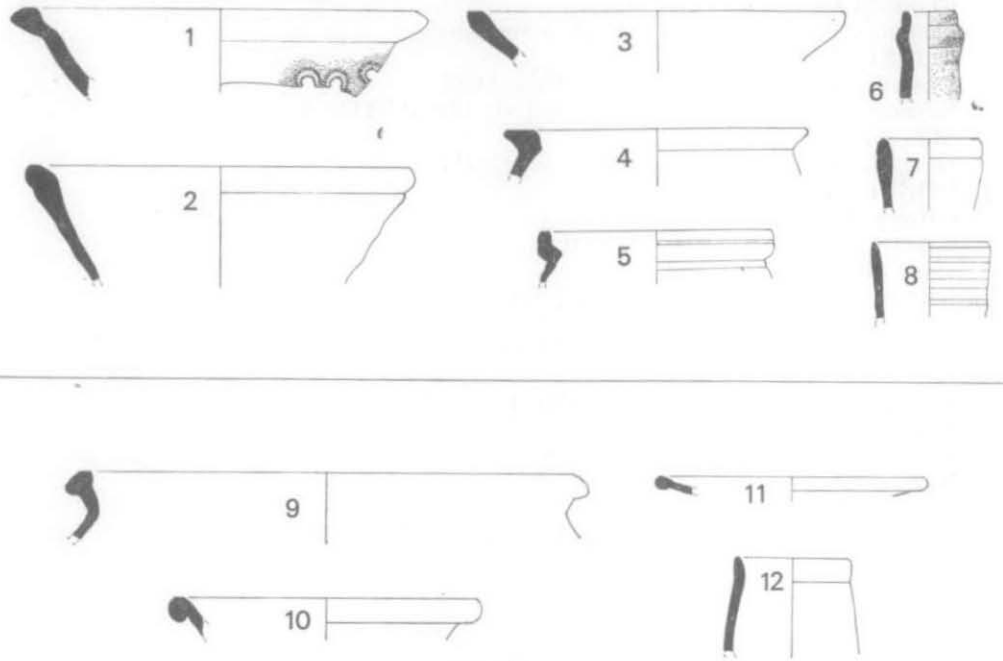

FIG. 36
Post-medieval Pottery : 1–8, Pit 22, Trench I ; 9–12, Pit 25, Trench I. Scale ¼.

Trench I, Pit 25

9 Cooking-pot in fine grey sandy fabric, fired dark grey on inside, fired orange on outside.
10 Bowl in pink sandy fabric, bright green glaze on inside, fired light grey on outside.
11 Small dish in fine grey fabric, mottled greeny-yellow glaze on inside, fired buff on outside.
12 Stoneware mug in fine grey fabric, fired pinky white on inside, light brown mottled glaze on outside.

The majority of the pottery from the Trench I post-medieval pits was residual Roman and medieval material. Only Pits 22 and 25 had significant quantities of post-medieval pottery, the other pits having mostly small numbers of body sherds. Fragments of ' Cistercian Ware ' and ' Tudor Green Ware ' were recovered from some of the pits, but this pottery was also residual in its context. All the post-medieval pits in Trench I would seem to be of 17th-century or 18th-century date and contemporary with the life of the cottages to the east of the Trench (FIG. 2), which are said to be 17th century in date.[40]

COINS

Five coins were recovered during the excavation, four Roman bronze coins and one silver Saxon coin. Coin number 4 was excavated from a contemporary deposit and of the remainder, numbers 1 and 2 were unstratified and numbers 3 and 5 were residual. Members of the staff of the Heberden Coin Room, Ashmolean Museum, have kindly identified the five coins.

1 LUCIUS VERUS (struck after his death)
Obverse DIVUS VERUS

[40] P. S. Spokes, ' Some Notes on the Domestic Architecture of Abingdon, Berks ', *Berkshire Archaeological Journal*, LXIII (1960), 9.

Reverse CONSECRATIO SC
Date A.D. 170 (unstratified, found by workmen)

2 CONSTANTINE I
Obverse IMP CONSTANTIUS MAX AUG
Reverse VICTORIAE LAETAE PRINC PERP VOT PR
Mint TRIER
Date *c.* A.D. 318–319 (unstratified Trench III)

3 CONSTANTIUS II
Obverse Illegible
Reverse FEL TEMP REPARATIO
Mint TRIER
Date *c.* A.D. 353 (Medieval Pit 114, Trench III)

4 THEODOSIUS I
Obverse IMP THEODOSIUS PFAVO
Reverse VICTORIA AUGGG
Date A.D. 379–395 (Roman Ditch 86, Trench III)

5 CNUT (silver short cross penny)
Obverse DEFRIDONL—E
Reverse GODEFRITH ON L—E
Mint LEWES
Date *c.* A.D. 1031–1035 (Medieval Pit 26, Trench III)

SMALL FINDS (FIG. 37)

Abbreviations used in this section :

A.R.B.	*Guide to the Antiquities of Roman Britain*, British Museum (1964).
Bryant and Steane	G. F. Bryant and J. M. Steane, ' Excavations at the Deserted Medieval Settlement at Lyveden ', *Journal of the Northampton Museums and Art Gallery*, 9 (1971).
Eccles, Kent	S. Hawkes, ' Finds from the Anglo-Saxon cemetery at Eccles, Kent ', *Ant. J.*, 53 (1973), 281–6.
L.M.M.C.	*London Museum Medieval Catalogue* (1967).
Seacourt	M. Biddle, ' The Deserted Medieval Village of Seacourt, Berks ', *Oxoniensia*, XXVI/XXVII (1961–62), 70–210.
Shakenoak	A. C. Brodribb, A. R. Hands and D. R. Walker, *Excavations at Shakenoak*, I–IV (1968–73).
Spencer	B. Spencer, ' A Scallop Shell Ampula from Caistor and Comparable Pilgrim Souvenirs ', *Lincolnshire History and Archaeology*, 1, no. 6 (1971), 59–66.

