

CPAT Report No 1138

Hindwell Double-palisaded Enclosure and Roman Vicus, Powys

ARCHAEOLOGICAL INVESTIGATIONS 2012



THE CLWYD-POWYS ARCHAEOLOGICAL TRUST

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ARCHAEOLOGICAL INVESTIGATIONS 2012

N W Jones

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Report for Cadw

The Clwyd-Powys Archaeological Trust

41 Broad Street, Welshpool, Powys, SY21 7RR

tel (01938) 553670, fax (01938) 552179

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Cover photo: excavations within the *vicus* (CPAT 3433-0127)

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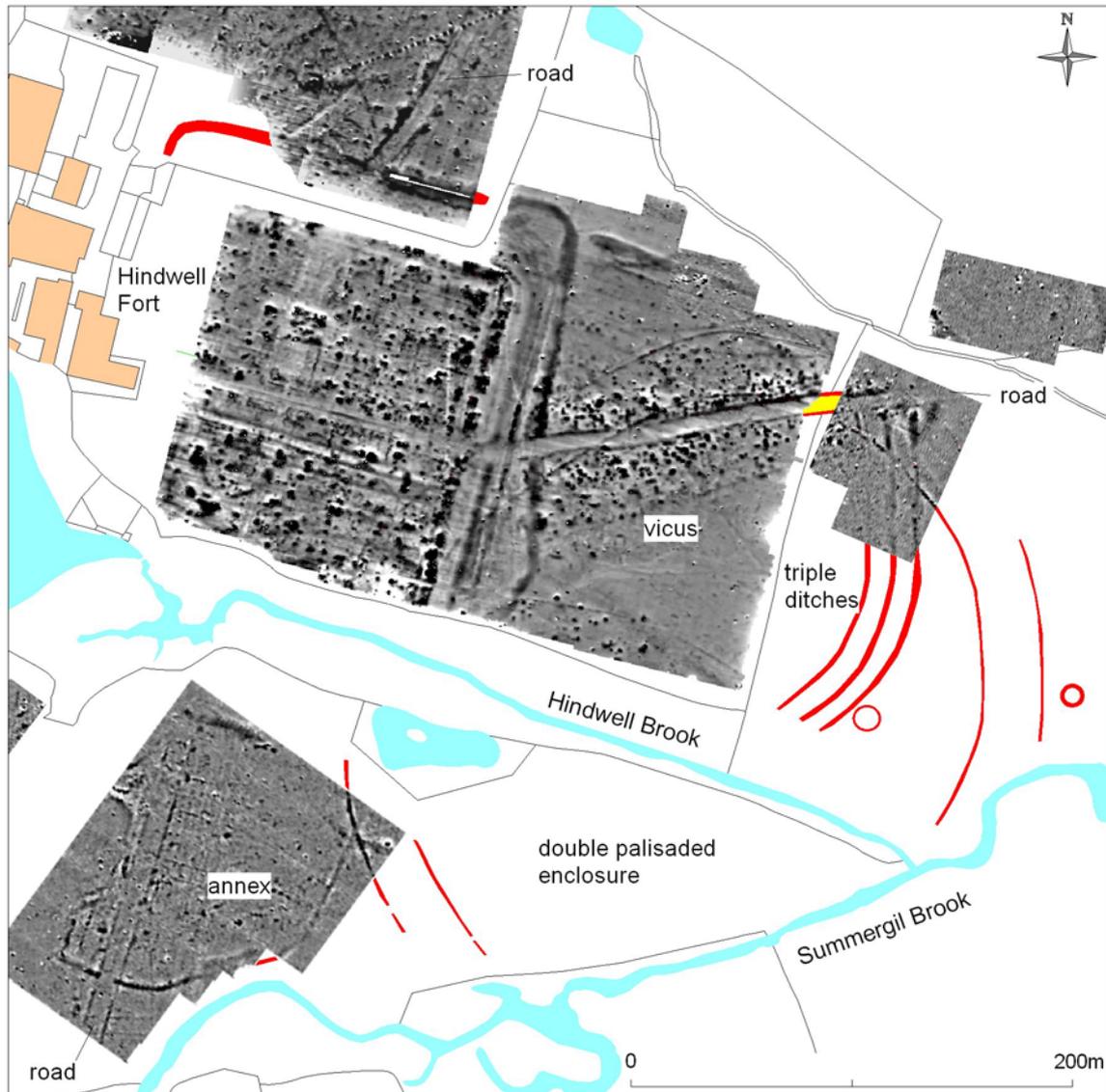
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APPENDIX 1: CHARRED PLANT REMAINS FROM EXCAVATIONS AT
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1 INTRODUCTION

- 1.1 The current project follows on from investigations conducted during 2010-11 in the environs of the Roman fort at Hindwell in Powys, and forms part of a wider study of Roman *vici* in mid Wales, undertaken with grant aid from Cadw.
- 1.2 The presence of a civilian settlement, or *vicus*, on the eastern side of the fort was first recognised through geophysical survey in 1998 (Gibson 1999), and was subject to further survey by the Clwyd-Powys Archaeological Trust (CPAT) in 2010. The combined results indicated a linear settlement flanking the road leading to the eastern gate of the fort and extending over an area of approximately 0.7ha.



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Fig. 1 The complex of monuments in the area of Hindwell Roman Fort

- 1.3 The geophysics, together with cropmark evidence visible on aerial photographs, also identified two sets of curving ditches to the east of the fort. One double-ditched circuit could be traced beneath the fort and this was investigated to the south of the fort in 2011 as part of a Cadw-funded project focusing on prehistoric funerary and ritual monuments. The results revealed that this was a Neolithic double-palisaded enclosure constructed of closely spaced oak timbers, about 0.25m across, set within a broader foundation trench. Charcoal

from one of the timbers has been dated to 2866–2574 cal. BC (SUERC-35386). To the east of the fort a system of triple, curving ditches, was viewed as defences most likely associated with the fort and *vicus*.

- 1.4 Given the complex and multiperiod nature of the archaeology to the east of the fort, the present project was designed to shed further light not just on the visus, but also on the double-palisaded enclosure and the triple ditch system.
- 1.5 Evidence for later Roman activity in the Hindwell area was generated by trial excavations in 2009 to investigate the Hindwell Cursus, which uncovered a series of Roman features immediately to the south of Four Stones Farm, around 1km to the west of Hindwell Roman fort. The pottery evidence indicates activity dating to the late 3rd to 4th century, with other finds including part of a rotary quern. A report on the charred plant remains was produced by Astrid Caseldine and Catherine Barrow and has been included in Appendix 1 of this report as an interim statement, prior to publication.

