Placed Deposits in Early and Middle Anglo-Saxon Rural Settlements

Thesis submitted for the degree of Doctor of Philosophy
School of Archaeology
University of Oxford

March 2012

Clifford Martin Sofield

Abstract

Placed deposits have received increasing attention over the past 30 years, particularly in prehistoric British archaeology. Although disagreement still exists over the definition, identification, and interpretation of placed deposits, significant advances have been made in theoretical and methodological approaches to placed deposits, as researchers have gradually moved away from relatively crude 'ritual' interpretations toward more nuanced considerations of how placed deposits may have related to daily lives, social networks, and settlement structure, as well as worldview. With the exception of comments on specific deposits and a recent preliminary survey, however, Anglo-Saxon placed deposits have remained largely unstudied.

This thesis represents the first systematic attempt to identify, characterize, analyse and interpret placed deposits in early to middle Anglo-Saxon settlements (5^{th}–9^{th} centuries). It begins by disentangling the various definitions of 'placed', 'structured', and 'special' deposits and their associated assumptions. Using formation process theory as a basis, it develops a definition of placed deposits as material that has been specially selected, treated, and/or arranged, in contrast with material from similar or surrounding contexts. This definition was applied to develop contextually specific criteria for identifying placed deposits in Anglo-Saxon settlements.

Examination of 141 settlements identified a total of 151 placed deposits from 67 settlements. These placed deposits were characterized and analysed for patterns in terms of material composition, context type, location within the settlement, and timing of deposition relative to the use-life of their contexts. Broader geographical and chronological trends have also been considered. In discussing these patterns, anthropological theories of action, agency, practice, and ritualization have been employed in order to begin to understand the roles placed deposits may have had in structuring space and time and expressing social identities in Anglo-Saxon settlements, and to consider how placed deposition may have articulated with Anglo-Saxon worldview and belief systems.

Acknowledgements

It is with sincere gratitude that I would like to single out a few of the many people without whose help I could not have completed this thesis. First and foremost I would like to thank my supervisor, Professor Helena Hamerow, who has responded quickly to every request, written references at short notice, and tirelessly read multiple drafts and reworkings. I hope this thesis exhibits a small degree of the precision and insight so characteristic of her scholarship. A significant debt of gratitude is also due to Dr Geoff Nicholls for multiple tutorials on correspondence analysis, the Monte Carlo method, and the R programming language, and for feedback on relevant sections of the thesis. Thanks go to the many colleagues who drew my attention to possible placed deposits, including Professor John Blair, Rebecca Boyd, Dr Chris Ferguson, Alex Knox, and Professor Andrew Reynolds; and to those who responded to enquiries about specific deposits: Mark Atkinson of Essex County Council Field Archaeology Unit; Alan Hardy; Leo O'Brien; Granville Laws and Dan Stansbie of Oxford Archaeology; Dr Gabor Thomas of Reading University; and Lorraine Mepham of Wessex Archaeology. Dr Kristopher Poole kindly let me read his unpublished doctoral thesis. David Baker at Oxford University Computing Services alerted me to the Excel macro needed to make Figure 5.6. Special thanks are due to Wendy Morrison, who helped me learn to use mapping software, and more importantly has been a valued colleague and friend through years of presentations, excavations, and consultations over coffee or a pint. I am grateful to the Clarendon Fund and The Queen's College, Oxford, for funding this project's first and final years, respectively, and to St Cross College, Oxford, which also supported my work. I am especially grateful to St Peter's College, Oxford, where I wrote the bulk of this thesis

while serving as junior dean. I wish to offer heartfelt thanks and a firm handshake to my most constant benefactors, Uncle Cliff and Anne, for their generosity throughout my undergraduate and graduate studies. While not exactly facilitating my work, the Wolfson College Boat Club, especially the men's first eight, has given me lasting friendships and many victories. On a deeply personal note, I would like to thank Stephanie for providing me every kind of emotional and intellectual support—when I was humble enough to accept it!—from before my first thoughts about placed deposits straight through the final hours. Finally, I would like to say thank you to my mother and father, who have never intruded, but have nevertheless stood right behind me every step of my academic career, even with an ocean between us. This thesis is dedicated to them, with my love.

Contents

Abstract iii

Acknowledgements iv

Contents vi

Chapter 1 'The remains of a fairly bizarre party': the legacy of previous research on placed deposits 1

1.1 Introduction and objectives 1

1.2 What are placed deposits? 10

1.2.1 'Structured' or 'formal' deposits 11

1.2.2 'Special', 'exceptional' or 'odd' deposits 13

1.2.3 'Placed', 'positioned', or 'arranged' deposits 17

1.2.4 Summary 19

1.3 Previous work on placed deposits in Anglo-Saxon contexts 19

Chapter 2 Placed deposition as a formation process 25

2.1 Removal and deposition 25

2.2 Structured deposition 28

2.3 Placed deposition 30

2.4 Summary 32

Chapter 3 Identifying placed deposits in Anglo-Saxon settlements 35

3.1 Characteristics of Anglo-Saxon settlements 36

3.1.1 The material comprising the assemblage 36

3.1.2 The contexts in which the material is found 37

3.2 Formation of the settlement assemblage 38
3.2.1 Loss, casual discard, and abandonment (passive deposition) 38
3.2.2 Deliberate discard (active removal and active deposition) 40
3.3 Material that has been specially selected, treated and/or arranged 41
3.4 Summary 44

Chapter 4 Data collection and methodology 46

4.1 Data collection 46
4.1.1 Selection of settlements for examination 46
4.1.2 Identification of placed deposits 50
4.2 Data analysis 52
4.2.1 Introduction 52
4.2.2 Pearson's chi-squared test 54
4.2.3 Correspondence analysis 56
4.3 Strategy and conventions 60

Chapter 5 The piglets and the pot: patterns of composition and context 62

5.1 The contents of placed deposits 63
5.1.1 Object types 63
5.1.2 Species 66
5.2 Contexts containing placed deposits 67
5.3 The relationship of composition to context 68
5.3.1 Object types and contexts 69
5.3.2 Species and contexts 71
5.4 Patterns in composition 72
5.4.1 Species and degree of articulation 72
5.4.2 Associations between object types 74
5.4.3 Associations between species 75
5.5 Neonates and juveniles 77
5.6 Discussion 78
5.6.1 Butchery waste 79
5.6.2 Distinctions among animal species 81

5.6.3 Animal (and human) skulls *85*
5.6.4 Neonates *87*
5.6.5 Non-skeletal remains *88*

5.7 Conclusion 88

Chapter 6 The spatial distribution of placed deposits in settlements 90

6.1 Types of associated features 91
6.1.1 Definitions *91*
6.1.2 Data and analysis. *93*

6.2 Elements of associated features 96
6.2.1 Definitions *96*
6.2.2 Data and analysis *97*

6.3 Discussion 102
6.3.1 Boundaries and entrances: 'liminal' places *102*
6.3.2 Boundaries in Anglo-Saxon settlements *105*
6.3.3 Placed deposits at contemporary boundaries and entrances *106*
6.3.4 Placed deposits at the close of boundaries *108*
6.3.5 Butchery waste and boundaries *111*
6.3.6 Non-skeletal object types: a change over time? *112*
6.3.7 Conclusion *112*

Chapter 7 Liminal times? Placed deposits made during the backfilling of SFBs and other features 115

7.1 SFBs 117

7.2 The formation of SFB fills: a critical review 119
7.2.1 General characteristics of SFBs and their fills *120*
7.2.2 Primary fills *121*
7.2.3 Lower secondary fills *122*
7.2.4 Upper secondary fills *126*
7.2.5 Conclusion *127*

7.3 Timing of placed deposits in SFBs with respect to the formation of the fill 128
7.3.1 Data *128*
7.3.2 Timing of deposition compared *129*
7.3.3 Summary *133*

7.4 Pits and other contexts 134
7.4.1 Pits 134
7.4.2 Other contexts 136

7.5 Discussion 138
7.5.1 Termination deposits associated with the destruction of SFBs 138
7.5.2 Termination deposits associated with the backfilling of SFBs and pits 142
7.5.3 Deposits in SFB compaction hollows 147
7.5.4 Termination deposits in other features 147
7.5.5 Other kinds of liminal times 148
7.5.6 Preservation 149

7.6 Conclusion 149

Chapter 8 Human remains in Anglo-Saxon settlement contexts 152

8.1 Definitions and categories 153
8.1.1 Definitions/Limits 153
8.1.2 Age and sex 154
8.1.3 Treatment of remains 155
8.1.4 Chronology 157

8.2 The data: an overview 158

8.3 Age and sex 160

8.4 Treatment 162
8.4.1 Deviant burials 164
8.4.2 Normative burials 165

8.5 Spatial patterns of burial 167
8.5.1 Associated features 167
8.5.2 Clusters and single burials 168
8.5.3 Burial treatment and geographical distribution 169

