The Excavation of a medieval bake/brewhouse at The Elms, Brackley, Northamptonshire, January 1999

by

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with contributions by Paul Blinkhorn, Tora Hylton, Pat Kent and Rhiannon Harte

SUMMARY

Excavation on land at The Elms, High Street, Brackley found activity dating from the 12th century to the second half of the 14th century. The first evidence of land use was several pits dating probably between 1150-1250. These are presumed to lie within plots to the rear of domestic buildings fronting onto the High Street. In the mid to late 13th century the back plot was developed as a stone built "L"-shaped building, probably a detached bake-house and kitchen complex with possible storage rooms; a metalled track ran from the building towards the street. Later a malt oven was inserted into the south-west room. The malthouse/ bakehouse was demolished probably in the second half of the 14th century and its walls were partly robbed and quarried for stone. The abandonment of the site seems to have mirrored the economic collapse of Brackley in this period and the resultant contraction in the town's size. Afterwards the site was never reoccupied.

INTRODUCTION

An archaeological excavation was undertaken in January 1999 in advance of a proposed housing development at The Elms, High Street, Brackley, Northamptonshire (Fig 1 NGR: SP 5878 3747). This excavation followed on from an archaeological desktop assessment of the site (Barber 1996a) and an archaeological evaluation by trial trenching (Fig 2 trenches 1-5; Barber 1996b). The evaluation trenches demonstrated the survival of medieval archaeology on the area nearest the High Street where at least one quarry pit was uncovered above which had stood a short-lived medieval stone building, though on the rest of the site only post-medieval ditches were found in trench 1a. The landowners, Countryside Properties (South Western) Ltd of Bristol, commissioned Northamptonshire Archaeology to carry out an excavation in the area of the medieval stone building.

ACKNOWLEDGEMENTS

We are grateful to Countryside Properties (South Western) Ltd, in particular Mr M Gough, for funding the excavation and report and to Mr Herbert Blencoe of Brackley Historical Society for his help on the site. Helpful advice was given by Glenn Foard, County Archaeologist and Sandy Kidd, Planning Officer at Northamptonshire Heritage, as well as colleagues Chris Burgess and Stephen Parry. The excavation was carried out under the direction of Mark Holmes, Rob Atkins was site supervisor and the team included Alistair Clarke, Sophie Edwards, Erland Hindmarch, Pat Kent and David Salt. Illustrations were drawn by Alex Thorne and Mark Roughley.

TOPOGRAPHY AND GEOLOGY

The site lay on fairly flat land at about 135m above Ordnance Datum though the surrounding land to the north and south form a gently rising relief. Brackley lies principally on Inferior Oolite limestone of the Middle Jurassic period. In the excavation area, the natural geology varied. Cornbrash was common over most of the site though these were mixed with yellow sands in the southern third of the site and limestone in the central and northern parts. Yellow/orange clays were noted underneath the natural limestone at 1.3m below the machined surface.

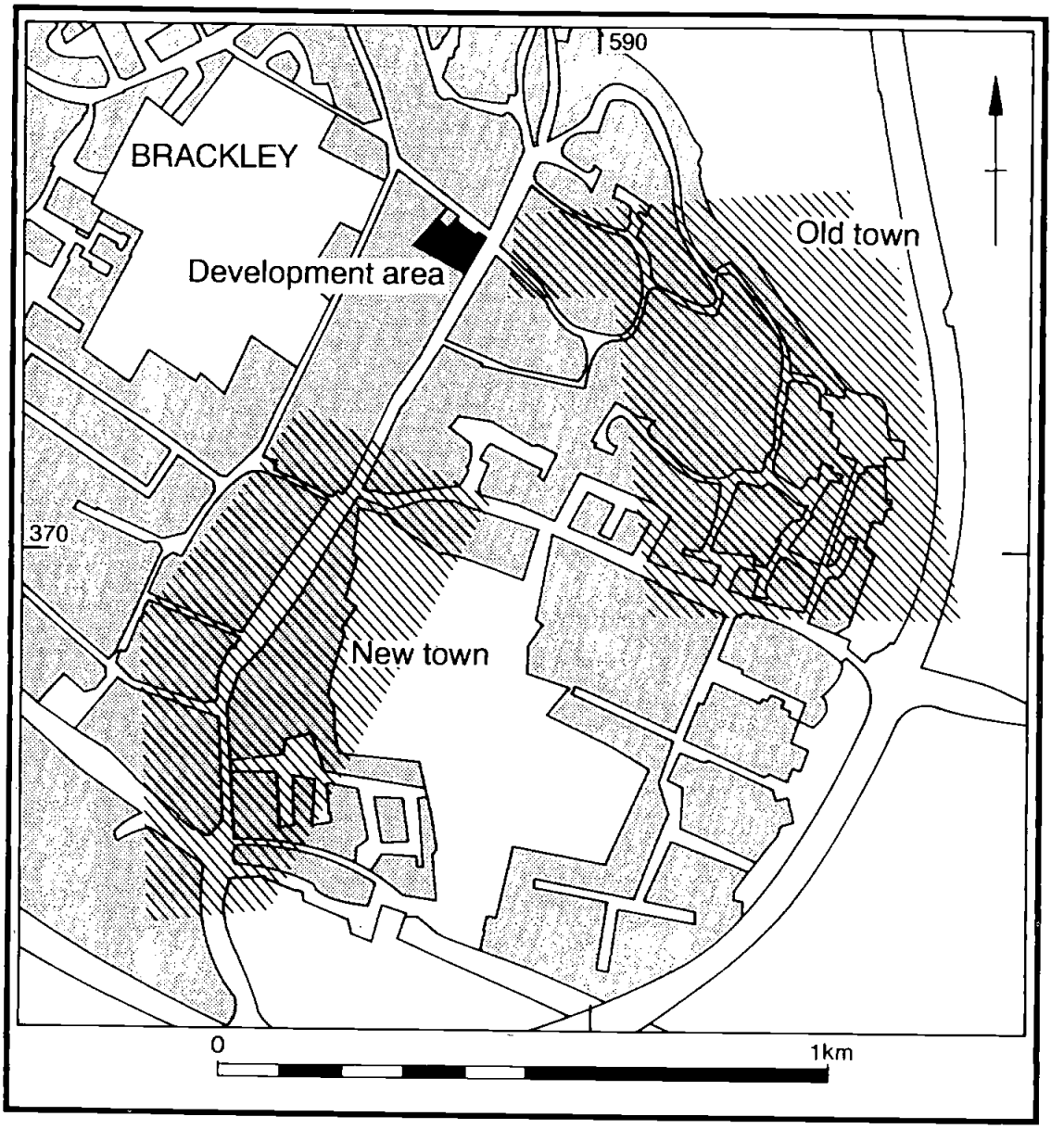


Fig 1 Site location after Clarke (1987, 34)

HISTORICAL BACKGROUND

The study area lies 400m to the west of the known Romano-British settlement and immediately west of the Saxon settlement (Fig 1: Old Town). The Domesday Survey of 1086 shows that Brackley's value and its population numbers were unremarkable compared to many neighbouring villages (Clarke 1987, 67). In the first half of the 12th century a New Town of Brackley appears to have been founded by the Earls of