Over one hundred objects of bronze, iron, lead and bone were listed as small finds during the excavation. A selection of the small finds which are relatively complete and of intrinsic interest is described here and illustrated in Fig. 37.

1 Bronze ligula handle (*Cf. A.R.B.*, Fig. 5, no. 3). From medieval Pit 73, Trench III.
2 Bronze finger ring. From Roman Ditch 41, Trench II.
3 Bronze bracelet fragment with engraved dot decoration on outside (*Cf. Shakenoak*, IV, Fig. 54, no. 202, from a late 4th-century deposit). From Roman Ditch 23, Trench II.
4 Top half of bronze bell with suspension loop. The bell had been crushed in antiquity (*Cf. Seacourt*, Fig. 28, nos. 10 and 11, pre-1400 ; also *Bryant and Steane*, Fig. 12, C1 and C2). From post-medieval Pit 22, Trench I.
5 Bronze ' spectacle ' buckle (*Cf. L.M.M.C.*, Pl. LXXVII, no. 8) from post-medieval Pit 38, Trench I.
6 Small bronze buckle. From post-medieval Pit 25, Trench I.

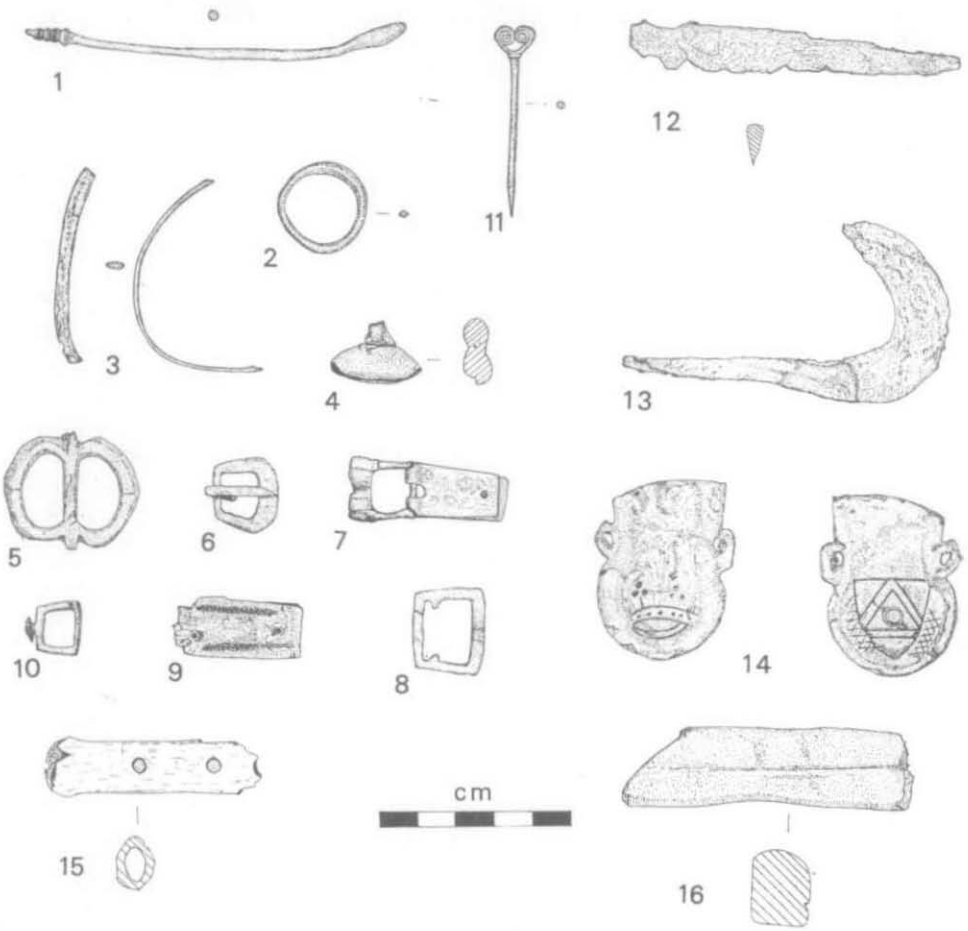

FIG. 37

Small Finds : 1–11, Bronze ; 12, 13, Iron ; 14, Lead ; 15, Bone ; 16, Stone. Scale ½.

7 Bronze strap-end buckle and plate. From post-medieval Pit 10, Trench I.
8 Bronze strap-end loop (*Cf. Bryant and Steane*, Fig. 11, B4). From medieval Pit 52, Trench III.
9 Decorated bronze strap-end. From post-medieval Pit 25, Trench I.
10 Bronze strap-end loop? with a square sheet of bronze riveted on. From medieval Pit 52, Trench III.
11 Spiral-headed bronze pin (*Cf. Shakenoak*, III, Fig. 31, 156 and 157 : for discussion of these pins, see pp. 84 and 85 ; also *Eccles, Kent*, 282–5, where dated to the 7th century A.D., and *Bryant and Steane*, Fig. 12 t in a late 13th-14th-century context).
12 Iron knife blade. From medieval Pit 36, Trench III.
13 Iron pruning knife (*Cf.* two in Ashmolean Museum, acc. nos. 1873.55 and 1873.56). From medieval Pit 73, Trench III.
14 Lead ampulla with shield of arms on one side and a crown on the other side. (*Cf. Spencer*, pl. XXII, o. Mr. Brian Spencer of the London Museum has kindly examined a drawing of this object. He considers it to be 15th-century in date.) From post-medieval Pit 38, Trench I.

