STAFFORDSHIRE ARCHAEOLOGICAL & HISTORICAL SOCIETY

TRANSACTIONS 1994-1995 VOLUME XXXVI

STAFFORDSHIRE

ARCHAEOLOGICAL AND HISTORICAL

SOCIETY

T R A N S A C T I O N S

FOR 1994–95

VOLUME XXXVI

Stafford
1997

CONTENTS

LIST OF PLATES AND FIGURES

A BRONZE AGE 'BURNT MOUND' AT MILWICH

CHRISTOPHER M. WELCH

INTRODUCTION

In June 1990 a deposit of heat-cracked stone and charcoal was discovered at Milwich by Mr R. Hulme. The site was investigated, and the presence of a 'burnt mound' was confirmed. The deposit was seen in the bank of the Milwich Brook and had been revealed by stream erosion. This erosion was clearly continuing and it was decided to carry out a limited excavation, funded by English Heritage and carried out by staff of Staffordshire County Council over five days in 1991.

The mound at Milwich, recorded as Staffordshire Sites and Monuments Record number 4256, is located at SJ97563[illegible]3, just south of the village of Milwich on the east side of the Milwich Brook. It is one of eighteen such sites known in the county and lies about 15km north of the major concentration around Cannock Chase (fig. 1).

Plate 1: Milwich Burnt Mound seen in stream section

Burnt mounds have been described as:

> '. . heaps, sometimes in excess of two hundred cubic metres, of little other than fire cracked stone, ash and carbon, which are always next to water.'[1]

Among Staffordshire mounds, Milwich is unusual in having been detected in stream section alone: there was no indication of a mound on the surrounding ground surface. The other sites in the county are found either as mounds up to 10m across and less than a metre high, or as deposits of burnt mound material encountered in the digging of, for example, land drains. The mounds tend to be round or irregular, with one kidney-shaped example (see below). During the course of the project the opportunity was taken to survey two further sites and these are discussed below.

1 J. Hedges, 'Excavation of two Orcadian burnt mounds at Liddle and Beaquoy', *Proc. Soc. Antiq. Scoland* **106** (1975), 39.

on burnt mounds in the area, T. C. Cantrill, was a geologist working in the South Staffordshire and Cannock Chase coalfield (a fact noted in the typewritten list of sites made in 1930 and discovered by M. Hodder in Sutton Coldfield Library) and it is in that area that he found most sites.[14] Subsequent work by the present author has added to the Cannock Chase sites noted by Cantrill to produce the Cannock Chase 'group'.[15] All four of the Lount Farm sites were found by the farmer, Mr G. Bannister, after careful searching along the valley of the Moreton Brook, and the Milwich site was found in similar fashion. Despite this, it can be said that the burnt mounds in Staffordshire are not associated with the better soils of the south-east of the county, where the prehistoric settlement remains tend to be concentrated.

An association between poorer land and burnt mounds is seen elsewhere in the country. In Hampshire, sites have been located on the poorer sandy soils of the New Forest.[16] In Orkney and Shetland, however, Hedges noted an association between the better agricultural land and the mounds, but Halliday has suggested this could be the result of the pattern of fieldwork.[17] In Shropshire, Ehrenberg has noted a coincidence between good agricultural land and burnt mounds, although the association may be as much with the presence of peat.[18]

The location in Staffordshire of the burnt mounds away from the more fertile soils of the south-east of the county and the association of these mounds with an economy based on the exploitation of animal products need not suggest that they were being used by a society scraping a living from wood pasture on marginal land. It is possible that the mounds were used periodically, perhaps seasonally, by groups operating away from their 'home' environment, either hunting or grazing animals. This hypothesis is supported, with the reservation noted above, by the C^{14} dating evidence from Milwich, which suggests that the site was visited over a long period, perhaps of several centuries. This would be in contrast with, for example, the Scottish sites referred to by Barber. It is worth noting that he suggests a typical burnt mound would have been used perhaps 400 times; if this were spread over the several centuries suggested by the C^{14} dates given for Milwich, an annual visitation of the sites seems feasible.[19]

An important reservation, however, should be noted: so far only the Milwich mound has been dated in Staffordshire. All the other sites are assumed to be Bronze Age in date by analogy only.

CONCLUSION

The following programme is suggested as a means by which the hypothesis outlined above could be tested.

1. A sample of the Cannock Chase, and Lount Farm, mounds need to be dated to confirm that these are, in fact, Bronze Age sites.

2. The samples for dating need to be taken from the top and bottom of the burnt mound material, as at Milwich, to confirm the length of time of accumulation, and the samples themselves need to be identified to remove the possibility that the inclusion of heartwood is giving a 'false' date difference.

3. A length of stream course needs to be identified within the arable area of south-east Staffordshire, and searched for burnt mounds, to determine the potential bias introduced by fieldwork.

Until the above programme is carried out, the suggestions put forward for the way in which these sites may have functioned in the context of Bronze Age Staffordshire must remain speculative.

14 **Anon.**, *Lists of Prehistoric Cooking Sites so far discovered in Staffordshire 15/10/1939* (typewritten list found by M. Hodder in Sutton Coldfield Library).

15 Anon., *ibid.*; T. C. Cantrill and G. M. Cockin, 'Neolithic flints from a Chipping Floor at Cannock Wood, Near Rugeley, South Staffordshire', *Transactions of the North Staffs. Field Club* **51** (1916-17), 96; see Catalogue, below, and M. A. Hodder and C. M. Welch, 'Burnt Mounds in the South Staffordshire Area', *Staffordshire Archaeological Studies* **4** (1990), 16-24, for more recently found sites.

16 M. Ehrenberg, 'Some aspects of the distribution of burnt mounds', in Hodder and Barfield (eds), *Burnt Mounds*, 49; sites listed in A. H. Pasmore and J. Pallister, 'Boiling Mounds in the New Forest', *Proceedings of the Hampshire Field Club and Archaeological Society* **24** (1967), 15.

17 J. Hedges, 'Excavation of two Orcadian burnt mounds at Liddle and Beaquoy', *Proc. Soc. Antiq. Scotland* **106** (1975), 74; S. P. Halliday. 'Patterns of fieldwork and the distribution of burnt mounds in Scotland', in Buckley (ed.) *Burnt Offerings*, 60-61.

18 M. Ehrenberg, 'Some aspects of the distribution of Burnt Mounds', in Hodder and Barfield (eds), *Burnt Mounds*, 47-48; see also M. Lehr, 'The North West Wetlands Survey, Shropshire', *West Midlands Archaeology* 37 (1994), 4-5.