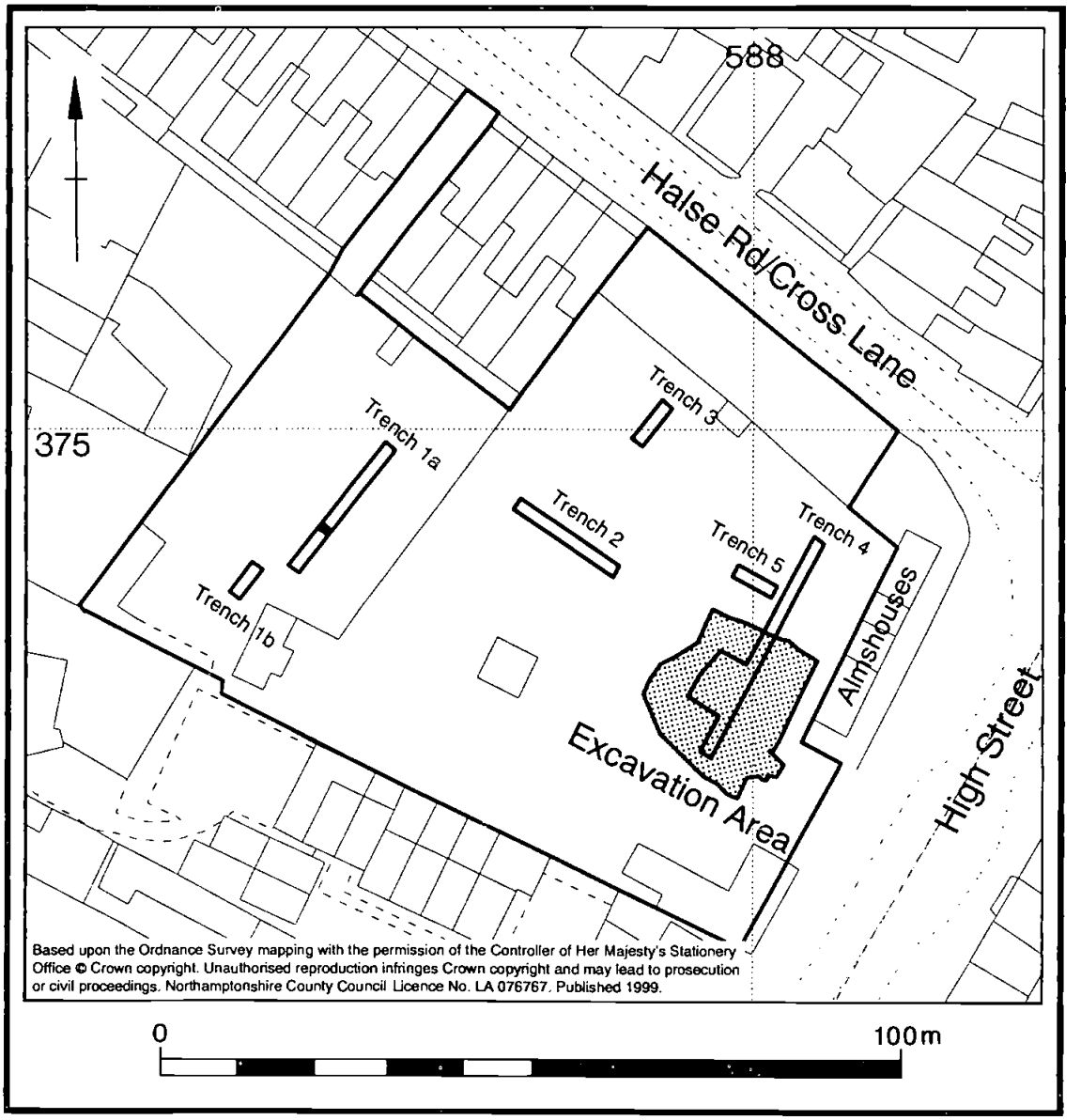


Fig 2 Area of excavation

Leicester to the west of the Old Town, along a road from Oxford to Northampton (Fig 1, after Clarke 1987, 34). Later in the 12th and possibly into the 13th century, due to increasing prosperity, the New Town expanded further northward along the Northampton road (Clarke 1987, 44). Foard agrees with this view, though slightly less emphatically, arguing that the northern part of the town was probably the result of expansion during the 12th or possibly 13th centuries rather than being part of the original planned town (Foard 1996). Rental assessments of 1520 seem to indicate a single phase of expansion, says Foard, with burgage plots extending to the very northern end of the tenement row on the west side of the High Street

north of Halse Road (Foard 1996, 4). Either way, the Elms site was probably occupied after the original founding of the New Town due to its increased wealth.

The growth of Brackley can be seen, in the lay subsidy of 1301, where Brackley paid £24 3s 1d, the second highest in the county after Northampton, with other towns only paying about £10. Not long after this date, however, Brackley declined as it was affected by three major problems: the national famine of 1316-20, collapse of the international wool trade, upon which Brackley was heavily reliant, and the plagues which ravished the country in the 1340's (Clarke 1987, 72-4). The hospital of St. John, which owned a lot of land and rented out property in the town, found that by the 1330's more people seemed to be leaving Brackley than arriving. In the poll tax returns of 1377 only 254 people were recorded as living in Old and New Brackley which was indicative of a catastrophic decline (Clarke 1987, 74). It was in this period that the excavated bakehouse/malthouse was abandoned. Brackley's decline was more marked relative to other towns in the county and Brackley never recovered its former position as second to Northampton. It has remained a small market town up to recent times.

DOCUMENTARY EVIDENCE

The documentary evidence for the application area has been considered as part of the evaluation of The Elms site (Barber 1996a and Foard 1996). The study of the rental documentation shows that the site comprised at least four separate plots which were:-

i) The northern-most plot, not specifically described in any of the rentals, was later occupied by almshouses.
ii) This was rented out for 6d, in 1486 it contained a messuage and butt, and in 1506 contained a messuage with one acre of land.
iii) This plot was rented for 8d and in 1486 it contained a toft and garden, but in 1506 was listed as having only a toft.
iv) This was rented for 6d and contained a toft and garden in 1486, and a messuage by 1506.

Foard asserts that the southernmost tenement continued in separate existence in the 1509 and 1520 rentals and remained a distinct tenement (1996, 4). The middle two tenements, he says, do not appear in the 1509 and 1520 rentals and so they seem to have been incorporated into the plot to the north between 1506 and 1509. Sir Thomas Crewe, speaker of the House of Commons established the almshouses to the east of the site in 1633 (Fig 2). Comparison of historic maps from the Magdalen Estate Map of c.1760 and the 1760 map of the town (NRO Map 2985) with the modern day Ordnance Survey Map shows that the study area has remained largely unchanged. It appears that the site formed gardens to the almshouses up until the 20th century when it was remodelled as an ornamental garden belonging to The Elms, a house fronting onto the High Street.

OBJECTIVES

Northamptonshire Heritage in its brief for the excavations of the site identified three main aims: to clarify the dates of medieval settlement expansion and contraction in this part of Brackley, to determine the date and character of the occupation on this site, especially whether the remains were related to urban tenements fronting onto the High Street, and to determine the date and extent of the stone quarrying found in the evaluation (Kidd 1999).

METHODOLOGY

An irregular area, roughly 18m by 16m, was opened using a JCB excavator with a toothless bucket to remove the modern topsoil and subsoil. Baulks, two metre wide were left adjacent to the almshouses and garden wall, to prevent damage to these structures.

Beyond the stone building at the west and east parts of the site, natural sand and limestone were exposed in several areas only 0.3-0.4m below the ground surface together with a few features cutting the natural. Elsewhere the machine exposed the top of the surviving walls of the building only 0.2m below the ground surface. Machining was conducted carefully where limestone showed in any quantities, and little soil was removed. Excavation was then continued manually and a large amount of rubble up to 0.5m thick, was removed within the area of the building, in order to expose pre-demolition remains.

ARCHAEOLOGICAL RESULTS

The archaeological evidence is summarised and

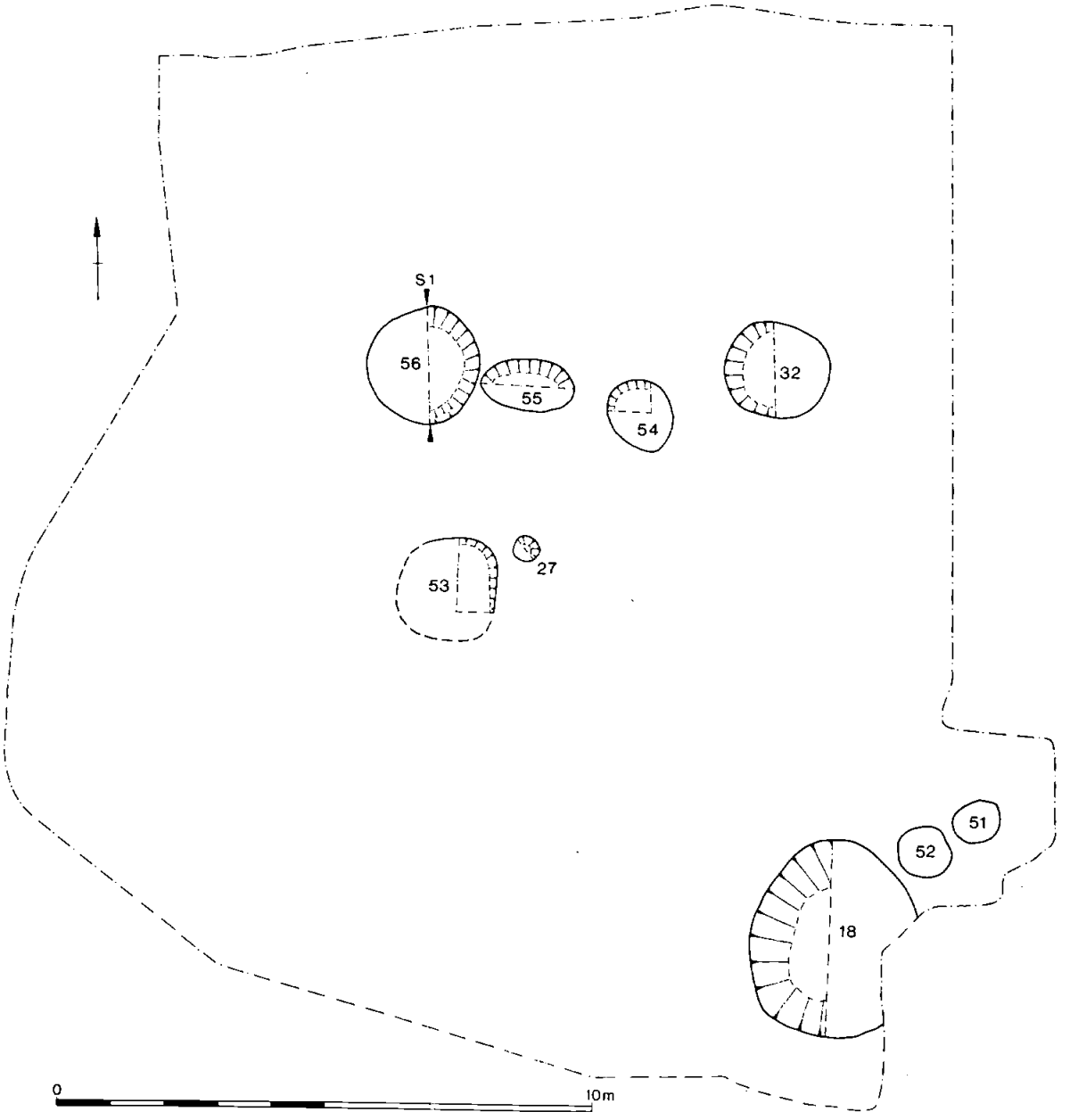


Fig 3 Period 1 features

discussed below with reference to plans (Fig 3 and 4) and sections (Fig 5 and 6). The archaeological sequence was as follows:-