15 Bone flute fragment. (*Cf. Bryant and Steane*, Fig. 19, b ; Pl. 18.) Unstratified, from area of Trench I.

16 Fragment of hone stone which has been used as a needle sharpener. From post-medieval Pit 15, Trench I.

TILE, TESSERAE, WALLPLASTER, NAILS AND LEAD

Many fragments of Roman and medieval tile were recovered from the medieval pits on the site. All the tiles were fragmentary but among the Roman material fragments of *tegulae* and *imbreces* were noted. Some thicker tile fragments were found which resembled hypocaust tiles and two fragments with 5 cm. holes in them which are probably box tiles from a hypocaust. The tiles had a hard-fired red fabric and many of them had combing marks on one side and traces of mortar adhering to them. The medieval tiles were thinner and many had bored holes in them for fixing to a roof. They had a rougher finish on both sides than the Roman tiles, and a hard red fabric. Many fragments of stone slate were also recovered. The slates were also fragmentary and only one complete specimen was recovered. This was roughly rectangular, measuring 35 cm. by 30 cm. and was 2 cm. thick. It was composed of a hard shelly limestone and was typical of the other slates recovered. This specimen had no bored fixing hole in it but many of the smaller fragments had holes some with iron staining around the hole from the nail. These slates may have been in use in the Roman or the medieval period.

Over a hundred tesserae were recovered from the site. They were made out of limestone and tile with the same hard-fired red fabric as the Roman tile. Some of them were made from tiles with a fine buff fabric and fragments of *opus signinum* and a yellowish mortar adhered to many of them. The *tesserae* were all well cut and as well as the standard square examples, triangular *tesserae* were found.

A small amount of wall plaster and mortar was found. Only one fragment of painted plaster was found. This was a pinkish plaster with traces of reddy brown paint.

A very large quantity of nails and spikes came from the pits. Nails were also found in two Roman features, Ditches 23 and 76 (fragments of tile and one *tessera* were found in 76 also). Many of the nails from the pits were similar to the examples from the two ditches and a high percentage of them is probably Roman.

Fragments of lead window cames and other miscellaneous lead fragments came from the pits.

Discussion : There seems little doubt that a Roman building stood in the vicinity of the site. There also seems little doubt that this building had tesselated floors, some painted wall plaster and a tiled roof. The hypocaust tiles indicate that it had some heated rooms and the large number of nails may indicate that a large part of its superstructure was timber. Some of the mortar from the site had wattle marks. The location of the building in relation to the site is unknown ; the building debris was found in most of the pits and no bias to one particular area was noted. As none of the pits which contained building debris was Roman it would seem that the debris was not deliberately thrown into them. The likeliest explanation for the presence of the material would seem to be that it represents the destruction layer of a Roman building which has been deposited on the site by ploughing or some other agency and thrown into the pits with other residual material at the time that they were backfilled.

INFANT BURIALS. By E. EDWARDS

Burial 16, Trench II (FIG. 4)

These remains consisted of a number of infant vertebral components, several ribs and rib fragments, and a number of pieces of the skull.

A temporary reassembly of four of the cranial fragments appeared to be a portion of the right parietal bone. This means that the fontanelles were still not fused. The parietal, occipital and frontal regions were all still quite separate. The saggital suture on the fragments had formed. This is the obelion, and fuses at about two months after birth. The antero-lateral fontanelle had not disappeared, this is located at the pterion, and fuses at about three months after birth. The postero-lateral cartilage had not ossified either, and this is complete at the end of the 1st year. Possibly the posterior fontanelle had not ossified, but this was difficult to determine.

From these fragments the sex remains unknown, but this infant died of unknown causes by about the time of its third month of life.

Burial 26, Trench II (FIG. 4)

This individual consisted of some parts of the arms, both the legs (minus fibulae), a few vertebral components, a few rib fragments, and some pieces of the cranium. Also present were two incomplete fragments of the pelvis, and shoulder blade. A temporary reassembly of some fragments of the frontal area including bone from the upper orbit indicated that the metopic suture had not begun its obliteration—this process is complete by the end of the 2nd year. The remaining cranial bones indicated that most of the fontanelles had ossified. From this evidence it is possible to make a tentative estimate that this infant was in its 1st year, about nine to twelve months of age. There is no evidence of bone disease, and no signs of injury or congenital abnormality.

THE PREHISTORIC FINDS

The earliest evidence of human occupation in Abingdon comes from the Lombard Street site,[41] where pottery of the early Iron Age was recovered from a post-hole. It would seem likely however that the gravel terraces on which Abingdon is built had attracted settlers before the Iron Age period. Abingdon is surrounded with the burial mounds of pre-Iron Age settlers many of which are known from air-photographs.[42] The

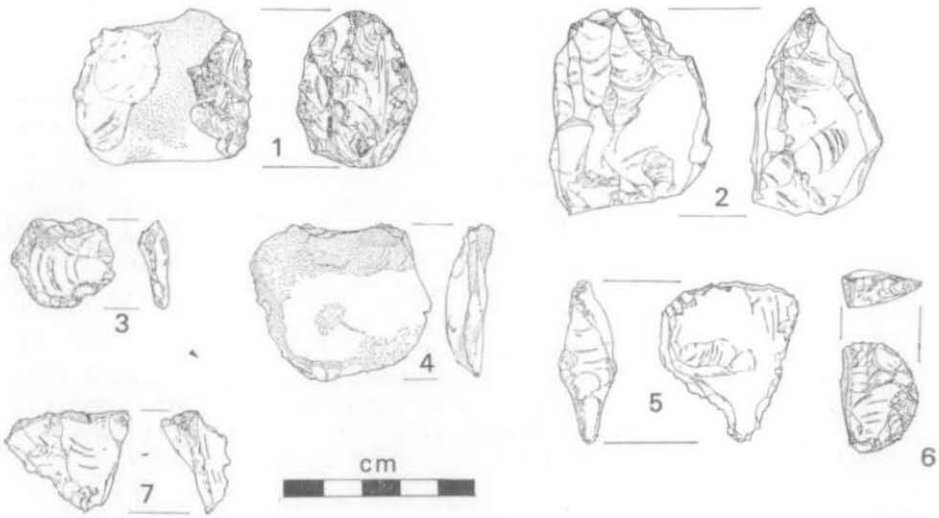

FIG. 38

Worked Flints : 1, 2, Cores ; 3, 4, Scrapers ; 5, Borer ; 6, Short Side Scraper ; 7, Notched Fragment. Scale ½.