19 J. Barber, 'Scottish burnt mounds: variations on a theme', in V. Buckley (ed.), *Burnt Offerings*, 101.

Figure. 7: Stafford Brook Farm A: contour survey

CATALOGUE

In 1990 a catalogue of sites in the South Staffordshire area was published, together with the results of geophysical survey over two of the Cannock Chase mounds.[20] The following catalogue is of all those mounds located since then, within the area seen in fig. 1.

Cannock Chase Group.

Stony Brook. Staffs SMR 1002. N.G.R. SK02081655. Referred to in 1930, but could not be located in 1987.[21] The site has now been found and appears to be well preserved. It lies by a secondary channel of the Stony Brook, south of the main course, about 200m below the Lower Stony Brook Pool.

Stafford Brook Farm II. Staffs SMR 4183. N.G.R. SK01881807. Fig.6:B. Exposure of burnt stone seen in drainage ditch about 90m south of Stafford Brook Farm I (see survey of SBFI, above).

Birches Valley I and *II.* Staffs SMR 4182 (N.G.R.SK01901680), 4181 (N.G.R.SK01951675). Two exposures of burnt stone seen in a drainage ditch on a small tributary of the Stony Brook, about 300m north-west of the Stony Brook site.

Slitting Mill II and *III.* Staffs SMR 4042 (N.G.R.SK03391730) and 4172 (N.G.R.SK03351728). Two mounds within a few metres of each other, adjacent to the Rising Brook. 4042 is crossed by the track that runs alongside the brook, and burnt stone is seen on the ground surface for some distance along it. The site appears to extend east and west of the track. SMIII lies to the south west, and between the track and the brook.

Lount Farm Group.

Lount Farm I. Staffs SMR 5007. N.G.R. SK03792184. Fig.4:A. Site surveyed in 1996. See above.

Lount Farm II. Staffs SMR 5008. N.G.R. SK04032167. Fig.4:B. Very low, but apparently extensive mound, some distance from the Moreton Brook. Almost adjacent to a medieval glassmaking site (Staffs SMR 20746).

Lount Farm III and *IV.* Staffs SMR 5009 (N.G.R.SK03942158) and Staffs SMR 5010 (N.G.R.SK03942155). Fig.4:C and D. Two exposures noted near Moreton Brook. Possibly part of the same mound. Part of a flint nodule was found on LFIII. This is not a common find in this area, but the flint had apparently not been worked.

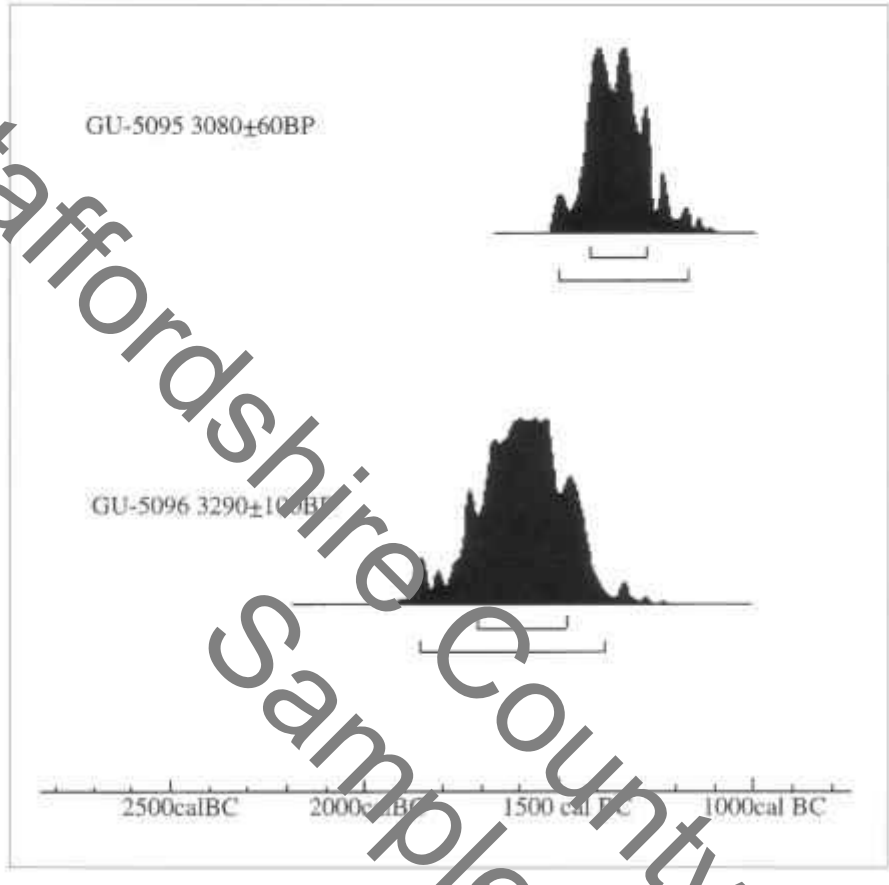
ACKNOWLEDGEMENTS

The project work was funded by English Heritage and carried out by Staffordshire County Council. Lord Harrowby kindly allowed access to his land at Milwich. Mr G. Bannister allowed access to survey the Lount Farm site, and Mr J. Foster allowed access to the mound at Stafford Brook Farm. I am grateful to Mike Hodder, Daryl Garton, Alex Jones, and Jenny Woodcock for references and discussion.

20 M. A. Hodder and C. M. Welch, 'Burnt Mounds in the South Staffordshire Area', *Staffordshire Archaeological Studies* **4** (1990).

21 *Ibid.,* 16; originally noted in Anon., *List of Prehistoric Cooking Sites so far discovered in Staffordshire 15/10/1939* (typewritten list found by M. Hodder in Sutton Coldfield Library).

The following diagram shows the probability distributions which have been calculated using OxCal (v2.0), (Bronk Ramsey 1994; Bronk Ramsey 1995), and the usual probability method (Stuiver and Reimer 1993).



REFERENCES

Bronk Ramsey, C. 1994 *OxCal (v2.0): a radiocarbon calibration and analysis program.* Oxford Radiocarbon Accelerator Unit.

Bronk Ramsey, C. 1995 'Radiocarbon calibration and analysis of stratigraphy: the OxCal program', *Radiocarbon* **38**, 425-30.

Mook, W .G. 1986 'Business meeting: Recommendations/Resolutions adopted by the Twelfth International Radiocarbon Conference', *Radiocarbon* **28,** 799.