Period 1: Medieval Pits AD 1150-1250

Period 2: The Bakehouse/ Brewhouse AD 1250-1400

Period 3: Desertion POST 1400

Period 4: Post Medieval Activity

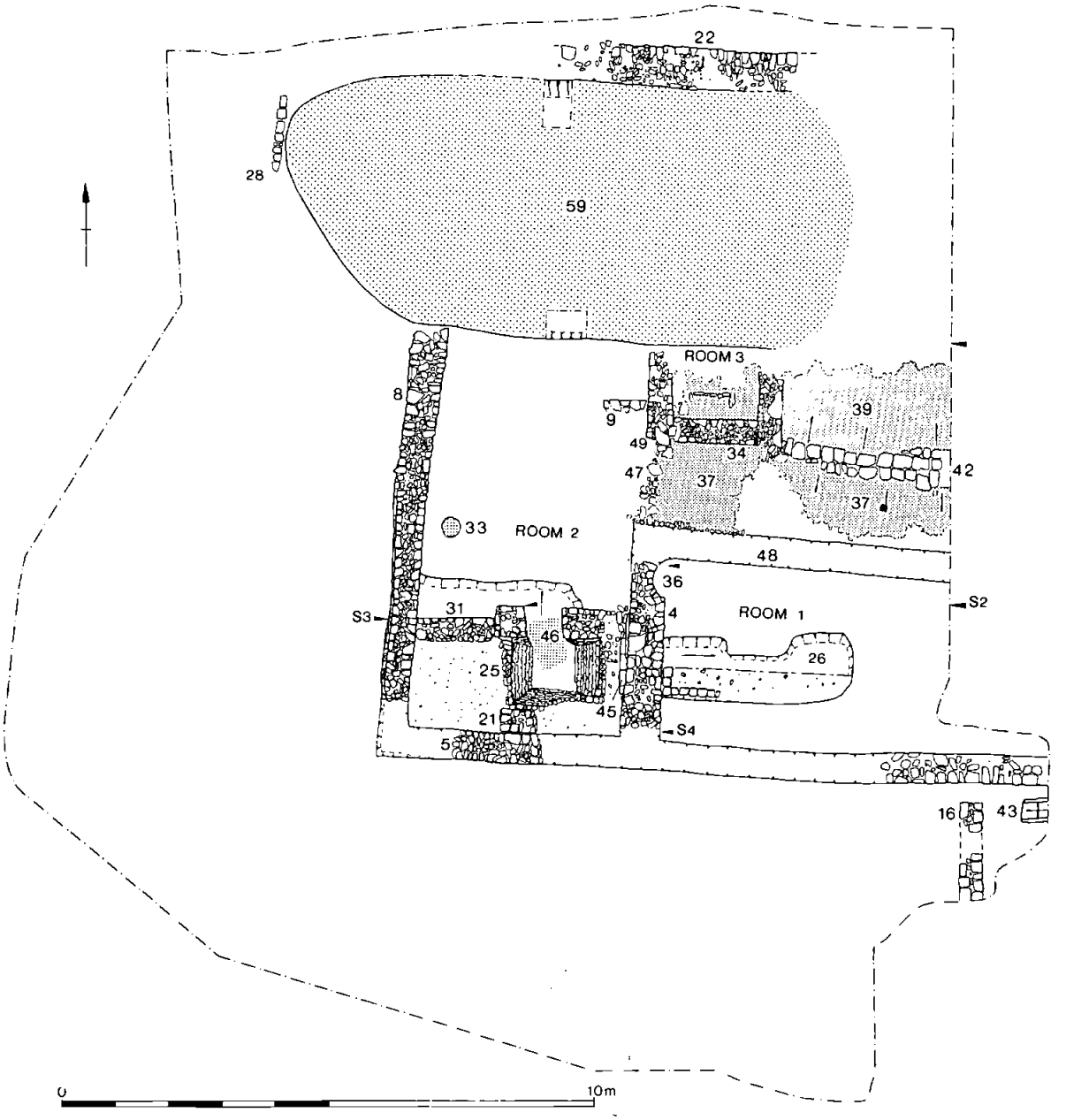


Fig 4 Period 2 and later features

PERIOD 1: MEDIEVAL PITS AD 1150-1250

The earliest features on the site were several pits (Fig 3). The pottery from the fills of these pits has been dated to AD 1150-1250, (Ceramic Phases, hereafter called CP, 1 and 2) although a starting date as early as 1100 is possible.

Three pits (32, 53 and 56) seem to be distinctively "large", sub-circular in shape with diameters of around 2.0m. They cut natural limestone and had steep, nearly vertical, edges. Pit (56) was 2.2m in diameter and 1.46m deep (Fig 5, S1). Its edges were near vertical with a slight undercutting in part, and it had a flat bottom. The pit was cut through a 1.3m depth of limestone

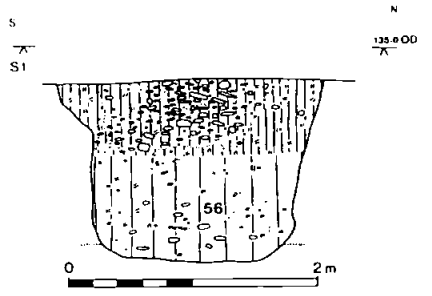


Fig 5 Section of pit (56)

bedrock, and below this there was a mixture of orange sand and green/yellow clay. The backfill of pit (56) consisted of well defined lenses of soil which probably signified that it was filled over a period of time. At the bottom, the fill was a light brown loamy clay with a few limestone pieces. A soil sample from this layer produced a few fish bones and carbonised seeds which included rye and barley. The upper fill was a dark brown loam clay which contained a large dump of limestone pieces.

The other pits were smaller and shallower on the whole (18, 27, 51, 52, 54 and 55). They varied in diameter from 0.45m to 1.45m and were up to 0.4m deep, with the exception of pit (18) which was 3.6m wide and could be the remains of two or three intercutting pits. These pits cut natural sands and combrash and were filled with brown loamy clays. The pottery recovered from the pits is dated to AD 1150-1250 (CP1 and CP2).

PERIOD 2: THE BAKEHOUSE/BREWHOUSE

An "L"-shaped stone building comprising two wings was built on top of some of the pits of period 1 (Fig 4). The south wing (room 1) contained a circular oven and a stone-lined pit. The west wing (room 2) was possibly first used as a storage room and a central partition wall denotes the presence of two chambers. Later a malt oven was inserted at the south-west end. A small external chamber (room 3) was attached to the east wall room 2. A cobbled pavement with a central drain led from the building towards the High Street to the east.

It was probably built to serve a domestic building fronting onto the High Street. The recovered pottery indicates that the building was in use through the 14th century (AD 1300-1400, CP4). It may have been constructed within the later 13th century, but the absence of any Nuneaton A ware, the defining pottery for 1250-1300 (CP3), leaves this uncertain.

PERIOD 2a: THE BAKEHOUSE

ROOM 1. THE BAKEHOUSE

Room 1 had an internal width of 3.4m and was in excess of 7.25m long; the full extent was not established as the east wall lay beyond the limit of excavation. The south wall (5) was 0.6m wide and survived in parts to one course high, whereas the west wall (4) was 0.7m wide and survived to a height of 0.8m and the north wall had been completely robbed. The robber trench was 0.6m wide. The walls were unmortared and well faced with squared limestone blocks on both sides. The core was of disordered limestone rubble.

There was a circular baking oven (36) recessed into the wall in the north-western corner of the room. Though only about a quarter of its lowest course survived, its diameter can be calculated to around 0.8m. The surviving part of the lining was burnt red. A soil sample was taken from the area of the stone foundations of the oven. However, as its floor had not survived the sample's association with the baking process is uncertain. Bread-type wheats and club wheats as well as rye and barley were recovered from this sample.

In the same room there was a shallow, stone-lined pit, 0.16m deep (26). The lining which comprised a single course of squared limestone blocks, with a length of 1.1m to the south and 0.75m adjacent to wall (4), had only survived at the south-western corner of the pit (Fig 6; S4). There was a possible continuation of this feature to the east, which would make its total length 3.5m, but whether there had been a single elongated, stone-lined pit, or a squarer pit with other features extending further eastward was uncertain as a result of later robbing.

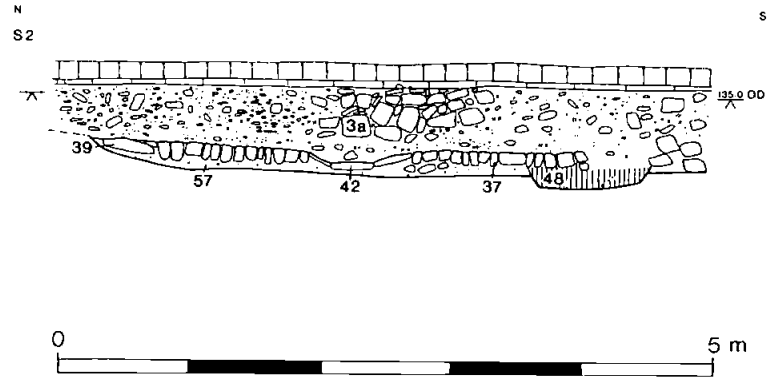
There was also an opening at ground level through the adjacent wall (4), 1.0m wide and 0.6m high (Fig 6 and plate 3). On the west side, within room 2, there was a lintel comprising a single limestone slab 0.9m long and 0.03m thick which protruded from the wall 0.07m, but no comparable slab had survived on the east side. There seems little doubt that both the stone-lined pit and the adjacent wall opening functioned together, but what that function was is uncertain.