8.6 Burials in settlement contexts vs. in discrete cemeteries 170
8.6.1 Comparing treatment in burial contexts with nearby cemeteries 171
8.6.2 Comparing age and sex in burial contexts with nearby cemeteries 171
8.6.3 Comparing pathologies in burial contexts with nearby cemeteries 172
8.6.4 Summary 173

8.7 Discussion, part i: social identity of burials in settlement contexts 174
8.7.1 Chronology.....175
8.7.2 'Deviant' burials.....175
8.7.3 'Normative' inhumations 179
8.7.4 Infants.....181

8.8 Discussion, part ii: burials in settlement contexts as placed deposits 183
8.8.1 Infants.....184
8.8.2 Skulls and disarticulated human bone.....185
8.8.3 Complete inhumations.....186

8.9 Conclusion 189

Chapter 9 Placed deposition as action: structuring settlements and society..... 191

9.1 Placed deposition: ritual or action? 192
9.1.1 Placed deposition as 'ritual'.....192
9.1.2 Placed deposition as action 194
9.1.3 Placed deposition and 'ritualization'.....197
9.1.4 Summary.....199

9.2 Placed deposits and settlement structure 199
9.2.1 Boundaries and liminality.....200
9.2.2 Placed deposits in liminal contexts 203
9.2.3 Spatial and temporal structure: early Anglo-Saxon settlements.....206
9.2.4 Spatial and temporal structure: middle Anglo-Saxon settlements 213
9.2.5 Conclusion 216

9.3 Placed deposits and social structure 218
9.3.1 Children: home and family 219
9.3.2 Gendered deposits? 221
9.3.3 Conclusion 225

Chapter 10 Placed deposition: worldview and belief..... 227

10.1 Animals in placed deposits 228
10.1.1 'Reflexes of shamanism'.....228
10.1.2 Livestock.....230

10.1.3 Horses *231*
10.1.4 Cattle and horse skulls *234*
10.1.5 Dogs *235*
10.1.6 Wild animals *239*

10.2 Sacrifice, feasting, and placed deposition 241

10.3 Placed deposits and 'technologies of enchantment' 244
10.3.1 Smithing *246*
10.3.2 Weaving *248*
10.3.3 Grave AX at Yeavering *251*
10.3.4 Ditch 2513 at Wharram Percy *252*

10.4 Placed deposits at ritual structures in settlements 252
10.4.1 Ritual structures *253*
10.4.2 Placed deposits and ritual structures *256*

10.5 Conclusion 260

Conclusion Anglo-Saxon placed deposits in context 263

Appendix A Settlements 270

Appendix B Placed deposits 281

Appendix C Tables 326

Tab. 2.1: The binary processes of removal from the behavioural system and deposition into the archaeological record viewed together. *327*
Tab. 4.1: Signifiers of special selection, treatment, and arrangement *328*
Tab. 4.2: An example contingency table for object type and context type. *331*
Tab. 5.1: Species representation in the overall animal bone assemblage and in placed deposits. *332*
Tab. 5.2: Contingency table for object type and context type. *333*
Tab. 5.3: Contingency table for species and context type *334*
Tab. 5.4: Contingency table for degree of articulation and species. *335*
Tab. 5.5: Placed deposits containing both cattle and horse skulls *336*
Tab. 5.6: Contingency table for multiple object types in the same deposit. *337*
Tab. 5.7: Contingency table for multiple species in the same deposit. *338*
Tab. 5.8: Numbers and proportions of infants and juveniles in placed deposits, by degree of articulation, species, and context type *339*

Tab. 6.1: Contingency table for object types and types of associated features. *340*

Tab. 6.2: Contingency table for species and types of associated features. *341*

Tab. 6.3: Contingency table for types and elements of associated features. *342*

Tab. 6.4: Contingency table for object types and elements of associated features. *343*

Tab. 6.5: Contingency table for species and elements of associated features. *344*

Tab. 7.1: Placed deposits made in SFBs before, during, and after backfilling, and in all other context types except graves, by object type and species. *345*

Tab. 7.2: Placed deposits containing skulls, made in SFBs or as secondary deposits in pits, that have recorded stratigraphic levels. *346*

Tab. 8.1: Sex versus age for individuals buried in settlement contexts. *347*

Tab. 8.2: Sex versus age for individuals buried in early Anglo-Saxon settlement contexts. *348*

Tab. 8.3: Sex versus age for individuals buried in middle Anglo-Saxon settlement contexts. *348*

Tab. 8.4: Sex of human remains in placed deposits, by site. *349*

Tab. 8.5: Age, sex, and treatment of human remains buried in settlement contexts... *350*

Tab. 8.6: Burial treatment in the early and middle Anglo-Saxon periods compared.. *351*

Tab. 8.7: Frequency of deviant characteristics in burials in settlement contexts. *351*

Tab. 8.8: Age and sex of normative and deviant burials in the early and middle Anglo-Saxon periods. *352*

Tab. 8.9: Sex versus age for individuals in normative burials..... *353*

Tab. 8.10: Age and sex of individuals buried in settlement contexts, by associated feature type and element. *354*

Tab. 8.11: Treatment of human burials in settlement contexts, by associated feature type and element. *354*

Tab. 8.12: Frequency with which burials in settlement contexts occur singly and in groups..... *355*

Tab. 8.13: Sites with burials in settlement contexts and discrete cemeteries nearby.. *355*

Tab. 8.14: Sex versus age for individuals in Flixborough's settlement burials and associated cemetery. *356*

Tab. 8.15: Sex versus age for individuals in Yarnton's settlement burials and associated cemetery. *357*

Appendix D Figures..... 358

Fig. 1.1: Early Anglo-Saxon earthfast structures. *359*

Fig. 1.2: Early Anglo-Saxon SFBs. *360*

Fig. 1.3: The early Anglo-Saxon settlement at Mucking, Essex. *361*

Fig. 1.4: The early Anglo-Saxon settlement at West Stow, Suffolk. *362*

Fig. 1.5: Middle Anglo-Saxon earthfast structures. *363*

Fig. 1.6: Fenced enclosures at Cowdery's Down, Hants. *364*

Fig. 1.7: Minor enclosures at Yarnton, Oxon. *365*

Fig. 1.8: Major enclosure at Higham Ferrers, Northants. *366*

Fig. 1.9: Rectilinear settlement at Godmanchester, Cambs. *367*

Fig. 4.1: Map of settlements examined in this study. *368*

Fig. 4.2: Example biplot produced by correspondence analysis of Tab. 4.1. ..... *370*

Fig. 4.3: Example biplot produced by correspondence analysis of Tab. 4.1, excluding object type *e*. *370*

Fig. 5.1: Placed deposit at the base of SFB 1351 at Brooklands, Milton Keynes. *371*

Fig. 5.2: Object types in placed deposits *372*

Fig. 5.3: Geographical distribution of placed deposits by object type. *373*

Fig. 5.4: Species represented in placed deposits *374*

Fig. 5.5: Proportional representation of animal species in placed deposits and in the overall animal bone assemblage from Anglo-Saxon settlements *375*

Fig. 5.6: The proportion of placed deposits containing each animal species plotted against its proportion in the overall animal bone assemblage from Anglo-Saxon settlements. *376*

Fig. 5.7: Geographical distribution of placed deposits by species. *377*

Fig. 5.8: Contexts of placed deposits *378*

Fig. 5.9: Geographical distribution of placed deposits by context type. *379*

Fig. 5.10: Biplot produced by correspondence analysis of Tab. 5.2, showing correspondences between object types and context types. *380*

Fig. 5.11: Biplot produced by correspondence analysis of Tab. 5.3, showing correspondences between species and context types. *381*

Fig. 5.12: Biplot produced by correspondence analysis of Tab. 5.4, showing correspondences between species and degree of articulation *382*

Fig. 5.13: Biplot produced by correspondence analysis of Tab. 5.6, showing correspondences between object types found together in the same deposit *383*

Fig. 5.14: Biplot produced by correspondence analysis of Tab. 5.7, showing correspondences between species found together in the same placed deposit *384*

Fig. 6.1: Types of features associated with placed deposits. *385*

Fig. 6.2: Biplot produced by correspondence analysis of Tab. 6.1, showing correspondences between object types and types of associated features *386*

Fig. 6.3: Biplot produced by correspondence analysis of Tab. 6.2, showing correspondences between species and types of associated features *387*

Fig. 6.4: Elements of features associated with placed deposits. *388*

Fig. 6.5: Biplot produced by correspondence analysis of Tab. 6.3, showing correspondences between types and elements of associated features *389*

Fig. 6.6: Biplot produced by correspondence analysis of Tab. 6.3, showing correspondences between types and elements of associated features; but with entrances included and earthworks and SFBs excluded. *390*

Fig. 6.7: Biplot produced by correspondence analysis of Tab. 6.4, showing correspondences between object types and elements of associated features *391*

Fig. 6.8: Biplot produced by correspondence analysis of Tab. 6.5, showing correspondences between species and elements of associated features. *392*