Pearson, G. W. and Stuiver, M. 1986 'High precision calibration of the radiocarbon time scale, 500-2500 BC', *Radiocarbon* **28**, 839-62.

Stuiver, M and Reimer, P. J. 1986 'A computer program for radiocarbon age calculation', *Radiocarbon* **28**, 1022-30.

Stuiver, M. and Reimer, P. J. 1993 'Extended ^{14}C data base and revised CALIB 3.0 ^{14}C age calibration programme', *Radiocarbon* **35**, 215-30.

The Society acknowledges a grant from English Heritage towards the cost of publishing this article.

A CUP-MARKED STONE AT RAMSOR FARM, RAMSHORN

GRAEME GUILBERT, DARYL GARTON, and DAVID WALTERS

The known examples of prehistoric rock-art in Britain number close to 2,000, and most occur on sites in upland areas (Morris 1989). One group of such rocks is to be found in the Peak District (Barnatt and Reeder 1982), though the known instances there are not so common, especially in the Staffordshire part of the Peak, that a newly-discovered cup-marked stone in that region can be allowed to pass unremarked and unrecorded. The slab of rock in question was dug up with an earth-moving machine in 1993, during the laying of drains in the midst of the yard at Ramsor Farm (NGR SK08444547), in the parish of Ramshorn. The owner and finder is Mr Ian Mooney, who kindly drew it to the attention of one of us (DW) and subsequently granted access for the purpose of making a photographic and drawn record (fig. 1). Mr Mooney reports that the slab was not visible before it was unearthed, and that it was only a few centimetres below present ground-level, lying flat, though he is unsure whether the decorated side was uppermost or lowermost. On the same occasion, several other slabs were uncovered nearby, but Mr Mooney states that these were undecorated and that they have been re-buried in another part of the farmyard, with the result that they have not been seen by any of the writers. Mr Mooney has erected the cup-marked slab beside the end of a wall within the yard, some 15 m. south-east of the point of discovery; and he has determined that it shall remain there for the foreseeable future. It was in this location that it was viewed and recorded in October 1995.

The material of the cup-marked slab is an orange-brown sandstone of consistently fine-medium grain, differing in both colour and texture from the darker, redder, and more variably grained sandstones and gritstones of both the walls and the bedrock immediately around Ramsor Farm. However, a reasonable match can be seen among boulders and bedrock exposed at little distance to the south-east. Geologically, the find-spot lies at the south-eastern end of a pronounced ridge of Namurian (formerly Millstone Grit Series) Ipstones Edge Sandstones, not far short of the point where these Carboniferous rocks give way to the younger Triassic rocks, in the Hollington and Hawksmoor Formations of the Sherwood Sandstone Group (formerly Keuper/Bunter Sandstones). Thus, it appears more likely that the cup-marked slab was derived from the Sherwood Sandstone than from the Namurian rocks. Either way, there would be no apparent cause to doubt that it could be of local origin.

The slab averages about 20 cm. in thickness, and the cup-marks are confined to one part of one face, though they could originally have been more extensive, as will be explained below. The rounded, undulating and weathered appearance of the undecorated, or reverse, side contrasts with the flatter face which bears the cup-marks, for the latter appears to have been created either by splitting the rock on a bedding-plane, perhaps to remove it directly from an exposure of bedrock, or otherwise by cleaving a large detached boulder. This bedding-plane undulates only very gently, providing an ideal surface in an ideal material for the pecking and grinding with stone tools that would have been required to accomplish such three-dimensional rock-art. One edge of the slab is weathered like the reverse (to right in fig. 1); the other is fractured, and this too may have happened when it was detached from the outcrop.

The cup-marks are clustered in the bottom left of this flattish face as the slab now stands and as it is illustrated in fig. 1, though it must be stressed that there is no reason to suppose that this, rather than any other arrangement, was its original disposition. A minimum of five cup-marks is visible, as depicted in unbroken outline in drawing B of fig. 1. Two other possible cups are shown, but only in dotted outline because these are dubious as artificial marks, being far shallower and less regular and having a rather rougher surface than the others, which have each been ground smooth. The five certain cups vary from about 30 mm. to 90 mm. in diameter, and most are slightly oval in outline. Each has a gently-sloping, bowl-shaped cross-profile. That of largest diameter is also the deepest, at 28 mm., while the second largest is 17 mm., and the others are all 8-9 mm. deep. A shallower channel extends across much of the *c.* 20-mm. space between the largest cup and that closest to it, and a small, shallow depression projects from the second largest cup; these are also dotted in drawing B, because it is unclear whether either is intentional.

A little more than half of the decorated face has flaked off along other bedding-planes, as defined by the line of shortest dashes in drawing B. Most of this damaged area has been reduced by sufficient depth as to remove all trace of any cups or other motifs less than 10-15 mm. deep, supposing that such marks had once featured on this part of the slab. A smaller part of it, as defined by the medium dashes in drawing B, has been reduced a little further, while the area beyond the longest dashes appears to have lost enough for marks up to 30 mm. or so in depth to have been removed. In other words, there can be no certainty that originally the pattern of decoration did not spread more widely over this face. Moreover, some part of the slab is now hidden from view below ground, and Mr Mooney states that it penetrates to about 45 cm. below the dot-dash line forming the bottom of fig. 1, though he has assured the writers that no further cups are to be seen on the buried portion.

It is not known when the damage to the decorated face occurred, and Mr Mooney asserts that it was not caused by the machine in 1993. However, there are other, fresher, smaller, and more localized scars at various points on both the decorated face and the reverse of the slab, and these were undoubtedly inflicted by the teeth of the machine's bucket. This apart, the surviving portion of the decorated face shows little sign of weathering, and the five cups are themselves well preserved.

One further detail of the decorated face merits a mention, as is lends weight to the presumption that these cup-marks are of considerable age. An irregular patch of the preserved surface is stained by iron, which seems likely to have been deposited out of ground-water over some period of time. The iron-stain extends over the surface of three of the cups, as shown by the shaded area in drawing B.

The Ramsor Farm cup-marked slab cannot be dated other than by analogy. It plainly belongs to the broad class of abstract rock-art which includes examples with simple cup-marks as well as those with more elaborate designs comprising cups and rings, all now of obscure meaning. The associations of such art elsewhere in Britain and Western Europe show it to derive largely from the period known conventionally as the Neolithic, though its significance arguably continued into the Early Bronze Age. To generalize, cup-marks and cup-and-ring art were probably executed mostly in and around the 3rd millennium BC (Burgess 1980, 347-8; 1990, 158-63, 168; Bradley 1991, 78; 1992, 169-71; 1993, 34-7; Parker Pearson 1993, 74-5).