ROOM 2: STORE ROOM

The main room on the west side of the building contained no below floor internal features and therefore it may have been used for storage. It was 4.0m wide and more than 7.5m long with the northern end destroyed by a later quarry. The west wall (8) was 0.65m wide. The southern end was built into a hollow and here the foundations were six courses high (0.45m) though the rest of the wall was only one or two courses high. The south wall (5) was 0.6m wide and east wall (4) was 0.7m wide, although the short length of wall (49) to the north of the doorway was slightly narrower, at 0.45m wide. The doorway (47) was 1.6m wide. The larger stones on the westem edge of the pathway (37) which ran towards the High Street may have been remnants of a threshold.

A wall (22) to the north of the quarry might be the north wall of the room, denoting a total length of 12.8m, but as it continues further to the east it must either have incorporated a length of boundary wall or been a boundary wall lying to the north of the building. It survived no more than one course and was up to 0.8m wide.

There may have been a central partition wall in room 2. It survived as a single course of six squarish limestone blocks (9), (0.9m long) which were faced on the north side and abutted wall (49). Despite excavation of room 2 to natural, there was no definite evidence for a floor, though a small 20mm thick brown loam patch about 2m by 1.5m in the hollow by wall (8) could have been a remnant of one. The only other feature found which possibly related to the building in room 2 was a small sub-circular area of red burnt sand (33), 0.3m in diameter.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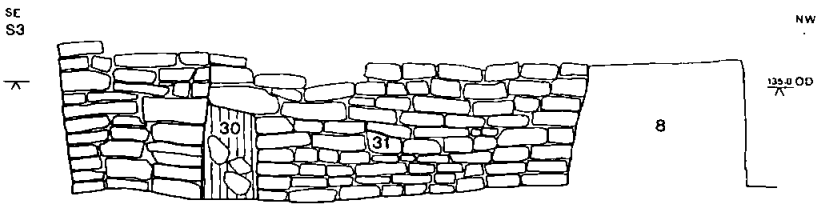
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Fig 6

Plate 1: General view of site looking south

ROOM 3: EXTERNAL STORE

Located on the east side of room 2 was a narrow room 1.5m wide and at least 1.25m long; the exact length is unknown due to later quarrying. It was formed by a narrow limestone wall (34) and any doorway must have been further to the north. There was the remains of a limestone floor. Upstanding limestone slabs formed three sides of a rectangular "bin", measuring 0.8m by 0.5m, adjacent to the south wall (Plate 2). The presence of this feature suggests the room may have been used as a store.

EXTERNAL FEATURES

A metalled path (37) ran from the room 2 doorway towards the High Street. It was 1.6m wide, built over a 0.2m thick layer of brown loamy clay soil (57) (Fig 6, S2). The metalling was of tightly packed rectangular limestone blocks with a mean size of 0.1 wide by 0.15m long and 0.2m deep, in a rough "herring bone" pattern. To the east of room 3 the path was up to 3.3m wide with tightly packed limestone metalling (37 and 39) flanking a central drain (42) of flat-laid limestone slabs typically 0.6m long by 0.45m wide.

PERIOD 2b: THE BREWHOUSE

The malt oven was a later addition to the building as it post-dated the blocking of the opening through the wall between rooms 1 and 2. The opening in wall (4) was blocked with courses of limestone blocks (49) (Fig 6, S4). Later this wall was extensively burnt over an area 1.4m by 0.4m possibly during or after the abandonment of the building. With the blocking of the wall opening it is assumed that the stone lined pit (26) also fell into disuse and may have been robbed out at this stage. Whether the circular oven was retained in use is uncertain.

A malt oven (25) was built into the hollow at the southern end of room 2. It comprised a rectangular chamber with a sunken floor, measuring 1.05m by 0.8m. The stone lining of the chamber survived up to 13 courses high (0.53m) and was battered at an angle of 75°, so that the highest surviving level of the chamber measured 1.95m by 1.45m. The flue opening was 0.65m wide with stone-built surrounds. They survived up to 10 courses high (0.52m), one square in shape and the other rectangular.

Between the oven lining and the walls of room 2, there was a backfill of soil consisting of dark brown loamy clay with a few small stones less than 5% of the fill. To the south the backfill surrounded a roughly built stone support or buttress. To the north

Plate 2 Pavement (37) with central drain (42), and store room, looking west

the backfill was retained by a stone revetment (31) which abutted both the oven flue surrounds and the walls of the room. The lowest seven courses (0.41m) were only one stone deep (Fig 6, S3) but the top two surviving courses widened out to 0.95m and they overlay part of the soil backfill. There was a small rectangular opening in the revetment next to the flue surround which was probably there for drainage (Fig 6, S3).

A sub rectangular area of blackened and reddened soil (46) indicates the location of the hearth, at the front of the chamber and within the flue opening (Plate 3). A soil sample taken from the fill of the malt oven contained some barley and wheat seeds. Overall, the assemblage represented at least two episodes of charring. Another soil sample was from the burnt area (46) and this contained little in the way of seed remains though there were some largely indeterminate cereals including a couple of barley seeds.

EXTERNAL FEATURES

To the south of the building there were two other features, a wall (16) and a stone lined drain (43). This may relate to this period (Fig 4). Wall (16) ran north-south. It was only 0.45m wide and was well faced on both sides and only survived to one course high. The wall cut pit (51) and was below soil layers (2 and 14) dated by pottery to AD 1300-1400 (CP4).

Drain (43) may also date from the medieval period. It heads east-west towards the high street. Unlike drain (42), it would have been covered-the base and two sides survive though not its cap. The limestone slab drain was 0.37m wide and the sides were 0.17m high and 50mm thick.

PERIOD 3: DESERTION

The demolition of the building involved the levelling and, in some places, the total robbing of the walls. In general, the larger limestone was taken away for reuse elsewhere while the smaller limestone rubble was spread across the site to form a demolition layer (3, 3a, 3b and 3c) up to 0.5m thick. In certain areas there were concentrated dumps of large limestone pieces and fragments from at least 30 limestone roof tiles were found at the junctions of walls (8) and (31), in room 2. Overall, hundreds of roof fragments were present within the demolition rubble.

The northern half of room 2 was totally removed by a later large quarry pit (59). It occupied an area measuring about 10m

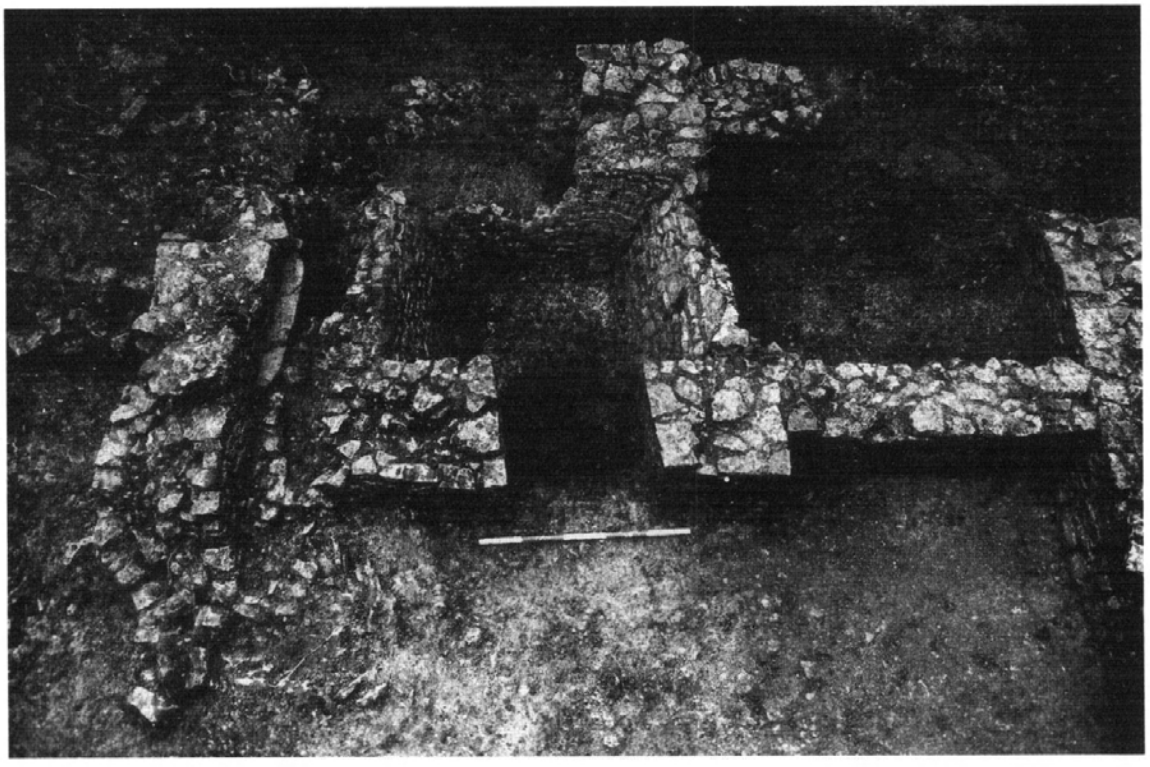

Plate 3 Malt oven (25) looking south, and baking oven (36), bottom left

E-W and by 5m N-S. It was not excavated, but had been partially investigated in the site evaluation. Test pits were excavated at the northern and southern ends and it was shown that the feature had vertical sides to a depth of more than 0.6m. The excavated sections show that the bedrock was suitable for quarrying (Barber 1996b, 12).

The archaeological evidence supports the documentary and cartographic evidence in that the site seems to have been open space since the buildings demolition. There was only one medieval sherd later than AD 1400 recovered from the site, a sherd of red earthenware, dated AD 1450-1600, from the topsoil.