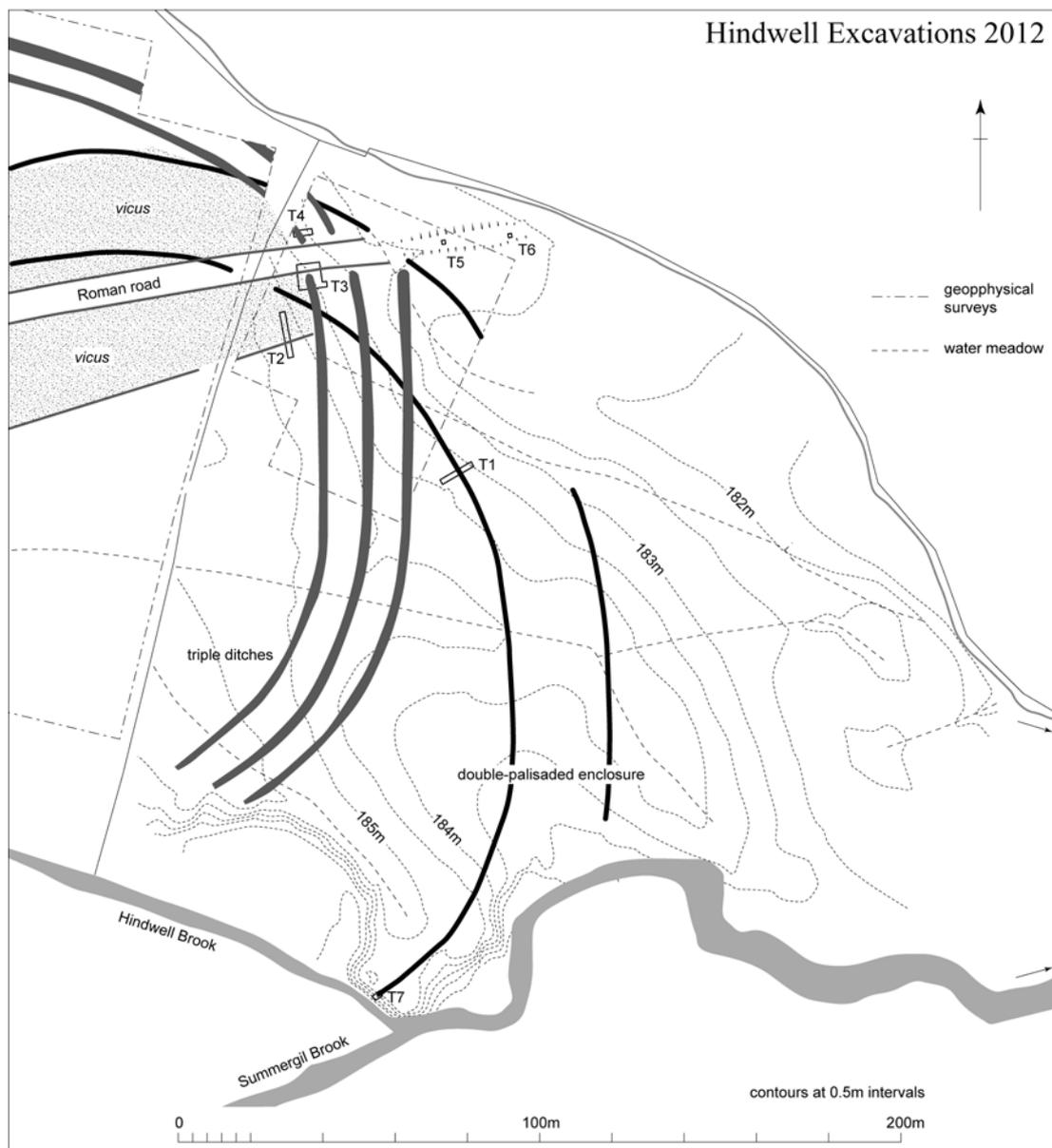


Fig. 2 The area east of Hindwell Roman fort showing the known archaeology, plotted from cropmark evidence and geophysical surveys, together with the position of the excavation trenches

- 1.6 The multi-period activity at Hindwell was enhanced during the excavations when a number of linear earthworks were noted in the two fields to the east of the fort and were identified by John Goodwin as elements of a water meadow. The majority of these were included within a topographical survey presented in Fig 2. Water was drawn from the Hindwell Pool and taken by a leat that cuts across the south-east corner of the fort to feed a system of smaller water channels, some of which were carried across lower ground on embankments.