No site in Staffordshire has yet yielded a rock decorated with any motif more complex than the cup. Among the few other cup-marked stones reported from the county hitherto, only those recovered by excavation from the barrows called the Brund, Sheen (Bateman 1861, 177-8; Howarth 1899, 35, 157; Barnatt and Reeder 1982, 43) and Low Bent, Fawfieldhead (Wilson and Cleverdon 1987, 16-17, fig. 8) are generally accepted as genuine. Two of the three stones from Low Bent have multiple cups; the third has a single cup. The excavator of the Brund recounted that his two finds each bore a single cup, but these stones have since been mutilated, so this cannot be verified. In any case, it is notoriously difficult to validate the man-made origin of such solitary cups on blocks of sandstone/gritstone (cf. Barnatt and Reeder 1982, 36, 44). Both the Brund and Low Bent are situated in the upper reaches of the Manifold Valley, 16 km. from Ramshorn, while another stone with a single cup was found almost as far north, in a barrow near Elkstone (Bateman 1861, 172; Howarth 1899, 157; Barnatt and Reeder 1982, 43). The interpretation of the latter stone has likely been queried (Wilson and Cleverdon 1987, 16), and recent inspection by GG at Sheffield City Museum has confirmed that this cup, at 70-90 mm. in diameter by 50mm. in depth, seems improbably proportioned in the present context. Otherwise, there is only the briefest mention of a 'similar stone found at Stanton' (Bateman 1861, 172), and therefore probably only 3-4 km. east of Ramshorn; but the whereabouts of this are unknown, and it cannot be regarded as a certain example. It is in the context of this meagre list that the local significance of the recent discovery at Ramsor Farm must be considered. As noted above, however, the few such decorated stones found in Staffordshire should be viewed alongside those from the Derbyshire part of the Peak District, which include both complex and simple patterns, some displaying irregular arrangements of cups not dissimilar to that seen at Ramsor Farm (Barnatt and Reeder 1982, figs 4 and 5). Even so, this is the first certain example of such art to be located at the southern margin of the Peak District.

It may reasonably be anticipated that other examples of rock-art will eventually come to light on these southern sandstone foothills. In attempting to predict which places might prove productive, it is first necessary to be aware that most of the recorded instances throughout the Peak District occur

THE MOATED SITE OF MANOR FARM, HARLASTON: AN EVALUATION AND EXCAVATION, 1991–1994

ALISTAIR BARBER
(Cotswold Archaeological Trust)

SUMMARY

Evaluation and excavation within the moated site revealed fragments of structures which appear to date from the 13th or 14th century. Thereafter the site seems to have been occupied more or less continually to the present day. It is possible that the platform was, unusually, moated only on three sides.

INTRODUCTION AND HISTORICAL BACKGROUND (fig. 1)

Manor Farm (NGR: SK 21 10) lies on the western edge of the village of Harlaston adjacent to the parish church of St. Matthew, which has an early 13th-century tower (Pevsner 1976). The village is some 8 km. north of Tamworth and 10 km. east of Lichfield, within an area of undulating relief at approximately 70m O.D. The local geology is Triassic Keuper Marl, with the alluvial deposits and fluvial reworkings of the River Tame to the west. The natural substrate varied across the excavation site from clay to glacial drift.

Harlaston is first recorded as *Heorlfestun* in the will of the Anglo-Saxon thegn Wulfric Spot (A.D. 1002 x 1004; Sawyer 1968, no. 1536). The lands were held by Earl Algar before the Conquest but afterwards passed into royal hands. The ownership of the manor of Harlaston has been discussed by Shaw (1798, 399–402), who associates the important Derbyshire-based family of the Vernons with the manor from the 12th to 16th centuries (see Wright 1983 for further details on the Vernon family). In 1565 the estate passed to the Stanleys, and in the 17th century to the Brabazons. Of the site itself Shaw records in 1798 that 'the old manor house appears to have been moated, but that site contains only a farm-yard and buildings'. An 1814 estate map (Estates of heir of Thomas Princeps: Staffs. Record Office, D(W) 3222/254) shows the site in detail. There is water on three sides of the platform which is annotated as 'moat', and an amorphous area of damp/wet ground to the south. The moat stops on the east and west side in clearly defined flat-ended terminals. There are four buildings marked in the centre of the platform, which are described in the apportionment as 'farm building, fold yard, rick yard, 2 crofts and moat'. By the time of the 1884 O.S. map the western arm of the moat had silted-up, although it was still visible as an earthwork. In this century all the buildings with the exception of one of the crofts have been demolished and modern farm buildings erected. The latter were in turn demolished in 1994 prior to redevelopment. The moated platform is about 90 m across within the ditch, and whilst the western moat-arm has been infilled in modern times the northern and eastern arms still retain water and may be fed from a groundwater source, since no inlet channels are visible.

BACKGROUND TO THE ARCHAEOLOGICAL INVESTIGATIONS

In 1990 plans were advanced for the residential development of part of the moat platform, and in accordance with Government advice contained in Planning Policy Guidance Note 16 Cotswold Archaeological Trust (CAT) was commissioned to undertake a field evaluation in October 1991. This comprised the excavation of 10 small trenches (fig. 2) in available areas between the then still standing farm buildings in order to determine the nature and preservation of any archaeological remains. The evaluation demonstrated that medieval deposits survived between areas of extensive post-medieval and modern disturbance (Johnson 1991). Following the evaluation a planning application was submitted which allowed for the preservation *in situ* of the most significant and vulnerable archaeological deposits as open-spaces within the development. Planning consent was granted for the development, subject to a programme of limited fieldwork which aimed to mitigate the effects of the development upon archaeological deposits and provide information on the history and development of the moated site. This second phase of fieldwork was carried out between