Fig. 7.1: Section of experimental SFB at West Stow, Suffolk. *393*

Fig. 7.2: Section of SFB 49 at West Stow, Suffolk. *393*

Fig. 7.3: Biplot produced by correspondence analysis of Tab. 7.1, showing correspondences between object types and timing of deposition in SFBs. *394*

Fig. 7.4: Sections of pit 195 at Hartigans, Bucks., and the watering hole (House XXI) at Sutton Courtenay, Oxon. *395*

Fig. 7.5: Cattle skulls in pit 195 at Hartigans, Bucks. *396*

Fig. 7.6: Loomweights in posthole 2991 at Spong Hill, Norfolk. *397*

Fig. 7.7: Lines of loomweights at Grimstone End, Pakenham, Suffolk. *398*

Fig. 7.8: Lines of loomweights on the base of an SFB at Dover, Kent. *399*

Fig. 8.1: The age demographics of individuals buried in settlement contexts and in cemeteries. *400*

Fig. 8.2: The treatment of individuals buried in settlement contexts. *401*

Fig. 8.3: Geographical distribution of placed deposits by treatment of human remains, and of placed deposits containing infants. *402*

Fig. 9.1: Plan of the SFB at Car Dyke, Waterbeach, Cambs. *403*

Fig. 10.1: Cattle skulls in SFB 7395 at Cresswell Field, Yarnton, Oxon. *404*

References 405

Chapter 1
'The remains of a fairly bizarre party': the legacy of previous research on placed deposits

> *'We observe, placed on the floor of the ditch, a series of deposits that once again would appear to be, broadly speaking, of a ritual character. In some segments of the ditch a carefully placed series of deposits, possibly originally contained in leather bags, ran down the axis of the ditch, the deposits containing human bone, animal bone (mostly cattle), flint tools and pottery. It is almost as though the remains of a fairly bizarre party had been scooped up, put in a sack and placed in the ditch bottom when it had already been open for some time.'*
>
> *(Mercer 1988: 94–95)*

1.1 Introduction and objectives

The subject of this research is a controversial class of deposits, notoriously difficult to identify, define, and interpret. There is little consensus over what to call these deposits; in addition to 'placed', the terms 'structured', 'special', 'unusual', 'odd', 'ritual', and others have been proffered, each carrying a unique definition and set of identifying characteristics. Yet these types of deposits share certain common characteristics: they stand out in contrast to the surrounding material, they exhibit complex form or patterning, and they appear to have been deliberately deposited, often at entrances and boundaries. As the concept of placed deposits has taken intellectual root, examples have begun to crop up with increasing frequency, and recent studies of this class of deposits suggest that if archaeologists are willing to disentangle the inconsistencies, misapprehensions, and prejudices surrounding the identification and interpretation of placed deposits, they stand to reap considerable rewards.

Since the 1980s, placed deposits have commanded significant attention in British prehistoric archaeology, where they have most commonly been referred to as 'structured' or 'special' deposits. Richards and Thomas use the term 'structured' to describe deposits of domestic material at the Neolithic henge monument of Durrington Walls that show patterns in terms of contexts, associations, arrangement and distribution, and were on those grounds supposed to be the results of ritual activity (Richards & Thomas 1984: 191–192). At about the same time, the excavators of Iron-Age Danebury published reports of 'special' deposits of articulated human and animal remains in disused storage pits (Grant 1984: 533–543; Walker 1984: 442–463). In the succeeding years, use of the term 'structured' has broadened to encompass not only the deposits Richards and Thomas treated, but also 'special' deposits and other unusual deposits, variously called 'odd', 'token', 'selected', 'deliberate' and so forth (Brudenell & Cooper 2008: 15). Such deposits have been identified at sites ranging from Neolithic monuments and ceremonial complexes to Bronze Age and Iron Age settlements (e.g. Brück 1999*b*: 328–330; Cunliffe 1992; Cunliffe & Poole 1995: 80–86; Hill 1995), and not only in Britain but throughout northwest Europe (Bradley 2003, 2005).

Despite sometimes being used interchangeably and sharing many characteristics, the panoply of terms above were coined to describe slightly different kinds of deposits. As will be discussed more fully in the next section, 'structured' describes deposits resulting from patterned activities, whereas 'special' characterizes deposits as unusual, and 'placed' refers to deliberate deposition. The interchangeable usage of these words has contributed to confusion in both identification and interpretation, further complicated by the fact that many archaeologists have attributed all of these kinds of deposits to 'ritual' or 'ritualized' activity (see Hill 1995). Other recent work has treated the identification of deposits as structured or placed as 'an interpretation in itself' (Garrow

2007: 12; see also Brudenell & Cooper 2008: 16). This study focuses on 'placed' deposits, defined below as consisting of material that has been specially selected, treated, and arranged (§2.3), and attempts to interpret the intention governing the act of deposition without relying on a ritual/functional dichotomy (§9.1; *cf.* Hill 1995; Brück 1999*b*; Morris & Jervis 2011).

Recently, researchers taking a nuanced approach to interpreting placed deposits, particularly in the prehistoric period, have begun to explore the insights they can provide into the daily lives, social networks, and worldviews of past societies. Studies have considered the ritualization of domestic activity, the construction of space, and the lifecycles of buildings, settlements, and their inhabitants (Bradley 2003, 2005; Hill 1995; Brück 1999*a*; Gerritsen 1999*a*; Cunliffe 1992; Cunliffe & Poole 1995: 80–86). The apparent ubiquity of placed deposits provides the most cogent argument for understanding them. Finding Iron Age settlements remarkably free of casually discarded refuse, Hill (1995: 95) infers that most of the archaeological record is the result of structured deposition. Although Hill's assessment might be extreme, it emphasizes the potential value that careful analysis of these deposits holds.

With that potential in mind, this study aims to undertake a nuanced analysis of placed deposits in early and middle Anglo-Saxon rural settlements. The early and middle Anglo-Saxon periods refer to the 5th–7th and 7th–9th centuries, respectively, in England. As a brief introduction to the period and its archaeology will show, the careful analysis of placed deposits in early and middle Anglo-Saxon rural settlements has much to contribute to our current understanding of settlement structure, social structure, and worldview in both periods. It may also offer an opportunity to examine the possible roles placed deposition can play in times of significant crisis and change.

The early Anglo-Saxon period began around AD 450, when later texts record a significant migration from northern Germany and southern Denmark into England (e.g. Bede, *HE*: I.15). The size and nature of the migration are matters of continued debate (see Brugmann 2011), but settlements, cemeteries, and artefacts now identified as early Anglo-Saxon emerged in England in roughly the 5th century. Both inhumation and cremation burials were common in cemeteries, which were usually kept separate from living areas (Lucy 2000). Both types of burials were often furnished, and grave goods were often linked to gender and age (Lucy 1997; Stoodley 1999*b*, 2000).

In rural settlements, the focus of the present study, buildings can be grouped into two types in the early Anglo-Saxon period. The first were earthfast structures, generally post-built and rectangular, with opposed entrances in the centres of the long sides (Fig. 1.1; James *et al.* 1984; Hamerow 1999, 2011: 130). These are generally interpreted as houses. The second, called sunken-featured buildings (SFBs) or *Grubenhäuser*, consisted of a subrectangular pit over which a superstructure, usually supported at least partly on posts, was erected (Fig. 1.2, West 1985: 113–121; Tipper 2004). SFBs were once thought to have been dwellings, but subsequent to the discovery of earthfast structures they are usually interpreted as ancillary structures for storage or manufacture, especially textile production (Tipper 2004: 160–184; Hamerow 2011: 150–151). Both building types were relatively short-lived and were usually replaced rather than repaired; this may have contributed in some cases to settlements shifting over time (Hamerow 1991, 2010*b*: 5–7). Early Anglo-Saxon settlements have yielded almost no archaeological evidence for boundaries, planning, or foci (Figs 1.3, 1.4; Reynolds 2003: 103; Hamerow 2010*b*: 9–10), although exceptions can be found (Powlesland 1997, 1998).

The spatial structure of rural settlements and its relationship to social structure remain important subjects of research in early Anglo-Saxon archaeology. The precise

relationship between earthfast structures and SFBs is still uncertain (Hamerow 2011: 151–152). Possible 'farmsteads' consisting of an earthfast 'hall' and one or more SFBs have been identified at West Stow (West 1985: 146–152), but groups of buildings do not appear to form discrete farmsteads at Mucking (Tipper 2004: 184). Furthermore, it is not clear how social structure mapped onto the settlement: for example, how did buildings or groups of buildings relate to social units, and how did social units relate to each other within the structure of the settlement (Scull 2009: 425; Crawford 2009: 66; Hamerow 2010*a*: 10)? An analysis of placed deposits in early Anglo-Saxon rural settlements may help answer these questions (Ch. 9).