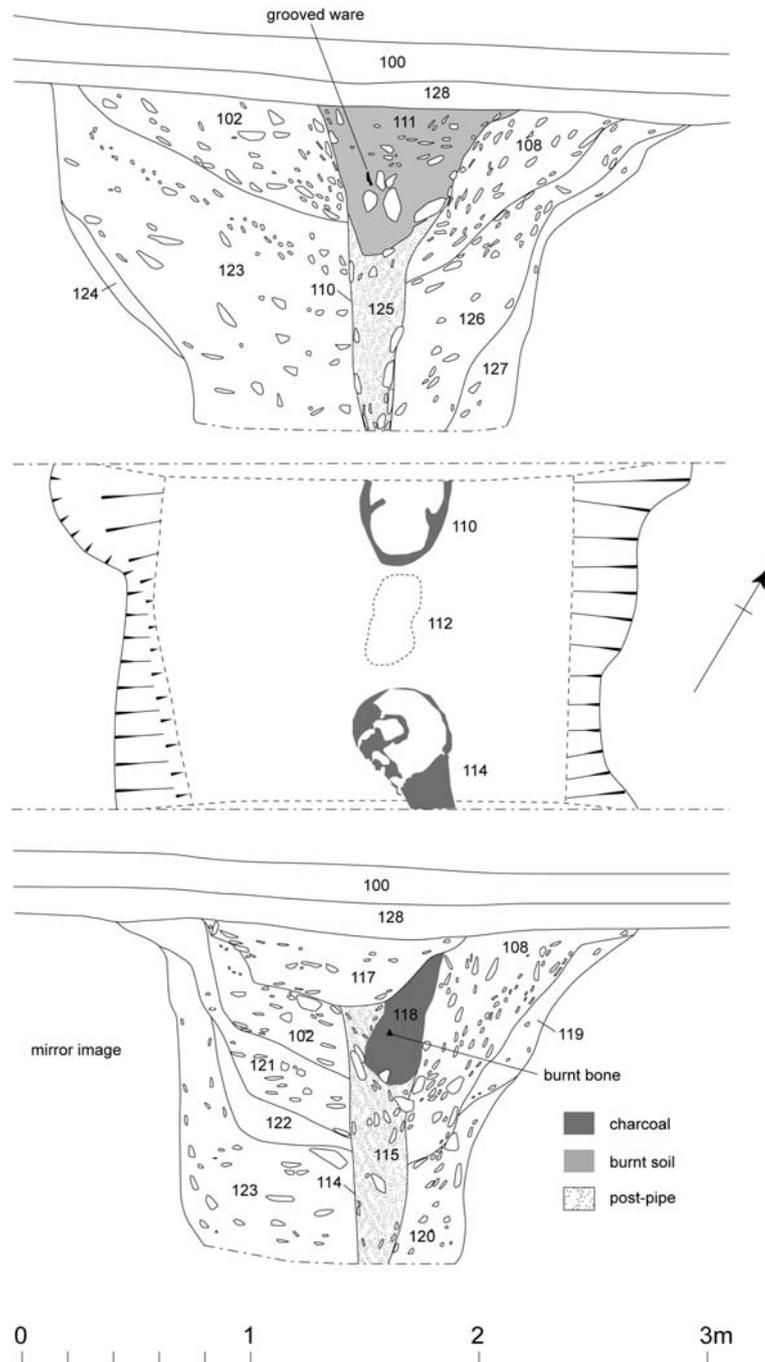


Fig. 3 Trench 1 investigating the inner palisade of the Hindwell double-palisaded enclosure. The plan shows the excavation at an early stage with posts 110 and 114 defined by the charring of the outer surfaces

2 EXCAVATIONS

2.1.1 The excavations conducted in late February and early March 2012 comprised four machine-excavated trenches, together with three small areas of hand-excitation (Fig. 2). A full drawn, photographic and written record was maintained throughout the excavation, and numbers in brackets in the following text refer to individual contexts recorded in the site archive, which has been deposited with the regional Historic Environment Record, maintained by CPAT in Welshpool.

The double-palisaded enclosure (Fig. 3)

2.1.2 The enclosure was investigated by two trenches (trench 1 and 7), both of which examined the inner palisade. Trench 1 was excavated by machine, removing the topsoil onto the surface of the natural gravels to reveal the palisade trench (101). This was excavated to a depth of 1.45m before reaching the watertable, at which point work had to be abandoned.

2.1.3 The palisade trench was steep-sided, between 2.1m and 2.8m in width, and both the inner and outer edges were scalloped, suggesting that it may have been dug as a series of interconnecting pits without post-ramps, rather than as a continuous trench. The removal of the uppermost fill exposed several areas of *in situ* burning, together with concentrations of charcoal which indicated the positions of a number of large posts (Fig. 4). It was notable that the burning was concentrated on the outer edge of the posts, against which the gravelly fill showed areas of significant fire-reddening, while the fill against the inner side of the posts was unaffected.

2.1.4 The individual posts were between 0.35 and 0.4m in diameter with charring affecting only the uppermost 0.6m, beneath which the post pipes were preserved as areas of gravelly silt surrounded by the more compacted gravels that formed the general backfill of the palisade trench. Two of the posts (110 and 114) were defined clearly by the charring of their outer surfaces, both extending into the sections on either side of the excavation (see Figs 3, 5 and 6). Both had well-defined weathering cones, indicating that they had decayed *in situ*. The intervening posts were less clear and, although charring was evident in places, the apparently more or less contiguous nature of the posts made it difficult to distinguish them individually. The evidence, however, suggests that perhaps a further two were present within the excavated area, one of which was contiguous with post 114 and, in plan at least, could not be separated from it.

2.1.5 A single, large sherd of Grooved Ware was recovered from the fill of the weathering cone for post 110. The sherd was positioned on edge, suggesting that it may have been placed deliberately against the post. Fragments of burnt bone were recovered from a similar position in the weathering cone for post 114.

2.1.6 There was a significant difference between the fills of the palisade trench on the inner and outer sides of the posts, suggesting that they may have formed a more or less continuous barrier. The fills on the outer side displayed prominent tip lines, with many of the flatter stones lying at a steep angle and some being near vertical against the outside of the posts. On the inner side, however, the fills were more mixed with little indication of tip lines.

2.1.7 The evidence suggests, therefore, that a succession of intercutting pits were dug to receive the posts which must have been held in place while the trench was rapidly infilled from the outside, followed by the dumping of the remaining material on the inside. The clear separation of the fills may indicate that the spoil from the trench was placed entirely on the outer side, possibly leaving the inner side clear for erecting the posts. There is also the possibility that the spoil was recycled from one pit to infill its neighbour.



Fig. 4 The partly excavated trench for the inner palisade showing the intense localised burning of the fill and the charred outer edges of perhaps four contiguous posts.
Photo CPAT 3433-0047