PERIOD 4: POST-MEDIEVAL

A plaque on the front of the building dates the almshouses, fronting the High Street, to 1633. A few post-medieval pottery sherds including Staffordshire Slipware recovered from the topsoil may be associated with this period when the area was part of the almshouse garden.

Post-medieval boundary ditches were found in evaluation trench 1a (Barber 1996b, 10; Fig 3). There were two parallel ditches with almost identical fills running NW-SE which contained post-medieval pottery. They were interpreted as a boundary ditch and a later recut of the same boundary.

The only feature uncovered probably of the post-medieval period in the 1999 excavation was wall (28). This limestone wall was undated and survived west of the medieval building, to one course high and measured 1.45m in length. It was probably part of the recent ornamental garden on the site.

FINDS

THE MEDIEVAL POTTERY
by Paul Blinkhorn

The pottery assemblage comprised 497 sherds with a total weight of 7,236g. The minimum number of vessels, by measurement of rimsherd length, was 3.74. The pottery occurrence by number and weight of sherds per context by fabric type is shown in Table 4.

FABRICS

The pottery was quantified using the chronology and coding system defined in the Northamptonshire County Ceramic Type-Series (CTS). The codes in parentheses are those given to the same fabrics at the Brackley Castle Lane site (Blinkhorn forthcoming), which was reported on before the CTS was created:

F207: Oolitic Ware, AD975-1150. 5 sherds, 57g, MNV = 0.
F360: Banbury Ware, AD1100-1400. 260 sherds, 3,693g, MNV = 1.58.
F330: Shelly Coarseware, AD1100-1400. 6 sherds, 61g, MNV = 0.11.
F331: Developed Stamford Ware, L12th-E13thC. 1 sherd, 20g, MNV = 0.
F337: Ferruginous Quartz Buffware (BF22), ?AD1100-1400. 9 sherds, 497g, MNV = 0.83.
F302: Reduced Sandy Coarseware (BF9), AD1100- ?1400. 9 sherds, 129g, MNV = 0.27.
F305: Fine Sandy Coarseware (BF23), ?AD1100-?1400. 1 sherd, 17g, MNV = 0.
F306: Sandy Greyware (BF3), ?AD1100-?1400. 11 sherds, 86g, MNV = 0.
F311: Calcareous Sandy Greyware (BF12), ?AD1100-?1400. 1 sherd, 22g, MNV = 0.
F340: Calcareous Sandy Oxidized Ware (BF15), AD1100-1400. 5 sherds, 78g, MNV = 0
F345: Oxford Ware, AD1075-1350. 4 sherds, 56g, MNV = 0.
F324: Brill/Boarstall Ware, AD1200-1600. 47 sherds, 485g, MNV = 0.08.
F329: Potterspury Ware, AD1250-1600. 132 sherds, 1,800g, MNV = 0.76.
F407: Red Earthenware, AD1450-1600. 1 sherd, 76g, MNV = 0.

In addition, two fabrics were noted which had not previously been recorded in the county:

1) South-West Oxfordshire Ware. Oxfordshire fabric OXBF (Mellor 1994, 52-54). Handmade wares with moderate to dense angular flint up to 2mm, moderate to dense quartz up to 1mm. *c* 1075 – early 13th century. 2 sherds, 14g, MNV = 0.02.
2) East Wiltshire Ware. Oxfordshire fabric OXAQ (Mellor 1994, 100-6). Coil built, wheel-finished. Similar fabric to OXBF, but finer flint (*c* 1mm or less), and thinner-walled with visible turning marks. Early 12th – early 15th century. 2 sherds, 24g, MNV = 0.02.

The overall composition of this assemblage is similar to that from Brackley Castle Lane. The relatively small quantities of shelly coarseware, F330, reflects the picture from that site, and confirms that Brackley was very much on the western edge of the distribution of the ware type. One notable difference is, however, the complete lack of Coventry and Nuneaton wares at this site. Their occurrence at Castle Lane was suggested as being due to the fact that the tenements may have been occupied by wool merchants from that area, or at least people who had dealings with them (Blinkhorn forthcoming). Coventry was an important cloth producer during the medieval period and beyond, and Brackley, as a market town with a sizeable sheep-farming community within its catchment area, potentially may have supplied Coventry with wool.

Research on the medieval pottery of Southampton by Brown has shown that imported pottery occurs in all areas of the city, and not merely limited to areas where foreigners are known to have lived (Brown 1977). Pottery was used basically for its functional suitability rather than due to its point of manufacture. Thus, in the case of Brackley, if pottery was being actively traded there from Coventry, it would be expected to be found all over the town. This is clearly not the case, which therefore suggests that the concentration of such pottery in the Castle Lane area was due to the material being the personal possessions of people from the Coventry area, and not the result of trade. Status considerations do not appear to be a factor, as the vessels have no obvious functional or aesthetic superiority to the products of more local kilns, such as those at Brill (c.f. Ivens 1981).

The presence of the OXBF (South-west Oxfordshire) and OXAQ (East Wiltshire) sherds is probably not of great significance, other than as new findspots which extend the known distribution of the wares. Both are found across a wide area of the south and south-west midlands. The former covers Oxfordshire, north Wiltshire and north Berkshire (Mellor 1994, 54), whilst the latter has an even wider distribution which includes Hampshire (ibid. 105). Previously, the most northerly finds of the wares were at Deddington and Middleton Stoney in Oxfordshire (ibid. 54 & 105). Both types are known from a kiln recently discovered at the Newbury by-pass in Berkshire (M Mellor, pers comm.), but there may have been other sources, such as the Savernake Forest in Wiltshire (Mellor 1994, 100).

CHRONOLOGY

Each context specific assemblage was given a seriated phase-date (RSP) using the system defined in the CTS for the ceramic traditions of southern Northamptonshire. This is shown in Table 1. It is possible that CP1 begins in the later 11th century rather at the date given. There is no definite evidence for Banbury ware in Brackley before the mid-11th century, but it was in use at Banbury Castle before the end of the 11th century, and may pre-date the Norman motte at Deddington (Mellor 1994, 84). This site has not, however, produced any chronological evidence which can clarify the situation.

The pottery occurrence per ceramic phase is shown in Table 2. The lack of assemblages dating to ceramic phase 3 (CP3) are less likely due to a hiatus in activity at the site than an indicator of social difference within the medieval town. As noted, this site did not produce any pottery of Coventry or Nuneaton type, despite the fact that relatively large quantities of the material occurred at the Brackley Castle Lane site. Thus, the lack of phase CP3 activity at this site is almost certainly due to the fact that the pottery which defines features of that phase, Nuneaton ware, was not in use here. Other wares from the Coventry/Nuneaton area were in use during other ceramic phases at Castle Lane, but they do not occur in contemporary phases at this site. Overall, the chronology of the pottery indicates that there was activity at this site throughout the medieval period from the 12th century onwards.

Vessel Forms

The only vessel types noted from rimsherds were jugs, jars and bowls, although bodysherds from large storage vessels were also present (see Fig 7.6). The vessel occurrence by MNV per phase is shown in table 3. The pattern is typical of that of a medieval domestic site, with jars dominating the early phases, and jugs increasing as a proportion of the assemblage over time. The lack

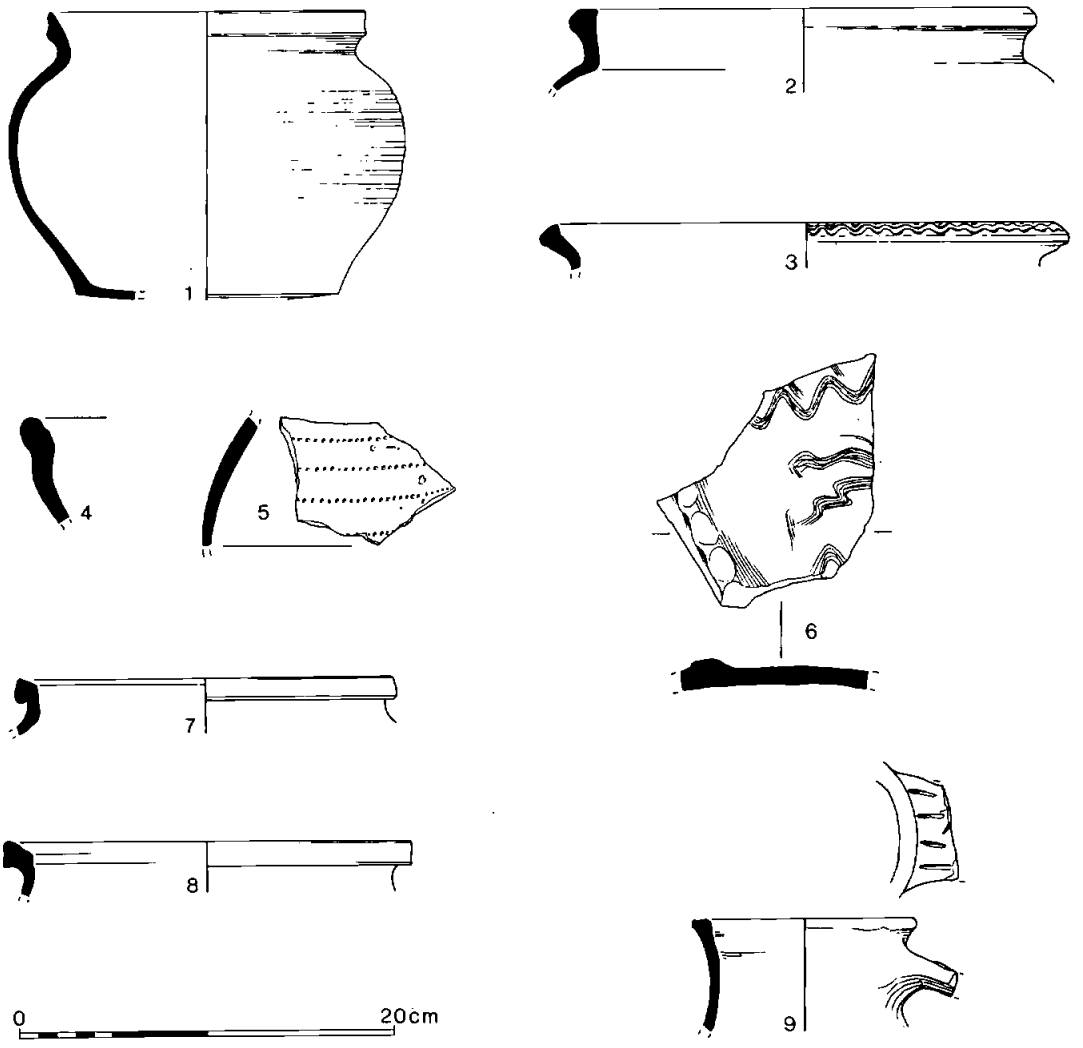

Fig 7 Medieval pottery

of jugs in CP2 contexts is a distortion caused by the relatively small assemblage size; bodysherds of such vessels were noted in contexts of that date.