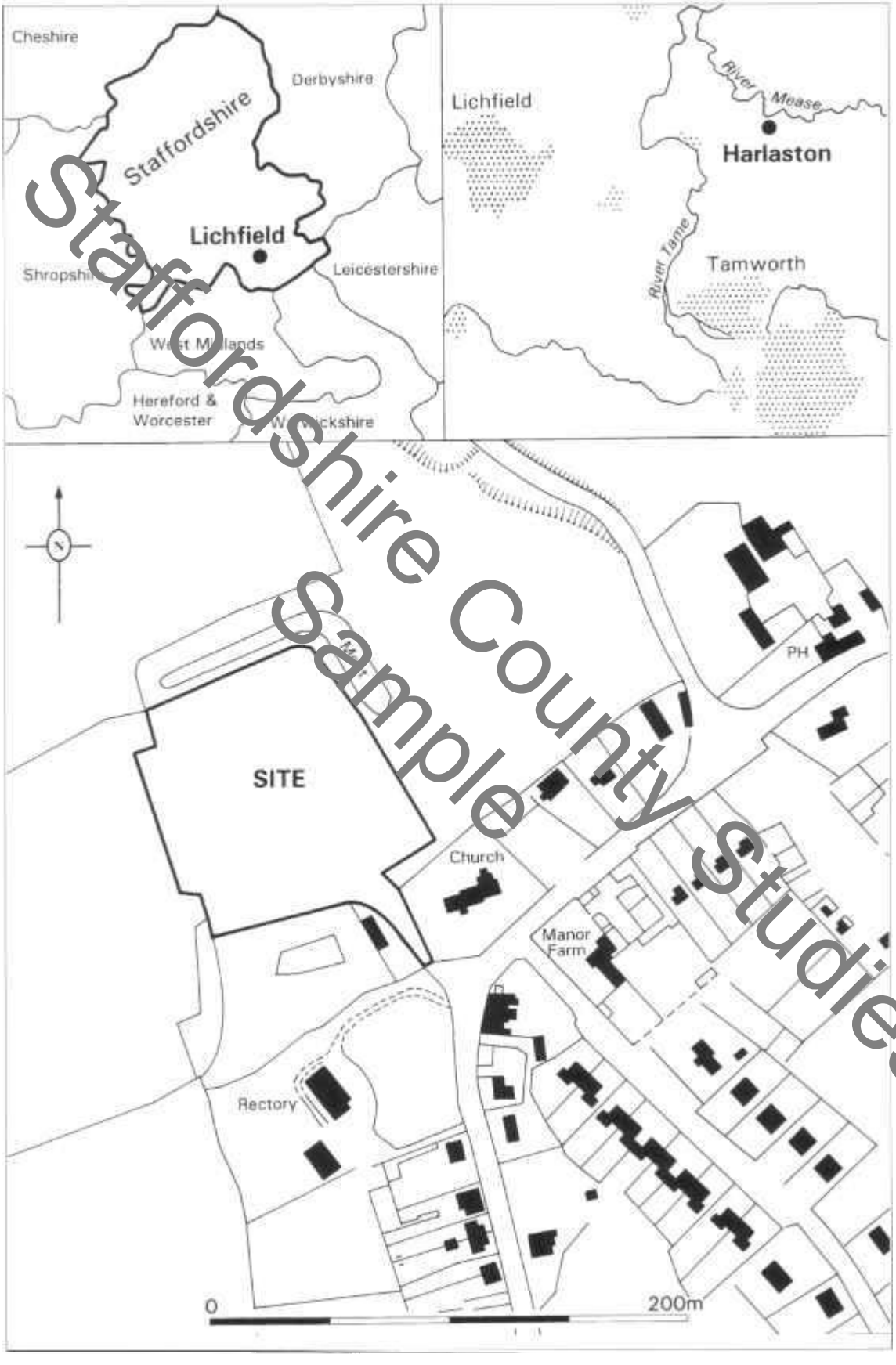


Figure 1: Site location

REFERENCES

Aberg, F. A.	1978	*Medieval Moated Sites.* CBA Research Report 17.
Aberg, F. A.	1983	'The Medieval Moated Sites Research Group: The First Thirty Years, 1952–81', in Hinton D.A. (ed.) *25 Years of Medieval Archaeology*, 90–96.
Hawke-Smith, C.	1984	'Rescue excavations at Eyeshall Manor moated site, Eccleshall, Staffs.', *Staffordshire Archaeological Studies*, i. 7–40
Johnson, C.	1991	*Manor Farm, Harlaston, Staffs. Evaluation Excavation Report*, CAT Typescript Report no. 9162.
Larkhan, P.	1983	'Moated sites in south Staffordshire', *TSSAHS*, xxiv. 8–61.
Le Patourel, H. E. J. and Roberts, B. K.	1978	'The significance of moated sites', in Aberg 1978, 46–55.
Pevsner, N.	1976	*Buildings of England: Staffordshire.*
Rigold, S.E.	1978	'Structures within English moated sites', in Aberg 1978, 29–35
RCHME	1968	*West Cambridgeshire.*
Sawyer, P.H.	1968	*Anglo-Saxon charters.*
Shaw, S.	1798	*The history and antiquities of Staffordshire* (volume one)
Taylor, C.C.	1978	'Moated sites: their definition, form and classification', in Aberg 1978, 5–13.
TSSAHS		*Transactions of the South Staffordshire Archaeological and Historical Society*
Wilson, D.	1985	*Moated Sites*
Wrathmell, S. and Wrathmell, S.	1975	'Excavations at the moat site, Walsall, 1972–74' *TSSAHS*, xvi. 19–53.
Wrathmell, S. and Wrathmell, S.	1977	'Excavations at the moat site, Walsall, 1975', *TSSAHS*, xviii. 29–46.
Wright, S. M.	1983	*The Derbyshire gentry in the fifteenth century* (Derbyshire Record Soc. viii).

The Society is grateful to Lovell Homes Ltd. for a grant towards the cost of publishing this article.

CROXDEN ABBEY, STAFFORDSHIRE: A REPORT ON EXCAVATIONS 1956–7 AND 1975–7

PETER ELLIS

with contributions by Lynne Bevan, Jackie Hall, and Stephanie Ratkai

INTRODUCTION

Croxden Abbey was founded as a Cistercian house in 1179. The site was chosen by monks from Aunay-sur-Odon, Normandy, who had settled initially, in 1176, a few miles to the north of Croxden, at Cotton, near Alton (fig. 1). The site lies on alluvial river deposits on the north side of Croxden valley (fig. 2). The house was dissolved in 1538 and some buildings were retained and used as a farm. Nineteenth-century archaeological and antiquarian interest led to excavation and recording of the standing structure, undertaken by Charles Lynam at the beginning of this century (Lynam 1911). The ruins came into state guardianship in 1936, and in 1956 the Ministry of Public Buildings and Works commenced a programme of consolidation. This was preceded by clearance, excavation, and recording, the results of which are reported here. Work was undertaken in two campaigns, the first, in 1955–6, directed by P. K. Baillie Reynolds, and the second, in 1975–7, by Peter Crane and Peter White.