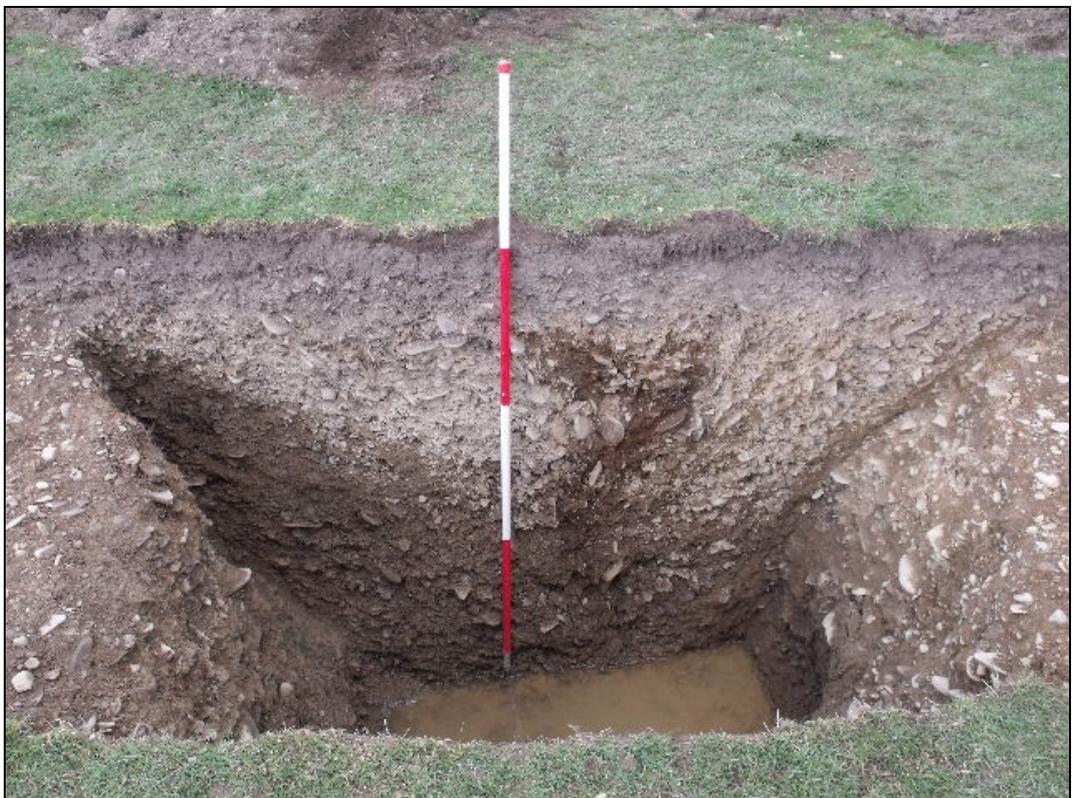


Fig. 5 The east-south-east-facing section of the inner palisade showing the weathering cone and post-pipe for post 110. Photo CPAT 3433-0112



Fig. 6 The east-south-east-facing section of the inner palisade showing the weathering cone and post-pipe for post 114. Photo CPAT 3433-0113

- 2.1.8 The inner palisade was also investigated by hand at the point where it had been truncated by the canalised section of the Hindwell brook adjacent to its confluence with the Summergil Brook (trench 7). Cleaning of the upper part of the river bank, which at this point was around 2.4m in height, revealed a partial section of the palisade trench. Unfortunately, only the inner edge of the trench was accessible owing to the presence of a large hawthorn tree (Fig. 7).
- 2.1.9 Limited excavation indicated that the trench appeared to be relatively straight-sided in its upper part, narrowing to a slot lower down, in the base of which a hollow suggested the position of a possible post. A postpipe containing some charcoal was tentatively identified in section and a single burnt flint was recovered from the base of the post-setting. Overall, the trench is likely to have been around 1.8m in depth.



Fig. 7 The partial section of the inner palisade trench adjacent to the Hindwell Brook. Photo CPAT 3433-0061

Hindwell Roman road and vicus

- 2.2.1 Trench 2 was positioned to investigate the *vicus*, examining the nature and preservation of deposits within the settlement and the presumed boundary ditch along the southern side. A second trench (trench 3) examined the relationship between the Roman road and the westernmost of the triple ditches, while a third trench (trench 4) was placed to confirm the continuation of the ditch system to the north of the road. The Roman road was investigated by two small test pits (trenches 5 and 6) to determine its state of preservation.

The Roman road

- 2.3.1 The Roman road survives as an upstanding earthwork to the north-east of the excavations, rising to perhaps 0.2m high, with a width of around 7.8m. Test pits (trenches 5 and 6) in this area revealed surviving metallurgy at depths of between 0.26-0.37m, indicating that the visible earthwork is not composed entirely of *in situ* road material.
- 2.3.2 Within the area of the main excavation (trench 3; Fig. 8) the Roman road was defined solely by its southern flanking ditch, with no surviving metallurgy or foundation. The ditch (302) was investigated in two places, one of which lay adjacent to the butt-end of the innermost of the triple ditches (306), which lay only 80mm from the edge of the roadside ditch. At this point the roadside ditch was around 0.75m wide and 0.65m deep, with sloping sides and a rounded base. A second section across the ditch, placed only 1m to the west, indicated that it may have been around 0.9m deep, however, although the excavated evidence does not present an obvious explanation for this discrepancy. A parallel, but much slighter gully (315), around 0.4m to the north, may also be associated with the road.