In the late 6th and 7th centuries a set of momentous changes took place in Anglo-Saxon society, including the rise of kingship and the consolidation of the main Anglo-Saxon kingdoms (e.g. Yorke 1990); the conversion of those kingdoms to Christianity and the concomitant emergence of the Church as a political, social, and economic force in England (e.g. Mayr-Harting 1972); and by the late 7th and 8th centuries a resurgence of overseas contacts and trade (e.g. Sindbæk 2007; Astill 2011). One effect of these changes can be seen in a proliferation of new types of settlement, including high status secular settlements, Christian 'minsters', urbanized trading and production settlements known as *wics* or emporia, as well as more enigmatic 'productive' sites (Ulmschneider 2011). Treatment of the dead also became more diverse in the 7th century (Geake 1992; Dickinson 2011: 231–232). In communal cemeteries, cremation and furnished burial declined, and some ancestral burial grounds were abandoned as new ones were founded (Boddington 1990). Meanwhile, the early 7th century witnessed a flourish of particularly wealthy princely burials (of which the most famous is Sutton Hoo: Carver 2005), and less elaborate but still elite furnished burials continued through the late 7th and early 8th centuries (Welch 2011: 269–277). Execution cemeteries, in which a high proportion of

burials exhibited signs of 'deviant' treatment, began to appear as early as the late 7th century (Reynolds 2009).

Rural settlements in the middle Anglo-Saxon period (7th–9th c.) differed from those in the earlier period in terms of building types and morphologies, construction techniques, and settlement organization. Middle Anglo-Saxon earthfast structures exhibited more variation in size and morphology than their predecessors, and featured new building techniques including foundation trenches and sill-beams (Fig. 1.5; Hamerow 2011: 130–131, 138–140). The SFBs so characteristic of the early Anglo-Saxon period became less common in the middle Anglo-Saxon period (Tipper 2004: 11–13). Starting in the late 6th and 7th centuries, ditched and fenced enclosures and other boundaries were constructed in rural settlements, both in newly founded settlements and superimposed onto pre-existing settlements (Reynolds 2003; Hamerow 2010*b*: 10–15). Boundaries and enclosures took a variety of forms, including fenced yards associated with particular buildings, especially 'great halls' (Fig. 1.6); ditched 'minor' enclosures about 60 m on a side (Fig. 1.7); larger ditched 'major' enclosures, sometimes surrounding an entire settlement (Fig. 1.8); and 'rectilinear' settlements comprising plots, tracks, and droveways meeting at right angles (Fig. 1.9) (Reynolds 2003: 130). As already mentioned, settlements also exhibited a growing range of functions and statuses. Whereas cemeteries had often been kept separate from living areas in the early Anglo-Saxon period, a growing number of individual burials and burial groups were associated with domestic buildings from the 7th century (Hamerow 2010*a*).

As with the earlier period, settlement organization and its relationship to social structure is a major focus of research in middle Anglo-Saxon archaeology. The emergence of boundaries in settlements suggests a new emphasis on the control of land, probably linked to its more intensive use. It will be seen that placed deposits in the

middle Anglo-Saxon period were often associated with settlement boundaries, offering an opportunity to explore the purposes, perceptions, and social significances of different types of boundaries and settlement units (Ch. 6). The practice of associating the dead more closely with the living through human burial in settlement has also attracted attention (Hamerow 2010*a*). These burials may have resonance with other placed deposits (Ch. 8).

The profound changes of the 7th century make the Anglo-Saxon period a potential case study of placed deposition in times of crisis. The 7th century has already been mentioned as a time of political and ideological crisis posed by conversion and the consolidation and rivalry of the Anglo-Saxon kingdoms. The flourish of 'princely' burials in the early 7th century and the increased variety of mortuary treatment may have been partly sparked by that crisis. It would be interesting to see whether placed deposits exhibited a similar flourish at around the same time. Difficulties in dating Anglo-Saxon placed deposits to a period as narrow as a single century by artefact typology, relative stratigraphy, and/or radiocarbon, however, may limit the success of such an analysis at this time (*cf.* Hamerow 2006: 2). Placed deposits may also provide an unusual opportunity for settlement archaeology to contribute to our understanding of Anglo-Saxon worldview, for which mortuary ritual, artwork, and late Saxon texts have been our primary sources of information (Ch. 10).

Two recent approaches to understanding the Anglo-Saxon period can provide an interpretational context for considering Anglo-Saxon placed deposits. The first, led by Howard Williams, has considered how the reuse of prehistoric and Roman monuments, the act of cremation and inhumation, and the manipulation of artefacts may have helped to construct memory and to create identity in the Anglo-Saxon period (e.g. Williams 1998, 2004, 2005). Placed deposition may have much in common with such

'technologies of remembrance' (Jones 2003). The second recent approach has been to consider domestic and wild animals not just in economic terms (e.g. as sources of food and raw materials) but as integral and perhaps symbolic components of Anglo-Saxon society (Poole 2010*b*; Pluskowski 2011: 769–772). Animal imagery in Anglo-Saxon literature and artwork is characterized by ambiguity, shape-shifting, and totemic associations with warfare and protection (Leigh 1984; Dickinson 2005; Webster 2011), and these themes have been suggested to represent relics of an animistic tradition still resonant within early and middle Anglo-Saxon society (Glosecki 1989, 2000). The possibility that living animals embodied some of the same associations as their artistic and literary counterparts is worth exploring (Poole 2010*b*: 15). Placed deposits are potentially relevant to this line of research, since animal remains feature prominently in Anglo-Saxon placed deposits (Ch. 5).

It is clear that placed deposition could contribute significantly to our understanding of early and middle Anglo-Saxon rural settlements and society, and would resonate with recent research into the construction of memory and the symbolic role of animals in Anglo-Saxon society. Despite this, and in contrast to the substantial research devoted to placed deposits in prehistoric and, to a lesser extent, Roman Britain (Fulford 2001), placed deposits in Anglo-Saxon settlements have received little attention. Hamerow (2006) has made a preliminary survey identifying a number of 'special' deposits in early Anglo-Saxon rural settlements consisting of articulated and semi-articulated human and animal remains, which she notes are similar in both composition and context to prehistoric structured deposits and some Romano-British deposits, as well as to contemporary deposits in Migration Period northwest Germany and the Netherlands. Recently commenting on Hamerow's work, Morris and Jervis (2011) point to evidence for similar deposits in Anglo-Saxon urban contexts and continuing in the late Saxon

period, though they object to designating them as 'special'. Otherwise, the question of placed deposition in Anglo-Saxon settlements has been largely ignored, except for the occasional identification of 'unusual' or 'ritual' deposits (§1.3). As a result, such deposits have remained an untapped resource in Anglo-Saxon studies, and their potential to shed light on Anglo-Saxon society and worldview has not been realized. Hamerow's preliminary survey issues a challenge for a more comprehensive treatment of these deposits in Anglo-Saxon settlements.

This thesis takes up that challenge for rural settlements throughout England in the early and middle Anglo-Saxon periods (5th–9th centuries). It seeks first to define what constitutes an Anglo-Saxon placed deposit in rural settlements of this period and to identify a representative corpus of them from published and unpublished excavation reports. Using that data set, it sets out to recognize and analyse their pertinent characteristics (e.g. composition, contexts, spatial distribution in the settlement), considering variability across time and place; and to interpret the circumstances and intentions that governed their deposition.

Approached in this way, placed deposits represent a new form of evidence for addressing some of the fundamental questions of Anglo-Saxon archaeology. Whereas building and settlement structure has only been studied through ground plans and settlement layout, considerations of placed deposition as a practice enables discussion of how people structured and were in turn structured by settlement space and time (*cf.* Bourdieu 1990 [1980]). Placed deposits offer a new opportunity to examine how social constructs such as lifecourse and gender were expressed in Anglo-Saxon settlements. Finally, placed deposits bring into a settlement context discussions of early Anglo-Saxon worldview and belief systems, topics that have until now depended on cemetery evidence, the reports of Christian writers, and late Saxon manuscripts.

This chapter places the current study in context by offering an account of British archaeologists' approaches to placed deposits thus far. It is not a comprehensive historiography but rather highlights two interweaving threads running through most past and current approaches to studying placed deposition: the inconsistent use of definitions and terms and a widespread disagreement over identification and interpretation. Whereas this chapter identifies these problems, later chapters proffer solutions to them. The chapter concludes with a specific account of previous work in Anglo-Saxon settlements on placed deposits.

The theoretical groundwork for understanding and identifying placed deposits in the context of formation processes is laid in Chapter 2. Chapter 3 defines contextually specific criteria for identifying placed deposits in Anglo-Saxon settlements, and Chapter 4 specifies the methods used to identify and analyse the data set. Chapters 5 through 8 analyse and interpret patterns of placed deposition. The concluding two chapters integrate the analysis of Anglo-Saxon placed deposits with the results of other scholarship to improve our understanding of the early and middle Anglo-Saxon rural settlement and worldview.

1.2 What are placed deposits?

A wide variety of terms have been introduced to describe placed deposits, each accompanied by its own set of assumptions and identifying criteria. These terms and criteria can be organized into two broad categories: those that emphasize depositional patterning, and those that emphasize unusual composition or contexts. This section assesses the descriptive, analytical, and interpretative advantages and limitations of these two approaches to identifying and interpreting placed deposits. It is suggested that a

useful and robust definition of placed deposits can be formulated by combining these approaches.