[41] *C.B.A. Group 9 Newsletter*, 3 (1973), 23.

[42] D. Benson *et al.*, *The Upper Thames Valley : an Archaeological Survey of the River Gravels* (1974), Maps 30-33.

Abingdon causewayed camp[43] is indicative of settlement in the area in the neolithic period. The density of settlement in Abingdon, from the Iron Age until the present day, would tend to obliterate less tangible evidence of occupation than features described in this report. The worked flints discussed below are the only evidence for pre-Iron Age occupation in Abingdon so far.

THE WORKED FLINTS (FIG. 38). By RICHARD BRADLEY

A total of 59 worked flints came from medieval layers on the site. The great majority were irregular and badly struck flakes from gravel nodules. The poor quality of this material accounts for the small size and the thickness of these pieces.

Flakes : Nineteen waste flakes retained areas of cortex and another 23 were non-cortical. Eleven were of the general proportion of blades, but none was made by any specialized technique. There were nine small spalls. Of the flakes, five showed areas of localized battering and four showed irregular retouch. Many of the gravel nodules had been naturally rolled, but wear marks consistent with use could be recognized on twelve flakes. All the flakes were too small and chunky to result from medieval wall knapping and a few of the most irregular may have been fractured by chance, for instance if they had lain within a trodden surface. In general, the number of partly cortical flakes is a reflection of the small size of the parent material.

Cores : Three cores were found, two with parallel platforms. In each case flakes had been struck in two directions from one of these platforms. A third core showed three platforms with a small area of retouch. The number of platforms is probably related to the small size of the gravel nodules.

Core trimming flakes : Two core trimming flakes were found, both struck diagonally to the platform. One retained areas of retouch.

Scrapers: Seven scrapers came from the site, all on small and rather irregular flakes, including one frost fracture. Five were short end scrapers and a sixth was a short side scraper. The remaining example was broken across in antiquity.

Borer : One retouched flake borer was recovered. The tip may have broken in antiquity and been resharpened by secondary retouch.

Miscellaneous : One small, broken fragment with a small area of quasi-microlithic blunting ; a notched fragment with severe wear within the hollowed area, and a retouched piece with severe abrasion on two edges consistent with its use on bone or antler.

General considerations : There is no reason why this material should all be contemporary and there is little to point to any date, except that all the flints should be later than the early–middle neolithic. The small scrapers and the borer can be matched in the late neolithic and later, while the cores are so closely conditioned by the raw material that any typological discussion would be worthless. The small irregular flakes may argue a period when flint technology was giving way to metal working, but there is good evidence for continued use of this material at least into the Roman period. Indeed it is not impossible that some of this material is not residual at all!

SEED REPORT. By MARTIN JONES

2·5 kgm. of sun-dried soil from Roman Ditch 23, Trench II, was floated over water and the float collected in a mesh with apertures of approximately 700μ diameter. *c.*125 gms. of carbonized plant material was acquired and a sample of *c.*25 gms. scanned for carbonized seeds. The finds are tabulated opposite :

Notes :

1 Carbonization tends to liberate hulled grain from the husk and thus the presence of naked carbonized barley grain does not necessarily indicate the presence of naked varieties of barley.

2 The division into central and lateral grain is made in order to distinguish between 2-row

[43] H. J. Case, ' The Neolithic Causewayed Camp at Abingdon, Berks ', *Antiq. J.*, 36 (1956), 11–30.

and 6-row barley. 2-row barley is composed entirely of central grains, and 6-row barley contains a mixture with theoretically twice as many lateral grains as central grains.

3 36 fragments of spikelet base, and one spikelet fragment with two grains in position, were recovered, and all identified as being from *TRITICUM SPELTA* (spelt).

Cereals		No. of Seeds
HORDEUM (Barley)		
Hulled grain :	Central grain	15
	Lateral grain	10
	Not further identifiable	10
	Total	35
[1]Naked grain :	Central grain	11
	Lateral grain	30
	Not further identifiable	164
	Total	205
	[2]Central grain total	26
	Lateral grain total	40
	Remainder	174
	HORDEUM total	240
TRITICUM (Wheat)		
Hexaploids :	[3]*T. SPELTA* (Spelt)	101
	Not further identifiable	25
	Total	126
Not further identifiable		50
	TRITICUM total	176
Cereal grain not further identifiable		91
Cereal grain total		507
Grasses other than cereals		
BROMUS sp. (Chess or Brome)		5
AVENA sp. (Wild Oat)		2
Not further identifiable		8
Total		15
Other species		
CYPERACEAE (sedge family)		10
CHENOPODIUM ALBUM (fat hen)		5
ANTHEMIS COTULA (stinking mayweed)		3
Other COMPOSITAE (dandelion/thistle family)		4
RUMEX sp. (dock)		1
VICIA sp. (vetch)		1
Not further identifiable		9
Total		33

Inference and Discussion :

The sample represents a deposit of 6-row barley (wholly or partially composed of hulled varieties) and spelt wheat, with a few weed seeds. Barley constitutes 58% of the cereal seeds.

This sample differs from the five Roman samples studied by Helbaek[44] in one important respect ; the main component is barley. In Helbaek's samples barley was either absent, or present in very small quantities, perhaps merely as a weed impurity. The recovery of the sample from North Broad Street corroborates Helbaek's suggestion that his own figures reflect, not the limited use of barley in Roman Britain, but rather the limitations in the evidence at his disposal, and it is obviously necessary to recover far more samples before much can be said about the relative importance of different crop-plants during the Roman period.