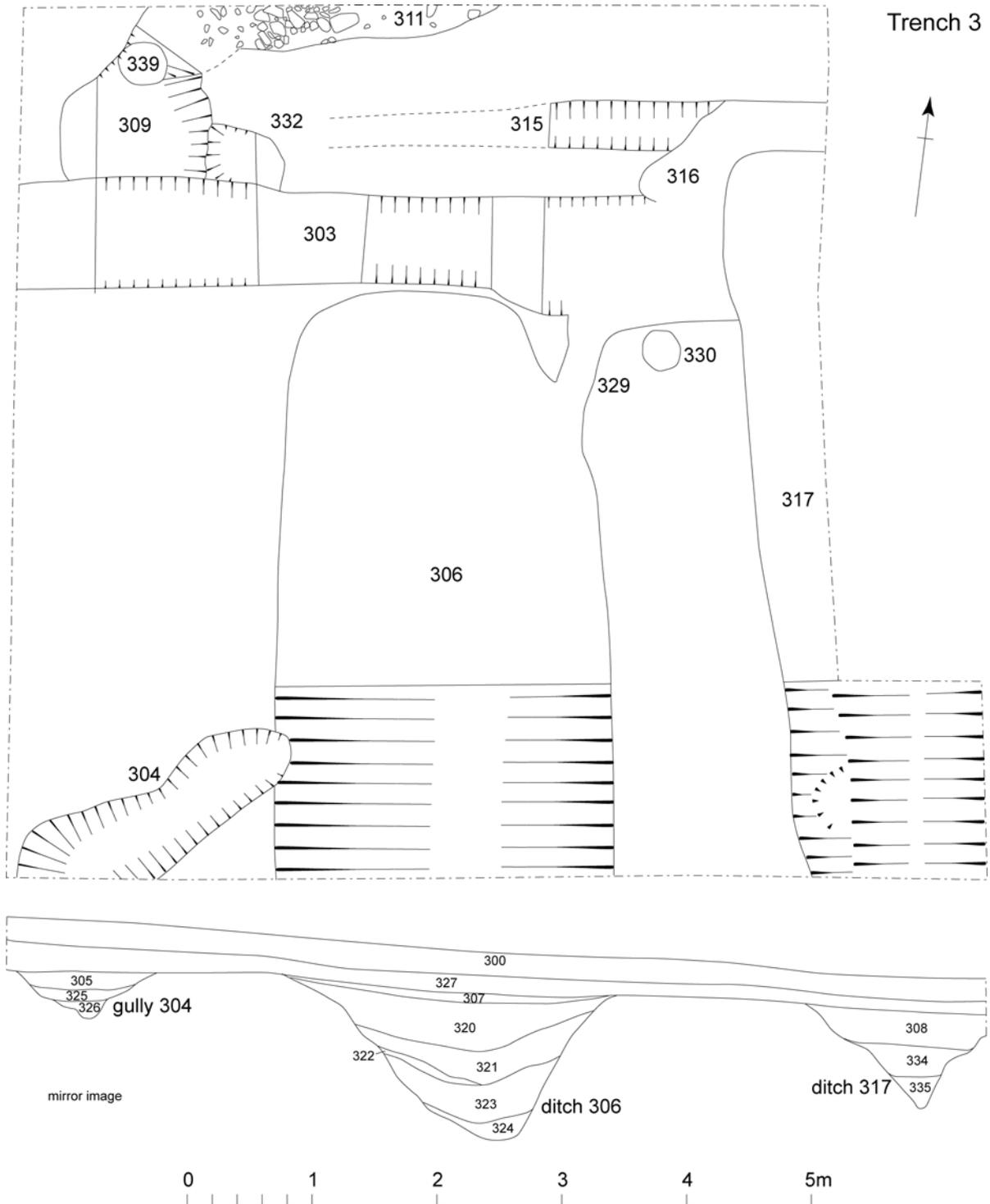


Fig. 8 Plan and section of trench 3, investigating the southern side of the Roman road and the innermost of the triple ditches

2.3.3 Several pits or post-holes were also identified along the side of the road, including one in the north-west corner of the excavation (309) which had been cut by the roadside ditch (302). This measured around 1.05m across and at least 0.45m in depth and was thought at the time to have been cut by a small post-hole (339) on its northern edge, although it is

possible that this feature was actually a post-pipe around 0.4m in diameter. A re-examination of the geophysical survey has identified several other possible post-holes on either side of the road, including this example, which might be associated with a gated entrance. Post-hole 309 had been cut through an earlier pit (332), which was at least 0.65m across and 0.27m deep, while an adjacent gully (311) to the north contained a significant quantity of stone.



Fig. 9 Excavations in trench 3 with the innermost of the triple ditches (306) in the foreground showing the butt-end with the roadside ditch (302) beyond.

Photo CPAT 3433-0140

The Triple Ditches

- 2.4.1 The westernmost of the triple ditches was investigated in trenches 4 and 5, the former providing a full section of the ditch, which was around 2.65m wide and 1.2m deep with a somewhat punnic profile, the outer, eastern side being steeper than the west, although the base was more rounded than V-shaped and lacked any basal slot (Figs 8-9). The sequence of fills provided no clear indication for the position of an accompanying bank, although this would normally be assumed to have been internal. The ditch produced a significant quantity of pottery, including the rim and body of a Gallo-Belgic butt-beaker with cordon and rouletted decoration of likely Neronian, or early Favian date. The geophysical survey had suggested that the triple ditch system might continue on the opposite side of the Roman road and this was confirmed in trench 4, where a continuation of the inner ditch (402) was identified, running at a pronounced angle to the road. The upper fill (402), which contained some smithing waste, was partly sealed by a stony deposit (406) which may have been derived from the road surface as a result of ploughing (Fig. 10).
- 2.4.2 A short length of gully (328) on the eastern side of the butt-end of ditch 306 remained unexcavated, although it appeared to be associated with both the large ditch and roadside ditch 302. A shallow gully (304) on the western side of ditch 306 was also originally

assumed to be an associated drain, although excavation demonstrated that the base sloped in the opposite direction. The upper fill (305) contained numerous sherds from the same redware vessel.

- 2.4.3 A second, smaller ditch (317) was identified running parallel to ditch 306 at a distance of 1.3m further east. Although this extended beyond the limits of the excavation, a sondage revealed that the width was at least 1.5m, while the depth was around 0.8m. At its northern end the ditch appeared to be butt-ended at approximately the southern edge of gully 315 and potentially cut roadside ditch 302. Two possible postholes (316 and 330) were identified along the western side of the ditch, although both remained unexcavated.

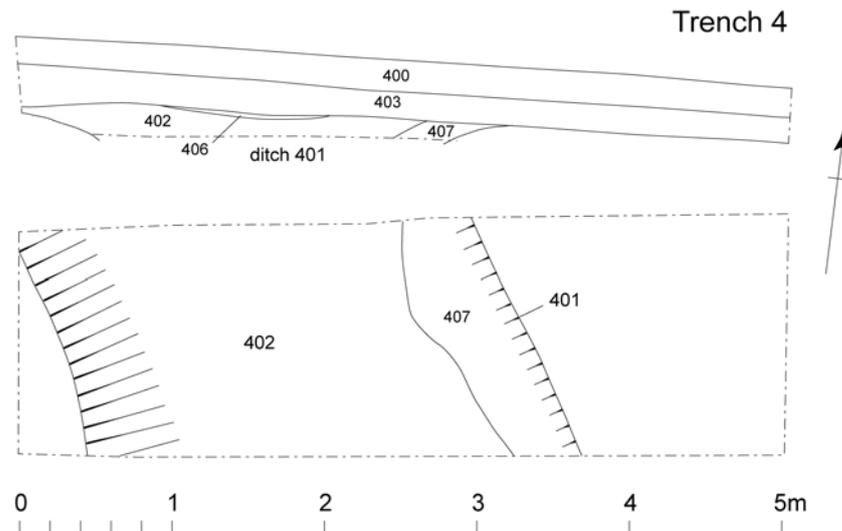


Fig. 10 Plan and section of trench 4 investigating the innermost of the triple ditches to the north of the Roman road

The vicus

- 2.5.1 Evidence from the three excavation trenches suggests that while the archaeology of the *vicus* is relatively well preserved, most features only survive below the surface of the undisturbed subsoil with no indication of occupation deposits. There were several areas, however, where deposits containing Roman cultural material survived below the topsoil, sealing a number of features and having presumably accumulated following the abandonment of the *vicus*. This was evidenced towards the northern end of trench 2 (context 209) and in particular across trench 4 (context 403).
- 2.5.2 The southern boundary of the *vicus* appears to be defined by a linear ditch which was investigated in trench 2. The ditch (201) was between 0.9 and 1.2m in width and up to 0.4m wide with a pronounced V-shaped profile. The fill (202), a yellow-brown clay silt, contained several sherds of Roman pottery, none of which was particularly diagnostic.
- 2.5.3 Three pits were identified within the area of the *vicus*, presumably associated with structures flanking the southern side of the Roman road. The largest pit (203) was at least 1.75m across and 1.4m deep (Figs 11-12) and could be identified clearly in the results from the geophysical survey. The pit appeared to have been dug for the disposal of rubbish and perhaps also as a latrine pit. The sides were almost vertical and in some places were significantly undercut in a manner which suggested that periodically there may have been standing water within the pit during its use. Significant quantities of pottery were recovered from a number of fills within the pit, including Samian, amphorae, and Severn Valley ware. Several of the deposits, notably contexts 214, 215 and 216, contained lumps of smithing waste and numerous fragments of charcoal and bulk samples were retained for

palaeoenvironmental analysis. Two smaller pits (207 and 210) lay adjacent to pit 203, although neither had any obvious function.