1.2.1 'Structured' or 'formal' deposits

'Structured' deposits are primarily characterized by patterns in the archaeological record. Richards and Thomas (1984) proposed the idea of structured deposits as a 'systematic' means of identifying and interpreting the archaeological traces of ritual activity. They start with a specific model of ritual behaviour as formalized, repetitive, and involving material symbols. When such behaviour involves the deposition of material, the resulting deposits can be expected to exhibit patterns with respect to several variables (*ibid.* 191–192, 215; Hill 1995: 95):

- contexts,
- object associations,
- depositional sequence, and
- spatial distribution.

Having laid the theoretical groundwork, Richards and Thomas take the assemblage recovered from the Neolithic henge monument of Durrington Walls as a case study. Since that assemblage exhibits structured patterns, they conclude it is likely to have resulted from the proposed sort of ritual activity (Richards & Thomas 1984: 215).

However, as Richards and Thomas admit, ritual activity is not the only patterned form of human behaviour (*ibid.* 215). Hill goes so far as to suggest that most human activity is symbolically structured, and that therefore most of the archaeological record consists of structured deposits (Hill 1995: 6, 96). It is certainly easy to think of examples of structured activity that most people would not call ritual. Habitual or intensive strategies of rubbish disposal can be repetitive and even formalized to a degree, and yet

not display other unambiguously 'ritual' traits. People repeatedly select material for discard and treat it in a habitual or prescribed way; if deposition in a landfill, pit or body of water is the end result, the deposits will be structured. People's conscious choices determine the condition, location, and arrangement of material. Whenever people perform activities in similar ways multiple times, patterns in terms of composition and context result (see §2.2).

Because structured deposits are characterized by observable patterns, the identification of structured deposits can be objectively based on empirical evidence rather than an implicit interpretation of the deposits as special or sacred. It is crucial that the identification of structured deposits be firmly dissociated from their interpretation, because such a wide range of activities result in structured deposits (§2.2). Two recent studies have presented effective examples of patterned deposits that may be interpreted 'prosaically' as redeposited surface rubbish heaps (Garrow 2007: 14; Brudenell & Cooper 2008). That does not mean these deposits are not structured according to Richards and Thomas's original definition; it simply means that the determinant of that structure need not be interpreted as ritual behaviour. Nevertheless, the uncritical interpretation of structured deposits as the result of ritual or ritualized activity appears to be widespread (Brudenell & Cooper 2008: 16).

A variety of other terms have been used to describe deposits that show patterns in terms of associations and spatial distributions. Structured deposits have also been described as 'formal' deposits, for example by Pollard (1995, 2001), who uses the two terms interchangeably. Various archaeologists describe structured deposits as 'deliberate' or 'intentional' (Pollard 1991: 143, 2001: 316; Chapman 2000*b*: 61; Bradley 2003: 11). Pollard specifically contrasts structured deposits with 'casual' deposits (Pollard 1991: 141), and Bradley describes structured deposits as 'carefully placed' (Bradley 2003: 8).

The use of these terms—'structured', 'formal', 'deliberate', 'intentional', 'careful'—suggests that, by and large, what differentiates these deposits is a quality of the act of deposition that often creates patterns, rather than special characteristics of composition or context.

1.2.2 'Special', 'exceptional' or 'odd' deposits

At about the same time as Richards and Thomas were defining structured deposits on the basis of depositional patterns, excavators at Danebury were identifying 'special' deposits in Iron Age pits on the basis of exceptionality. The 'special' animal deposits at Danebury stood out in contrast to the bulk of the animal assemblage in exhibiting four characteristics (Grant 1984: 542):

- unusual treatment of the animal remains,
- non-random association of materials,
- non-random location within context, and
- element of special selection.

Initially, the Danebury excavators recognized three types of special animal deposits in disused grain storage pits: complete animals, complete skulls or mandibles, and articulated limbs (*ibid.* 533). Human 'pit burials' were already an identified phenomenon in Iron Age settlements (Whimster 1981; Wilson 1981); these and other deposited human remains were also found in disused grain storage pits at Danebury (Walker 1984: 442–463). Special animal deposits and deposited human remains with similar characteristics were quickly recognized at numerous other Iron Age settlement sites (Wait 1985: 83–153).

The animal and human remains in grain storage pits were eventually recognized as related classes of special deposits, along with deposits of further types of material,

such as pottery, other artefacts, and organic material (Cunliffe 1992: 75; Poole 1995: 259). As the variety of special deposits expanded to include deposits of more mundane material, their special placement on or near the bases of pits, rather than the special treatment of their contents, appears to have been increasingly recognized as the most important exceptional characteristic of the deposit. However, the exceptional treatment of the animal remains was the initial 'special' characteristic that drew attention to these deposits. Poole has quantitatively shown that special animal deposits were more likely to be recognized during excavation than, for example, deposits of large potsherds (*ibid.* 249, tab. 55). This 'retrieval' bias betrays an element of subjectivity that may have contributed to the initial identification of articulated animal remains as 'special' (*cf.* Hill 1995: 16, 24). However, the Danebury excavators have affirmed their exceptionality by comparison with the bulk of the animal bone assemblage.

Although the eponymous quality of special deposits is their exceptionality, the frequency with which they occur is equally important to their identification as a class of feature. While the unusual characteristics of each individual instance might be explained away prosaically, the discovery of such deposits 'on a number of occasions' has been taken to demonstrate a repeated 'pattern of behaviour' (Cunliffe & Poole 1995: 80). Later analyses of the special deposits at Danebury attempted to identify patterns not only of material type, but also of other variables such as context type, vertical and horizontal placement within the context, and so on (Poole 1995). In displaying depositional frequency or patterns, special deposits can be recognized as a subset of structured deposits, but ones that also have exceptional qualities.

Two other scholars have made important contributions to the developing concept of 'special' deposits. In his detailed analysis of the formation of the archaeological record at British Iron Age sites, Hill (1995) also identifies special deposits on the grounds

of exceptionality, albeit using less subjective means. He argues that in Iron Age pits, the 'average' layer contains only a small amount of material, which is 'background material' unintentionally deposited (*ibid.* 39, 44). However, he finds that a small number of 'exceptional' deposits contain large amounts of a single class of material (*ibid.* 39–40). Examples include assemblages of large potsherds; large assemblages of potsherds; large amounts of bone from a single species, either articulated or disarticulated and/or fragmented; assemblages of two or more small finds; or human remains (*ibid.* 39–40). Hill concludes that because the exceptional deposits usually contain large amounts of only one class of material, they represent 'intentional' deposits of primary refuse or material from homogeneous secondary refuse dumps (*ibid.* 39; Schiffer 1987: 58; 1976: 30).

Individually, each of these exceptional deposits could be interpreted as an instance of refuse disposal; however, Hill's deposits acquire their full significance when patterns of exceptional deposits are considered. Multiple exceptional deposits occur together in the same pit, sometimes concentrated in the lower two-thirds of pits, statistically more often than would be expected to have happened by chance. This shows that the 'exceptional' layers were deposited in sequence as part of a larger or longer-lasting depositional event (Hill 1995: 53, 70–74). Hill also demonstrates patterns in the spatial distribution of exceptional deposits across settlements (*ibid.* 94). These patterns of associations and spatial distributions show that Hill's deposits are structured, as defined by Richards and Thomas (*ibid.* 95–96). However, they have the additional element of consisting of exceptional deposits of material.

Two important features of Hill's definition of exceptional deposits are that it is empirically determined and contextually specific. Like special deposits, Hill's exceptional deposits stand out in contrast to the bulk of deposits, but Hill attempts to

eliminate any element of subjectivity from his identification of exceptional deposits by not assuming any material to be *prima facie* 'special'. Instead, by quantitatively identifying 'average' pit layers for Iron Age storage pits and recognizing layers that are quantitatively different as exceptional, Hill provides a definition of exceptional that is both objectively determined and specific to the context of Iron Age storage pits. This means that in order to apply Hill's techniques to another context, such as Anglo-Saxon settlements, one must start from scratch.

The second scholar to contribute importantly to the concept of 'special deposits' is Brück. In a body of work on ritual activity in British Bronze Age settlements, Brück steps back from Hill's computational approaches to reinforce the importance of 'oddness' in identifying exceptional deposits. Rather than eliminating any element of subjectivity from the identification of exceptional deposits, Brück embraces archaeologists' subjective labeling of these deposits as 'odd' (Brück 1999*b*: 328–332, 1999*a*: 152). The characteristics of Brück's odd deposits coincide with those of special deposits as described above: they contain a variety of materials and objects (e.g. animal remains, pottery, weapons, everyday domestic artefacts), are sometimes recovered from 'interesting' contexts (e.g. at corners, entrances, or ditch terminals), and sometimes show signs of 'deliberate arrangement' (Brück 1999*b*: 329–330). Brück frames her treatment of 'odd' deposits as a rebuke of archaeologists' penchant for using 'ritual' as a generic interpretation for anything without an obvious functional aim (*ibid.* 313). She argues that deposits with no obvious rational purpose may seem 'odd' to modern archaeologists, but within the ancient worldview, they would have been both purposeful and rational. Rather than interpret 'odd' deposits as ritual, Brück challenges archaeologists to understand the worldview under which they were functional. Precisely by considering what makes the deposits seem odd to us, we can understand the differences between the modern and

ancient worldviews (*ibid.* 332). This study adopts a similar approach to interpreting placed deposits (§9.1).