In other respects the sample is similar to those studied by Helbaek ; the wheat species present is spelt, and occurring with it are the two grasses, chess and oats (*BROMUS* sp. and *AVENA* sp.) which accompany spelt in virtually every sample of grain that has been recovered from Iron Age and Roman deposits.[44]

There is a great diversity in the degree of purity (*i.e.* the percentage of weed seeds) of the samples of Iron Age and Roman grain that have been discovered in this region. The present sample, with weed seeds at 8·6% by number, is comparatively pure. The significance of this diversity is not yet clear, and it is hoped that examination of further samples from this region may cast some light on this point.

The presence of ten seeds of the sedge family (*CYPERACEAE*) indicates the presence of a waterlogged patch or patches, in or near the arable fields, a situation not uncommon on the river gravels. As there is only one sample from this site, no great significance is attached to this point.

QUANTITATIVE ANALYSIS OF POTTERY ASSEMBLAGES FROM PITS ON THE BROAD STREET SITE, ABINGDON. By DENYS PRINGLE

In the discussion above, the medieval pottery from the Broad Street excavations has been analysed by the standard method of identifying ' types ' and from these constructing a ' type-series ' (*i.e.* a chronological series of types) with the aid of additional information provided by stratification, the association of different wares in assemblages and from parallels with other sites. In analyses of this kind, a *terminus post quem* for dating each deposit is then usually sought in the latest type represented in it. It was on such grounds, for example, that Pits 36 and 26 were suggested to be later in date than the rest, because they contained sherds of Tudor Green pottery, which it is known occurs on other sites in late 14th- and 15th-century contexts.[39] Without in any way challenging the general validity of this method of approach, the classic description of which was given by Childe,[45] it should nevertheless be pointed out that in practice it is open to serious criticism on two major points. In the first place, a great deal of importance may be invested in a handful of ' type fossils ', whose presence in any assemblage might conceivably be due to accident (e.g. worm action, root disturbance, careless excavation, etc.) ; one might reasonably question, for example, the significance of two sherds of Tudor Green from Pit 36, and the five sherds from Pit 26, which represent respectively only 1·8% and 3·8% of their assemblages ; and conversely one might ask whether, when such small numbers are involved, the absence of the ware from Pit 41 necessarily means that the pit was filled before the time at which Tudor Green became current. Secondly, by concentrating on the questions arising from the presence/absence of specific types, the whole range of other wares included in the assemblages is apt to be neglected.

It would be wrong to assume from these remarks that archaeologists are either unaware of these problems, or that they do not attempt to achieve some kind of overall objectivity when dealing with pottery assemblages. Some seventeen years ago, Professor Jope showed

[44] H. Helbaek, ' Early Crops in Southern England ', *PPS*, XVIII (1952), 94f.
[45] V. G. Childe, *Piecing Together the Past* (1956).

that attention to the frequency of occurrence of certain wares could serve as a useful aid in dating medieval pottery groups[46] ; and a statistical approach to the analysis of pottery from a single site was made by Biddle in his report on the excavations at the deserted medieval village site of Seacourt.[47] Nevertheless, it seems strange that whereas it is now common practice to include in medieval reports a detailed quantitative analysis of the bone material, pottery only rarely receives similar treatment.[48]

A quantitative approach to the pottery of Abingdon commended itself for a number of different reasons. Until recently, little work has been done on the medieval pottery of the town, and although the series for near-by Oxford is much better understood, it was felt that it should not be assumed *a priori* that Abingdon would conform to the same pattern. Secondly, it was hoped that seriation might clarify the relationships between some of the pits, which had not been determined by stratigraphy or standard typological analysis. Thirdly, the experiment was undertaken in order to evaluate what is in effect a relatively simple method of seriation,[49] and its possible application to the study of medieval pottery.

The seriation technique employed in this analysis is essentially the one which W. S. Robinson and G. W. Brainerd published in 1951.[50] Seriation operates on the principle that, when cultural change proceeds at a constant rate, deposits which are laid down closer together in time will show a greater degree of similarity when their cultural assemblages are considered as a whole than ones which are temporally further removed from one another. Since rates of cultural change are rarely constant, or not predictably so, seriation cannot usually hope to produce an absolute chronology ; yet by comparing pottery assemblages with one another in terms of the percentages of the different wares they contain, it is often possible to construct a relative chronological sequence for the assemblages. In practice this is done by drawing up a similarity matrix showing the degree of similarity (expressed in terms of a ' coefficient of similarity ') when each assemblage is compared individually with each other one. Through analysis of the matrix, for which a number of techniques are now available, it is possible to draw assemblages together into a series based on the similarities exhibited between them. As Dunnell has written, however,[51] the ' resulting series . . . must be *inferred* to be chronological, and all such inferences must be based on the assumptions of the method and, ultimately, on whether or not the classes chosen for seriation embody in their definitions criteria that vary primarily through time, and not through " other dimensions " ' (my italics). In practice, the classic time/frequency model upon which Robinson and Brainerd based their method rarely occurs in the simplified form suggested by their diagram.[52] Before going on to describe the analysis of the Broad Street pit-groups therefore, mention should first be made of some possible distorting factors which could upset the seriation and affect our evaluation of the results.

In the first place, it is assumed that the pits were filled consecutively. If, for example, during the time taken for one pit to fill, a number of other pits were also dug and filled,

[46] E. M. Jope, ' The Clarendon Hotel, Oxford. Part 1, the site ', *Oxoniensia*, XXIII (1958), 1–83 (at p. 55, Fig. 20).

[47] M. Biddle, ' The Deserted Medieval Village of Seacourt, Berkshire ', *Oxoniensia*, XXVI–XXVII (1961–2), 70–210 (at p. 130–134) ; also M. Robinson, ' Excavations at Copt Hay, Tetsworth ', *Oxoniensia*, XXXVIII (1973), 41–115, Tables 1–2.