Fig. 11 The southern side of the vicus with the large rubbish pit (203) in the foreground and the boundary ditch (201) beyond. Photo CPAT 3443-0127

- 2.5.4 A fairly slight, curving gully (205), around 0.18m across and 0.12m deep, lay between the large rubbish pit (203) and the boundary ditch (201), the arc of which fitted a circle around 10.5m in diameter. No cultural material was forthcoming, although fragments of charcoal were recovered which have the potential for providing a radiocarbon date. It is possible that this feature may be associated with the double-palisaded enclosure rather than the *vicus*.

Trench 2

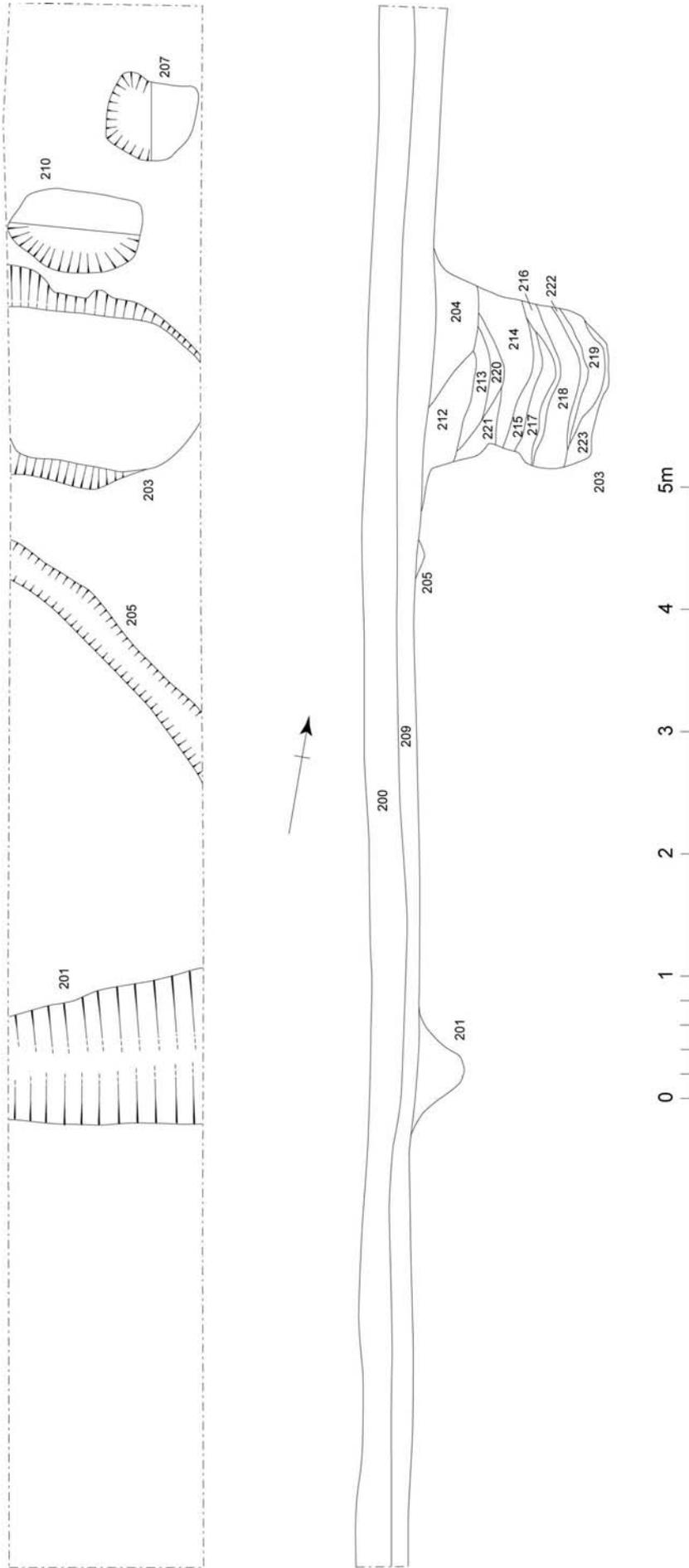


Fig. 12 Plan and section of trench 2 investigating the southern side of the vicus

3 FINDS

- 3.1 The excavations produced single sherd of Grooved Ware and two flints from the double-palisaded enclosure and a range of Roman pottery from the area of the *vicus*, together with some ironwork and copper alloy. All await specialist identification and reporting, although preliminary identifications have provided some useful information.

Coins, identified by Mark Walters

- 3.2 Two copper alloy coins were recovered, one of which, from the fill of rubbish pit 203, has yet to be identified. The other is a republican denarius dating from the 1st to late 2nd century BC, which came from the fill (context 307) of the innermost of the triple ditches (306). The obverse may depict the head of Roma to the right, while the reverse has a horseman with a quadriga.

Roman pottery, identified by Wendy Owen

- 3.3 A reasonable quantity of pottery was recovered from a series of pits, gullies and ditches, although the majority lacks any diagnostic features. Several features were notable, however, including a complete lack of Black-burnished ware and mortaria, and an absence of any obviously late pottery. Severn Valley ware and similar redwares predominate, while other forms include Samian, Malvernian-type tubby cooking pots, Dressel 20 amphorae and flagons.
- 3.4 Of particular note is a Gallo-Belgic butt-beaker from the fill of ditch 306 (context 324). This is of classic form, made either in Gaul or eastern Britain, and probably pre- or early Flavian, perhaps more likely to be associated with the Neronian than the Flavian advance (P Webster pers comm.).

Metallurgical residues, identified by Mark Walters

- 3.5 A small quantity of smithing waste was recovered from a number of contexts, principally fills of a large rubbish pit (203) and the upper fill of ditch 401. These included some plano-convex hearth bottom slags as well as some vitrified clay hearth lining.