1.2.3 'Placed', 'positioned', or 'arranged' deposits

The deposits considered in this study are ones that combine the empirical patterning of structured deposits with the exceptionality of special deposits. The term most appropriate to describing deposits with both of these sets of characteristics is 'placed.'

Although archaeologists often say that structured or special deposits have been 'placed' in their contexts, they tend to apply this verb without explanation or rigorous definition of what constitutes 'placing'. According to common usage, 'to place' implies deliberateness, intentionality, or care. Binford uses the term as a gloss to explain what he means by 'positioned' items: items arranged or placed for subsequent retrieval (Binford 1978: 346). When applied to deposits, 'placed' usually connotes a deliberate or careful quality: deposits may be placed 'deliberately' (Serjeantson with Gardiner 1995: 429; McOmish 1996: 73; Jones 1998: 305; Pollard 2001: 319) or 'carefully' (Mercer 1988: 94; Bradley 2003: 8), or they may be 'arranged' (*ibid.* 13). Placing is sometimes also characterized in 'ritualistic' terms: deposits are placed 'with some formality', 'ceremoniously', or 'symbolically' (*ibid.* 13, 15; Crabtree 2007: 163).

Nor has the term 'placed' deposit been explicitly defined. Pryor, reporting on a collection of 'symbolic or placed deposits' at the Neolithic causewayed enclosure at Etton, Cambs., was the first to use the term consistently (Pryor *et al.* 1985; Pryor 1987, 1988). He seems to have chosen it as a fitting descriptor for material that had been 'positioned with some care', such as a complete pot 'placed' on a birch bark mat in the centre of the base of a ditch terminus (Pryor *et al.* 1985: 293; Pryor 1998: xix, 21). A

variety of other archaeologists since then have also referred to ‘placed’ deposits without formally defining the term (e.g. Bronk Ramsey & Allen 1995: 529; Guttmann & Last 2000; Proctor 2002; Bradley 2003: fig. 10). The term ‘placed’ is sometimes used interchangeably with ‘structured’ or ‘special’ in the same paper, possibly reflecting the increasing currency of the latter terms. In the final published site report, Pryor usually refers to the deposits at Etton as structured deposits, although he still calls them placed deposits occasionally, and sometimes ‘arranged’ deposits (Pryor 1998: 13–69).

As these terminological tangles imply, ‘placed’ deposits have been identified as both structured and special. The term itself implies that, as with structured deposits, what differentiates placed deposits from others resides in the act of deposition, rather than in their chosen contents or contexts. Some archaeologists explicitly equate placed deposits with structured deposits (e.g. Pryor 1998: 13; Bradley 2003: 8). However, it is the unusual characteristics of placed deposits that suggest they were deposited with deliberateness or care. In this respect they are more similar to special deposits, which are also distinguished from other deposits by their exceptional nature. Proctor situates the late Bronze Age/early Iron Age placed deposits at Westcroft Road, Carshalton, Surrey, in the tradition of special deposits by evoking the work of Wait (1985), Grant (1984: 533–543) and Hill (1995), and focusing primarily on the exceptional nature of their contents (flint nodules, red deer skulls) and contexts (pits dug specially to receive the contexts) (Proctor 2002).

The precedent for using the term ‘placed’ to describe deposits that span the characteristics of both structured and special deposits makes it a useful choice of term to unite these two approaches to studying this class of deposits. Whereas structured deposits are identified on the basis of patterns, which could be the result of mundane (e.g. non-ritual) activity, placed deposits can refer to the more specific subset of patterned deposits

that also exhibit 'exceptional' characteristics. At the same time, the term 'placed' implies more of an emphasis on the act of deposition than has traditionally been implied by special deposits. The model of the formation processes developed in Chapter 2 demonstrates the need for a term that can fulfill both of these roles.

1.2.4 Summary

The controversial class of deposits described at the beginning of this chapter lacks a generally agreed-upon label and definition. 'Structured' deposits result from too broad a variety of activities, whereas 'special' deposits are identified by their potentially subjective interpretation as exceptional rather than from empirical characteristics. Other terms like 'formal' and 'symbolic' too specifically imply a ritualistic interpretation. The term 'placed' has been used to describe deposits with characteristics that span 'structured' and 'special'. Chapter 2 develops a definition of placed deposits that encompasses those structured deposits that can also be empirically shown to be exceptional.

1.3 Previous work on placed deposits in Anglo-Saxon contexts

In contrast to prehistoric archaeology, very little work has been done on placed deposits in Anglo-Saxon settlements, to the extent that placed deposition has not been recognized as a common cultural phenomenon in Anglo-Saxon settlements until very recently (Hamerow 2006). This lack of recognition may seem surprising, considering the amount of attention placed deposits have received in prehistoric British archaeology. It may be due in part to the fact that until recently few Anglo-Saxon settlements have been excavated on a large scale, combined with the difficulties in dating Anglo-Saxon deposits in order to associate them reliably with nearby structures and other settlement features (Hamerow 2006: 2).

There are a few examples of deposits so unusual that they have been attributed to ritual activity, often in the form of 'foundation' or 'termination' deposits associated with the construction or destruction of a building, respectively. A deposit containing a 'ritually "killed"' pot and semi-complete pig remains at Brooklands, Milton Keynes, has been identified as a possible termination deposit (Stansbie 2008: 27; Blinkhorn 2008: 46–47). Similarly, lead rings or discs in the posts, corners, and centres of sunken-featured buildings at various sites have been identified as possible foundation or termination deposits (e.g. at Gamlingay, Cambs., in Murray with McDonald 2005: 232, 259). Most notably, at Wharram Percy, N. Yorks., a human infant near a partially butchered sheep sprinkled with flecks of amber and overlain by a round boulder of 'unusual veined appearance' has been identified as a ritual deposit (Richards 1992: 84–85). In cases such as these, the deposits have usually been treated as one-off anomalies, rather than as examples of a wider pattern of activity in Anglo-Saxon settlements.

In some cases, excavators have noticed placed deposits and remarked them without considering their significance. At Cowdery's Down, Hants, a human infant recovered from the axial posthole of a possible sunken-featured building was noted almost parenthetically in the site report (Millett with James 1983: 217). At Car Dyke, Waterbeach, Cambs., Lethbridge recovered an articulated dog skeleton with a sherd of Romano-British pottery on top of it from an Anglo-Saxon building. He interpreted the dog burial as contemporary with the use of the structure and deemed it indicative of "a complete disregard for cleanliness or comfort" (Lethbridge 1927: 146). In other cases, excavators have attributed the presence of the deposited material to simple waste disposal or, in the case of animal remains, natural death. At West Stow, Suffolk, two articulated dog skeletons were found in the fill of a sunken-featured building; the animals were thought to have died naturally beneath a suspended floor (West 1985: 18, 23; Hamerow

2006: n. 7). In the light of recent research on the formation of sunken-featured building pit fills (Tipper 2004), such interpretations are untenable. At Upton, Northants, rows of unfired loomweights on the floor of a building were interpreted as two looms destroyed when the structure burned down (Jackson *et al.* 1969: 210). Although this is a feasible interpretation, why the loomweights were not retrieved after the fire for later use requires explanation (Gibson with Murray 2003: 210–211; Hamerow 2006: 18; see §7.5.1).

There may be many deposits that excavators simply did not notice at all. Studies have demonstrated a bias in excavation toward bright, large, coloured artefacts, and those that are recognizable or perceived to be of academic importance (Hill 1995: 20). The situation with animal bone is even more alarming, considering the common appearance of animal remains in placed deposits. On settlements where animal bone is abundant, bone fragments are sometimes treated cavalierly. It can only be assumed that the number of deposits that escape notice is far greater than the few that have been recorded in this thesis, that most of them will never be discovered, and that such deposits will continue to escape notice in future excavations.

Despite these obstacles, some scholars have noticed patterns of placed deposition in Anglo-Saxon settlements. Gibson (2003: 210–211), discussing the settlement at Godmanchester, Cambs., notes that fragile unfired clay loomweights and animal remains that were only partially butchered are often recovered from sunken-featured buildings, and she argues that such material must have been deliberately placed in the backfill. In his work on boundaries in Anglo-Saxon settlements, Reynolds (2003: 132) highlights a number of deposits and burials associated with boundary features and relates them to more varied kinds of ritual activity in rural settlements, including free-standing posts and structures 'suggestive of ritual activity', as well as reuse of ancient monuments.[1]

[1] The reuse of ancient monuments in settlements has been discussed most recently by Crewe (2008).