[48] One notable example of the presentation of quantitative pottery data from a medieval site is to be found in R. H. Hilton and P. A. Rahtz, ' Upton, Gloucestershire, 1959–1964 ', *Trans. Bristol and Glos. Archaeol. Soc.*, LXXXV (1966), 70–146 ; and P. A. Rahtz, ' Upton, Gloucestershire, 1964–1968 ', *Ibid.*, LXXXVIII (1969), 74–126.

[49] With the aid of a desk calculator the analysis of the data supplied by Michael Parrington took only a few hours to complete.

[50] W. S. Robinson, ' A method for chronologically ordering archaeological deposits ', *American Antiquity*, XVI, iv (1951), 293–301 ; G. W. Brainerd, ' The place of chronological ordering in archaeological analysis ', *Ibid.*, XVI, iv (1951), 301–313. A more comprehensive discussion of seriation techniques is given in F. Hole and M. Shaw, *Computer analysis of chronological seriation*, Rice University Studies Monographs 53, 3 (Houston, 1967) ; see also the review of this by G. L. Cowgill, *American Antiquity*, XXXIII, iv (1967), 517–519. A more general introduction is given in D. Clarke, *Analytical Archaeology* (1968), 451–463.

[51] R. C. Dunnell, ' Seriation method and its evaluation ', *American Antiquity*, XXXV, iii (1970), 305–319 (at p. 10).

[52] Robinson, *op. cit.* note 50, Fig. 89 ; *cf.* Clarke, *op. cit.* note 50, Fig. 84.

one could not expect these assemblages to seriate successfully. Secondly, one should be satisfied that all of the assemblages belong to the same cultural tradition and are representative of it at the time that they were formed. One would not necessarily expect pit-groups excavated in, for example, Oxford or Wallingford to seriate chronologically with those from Abingdon. In general, large assemblages (over 70 sherds) are more likely to be representative than smaller ones. One should thirdly consider the possibility of spatial variations in the distribution of artifacts over a site, the result, for example, of social or functional factors.[53] If pits were used for different purposes while they were filling one might expect to find this reflected in their fill. Fourthly, one should adopt sampling and counting methods which most accurately record the data in the ground. In the case of the Abingdon groups, pottery was quantified in terms of the numbers of sherds of each ware recovered from each pit. Because some types of pottery are more liable to fracture than others, however, it is arguable that recording by volume, mass or estimates of the number of whole vessels represented would have been more satisfactory.[54] As regards sampling, one should at least be satisfied that the same standards of data retrieval obtained for the excavation of each pit.[55] Any one of these considerations, or a combination of them, could cause disturbance of the temporal patterning to rise above an acceptable level of background ' noise ' and cause clustering in the matrix, or even false seriation.[56]

The distribution of sherds of each ware throughout the assemblages is given in tabulated form in Table 2. Percentages are shown in *italics* beneath each figure. From these percentages a matrix of similarity, Table 3, was constructed, based on coefficients giving 200 for perfect correlation between groups, calculated in the manner described by Brainerd[57] the matrix was then subjected to close-proximity analysis of the double-link method developed by Renfrew and Sterud.[58]

The results of this are represented diagrammatically in Figure 39.

In FIG. 39 we see a linear series of pottery groups : 73, 100, 78, 66, 35, 26, 36, 41. As stated above, however, the extent to which this represents a *chronological* series depends on how far it may be said in this instance that the assumptions on which the method is based are justified ; and this is a matter of individual judgement. However, a number of factors do appear to support the chronological validity of the seriation.[59] The complete absence of single-link bonds (with the exceptions of Pits 70 and 80, about which more will be said later) and the low level of clustering[60] may be counted grounds for optimism. Furthermore, the series tallies convincingly with the sequence deduced by more orthodox methods, and, if one accepts that Pit 26 is not a later intrusion (see p. 52 above), does not conflict with

[53] *Cf.* H. T. Irwin, ' Effects of excavation on seriation at a Palaeo-Indian site ', in F. R. Hodson, D. G. Kendal and P. Tautu (eds.), *Mathematics in the Archaeological and Historical Sciences* (1971), 209–214.

[54] The number of reconstructable whole pots was in fact too small for this to have been a realistic method of approach in this instance ; see, however, B. J. Egloff, ' A method for counting rim sherds ', *American Antiquity*, XXXVIII, iii (1973), 351–353 ; and W. G. Solheim, ' The use of sherd weights and counts in the handling of archaeological data ', *Current Anthropology*, I, iv (1960), 325–329.

[55] Dunnell adds another prerequisite, that only classes of artifact (in this case wares) which conform to a unimodal frequency distribution through time are suitable candidates for seriation (*op. cit.* note 51, 317–318). There seems to be no compelling reason why Dunnell's statement should be true for all cases. Any class of artifact with a frequency distribution showing gradual, but not erratic, rises and falls ought to be equally suitable, though it is of course more difficult to be certain in such cases that the result represents a true chronological seriation. In practice it may not always be possible to differentiate clearly between different wares whose fabrics are very similar ; bimodal, skew or polymodal distributions may result (*cf.* Clarke, *op. cit.* note 50, Fig. 23 and 24).

[56] Cowgill, *op. cit.* note 50, 519.

[57] Brainerd, *op. cit.* note 50, 307. The coefficient is calculated by subtracting from 200 the sum of the differences between individual wares.

[58] A. C. Renfrew and G. Sterud, ' Close proximity analysis. A rapid method for the ordering of archaeological materials ', *American Antiquity*, XXXIV, iii (1969), 265–277 ; the advantages and shortcomings of this technique are discussed in the article. The prime reason for its adoption here is that it can be applied quickly and without the use of a computer or other sophisticated gadgetry.

[59] It should be noted that the chronological direction of change in a series produced by seriation has always to be deduced by independent means, for example from stratigraphy.

[60] The cluster coefficient produced by close-proximity analysis is only 20 (*Cf.* Renfrew and Sterud, *op. cit.*, note 58).

TABLE 2

Wares present (by number of sherds) in pits ; *percentages in italics*. Fabric X is excluded from the analysis.