4 DISCUSSION

Hindwell double-palisaded enclosure

- 4.1 The enclosure lies to the south-east of Hindwell Farm at around 185m OD, centred at SO 25976044. Its presence was first noted in 1998 when a geophysical survey was conducted by Dr Helmut Becker as part of the Walton Basin Project. This focused primarily on the Hindwell palisaded enclosure but also included the Hindwell Roman fort; and it revealed the partial circuit of a double-ditched enclosure, apparently lying in part beneath the fort and its eastern *vicus* (Gibson 1999, fig. 24; Gibson 2001, figs 8.1, 8.3). At the time it was thought to be associated with a set of triple ditches further to the east, but this was subsequently shown to be a separate feature following aerial reconnaissance by Toby Driver of RCAHMW in 2006 which located the eastern side of the enclosure, as well as identifying a short section between the Summerville and Hindwell Brooks (aerial photograph nos 2006-3706 to 3708). Further geophysical survey by CPAT in 2010 to the east and south of the fort provided additional evidence for the enclosure ditches (Hankinson 2011).
- 4.2 The combination of aerial photography and geophysical survey has so far identified at least 55% of the enclosure, which measures 300m by more than 250m across, with the two circuits 25m to 30m apart. A trial trench across the outer palisade in 2011 (Jones 2011a, 13–17) showed that this was formed by a series of intercutting pits up to 2.7m wide and over 0.8m deep, which had held closely spaced oak timbers, about 0.25m across. A re-examination of the evidence has recently concluded that the posts may have been burnt *in*

situ as an act of deliberate destruction. Charcoal from one of the timbers has been dated to 2866–2574 cal. BC (SUERC-35386). The upper fill of the weathering cone above the post-pipes contained several sherds of Roman pottery and a coin, indicating that the line of the palisade remained visible, albeit as a slight earthwork, into the Roman period.

- 4.3 The recent investigations have confirmed the position of the inner palisade on the eastern side, demonstrating in the process that it had been cut by the canalised section of the Hindwell Brook. Like the outer palisade, this was formed by intercutting pits up to 2.8m across and at least 1.45m deep below the natural gravel, which held close-set posts around 0.35-0.4m in diameter. The upper part of the posts had clearly been burnt *in situ*, causing intense reddening of the gravelly fill pack against the outer face of the posts, but not on the inner side. This suggests the deliberate destruction of the monument by fire, a feature which has been recorded at a number of palisaded enclosures elsewhere (Hale *et al.* 2009, 286).
- 4.4 There is currently no evidence for activity within the enclosure, although it is possible that the curving gully identified in trench 2 could be related to a circular structure associated with the enclosure. The gully only survived as a very slight feature and had presumably been truncated by ploughing, although the impression during excavation was that it may have been associated with a curving wall line, rather than having been a drainage feature. The projected diameter, at around 10.5m, invites comparisons with the circular stake-built structures at Upper Ninepence, 1.25km to the north-west, the diameters of which measured 6m, 8m and 12m. All were associated with Groove Ware and the smaller structure produced four radiocarbon dates clustering around 2700 cal. BC (Gibson 1999, 35-47). Interior structures have been identified within other palisaded enclosures, such as West Kennet II, where excavation and survey has identified three structures, each of which was composed of double, concentric rings of post-pits, the outer rings being 30-40m across and the inner 9-18m (Whittle 1997, 83-6).

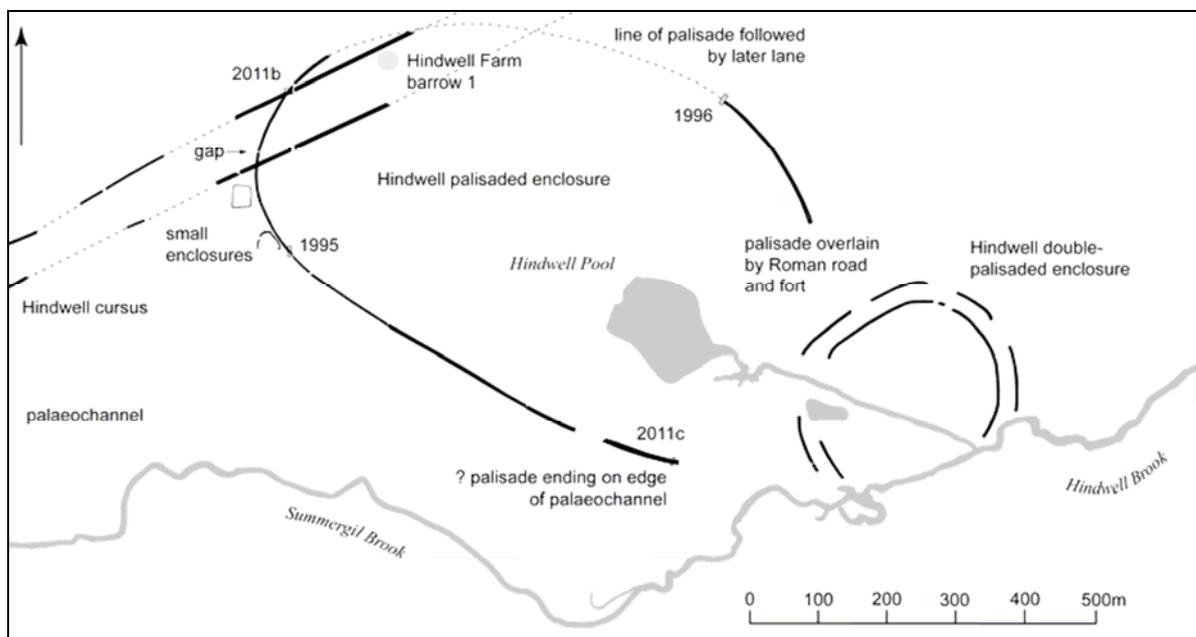


Fig. 13 Plan showing the relationship between the two palisaded enclosures at Hindwell and present day and former watercourses.

- 4.4 The enclosure at Hindwell may also have a relationship with the Summergeil Brook, for its southern extent as currently known stops just 10m to the north of the brook, with no evidence to suggest a continuation beyond the watercourse. Given the likely movement of

the brook over the last three millennia it is also possible that the southern side of the enclosure has been lost.

- 4.5 The position of the monument with respect to both the Hindwell and Summergil Brooks also raises an interesting question regarding its relationship with the larger Hindwell palisaded enclosure to the west (Fig. 13). As noted previously, the latter site appears to respect a large palaeochannel lying between the two brooks and does not continue to the east, into the area occupied by the double-circuit enclosure. Whether either of these channels was active during the Neolithic is perhaps questionable, but as landscape features they appear to have exerted some influence over the siting of both monuments.