Archaeological and architectural sources comprise Wardle (1895), Lynam (1911), a guidebook and a short note by Baillie Reynolds (1946, 1964), and summaries of work undertaken (Wilson and Hurst 1958, 153; 1959, 191; Webster and Cherry 1978, 161). The primary sources for the history of Croxden are the foundation charter and the abbey chronicle (printed in Dugdale 1846; Collectanea Topographica et Genealogica 1835; Lynam 1911). Discussions of these documents occur in Lynam (1911), in four articles concerned with aspects of the abbey (Hills 1865; Hibbert 1914, 1918; Laurence 1951-4), and in the Victoria County History (1970). Additional research into the history of the parish has been undertaken by Keele University Department of Adult Education (Stuart 1984), and the architectural evidence has been discussed by Hoey (1993). The historical and documentary section below is based on these primary and secondary sources.

Thanks are due to colleagues at Birmingham University Field Archaeology Unit, in particular Nigel Dodds for the illustrations, and Cathy Mould and Iain Ferris who initiated the project. Staff at the William Salt Library, Stafford, facilitated research, and Sara Levitt and Cameron Moffett of English Heritage's Historic Properties (Midlands and East Anglia) and Glynis Edwards at the Ancient Monuments Laboratory of English Heritage expedited work on the finds. For their comments on the text I am grateful to Jackie Hall, who also discussed her interpretations of the evidence with me in advance of publication of her work, and to Glyn Coppack and an anonymous referee. Although the discussion section in particular owes a great deal to their comments, the author alone is responsible for the final text.

HISTORICAL AND DOCUMENTARY BACKGROUND

The initial settlement at Cotton and the subsequent abbey at Croxden were under the patronage of Bertram de Verdun, lord of Alton, whose relative had founded the mother house at Aunay. Bertram endowed the community with lands at Croxden itself, and at Alton and elsewhere in Staffordshire, as well as a salt-pit at Middlewich in Cheshire, a mill at Stamford in Lincolnshire, and other properties and dues in Rutland, Derbyshire, and Leicestershire (fig. 1). The Verduns were replaced as patrons by the Furnivalles in the early 14th century.

Land acquired in Shropshire in 1206 was exchanged in 1287 for land near to Croxden in an arrangement with Buildwas Abbey, Shropshire. No such co-operation took place with Dieulacres Abbey, founded 12 miles away from Croxden in 1214, and the relationship between the two houses was marked by long-running legal arguments and complicated agreements. Croxden's organisation of its resources resulted, by the end of the 13th century, in the ownership of monastic granges at five sites in addition to Croxden itself, and this was the most prosperous period for the abbey, based principally on sheep-farming, but also on woodland management including the production of charcoal (Laurence 1951–4, B24). A town house was acquired between 1297 and 1308 for the abbot's London visits.

MEDIEVAL WINDOW GLASS

Thirty fragments of medieval window glass were recovered, including the remains of six identifiable small panes or quarries. This small collection was in a generally poor condition, exhibiting varying degrees of opacity and edge damage. All fragments were made of a pale green glass, and five quarries showed evidence of decoration applied with dark red paint. All decorated quarries have been illustrated in fig. 8. Border quarries decorated with circular motifs are dated to the 14th century (fig. 8.1–2), whereas quarries with naturalistic foliage and foliate motifs suggest an earlier date in the 12th to 13th century (fig. 8.3–5).

Figure 8: Painted window glass; scale 1:1.

Catalogue (fig. 8)

Numbers 1—5 illustrated

1 Quarry with one flat side and traces of a curved, grozed edge. Red painted decoration forms a series of large empty circles and smaller, filled circles. Such decoration was popular as a border motif during the 14th century, and parallels have been noted in the heraldic window at York Minster (O'Connor and Haselock 1977, pl. 107–108), Marsh Baldon, Oxfordshire (Baker 1960, pl. 24), and at Wolvesey Palace, Winchester (Kerr 1990, fig. 100:898.2, 898.6). Length: 35mm, thickness: 5mm, width: 25mm; AML 780076; CA 77, BI, SF 6; Dissolution context.

2 Quarry in three conjoining fragments. Curved with two long, grozed edges and two short, ungrozed edges. Red paint has been applied to form a larger version of the decoration described for 1. Max length: 90mm, thickness: 3mm, width: 27mm. AML 780077; CA 77, BI, SF 7; Dissolution context.

3 Quarry without original edges, decorated with painted foliage trails against a cross-hatched background. The foliate motif shown on this piece is similar in form to an example from Wolvesey Palace, Winchester, where similar foliage trails have been dated to the 12th to 13th century (Kerr 1990, 412–413, fig. 102:900.8). Thickness: 5mm. AML 780075; CA 77, BC, SF 5; recent context.

4 Quarry in thirteen conjoining fragments with remains of two straight edges and one corner and traces of red painted design showing stem intersection of foliate trails and an area of cross-hatching. Decoration is similar to 3. Very poor condition. Length: 56mm, thickness: 4mm. AML 780079; CA 77 BC, SF 9; recent context.

5 Quarry in three pieces with one straight edge and one curved, grozed edge. Decoration similar to 4 with the exception of cross-hatching. Very poor condition. Approximate length: 30mm, thickness: 4mm, width: 23mm. AML 780079; CA 77 BJ; medieval context.

6 Quarry, undecorated with traces of three straight, ungrozed edges. Maximum width: 40mm, thickness: 4mm. AML 780074; CA 77 BD, SF 4; Dissolution context.

7–15 Nine undiagnostic fragments: AML 780073; CA 77 BG, SF 3; Dissolution context; AML 780074; CA 77 BD; Dissolution context; AML 780078; CA 77 BI, SF 8; Dissolution context; and AML 780079; CA 77 BJ, SF 9; medieval context.

THE MEDIEVAL AND POST-MEDIEVAL POTTERY by Stephanie Ratkai

INTRODUCTION

A small collection of pottery from the work undertaken between 1975 and 1977 was examined, amounting to 112 sherds. The pottery was divided by eye into 16 fabric groups. The type sherds were then examined under x20 magnification. The pottery falls into four groups of material: (i) from the latrine block drain, F24; (ii) from the east side of Building 1; (iii) from excavations in the latrine block undercroft (1975); and (iv) from excavations in the alley to the rear of the east range (1977).