ILLUSTRATED POTTERY (Fig 7)

1) F337, context 56B. Small jar. Buff fabric with a pale grey core. The whole of the outer body below the shoulder and basepad are both evenly sooted. The central area of the basepad is missing, with scorching on the edges and surface suggesting that it burned through during use.
2) F360, context 19. Jar rim. Dark grey fabric with brick-red surfaces.
3) F360, context 30. Jar rim with incised wavy line on bead. Fabric as 2).
4) F360, context 53. Bowl rim. Dark grey fabric with browner surfaces. Exterior is evenly sooted.
5) F360, context 14. Shoulder from globular ?jug. Multiple single rows of triangular notched rouletting. Hard, uniform grey fabric.
6) F360, context 18. Fragment from lower body of large storage jar with applied thumbed strips and incised wavy lines. Grey fabric with purplish-brown surfaces.

Table 1: RSP Phases and Major Defining Wares for the Medieval Ceramics of Southern Northamptonshire

RSP Phase	Defining Wares	Chronology
CP1	Coventry 'A' and 'D' wares, Oxford Glazed Wares, Developed Stamford Ware, Banbury Ware	1150 –1200
CP2	Brill/Boarstall Ware	c. 1200 – 1250
CP3	Nuneaton 'A' Ware	c. 1250 – L13thC
CP4	Potterspury Ware	c. L13thC – 1400
CP5	Lyveden/Stanion 'D'	c. 1400 – 1450
CP6	Late Medieval Oxidized Ware	c. 1450 – 1500

Table 2: Pottery occurrence per ceramic phase

Phase	No	Wt (g)	Mean sherd wt (g)	MNV
CP1	87	1,943	22.3	1.12
CP2	108	1,322	12.2	0.62
CP4	296	3,845	13.0	2.00

Table 3: Vessel occurrence per ceramic phase by percentage of phase assemblage

Phase	Jars	Bowls	Jugs	Total MNV
CP1	93.8%	6.2%	0	1.12
CP2	95.1	4.9	0	0.62
CP4	61.0	12.5	26.5	2.00
Total MNV	2.86	0.35	0.53	3.74

7) F302, context 54. Rimsherd from jar. Grey fabric with dark reddish-brown surfaces.
8) F330, context 3C. Rimsherd from jar. Grey fabric with orange surfaces.
9) F329, context 5. Rim and handle terminal from jug. Buff fabric with dark grey core with pale orange surfaces.

THE OTHER FINDS
by Tora Hylton

The excavation produced a small group of medieval and post-medieval objects. The assemblage comprises mainly structural debris together with a small number of objects which reflect household equipment and portable items which may have been casually lost. Of particular interest is the presence of an iron fire-strike.

In total there are 40 individually recorded finds, in seven material types. Each object has been described and measured, and a descriptive catalogue of all the finds is retained in the archive. Bulk finds include fragments of ceramic roof tiles and limestone roof slates.

MEDIEVAL

Coins and Tokens

A silver long cross half penny of Edward III (1327-77) was located in a sub-soil layer (context 14) just outside the building. The coin is a standard Type G, third coinage (North 1963, 42ff) which dates to AD 1344-51, this equates well with the 14th century date of the associated pottery (CP 4). A trading token (jetton) of 13th-14th century date (Barnard 1916, 93-97, nos. 1-3) was located within the subsoil (2).

Building Materials.

Most of the finds (24) were located within rubble layers, which relate to the destruction of the medieval building (layers 3, 3a, 3b, 3c). The nature of the objects indicate that they may have formed part of, or been attached to the permanent structure of the building. These include, a few fragments of green glazed roof tile in a Potterspury type fabric, and large quantities of perforated Colyweston limestone roof slates of which only a representative sample was retained. Also found in the excavation was a large hinge with U-shaped eye (Fig 8.1), for carrying a door or shutter, 10 nails measuring up to 75mm in

Table 4: Pottery occurrence by number and weight (in g) of sherds per context by fabric type

CTXT	LAYER	F207		F360		F330		OXBF		OXAQ		F331		F337		F302		F305		F306		F311		F340		F345		F324		F329		F407		DATE
		No	Wt	No	Wt	No	Wt	No	Wt	No	Wt	No	Wt	No	Wt	No	Wt	No	Wt	No	Wt	No	Wt	No	Wt	No	Wt	No	Wt	No	Wt	No	Wt	
1				4	23																							1	24			1	79	PMED
2				15	121									6	66													9	65					CP2
3		1	10	10	121															3	18			1	7			4	64	11	118			CP4
3	A			16	167							1	20	1	11	2	28							1	7			10	56	25	299			CP4
3	B			3	55			1	6													1	22					2	14	1	60			CP4
3	C	2	17	7	91	1	21	1	8							1	11	1	17					1	37			1	84	4	45			CP4
5				8	69																									5	161			CP4
14		1	11	36	545																							5	56	68	981			CP4
18				19	562																													CP1
19				10	166																					1	10			4	28			CP4
22				1	6																									2	7			CP4
23				9	101															2	24							2	9	2	23			CP4
24				2	31																									1	8			CP4
27				2	7																													CP1
29				2	5																									4	37			CP4
30				40	441	1	5							1	42	4	49			2	11							8	64					CP2
32																														1	4			CP4
48		1	19	1	7																			1	10			1	1	1	6			CP4
51				12	191	2	11			2	24									4	33			1	17	2	29							CP1
52				6	95											1	19									1	17	1	29					CP2
53				14	338	1	6																											CP1
54				20	246											1	22																	CP1
56				6	54																							2	19	3	23			CP4
56	A			11	172	1	18																					1	108					CP2
56	B			6	79									1	378																			CP1
		5	57	260	3693	6	61	2	14	2	24	1	20	9	497	9	129	1	17	11	86	1	22	5	78	4	56	47	593	132	1800	1	79	

length and an iron wedge, which may have been used to secure structural fittings.

Household Equipment.
Equipment for household uses include, a fire-steel, part of a barrel padlock and a knife blade. The presence of a fire-steel (strike-a- light) for striking with a flint to produce a spark to kindle a fire is of particular interest (Fig 8.2). Although such objects may be difficult to identify, examples are known from London (Egan 1998, fig 93) and Winchester (Biddle 1990, Fig 306, 3538, 3539). The examples from Winchester date to the twelfth and thirteenth centuries, and like the example from Brackley, they are perforated, possibly for suspension. Egan suggests that the perforation implies that the steel was held in a hinged case (Egan 1998, 121). The barrel padlock bolt comprises circular closing plate and spines, together with part of the L-shaped free arm which is attached to the closing plate (Fig 8.3). This example resembles Goodalls Type B or C with the tube into which the freearm slots located away from the case (1990, 1001ff). Other objects of medieval date include a foot/leg from a copper alloy cauldron, a buckle plate and a lathe-turned, ?stone bead 8mm in diameter.

POST MEDIEVAL

Objects of post-medieval date were located mainly within the topsoil and subsoil.These included a fragment of nineteenth century wine bottle glass, iron nails and a copper alloy disc.

CATALOGUE OF ILLUSTRATED FINDS (Fig 8)

1) Hinge, complete. Large flat strap terminating in a U-shaped eye with shaped decorative terminal. Nail still survives for fixing. May have been used to hang a door. L: 330mm. Context 3a, SF No 12
2) Fire steel. Parallel sided striking plate (125x18mm), one terminal rounded and perforated, other with hooked handle. Context 3a, SF No 25
3) Barrel padlock, fragment only. Part of bolt with attached spines and L-shaped free arm. Context 3, SF No 7

ANIMAL BONE
by Pat Kent

A total of 235 bones and 20 oyster valves were recovered. The majority were recovered from the demolition rubble (3, 3a, 3b and 3c) and layer (14). Overall the bone preservation was good, although some from the rubble were damaged either from the rubble or exposure and weathering. There were possible signs of chewing by domestic carnivores. Thirty five bones showed specific butchery marks. Others displayed identical breakage patterns. The oyster valves displayed characteristic knife marks from opening.

The bone assemblage was mainly of cattle (*bos*), 26%, and sheep/goat (*ovi-caprid*), 30%. There were 38% of the assemblage which were too fragmentary to identify. There were small numbers of other species:-

Horse	1 bone	(<1%)
Pig	7 bones	(3%)
Dog	1 bone	(<1%)
Chicken	3 bones	(2%)
Goose	1 bone	(<1%)

Overall this is a domestic assemblage but without any clear pattern showing. It may be significant that there is a low percentage of pig.