The Roman fort and vicus

- 4.6 The fort is a relatively recent discovery, resulting from aerial reconnaissance by Professor J. K. St Joseph in 1973, which provided a context for the Roman pottery and other diagnostic material that had been identified during works at Hindwell Farm in 1956 and 1961. The fort earthworks were surveyed in 1998 and at the same time extensive magnetometry provided a detailed picture of both the fort and its *vicus*. There has not, however, been any major excavation on the site, although a small-scale investigation was conducted in 1976, and finds from the fort argue for its establishment in the Neronian period, between AD 55-65, with occupation probably extending into the Flavian period, beyond AD 80 (Silvester 2010).
- 4.7 Present knowledge suggests that the *vicus* is focused on the road leading from the east gate, with indications of buildings and ancillary activity spreading out for about 30m on either side of the road and defined, at least on the south side, by a narrow, V-shaped ditch. The *vicus* continues for about 160m beyond the fort defences, occupying an area of around 0.7ha. The recent limited excavations identified several pits within an area which may be presumed to lie behind roadside structures. A preliminary examination of the pottery indicates the presence of some earlier pottery, possibly of Neronian date, but an absence of later Roman material.
- 4.8 The eastward extent of the *vicus* appears to be bounded by a system of triple ditches which respect the Roman road. An investigation of the innermost ditch has shown it to be around 2.65m wide and 1.2m deep and although there was no evidence to suggest the position of an accompanying ditch it may be presumed to have been on the interior, given the generally punnic profile of the ditch. At present the only dating evidence is a probable Neronian Gallo-Belgic butt-beaker, perhaps indicating that the ditch system is associated with the fort itself, possibly as an outwork, rather than providing a deliberate defence for the *vicus*. In the light of the excavated evidence a re-examination of the geophysical survey results shows a number of possible post-holes along the edge of the Roman road, which include the excavated feature 309/339, and suggest a possible four- or six-posted gateway set inside the innermost ditch.
- 4.9 Finds made in the 1950s about 120m to the south of the fort included tile and hypocaust bricks, suggesting the presence of a bath-house close to the stream. This southern area was the subject of geophysical survey and small-scale investigation in 2010 which identified the road leading towards the southern gate of the fort, and also provided evidence for a southern annex to the fort, within which a number of linear features and pits were evident. There was, however, no suggestion of civilian activity in this area (Hankinson 2011).

5 ACKNOWLEDGEMENTS

- 5.1 The writer would like to thank the following colleagues at CPAT for their assistance during the project: Bill Britnell, Jenny Britnell, Ian Grant, Richard Hankinson and Sophie Watson. The preliminary identification of the finds has been conducted with the assistance of Wendy Owen and Mark Walters of CPAT, with additional information from Peter Webster.
- 5.2 The writer would particularly like to thank Mr J Goodwin, the landowner, for permission to carry out the survey and excavation.

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APPENDIX 1**CHARRED PLANT REMAINS FROM EXCAVATIONS AT FOUR STONES IN 2009****Astrid E. Caseldine and Catherine J. Griffiths**

In February 2009 trial excavations to investigate the Hindwell Cursus identified a series of Roman features immediately to the south of Four Stones Farm. The site lies around 1km to the west of Hindwell Roman fort, while one of several marching camps in the area is only 150m to the east and the projected line of the Roman road is around 170m to the north. What is interesting, however, is that all of the pottery indicates activity dating to the late 3rd – 4th century. It is probably also significant that much of the pottery was composed of relatively large sherds, suggesting that it had been deposited directly after breakage. This, together with the rotary quern, indicates an occupation site not too distant.

A small amount of charcoal was identified from a ditch containing Roman pottery and from a hearth to see if there was any evidence for a change in the nature of woodland in the area.

Methods

The charcoal from samples that were specifically taken as charcoal samples (1003, 1004 and 1007) was washed on a 250µm sieve. Other charcoal was recovered from the processed bulk samples. The charcoal was dried then fractured to produce clean sections in three dimensions (transverse, transverse longitudinal and radial longitudinal). A Leica DMR microscope with incident light source was used to examine the charcoal. Wood identification manuals (Schoch *et al* 2004, Schweingruber 1978) and reference material were consulted for identification purposes. Nomenclature follows Stace (1995). The identifications are given in Table 1.

Results and discussion*The Roman ditch and the hearth*

The assemblage from the Roman ditch (4) contained a range of species including oak, elm (*Ulmus* sp.), cherries/blackthorn (*Prunus* sp.) and gorse (*Ulex* sp.) and, with the other charred plant remains, suggests waste from a domestic fire and the use of what was readily available to hand. The sample differs markedly from those from the cursus ditch in the greater variety of species and the greater amount of oak, although the individual cursus samples were very small. Somewhat surprisingly hazel was also absent from the Roman ditch sample, whereas this was the only or the predominant species recorded in the cursus samples.

Charcoal from a small hearth (7), which consisted of a thin charcoal deposit (8) lining the base of a shallow scoop, also consisted of a higher proportion of oak and a greater mix of species than in the samples from the cursus, but the range differed to that from the Roman ditch. Again oak was present but the other taxa comprised hazel, alder and ash, suggesting the exploitation of different woodland from that recorded in the Roman ditch sample but once again that whatever was readily available was being used. However, the different representation of species in the hearth compared with the Roman ditch may be partly attributable to the small sample size or indicate a different date. The presence of a possible rye grain indicates a later date for this assemblage, possibly broadly contemporary with the Roman ditch or later.

A Romano-British hearth from Upper Ninepence (Johnson 1999) also produced a range of species including oak, blackthorn, cherry, gorse and quite a lot of hawthorn type. Hazel was present but only two fragments. The assemblages from both sites suggest wood for fuel was being gathered from scrub, open woodland, or even hedges.

Table 1 Charcoal identifications from the excavations at Four Stones.

Sample	1001	1002	Total
Context	8	4	
Feature	7	3	
<i>Ulmus</i> sp. (Elm)	-	1	1
<i>Quercus</i> spp. (Oak)	5	6	11
<i>Alnus glutinosa</i> (L) Gaertner (Alder)	1	-	1
<i>Corylus avellana</i> L. (Hazel)	6	-	6
<i>Prunus</i> spp. (Cherries/blackthorn)	-	2	2
<i>Ulex europaeus</i> L. (Gorse)	-	1	1
<i>Fraxinus excelsior</i> L. (Ash)	1	-	1
Total	13	10	23

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