The potential value of the pottery was the subject of an initial assessment (Mould *et al* 1994). Although only a small number of sherds was stratified, it was felt that study was worthwhile in view of the small quantity of excavated material from this area of Staffordshire. In addition, the stratified pottery came from dissolution contexts, a period during which the transition from the medieval to the post-medieval tradition was taking place and one which has been highlighted for its importance (English Heritage 1997).

FABRICS

The pottery was made up of coal measure clay fabrics and red/grey firing clays, the former predominant. The range of fabrics is one commonly seen in Staffordshire.

Fabric 1 Buff, abundant large quartz grains, red ferruginous inclusions and sparse ?clay pellets.

Fabric 1a Buff, sparse-moderate quartz.

Fabric 2 White paste-like fabric with sparse, small quartz grains.

Fabric 3 Proto-Midlands Purple Ware.

Fabric 4 Oxidised surfaces, grey core, dense sandy matrix (grains smaller than 0.01mm) with sparse larger quartz grains, sparse orange and brown ferruginous inclusions, mica visible on surfaces.

Fabric 5 Oxidised surfaces, grey core, sparse-moderate quartz, sparse ferruginous inclusions and sparse sub-round cream inclusions.

Fabric 5a Oxidised surfaces grey core, sparse quartz, sparse-moderate irregular voids (?organic matter) and coarse ?sandstone.

Fabric 6 Orange, moderate quartz and sparse ferruginous inclusions.

Fabric 6a Orange, sparse angular quartz and sparse elongated and irregular voids.

Fabric 7 Light orange-brown, abundant quartz, very sparse ferruginous inclusions, mica visible on the surfaces.

Fabric 8 Buff, poorly mixed clay, dense matrix with few visible inclusions, moderate small oval voids, red and cream streaks within the clay body.

Fabric 9 Dark grey with pale grey margin beneath the external glazed surface, abundant ill-sorted quartz and sparse, rounded dense, grey inclusions.

Fabric 10 Midlands Purple

Cist Cistercian Ware

Cist/Blw Cistercian/Blackware

Gstw German Stoneware

Pm Post-medieval ware

THE COLLECTION

Group 1: pottery from the latrine block drain

fabrics	01	03	05	05a	06a	07	total
	11	1	3	1	1	3	20
forms	jug	bowl	cpj	pipkin	?cheese press	?	total
	11	4	–	1	1	3	20

north end of F29. The yard was then enclosed on its north side by F31, running across to the south-west corner of Building 1. This would suggest that a walled area here preceded Building 1. The south wall of a pre-existing yard may well have dictated the alignment of Building 2, and the yard may thus have been earlier than either building.

Some of the servicing of the abbey economy may have taken place in the walled yard. Outer court buildings such as smithies, wool houses, or bakeries may have been located there, as is suggested by the hearths and hard standings. These features might also be argued to be post-medieval, and continuity of economic use of monastic outbuildings is a possibility. The two furnaces found, one in Building 2 and the second outside the east door of the latrine block, together with the hearth stone, F51, apparently opening to the west of F29, seem likely to represent Dissolution period features. Recent field names within the precinct, Loafner's Yard (meaning unknown) and Smithy Croft, may reflect earlier post-medieval industrial activity (Stuart 1984, 25), and a visiting antiquary, E. Arblaster, recorded cart houses and baking places amongst the surviving buildings on a visit in 1719 (Barns 1912, 144).

However, it seems clear that post-medieval activity occurred principally on the other side of the cloisters, where a house is shown in the south-west corner of the cloister in the early 18th century (Stuart 1984, 12), and where the name Bakers Yard on 19th-century maps suggests the location of the bakery seen by Arblaster (Lynam 1911, plan 1). Furthermore, there was little evidence of post-medieval artefacts from the excavations. The finding of the architectural fragments in the latrine block and the cloister alley to its north, the group from the latter perhaps its associated arcade, suggests little post-medieval disturbance. Although the finds of window glass from the same location did not derive from the dormitory undercroft, where the lights were shuttered and not glazed (Lynam 1911), the glass may have come from windows in the dormitory above. It seems probable, therefore, that the features uncovered between the latrine block and the infirmary can all be seen as belonging to the period of monastic use, although some activity clearly occurred soon after the Dissolution.

The nature of water management at Croxden was clarified by the excavations, with the discovery of stone-lined drains running from the north between Building 1 and the cloister, and then dividing to run along the south side of the latrine block and to the south east between Buildings 1 and 2. Another drain was recorded by Lynam to the east of the infirmary, and it was presumably associated with the infirmary kitchen. Lynam illustrated sections across the drains (1911, plate 69).

The water supply from the north indicates water overflowing from the mill and fishponds may have been diverted around the north of the church to flow southward into the outlets uncovered by excavation.

Work in progress on the standing structure and on the architectural fragments should establish a firm constructional sequence and date for the abbey buildings. The excavations reported on here have demonstrated the extensive nature of those buildings and services outside the core of cloister and church, underlining the scale of monastic buildings and the importance of later medieval development around detached households. They have also hinted that earlier buildings may have existed, but any establishment of a sequence would require further excavation below the latest medieval levels.

TABLE	Documentary Dating Evidence
1179–81	foundation and dedication
1242–68	completion of 13th-century church, chapter house, refectory, dormitory (and latrine block), kitchen, infirmary, precinct wall, gatehouse, chapel
1254	church dedication
1269–74	abbot's house next to dormitory
1274–84	precinct wall completed
1280–90	construction of west range
1332–4	east range reroofing and expansion
1335–6	abbot's new building
1374	cloister repairs
1467–1507	repairs to east range

REFERENCES

Baillie Reynolds, P. K. 1946 *Croxden Abbey* (Ministry of Works guidebook).

——— 1964 'Croxden abbey', *Archaeol. Journal,* **120**, 278.

Baker, J. 1960 *English stained glass.*

Barns, T. 1912 'Mr E. Arblaster's notebook, 1719', *Transactions of the North Staffordshire Field Club*, **46**, 144–8.

C[illegible]G 1835 Extracts from the annals of Croxden Abbey', *Collectanea Topographica et Genealogica*, ii, 290-310.

Coppack, G. 1990 *Abbeys and priories.*

Crummy, N. 1988 *The post-Roman small finds from excavations in Colchester 1971-85* (Colchester Archaeological Report 5).

Cunnington, C. W. and Cunnington, P. 1972 *Handbook of English costume in the 17th century.*

——— 1973 *Handbook of English medieval costume.*

Dugdale, W. 1846 *Monasticon Anglicanum, a history of the abbeys and other monasteries,* **5**.