Mulville and Ayres (2004: 345–347), noting that animal remains at Yarnton, Oxon, were often buried in ditches and pits, have attempted to discern associations between the composition of those remains and feature type. Human burials in settlement contexts have always attracted attention due to their rarity; this is true of even the most prosaic graves, not to mention unusual burials like grave AX at Yeavering or the woman and infant in pit α at Sutton Courtenay (Hope-Taylor 1977: 67–69; Leeds 1947: 86). Boyle has collated examples of isolated graves in settlements, but does not pursue their possible role as placed deposits (Boyle 2004: 321). Deposits containing infant remains in SFBs at West Heslerton have been identified as representing a possible pattern of activity (Powlesland 1998: §7.5.2), and Crawford has analysed examples of infant remains in Anglo-Saxon settlement contexts and, in the light of Hamerow's work (discussed below), has suggested that they might best be understood as placed deposits (Crawford 2008: 203).

Hamerow (2006) has produced the only synthetic work treating placed deposition as a common, broadly varied, widespread pattern of behaviour in Anglo-Saxon settlements. From a preliminary survey of 16 Anglo-Saxon settlements, Hamerow identifies a set of 42 probable placed deposits of animal and human remains, mostly dating to the 5th through 8th centuries. She organizes these into five categories, using a similar approach to Grant (*ibid.* 3; Grant 1984: 533–543):

- complete articulated skeletons;
- skulls or parts of skulls;
- articulated limbs or trunks;
- disarticulated bones deposited *en masse*;
- redeposited cremation pyre material.

It is useful to summarize here just a few of Hamerow's observations. First, although cattle were the predominant animal species represented, dog and horse occurred

in far greater proportions than they did in overall animal bone assemblages on Anglo-Saxon settlements (Hamerow 2006: 8). These proportions are reminiscent of the British Iron Age deposits, both at Danebury and at hillforts and settlements in general, in which cattle and sheep are the predominant species, but horses and dogs are disproportionately represented when compared to the overall animal bone assemblages (Grant 1984: 542; Hill 1995: 56–57). Second, half of the deposits came from sunken-featured buildings (Hamerow 2006: 8). Third, Hamerow notes a persistent association between placed deposits and entrances or boundaries (*ibid.* 9). This association with entrances and boundaries is, again, reminiscent of placed deposits in Bronze Age and Iron Age Britain and the Continent. Interestingly, Hamerow finds no correlation between the contents of the deposit and its context or location within the settlement (*ibid.* 12). In addition to deposits of animal and human remains, Hamerow also notes some probable placed deposits of complete or partially complete pots, loomweights, and groups of artefacts normally associated with women (Hamerow 2006: 17–19). These placed deposits were found in similar contexts and with similar associations to the deposits of animal remains, particularly in SFBs.

Morris has recently considered associated bone groups (ABGs) from Anglo-Saxon sites in his study of ABGs from the Neolithic through the medieval periods in southern England and Yorkshire (Morris 2008; Morris & Jervis 2011). He analyses the prevalence of ABGs in each period, the types of features in which they were found, and patterns in terms of species and degree of articulation. Morris suggests that his results contradict Hamerow's (Morris 2008: 423; Morris & Jervis 2011: 67–68), but this is due to incompatibilities between the two studies' objectives and data sets. Depositional patterns for ABGs (Morris) need not match depositional patterns for placed deposits (Hamerow and the present study), since not all ABGs are placed, and not all placed

deposits are ABGs (§3.3). Furthermore, Morris included sites of all types from the entire Anglo-Saxon period, whereas Hamerow's study (like the present one) was restricted to rural settlements of the 5th through 9th centuries. Only six of the 92 ABGs that Morris identified for the Anglo-Saxon period came from early to middle Anglo-Saxon rural settlements; of these, only three were identified as placed according to this study's criteria (Tab. 4.1): SFB 100 at Collingbourne Ducis, pit 6 at Cowdery's Down, and ditch 2505 at Wharram Percy (references in Appendix B). Only the latter two were included among Hamerow's 42 placed deposits; conversely, the ABGs among Hamerow's other 40 placed deposits were not used in Morris's (2008) study. Thus the difference between Morris's finding that most ABGs from Anglo-Saxon rural sites come from pits (Morris & Jervis 2011: 67–68) and Hamerow's finding (born out in the present study; §5.2) that most placed deposits were found in SFBs (Hamerow 2006) can be attributed both to the difference between ABGs and placed deposits and the fact that 20 out of Morris's 26 ABGs in rural Anglo-Saxon settlements dated to the late Saxon period, when SFBs were uncommon.

Hamerow's work proposes placed deposits as an important cultural phenomenon in Anglo-Saxon England, opening the door to a more detailed study of placed deposits in Anglo-Saxon settlements. This thesis represents such a study for rural settlements of the early and middle Anglo-Saxon periods (5th–9th centuries).[2]

[2] The chronological and geographical bounds of this study are discussed in Chapter 4.

Chapter 2
Placed deposition as a formation process

Schiffer has established that most past activities are not reflected directly in the archaeological record, but are instead 'distorted' by formation processes: the cultural and natural means by which material is deposited into and transformed within the archaeological record (Schiffer 1972, 1976, 1987). He argues that understanding formation processes provides archaeologists with the corrective 'lenses' required to view and analyse 'behaviors of interest' (Schiffer 1976: 42, 1987: 10). However, formation processes—of which placed deposition is an example—can themselves be behaviours of interest. Cultural formation processes are the human activities for which the archaeological record presents the most direct evidence. Even humble rubbish disposal can reflect complex social priorities and worldviews while fulfilling a basic functional requirement (Hill 1995: 96).

Since placed deposition, the subject of this thesis, is a formation process, it is appropriate to develop a model of formation processes that encompasses placed deposition. In order to identify, classify, and interpret placed deposits, we must first understand what distinguishes placed deposition from other formation processes, particularly structured deposition.

2.1 Removal and deposition

The theory of formation processes developed by Schiffer (1976, 1987) provides a useful framework within which to work. Fundamental to Schiffer's theory is a distinction between the behavioural system on the one hand and the archaeological record on the

other (Schiffer 1972: 157; 1976: 28; 1987: 3–4). The behavioural system, or systemic context, consists of human beings interacting with artefacts, the environment, and each other, whereas the archaeological record consists of material (including human remains) that is no longer part of the behavioural system. Formation processes, or the processes by which the archaeological record is formed and reformed, can be seen as the means by which material is transferred between and transformed within these two contexts. The various processes by which people cause material to leave the behavioural system and to enter the archaeological record are collectively termed 'cultural deposition' (Schiffer 1976: 27–28; 1987: 3–4). Schiffer divides cultural deposition into five main categories according to their assumed motivations or purposes: discard, disposal of the dead, caching, loss, and abandonment; albeit recognizing that additional formation processes may exist (Schiffer 1976: 30–34, 1987: 47–98).

Rather than adopting Schiffer's categories, however, cultural deposition can be analysed more generally by treating it as a combination of two separate processes: *removal* from the behavioural system and *deposition* into the archaeological record. The distinction between removal and deposition is artificial, as there is no intermediate state in which material may reside between the behavioural system and the archaeological record. Removal and deposition are not in practice separate processes but the same process considered from two different frames of reference. The terminology commonly used by archaeologists betrays a tendency to consider formation processes either in terms of removal or deposition. For example, of the terms with which Schiffer categorizes cultural *deposition*, only 'caching' describes how the material enters the archaeological record; 'discard', 'disposal', 'loss' and 'abandonment' all refer to *removal* from the behavioural system.

Human intent in removal and deposition can in turn be described as either *active* or *passive*. In active removal, such as discard, someone consciously or intentionally removes material from the behavioural system. Caching involves active deposition; a person deliberately deposits items in what will perhaps become its archaeological context. Conversely, passive removal and deposition are unconscious; a person losing an item is unaware both that it has been lost (passive removal from the behavioural system) and that it has been deposited elsewhere (passive deposition in the archaeological record). Whether removal is active or passive is independent of whether deposition is active or passive. Discard, for example, is always active with respect to removal, but the deposition of discarded material may be either active or passive. Broken tools, waste material, and other debris that is casually discarded may land on the floor of a workshop, or they may be deliberately discarded in a bin or onto a rubbish heap.[3]

Combining the binary processes of removal and deposition creates four permutations that span all possible cultural deposition processes (Tab. 2.1). Schiffer's categories fit neatly into this matrix, but they acquire different associations within it. Whereas Schiffer ascribes a basic commonality to all 'discard', this matrix suggests that casual discard and deliberate discard are as different as loss and disposal of the dead. Conversely, processes contained in a single cell of the matrix, such as disposal of the dead and caching, are revealed to share fundamental similarities. The affiliations and distinctions derived from Table 2.1 are meaningful archaeologically. Because deliberately discarded waste is deposited actively, it exhibits structured patterns of deposition (Hill 1995: 96–97). This is structured deposition (§2.2).