	80	72	100	78	70	66	35	41	36	26
A		241	37	132	23	47	99	26	44	64
		59·8	*56·9*	*49·8*	*63·9*	*44·3*	*45·4*	*32·1*	*39·6*	*48·1*
B	26	67	11	49	2	25	39	4		
	59·1	*16·6*	*16·9*	*18·5*	*5·6*	*23·6*	*17·9*	*4·9*		
C	14	43	4	48	10	19	18	26	22	8
	31·8	*10·7*	*6·2*	*18·1*	*27·8*	*17·9*	*8·3*	*32·1*	*19·8*	*6·0*
D					1	12	52	22	42	33
					2·8	*11·3*	*23·9*	*27·2*	*37·8*	*24·8*
E				1		2				
				0·4		*1·9*				
F		41	5	6		1	7	1		3
		10·2	*7·7*	*2·3*		*0·9*	*3·2*	*1·2*		*2·3*
G	4		1				2			
	9·1		*1·5*				*0·9*			
H			1	1						1
			1·5	*0·4*						*0·8*
I		1						1		1
		0·2						*1·2*		*0·8*
J		6	4	23			1			8
		1·5	*6·2*	*8·7*			*0·5*			*6·0*
K		4	2	5					1	6
		1·0	*3·1*	*1·9*					*0·9*	*4·5*
L								1		
								1·2		
M									2	5
									1·8	*3·8*
N										4
										3·0
Total	44	403	65	265	36	106	218	81	111	133
	100·0	*100·0*	*100·0*	*100·1*	*100·1*	*99·9*	*100·1*	*99·9*	*99·9*	*100·1*
X		5			2			3	1	3
		1·2			*5·3*			*3·6*	*0·9*	*2·2*

TABLE 3

	80	73	100	78	70	66	35	41	36	26
80	—	69·8	49·2	73·1	66·7	83·1	54·1	73·5	39·7	11·9
73	69·8	—	179·8	163·7	152·1	145·1	147·1	98·3	102·5	118·1
100	49·2	179·8	—	167·3	137·3	136·7	146·1	88·9	93·5	132·5
78	73·1	163·7	167·3	—	146·8	164·0	148·6	112·6	117·2	129·2
70	66·7	152·1	137·3	146·8	—	141·2	124·0	135·2	124·4	113·6
66	83·1	145·1	136·7	164·0	141·2	—	165·4	134·4	137·9	125·0
35	54·1	147·9	146·1	148·6	124·0	165·4	—	140·8	143·6	156·0
41	73·5	98·3	88·9	112·6	135·2	134·4	140·8	—	158·4	129·8
36	39·7	102·5	93·5	117·2	124·4	137·9	143·6	158·4	—	140·2
26	11·9	118·1	132·5	129·2	113·6	125·0	156·0	129·8	140·2	—

Q-Matrix showing degrees of similarity between pit-assemblages (Perfect correlation = 200).

the stratigraphy. The three points on which the series differs from the predicted sequence are in the reversal of the last three groups (Pits 26, 36 and 41) and in the anomalous positions of Pits 70 and 80.

The significance of the lack of Tudor Green (Type M) from Pit 41 has already been called in question. The evidence of general pottery trends shown in the seriation would

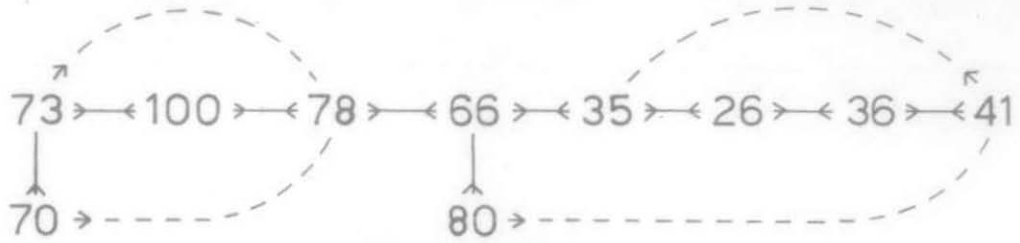

FIG. 39

Seriation of pit-assemblages produced by close-proximity analysis.

appear to justify this scepticism by reversing the order of the final three groups. One cannot prove that either order is the correct one, however ; both interpretations are equally valid. Seriation has at least demonstrated that another interpretation is possible. On typological grounds, the chronological position of Pit 70 was estimated between Pits 78 and 66. Although it could be questioned whether the single sherd of Type D pottery, on which this hypothesis was based, is a valid chronological indicator, a more likely reason for the group's failure to achieve its predicted position is the inadequate size of the sample (only 36 sherds). It may be noted from the matrix that its second and third nearest partners are Pits 78 and 66. The inadequate size of its sample (only 44 sherds) may also explain the odd position of Pit 80. A glance at Table 2 shows, however, that the most striking feature of Pit 80 is its dissimilarity to all the other pit-groups. The fact that it shares its highest coefficient (83.1) with Pit 66 can hardly be taken as significant. Both stratigraphy and typology show it to be in fact the earliest medieval pit on the site.

If the general chronological validity of the series is admitted, it becomes possible to draw some further conclusions, albeit tentative along the lines of the conditions for successful seriation outlined above. The linear patterning produced by the matrix and the absence of bunching or clustering could imply, for example, that the pits were indeed filled, perhaps even dug, one after the other. More sophisticated cluster analysis (e.g. multi-dimensional scaling) would be necessary to test this hypothesis, however, since close-proximity analysis tends to oversimplify the relationships between groups (by ignoring all but the highest two coefficients in each column). Again, the linear patterning suggests that there was a single overriding factor affecting change, for which the passage of time seems the likeliest candidate.[61] Since variation due to other factors therefore appears to have been minimal, this could be taken to imply that the pits were all dug for a similar purpose, whatever that may have been. The general homogeneity of the cultural sequence was never in doubt ; and, excepting Pits 70 and 80, the size of the samples appears to have been adequate. Similarly, the successful results obtained seem to justify the counting method employed, though this does not mean that merely counting the number of sherds is sufficient for all sites and periods. Finally, when the percentage table is redrawn to take account of the proposed change in order of the last three groups (see FIG. 40), it emerges that only Type C (flint- and chalk-tempered) shows a blatantly bimodal frequency distribution through time. If one allows for a possible sampling error of $\pm c.\ 2{\cdot}5\%$, the figures for Types, A, B, D, F, J and K are consistent with unimodal distributions, while the remainder all have percentages below $2{\cdot}5\%$. This would also support the chronological validity of the seriation,[61] and one might legitimately ask whether Type C is not a combination of two sub-types.