ANIMAL BONE FROM SIEVING

The bones recovered from the sieved soil samples are retained in the site archive. The group includes fragments of bone from the larger mammals, as already represented in the hand picked bone assemblage. However, the sampling also retrieved a range of small mammal bones, bird bones and fish bones which, with the exception of 3 chicken bones, were largely absent from the hand picked bone assemblage. Context 24 from the fill of the malt oven included Bird (3 fragments) and Fish (6 fragments, including 3 ribs), and context 56 from the fill of the pit included Fish (2 fragments/bones).

At least some of the small mammal bones may derive from later contamination of deposits by burrowing rodents. They were recovered from three contexts, 24 (26 fragments/bones), context 36 the fill of baking oven (68 fragments including 2 small carnivores/ and 5 vole mandibles) and context 56 (11 fragments/ bones). The bird and fish bones will be contemporary with the use of the bakehouse/malthouse.

THE CARBONIZED PLANT REMAINS
by Rhiannon Harte

A total of 90 litres of soil samples were taken from a range of deposits. After evaluation 4 samples each of 20 litres, from contexts (24, 36, 46 and 56) were chosen for processing, all of which have subsequently produced charred plant remains.

Context 24 (fill of Malt Oven, Room 2).
Due to the highly vesicular nature of the grain in this sample it was not possible to identify most beyond the level of indeterminate cultivated barley (*Hordeum* sp.). However, some grains showed signs of the longitudinal ridges, and the asymmetry characteristic of hulled 6-row barley (*Hordeum vulgarae* L.). Both grain and rachis were recovered in this sample of which barley made up the largest percentage (79%). It is possible that some 2-row barley was present but none of the rachis fragments were well preserved enough to confirm this. Thirteen percent of the sample was made up of the culm nodes of indeterminate cereals in very poor state of preservation. There were a number of Triticum sp. grains and rachis, probably from either bread/ club wheat (*Triticum aestivo- compactum*), this represented only 2% of the sample and may represent either contamination in the growing crop (possibly from a previous year's rotation), or a contaminant from the processing of the crop. The remaining 6% of the sample is represented by the type of weed remains typical of crop contamination in the field, nutlets of sheep's sorrel (Rumex acetosella agg.), fat hen (*Chenopodium album* L.), the caryopses of indeterminate grasses (*Gramineae* indet)

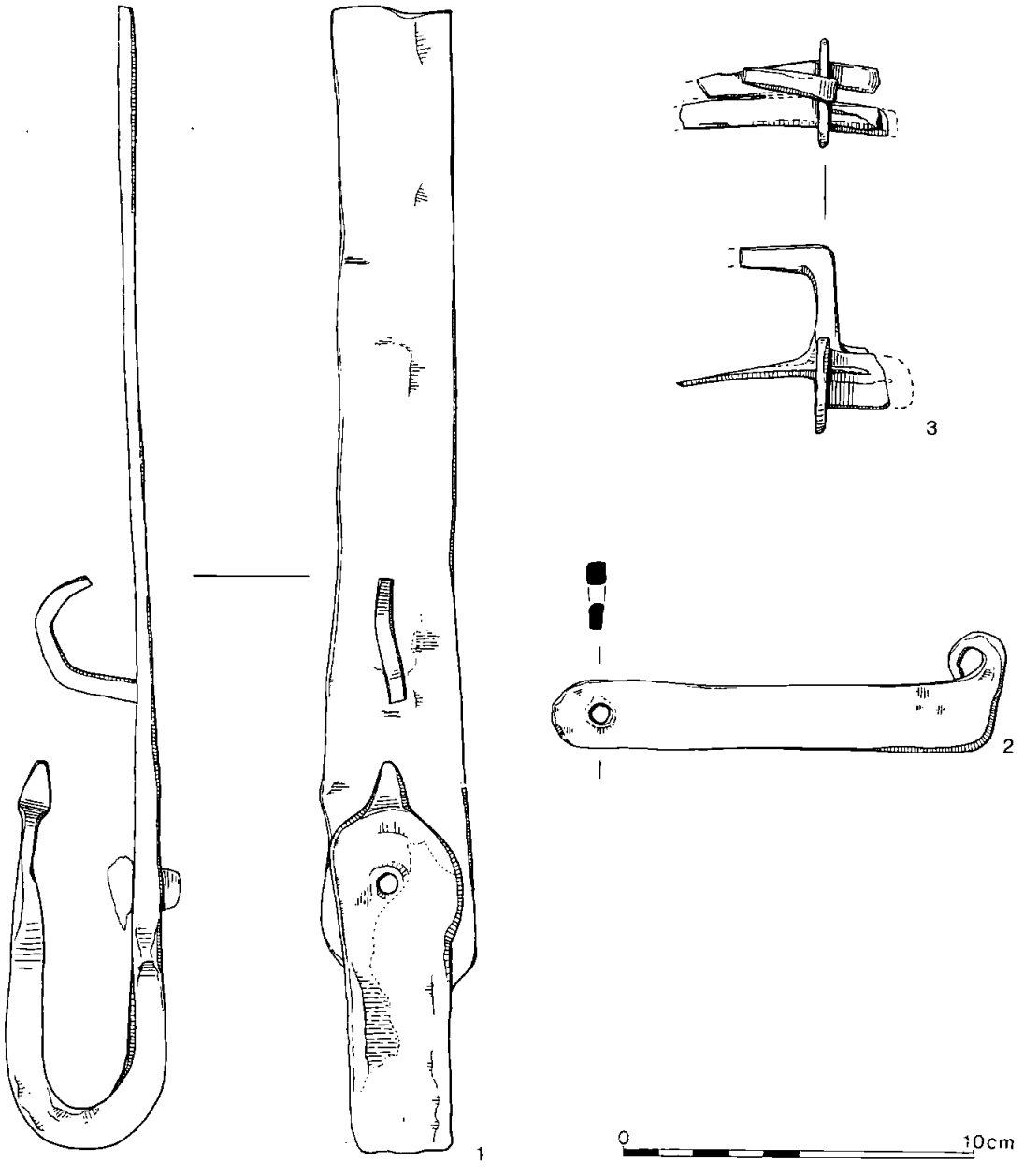

Fig 8 Small finds

and a single fruit of cleavers (*Galium aparine* L.). It would appear that this assemblage represents at least two episodes of charring.

Context 36 (Fill of Baking Oven, Room 1).
The highest constituent component of this context (89 % of the total), of two layers of charred remains, proved to be freethreshing wheat grains with the typical oval, plump form of breadtype wheats (*Triticum aestivo-compactum*). However, few of the rachis fragments were complete enough to indicate if they were hexaploid or tetraploid type. The small number of internode segments present were identifiable as hexaploid breadtype (*Triticum aestivum*) rather than the short internodes of club wheat type (*T. compactum*). No definite identification of tetraploids (*T. turgidum/ durum*) was possible, however it is known that this type of wheat was present in central and southern Britain from the 12th century (Carruthers, 19967), it is possible that some of the unidentifiable remains were of this type, and their presence cannot therefore be ruled out. The remaining 11% of the sample from context 36 consisted of rye (*Seacale cereale* L.) [3%], hulled 6-row barley (*Hordeum vulgare* L.) [4%], and 'typical' cereal weed species [4%]. These weeds consisted of; the seedcorn of *Spergula arvensis* L. (corn spurry) and the nutlets of *Rumex* sp. (dock), and 1% cartyopsis of indefinite grass species (Gramineae indet).

Context 46 (Burnt Surface within Malt Oven, Room 2).
The sample from this context was very small and proved to be largely indeterminate cereals and grasses, two grains of identifiable hulled barley (*Hordeum* sp.), one of which showed the characteristic twisting of 6-row hulled barley (*Hordeum vulgare* L.), a single seed of corn gromwell (*Lithospermum arvense* L.) and seedcorn of spurry (*Spergula arvensis* L.). In addition there were a few fragments of awn and lamma of indeterminate nature.

Context 56 (Lower fill of Pit).
A large percentage of the sample from context 56 (77%) consisted of the grains and rachis of 6-row hulled barley (*Hordeum vulgare* L.), and rye (*Seacale cereale* L.) comprising 47% and 30% respectively. It is possible that this indicates the presence of earlier processing on the site, as rye was generally more common as a crop in the late Saxon period, however rye was also common as a 'lower class' cereal throughout the medieval. The sample contained 7% wheat grains, probably of breadtype wheats (*Triticum aestivocompactum*), and 4% rachis. The remainder of the sample consisted of typical cereal weeds such as, fat hen (*Chenopodium album* L.), *Spergula arvensis* L. (corn spurrey), *Cruciferae* (indet), but possibly *Brassica/Sinapis* sp. (wild mustards etc.), and indeterminate graminae.

DISCUSSION

The samples although relatively small were dominated by two significant cereal grain elements. As the amount of plant macrofossil remains was small, it was decided that the use of sub-sampling was unnecessary, therefore 100% of the sample was examined under a microscope. There was some evidence of the lighter chaff elements (possible awn and lemma fragments) in context 36. This may indicate the presence of partially winnowed crop, however given the context in which they were found it is more likely that these were wind blown contaminants.

The weed remains recovered in the flots are representative of a fairly average cereal crop weed assemblage, and are most likely to have been harvested along with the cereals. They therefore represent contaminants remaining within the processed products. They provide evidence, therefore, for agricultural field ecology. The species present are typical components of an arable weed flora. A variety of different ecological tolerances are noted with species such as corn spurrey (*Spergula arvensis* L.) indicative of moderate to acid soils with an average nutrient supply. Fat hen (*Chenopodium album* L.) is more prevalent on nitrogen-rich soils, while sheep's sorrel (*Rumex acetosella* L.) is more commonly associated with acidic, nutrient deficient soil and poor arable land (Hanf 1983).