Eames, E. A. 1980 *Catalogue of medieval lead-glazed earthenware tiles in the Department of medieval and later antiquities, British Museum.*

Egan, G. and Pritchard, F. 1991 *Medieval finds from excavations in London: 3, Dress accessories c. 1150–c. 1450.*

English Heritage 1991 *Exploring our past: strategies for the archaeology of England.*

Ford, D. A. 1995 'Medieval pottery in Staffordshire AD 800–1600, a review', *Staffordshire Archaeological Studies,* **7**.

Goodall, I. H. 1993 'Iron knives', in Margeson, S., *Norwich households: the medieval and post-medieval finds from Norwich survey excavations 1971–1978* (East Anglian Archaeology Report **58**), 124-133.

Hall, J. 1994 *Croxden Abbey, Staffordshire: assessment of loose architectural stone* (BUFAU report).

Hibbert, F. A. 1914 'The date of Croxden', *Transactions of the North Staffordshire Field Club*, **48**, 129–41.

——— 1918 'Croxden Abbey and Musden Grange', *Transactions of the North Staffordshire Field Club*, **52,** 41–51.

Hills, G. M. 1865 'Croxden abbey and its chronicle', *Journal of British Archaeological Association,* **21**, 294.

Hoey, L. 1993 'Croxden abbey', in Maddison, J. (ed), *Medieval archaeology and architecture at Lichfield* (BAA conference transactions, **15**), 36–49.

Kerr, J. 1990 'Later medieval window glass from Wolvesey Palace', in Biddle, M. (ed.), *Winchester Studies 7 ii, Artefacts from medieval Winchester – Object and economy in medieval Winchester,* 397–423.

Laurence, M. 1951-4 'Notes on the chronicle and other documents relating to St Mary's Abbey, Croxden, Staffs., Parts 1–4', *Transactions of the North Staffordshire Field Club*, **85–88,** B1–B90.

Lynam, C. 1911 *The abbey of St Mary, Croxden, Staffordshire.*

Moorhouse, S. 1971 'Finds from Basing House, Hampshire (*c.* 1540–1645): Part Two', *Post-Medieval Archaeology,* **5,** 35–76.

Mould, C., Ratkai, S., and Ferris, I. 1994 *Croxden Abbey, Staffordshire, a post-excavation assessment* (BUFAU report no. 291).

Oakley, G. E. 1979 'The copper alloy objects', in Williams, J., *St. Peter's Street Northampton, excavations 1973-1976* (Northampton Archaeological Monograph, **2**), 149–52.

O'Connor, D. E. and Haselock, J. 1977 'The stained and painted glass', in Aylmer, G. and Cant, R. (eds), *A History of York Minster,* 313–93.

Pounds, N. J. G. 1990 *The medieval castle in England and Wales*.

Salzman, L. F. 1967 *Building in England down to 1540*.

Ratkai, S. forthcoming a 'The pottery', in Darlington, J. (ed.), *Excavations at Stafford Castle.*

Ratkai, S. forthcoming b 'The pottery', in Woodfield, C., *Excavations at Whitefriars, Coventry*.

Stuart, L. (ed.) 1984 *Croxden, Staffordshire, a history of the parish* (Department of Adult Education, University of Keele).

VCH 1970 *Victoria County History of Staffordshire,* **3.**

Wagstaff, J. M. 1970 'The economy of Dieulacres Abbey, 1214–1539', *North Staffs. Journal of Field Studies*, **10**, 83–102.

Wardle, G. Y. 1895 'The gate-house chapel, Croxden abbey, Staffordshire', *Archaeologia*, **49**, 434–8.

Webster, L. E. and Cherry, J. 1978 'Medieval Britain in 1977', *Medieval Archaeology*, **22**.

Wilson, D. M. and Hurst, J. G. 1958 'Medieval Britain in 1956', *Medieval Archaeology*, **1**.

——— 1959 'Medieval Britain in 1957', *Medieval Archaeology,* **2**.

Woodfield, C. 1981 'Finds from the Free Grammar School at Whitefriars, Coventry, *c.* 1545–*c.* 1567/8', *Post-Medieval Archaeology*, **15**, 81–159.

The Society acknowledges a grant from English Heritage towards the cost of publishing this article.

STAFFORDSHIRE ARCHAEOLOGICAL AND HISTORICAL SOCIETY

OFFICERS AND COMMITTEES
1994–1995

President: J. G. L. COLE, M.B., F.R.C.R.

Vice-Presidents:
C. W. BRIDGEMAN
A. A. ROUND, B.Sc., F.S.A.
COUNCILLOR A. G. WARD, C.B.E., J.P.

Hon. Secretaries:
STEVEN CAMPBELL-KELLY (general and minutes)
Mrs. BETTY FOX (membership)
MRS. MARGARET BROWNE (newsletter)

Hon. Meetings Secretary:
C. WARDLE, B.A.

Hon. Treasurer: KEITH BILLINGTON, 32 Birchwood Road, Parkside, Lichfield WS14 9UW

Hon. Editor of Transactions: N. J. TRINGHAM, B.A., M.Litt., Ph.D.,
V.C.H. Staffordshire, William Salt Library, Eastgate Street, Stafford ST16 2LZ

Committee:
Mrs. DIANA WILKES
Mrs. NANCY BALL
F. BALL
R. A. MEESON, M.A., F.S.A.
N. R. NICOLL
MRS. J. WILSON

Editorial Committee:
KEITH BILLINGTON
J. G. L. COLE
R. A. MEESON
N. J. TRINGHAM
Mrs. DIANA WILKES

Hon. Auditor:
M. S. HORTON

PROGRAMME

1994

14 Oct.	Annual General Meeting Excavations at Wortley Villa – David Wilson
28 Oct.	Industrial archaeology of Ironbridge gorge – Kate Clark
18 Nov.	Archaeological monuments of the past – John Darlington
2 Dec.	Pre-historic and Romano-British settlements of the Upper Trent and Tame valleys – Carolym Hughes
16 Dec.	Country house brewing – Pam Sambrook

1995

27 Jan.	Coal mining on Cannock Chase – Chris Welch
10 Feb.	Medieval houses in the Midlands – Nat Alcock
24 Feb.	Roman Wroxeter – Esmonde Cleary
10 Mar.	Topography of medieval towns in Staffordshire – Terry Slater
24 Mar.	Archaeology in Dudley – Pete Rowland
7 Apr.	Samuel Johnson and his birthplace – L. Nicholls