In conclusion, I would draw attention to two main points. Firstly, that the quantitative analysis of assemblages is just as valid an approach as the qualitative, based on recognizing ' type fossils ', and can serve as a useful check on it. Secondly, that neither method is entirely objective or fool-proof, and that both must be applied with the same degree of caution and interpreted with the same degree of subjective judgement. To these a further

[61] The possibility of false seriation should, however, be borne in mind.

[61] *Op. cit.* note 57.

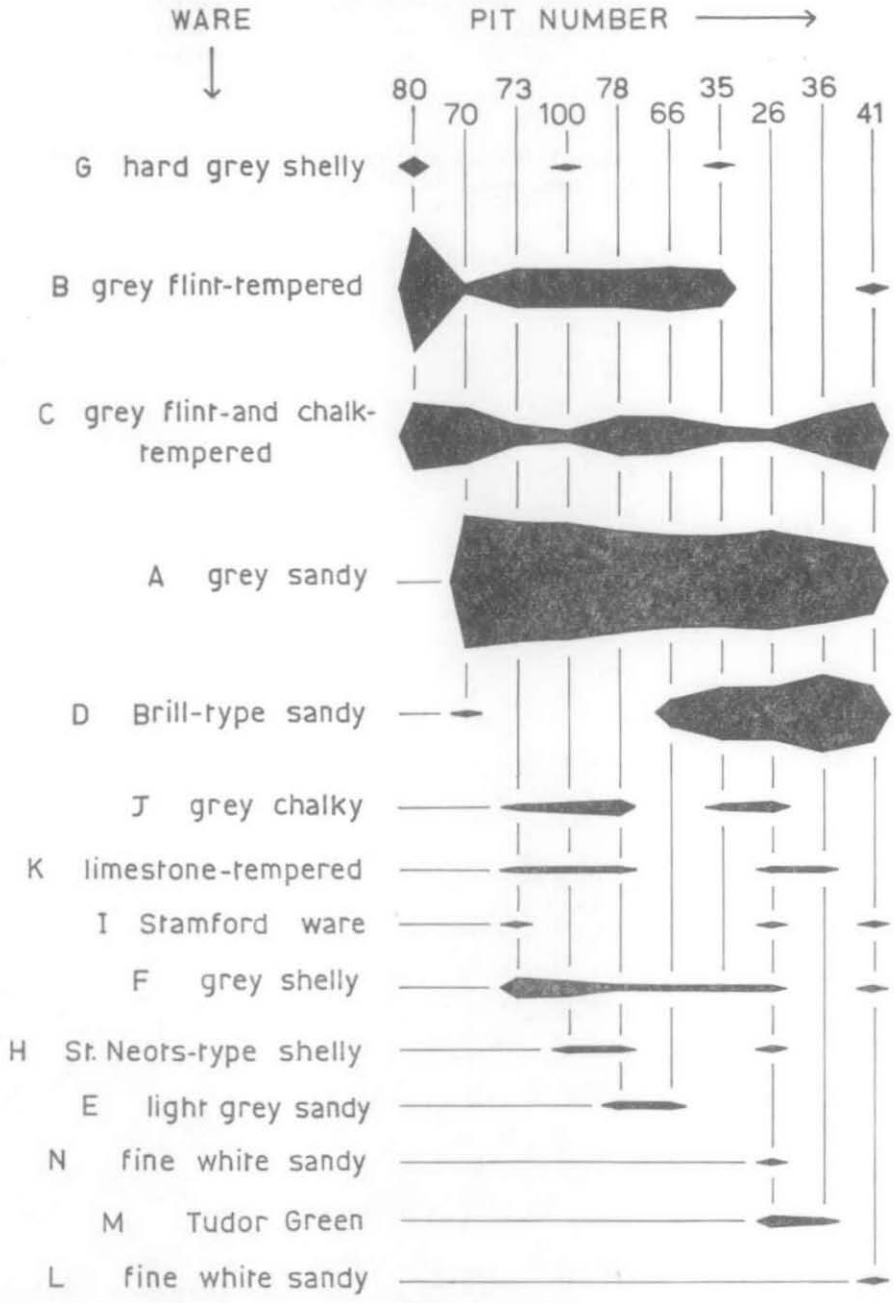

FIG. 40

Proportion of wares in the ten pits analysed. The pits are arranged in the sequence obtained by seriation. Note that the position of Pit 70 is open to question, owing to the small size of its sample. Wares A to N are described fully on pp. 32–3.

point is added : this is to impress on excavators the need to include in their reports tables showing the percentages of different pottery types obtained from each layer or phase. Even if no analysis of these is attempted, such information would at least provide the reader with a useful tool to aid him in his critical appraisal of the conclusions of the report.

Acknowledgement

I would like to thank Richard Bradley and Robert Wheeler for their helpful comments ; the responsibility for the views expressed here is however my own.

A. Abingdon. Trench I, Broad Street, view of completed excavation from north, scale 2m.

B. Abingdon. Trench II, Broad Street, remains of medieval building from west, scale 2m.

Phh.: M.P.

A. Abingdon. Trench III, Broad Street, post-medieval features from west.

B. Abingdon. Trench III, Broad Street, view of completed excavation from west, scale 2m.

Phh.: M.P.