Both corn spurry and fat hen are common elements in spring-sown cereals including barley and wheat. The differing ecological preferences of these seeds might well reflect differing patches of soil quality within the same field, or could indicate that the crops were being brought to the site from fields of varying fertility.

With regard to the cereals, all have precedents from other sites in Northamptonshire (Campbell 1994 and Soden, 1996), and are not unexpected from this period. The mixture of the crop species in the deposits can be interpreted in two ways, either they were growing together in the fields, or they were mixed after the harvest. In all but context 56 the assemblage can best be interpreted as preharvest admixture due to weed contamination, context 56 however may represent mixture during storage and/or deposition.

DISCUSSION

The excavation has clarified the dates of medieval settlement expansion and contraction in this part of Brackley, determined the date and character of the occupation on this site and largely seems to have determined the date and extent of the stone quarrying. The excavation has not clarified the size of the burgage plots in the area.

The pottery seems to date from AD 1150 onwards though the pottery specialist does stress that it may be from c. AD 1100. Cautiously, therefore, we can postulate this probable lack of early 12th century activity implies that the development site was outside the original New Town of Brackley. This would support Clarke's and Foard's view theory that the planned New Town originally stopped well before Halse Road along Northampton Road (Clarke 1987, 34, Foard 1996, 4).

It is likely that during Brackley's increased wealth and population the town expanded along the Oxford/ Northampton road. The first activity on the site was the digging and filling of rubbish pits which were part of back plots to domestic buildings facing onto the old Northampton to Oxford road and probably took place between the mid 12th and mid 13th centuries. While

most of the pits were probably only rubbish pits some of the larger ones may have been excavated as small quarry pits for the local limestone. The recovery of rye and barley seeds from one pit (56) shows that these crops were either being grown or processed near by before the bake/brewhouse was built.

The construction of the new building probably occurring in the later 13th century when Brackley was still very buoyant and increasingly wealthy. It appears to have been a bakehouse/malthouse, probably as a detached range lying to the rear of a property fronting onto the Northampton Road. One room contained a corner circular baking oven, while a stone-lined pit with an associated ground level opening through the adjacent wall is of uncertain function. The other wing was probably divided into two rooms. where a later malt oven was inserted into the western room. The rest of the room may be for storage. This arrangement seems to have happened at Brixworth where a kiln building was excavated in the churchyard which has been linked to a 13th century document which recorded grain being stored in this area (Woods 1970).

Malt ovens and detached malt houses are fairly common during the medieval period and numerous examples have been excavated in Northamptonshire at both urban and rural settlements including Northampton (Soden 1998, Williams 1979), Brixworth (Woods 1970), Furnells manor and Burystead (Audouy in press), Mill Cotton, Raunds (Chapman in Parry, forthcoming) and West Cotton (Chapman, forthcoming).

The Elms setting of a separate bakehouse/malthouse building, probably at the rear of a domestic range is common. At West Cotton, Raunds, a small deserted village, there were four malt houses all constructed around the middle of the 13th century and all were in detached buildings set at the rear of the tenements (Chapman forthcoming). There would have been several other malt kilns at the rear of tenements in Brackley - indeed there is a close called "Malt kiln close" about 200m south of the site down the High Street.

The building seems to have also been at least mostly roofed with stone tiles. Hundreds of Colyweston type stone roof tile fragments were found in the building demolition layers as well as a few clay roof tiles. The fact that the building complex was completely made of stone may be indicative of the wealth of the owner and of Brackley in general. Many of the excavated examples are wooden buildings with only a stone malt oven, despite abundance of nearby limestone, for instance, Brixworth (Woods 1970). Hindle makes the point that few houses were built of stone and this was usually in later medieval times, "only the richest members of the community could afford such buildings" (Hindle 1990, 51).

The small area of excavation did not find the size of the suspected medieval burgage plots. This excavation was to the rear of any domestic buildings fronting the medieval street and the finding of the malthouse/ brewhouse complex does not fit in with the four burgage plots known to be established in the late 15th century (Foard 1996). Wall (22) may be a boundary wall, but without other walls, no plot size can be calculated.

The site's abandonment may be dated through pottery, coin and documentary records. A coin of 1344-51 recovered in the subsoil layer (14) may imply the site was still being used in the mid 14th century. The pottery, unfortunately can only be loosely dated to *c* 1300-1400. The documentary records show a collapse in Brackley's population occurring between about 1330 and 1377 when the poll tax returns show that a catastrophic decline. The abandonment of the bakehouse/malthouse may be interpreted as part of this process.

When the building was destroyed there was a huge amount of robbing and some good stone seems to have been taken from the site for reuse elsewhere though there were substantial amounts of reusable stone that had been left on site both in the form of upstanding walls and in some large stones left dumped at the site. This may reflect that there was a low demand for building stone which would tie in with the documented decline of Brackley. At a later date more limestone quarrying seems to have taken place in an area about 10m by 5m.

The site does not seem to have been reoccupied, just one pottery sherd from the period 1400-1600 was recovered from the topsoil on the site. The lack of features and pottery found must imply the site was not occupied and that it was likely that the documentary evidence of four plots in the 15th century refers to only rented fields in this period.

Some of the plots seem to have been partly amalgamated in the early 16th century period but by the building of the almshouses in 1633, the land seems to have been used as fields or gardens belonging to the almshouses. This lack of development on the site continued into the 20th century when it became an ornamental garden.

BIBLIOGRAPHY

Audouy, M., (in press). *North Raunds, Northamptonshire. Excavations 1977-87,* English Heritage Archaeological Report

Barber, A., 1996a. *The Elms, Brackley, Northamptonshire. Archaeological Assessment.* Cotswold Archaeological Trust Report.

Barber, A., 1996b. *The Elms, High Street, Brackley, Northants Archaeological Evaluation.* Cotswold Archaeological Trust Report.

Barnard, F.P., 1916. *The Casting Counter and the Counting Board: A Chapter in the History of Numismatics and early Arithmetic.* Clarendon Press, Oxford.

Beresford, G., 1974. The Medieval Manor of Penhallan, Jacobstow, Comwall, *Medieval Archaeology.* XVIII 90-117.

Biddle, M., (ed). 1990. *Object and Economy in Medieval Winchester: Artefacts from Medieval Winchester.* Winchester Stud 7.2, Oxford.

Blinkhorn, P. W., (forthcoming). The Pottery. In I. Meadows Excavations at Castle Lane, Brackley, Northamptonshire 1983.

British Geological Survey., 1996. *London and the Thames Valley* 4th edition, HMSO.

Brown, D. H., 1997. The Social Significance of Imported Medieval Pottery, in C.G. Cumberpatch and P.W. Blinkhorn (eds), *Not So Much a Pot, More a Way of Life.* Oxbow Monograph 83, 95-112.

Campbell, G., 1994. *The preliminary archaeobotanical results from Anglo-Saxon West Cotton and Raunds.* In Rackham, J, (ed) Environment and Economy in Anglo-Saxon England. CBA Research Report 89

Chapman, A., (forthcoming). *West Cotton: a study of medieval settlement dynamics. Excavations at West Cotton, Raunds, Northamptonshire 1985-89,* English Heritage Archaeological Report

Clarke, J., 1987. *The book of Brackley,* Barracuda books.

Carruthers W., 1996. Charred Plant Remains. In I. Soden . Saxon and Medieval Settlement Remains at St. John's Square Daventry, *Northamptonshire Archaeology* 27, 5199.

Egan, G., 1998. *The Medieval Household, Daily Living c.1150-c.1450.* In, Medieval finds from excavations in London: 6, HMSO.

Foard, G., 1996. *The Elms, Brackley. Documentary Analysis.* In, A. Barber. The Elms, Brackley, Northamptonshire. Archaeological Assessment. Cotswold Archaeological Trust Report.

Hanf, M., 1983.*The arable weeds of Europe,* Hadleigh books, Suffolk.

Hindle, B.P., 1990. *Medieval Town Plans,* Shire Archaeology. Princes Risborough.

Hurst D.G., 1970. Medieval Britain in 1969; Post-conquest. *Medieval Archaeology,* XIV.

Ivens, R. J., 1981. Medieval Pottery Kilns at Brill, Buckinghamshire. *Rec Buckinghamshire,* 24, 144-70.

Kidd, A. M., 1999. *Archaeological Brief for The Elms site.* Northamptonshire Heritage dated 5th January 1999.

Mellor, M., 1994. Oxford Pottery: A Synthesis of middle and late Saxon, medieval and early post-medieval pottery in the Oxford Region, *Oxoniensia,* 59, 17-217.

North, J. J., 1963. *English Hammered Coinage,* Vol 2, Spink & Son, London.

Parry, S., (forthcoming). *Raunds Area Survey: an archaeological study of the landscape of Raunds, Northamptonshire 1985-92.* English Heritage Archaeological Report.

Soden, I., 1996. Saxon and Medieval Settlement Remains at St. John's Square Daventry, *Northamptonshire Archaeology* 27, 5199.

Soden, I., 1998. *Excavations from Woolmonger Street, Northampton,* Northamptonshire Archaeology report.

Williams, J., 1979. *St. Peter's Street, Northampton, Excavations 1973-6,* Northampton Development Corporation Archaeological Monograph No.2.

Woods, P., 1970. Malting in England, Brixworth, Northamptonshire. *Medieval Archaeology* XIV, 205-20.