The characterization of caching and disposal of the dead as involving passive removal from the behavioural system requires some justification. Schiffer would argue

[3] Casual discard usually results in primary refuse (defined as material discarded near the its place of manufacture, use, or repair), whereas deliberate discard usually results in secondary refuse (material discarded elsewhere) (Schiffer 1976: 30; 1987: 58).

that although the place of deposition (cache-site or grave-site) may remain in the systemic context as long as someone remembers it, the objects or body within have been removed from the sphere of human interaction (Schiffer 1987: 80, 84). This does not necessarily hold true outside of a strict scientific understanding of causality, however.[4] If the knowledge that the objects are in the cache influences someone's actions, or if someone believes that the body within the grave can still interact with people, animals, or things, then the deposited material still has agency in the human sphere (*cf.* Gell 1998). In a real sense, the deposited material is still in the behavioural system, and barring any further manipulation remains there until it is forgotten (i.e. passively removed).[5]

Like deliberately discarded material, material that is actively deposited and passively removed usually exhibits structured patterns and may be regarded as a structured deposit (§2.2), but a special kind that retains agency within the behavioural system during or after deposition. It will be suggested that this is placed deposition (§2.3). The agency of placed deposits within the behavioural system is critical to their interpretation. That agency informs the analysis in Chapters 5 through 8 and is discussed fully in Chapter 9. For now, the rest of this chapter considers how to identify and differentiate structured and placed deposition in the archaeological record.

2.2 Structured deposition

Chapter 1 explored some of the inconsistencies and disagreements surrounding the use of terms such as 'structured', 'special' and 'placed' deposits, including not only the problem of interpreting such deposits, but also those of defining and identifying them. Having constructed an unambiguous model of formation processes based on

[4] Even in our own society, a time capsule is cached and its location recorded so that it can be retrieved later; and most people who visit a grave do not wish to commune with the site but with some aspect of the person buried there.

[5] This suggestion largely agrees with Schiffer's (1987: 92) argument that material forgotten (or abandoned) in caches is a kind of *de facto* refuse.

active/passive removal/deposition, it is now possible to suggest objective definitions of both structured and placed deposits.

It is my contention that all formation processes characterized by active deposition into the archaeological context result in structured deposits. As defined by Richards and Thomas, structured deposits exhibit patterns in terms of composition, context, and spatial distribution because they are the result of repetitive, formalized manipulation of material (Richards & Thomas 1984: 191–192; Hill 1995: 95). The processes listed in the bottom half of Table 2.1 vary considerably in character, formality, motivation, and intention, but they all feature repetition and convention to varying degrees and produce structured patterns in the archaeological record. It seems straightforward to extrapolate from these examples that any material actively deposited into the archaeological record will exhibit structured patterns as a result of human selectivity and conscious decision. The identification of the products of active removal and active deposition as structured deposits neatly dovetails with Richards and Thomas's established definition of structured deposits.

Furthermore, I contend that *only* formation processes fitting into the bottom half of the matrix can produce structured deposits, even though other formation processes might produce patterned deposits. Much of human activity is patterned, and material lost or casually discarded in the course of such activities may likewise exhibit patterns, through which the activities can sometimes be interpreted in traditional functionalist terms, as illustrated by two classic examples. Flintknapping is a repetitive and sometimes formalized manipulation of material that can produce characteristic patterns of debitage, yet it would be controversial to interpret a scatter of waste flakes as a structured deposit. This is precisely because it is not actively deposited. It would be likewise be misleading to interpret deposits of food in *dolia* preserved in ash in Pompeii and Herculaneum as

structured deposits. In defining structured deposits, it is not enough for material to exhibit patterns in terms of composition, context, and spatial distribution, or to be the result of repetitive, formalized behaviour; structured deposits must also be *deposited*. Defining structured deposits as the result of active deposition thus narrows an accepted definition that is arguably too broad.

2.3 Placed deposition

Even after narrowing the definition of structured deposits to include only those deposits characterized by active deposition, the term still embraces a wide variety of deposits. As recent studies have shown for the Neolithic and the Bronze Age in Britain (Garrow 2007; Brudenell & Cooper 2008), structured patterns in the archaeological record can often result from mundane activities like rubbish disposal; however, symbolic or exceptional deposits like human burials or caches also appear in the archaeological record as structured deposits. The labels 'odd', 'deliberate', 'token' and so forth discussed §1.2 are all attempts to distinguish more 'meaningful' structured deposits from structured rubbish disposal. As I suggested in §1.2, the term 'placed' provides an appropriate label for such deposits, since there is precedent for using the term to refer both to structured deposits and to special deposits. Referring to the earlier discussion of formation processes (§2.1), it may be suggested that placed deposits are more 'meaningful' than structured rubbish deposits in that they have not yet been removed from the behavioural system; in other words, they still exercise agency in the human sphere.

As with structured deposits, it is important to have an objective definition of placed deposits in which identification relies on empirical evidence, rather than a definition that depends upon an interpretation of the purpose of the deposit. Questions of

motive are notoriously difficult to assess formally (e.g. Binford 1978: 346). Deliberately discarded material and more 'meaningful' deposits alike are characterized by active deposition, and consequently both result in structured deposits exhibiting patterns in terms of composition, context, and spatial distribution. How can a deposit that retains agency during or after deposition be distinguished from other structured deposits?

A solution is inspired by distinctions made by Garrow (2007) in his analysis of structured deposits in the pit complexes of Neolithic East Anglia. Most of the pits seem to have been specially dug to receive the contents of middens, perhaps to manage their size, and most depositional patterns and peculiarities appear to have resulted from local or chronological variations in economic activity (*ibid.* 14). However, Garrow singles out a few exceptional deposits, including a pit 'divided vertically', each half filled with a different soil matrix, and a pit containing a fragment of skull resting on a soil 'pedestal' (*ibid.* 14–16).[6] These deposits are empirically exceptional compared to the contents of most of the other pits Garrow examined. They contain 'special' objects and 'arranged' material that appears to have been 'intentionally' selected (*ibid.* 16). In addition to special selection and arrangement, I would add the possibility that material in such deposits might be unusually treated prior to deposition.

Garrow's observations provide the basis for a definition of placed deposits as structured deposits of material that has been *specially selected*, *treated*, and *arranged*, as compared to material in similar or surrounding contexts. Like other structured deposits, they are the result of active deposition into the archaeological context, and they consequently exhibit patterns in terms of their composition, context, and spatial

[6] Garrow describes these exceptional deposits as 'structured' in contrast to the redeposited midden material in most pits, which he argues is not structured deposition (Garrow 2007: 14–16), but according to the definition advanced here, redeposited midden material in specially dug pits is unambiguously structured deposition. This is a difference of semantics rather than interpretation: for Garrow, structured deposits are associated with ritual behaviour by definition (*ibid.* 11–12), aligning them more closely with 'placed' deposits as defined in the current study.

distribution. What distinguishes them from other structured deposits is exceptionality (*cf.* special deposits, §1.2): specifically, exceptional selection or manipulation of material during the processes of removal and/or deposition. The care taken in selection and deposition argues the material is not simply being removed from the behavioural system, but that it is expected to exercise agency in or after deposition. Under the proposed definition, the exceptionality of these deposits is empirically determined: the characterization of the selection, treatment and arrangement of the material as *special* depends upon a contextually specific contrast between the material in the deposit versus material usually found in comparable or surrounding archaeological contexts.[7]

The value of using contrastive criteria for identifying placed deposits cannot be overstated. Only by contrasting the selection, condition, and arrangement of materials in the deposit with the contents of comparable and surrounding archaeological contexts can the deposits be empirically characterized as exceptional or special. This complies with Hill's (1995) insistence that non-subjective, contextually specific criteria must be used to identify 'exceptional' deposits in Iron Age hillforts and settlements. Because it is not sound to apply contextually specific criteria indiscriminately as a general rubric for identifying placed deposits anywhere (Brudenell & Cooper 2008: 19), contextually specific criteria must be constructed for identifying placed deposits in Anglo-Saxon settlements. That is the responsibility of the next chapter.

2.4 Summary

In this section a new model of formation process theory has been developed and utilized to realign the overlapping and often inconsistent definitions of structured and placed deposits that have found their way into current use. *Structured deposits*, originally

[7] It would be trivial to consider placed deposits that are indistinguishable from the surrounding material despite being specially selected, treated, and/or arranged because it would be impossible to identify them.

defined as the result of the repetitive, formalized manipulation of material and identified by patterns in terms of composition, context, and distribution (Richards & Thomas 1984), are now further defined as deposits resulting from a specific category of formation processes: namely those characterized by the *active deposition* of that material into the archaeological record. By grounding the definition of structured deposits in formation theory, the original definition of structured deposits is reaffirmed, and blurry ideas as to whether such deposits must be the result of ritual or ritualized activity are eliminated. *Placed deposits* are distinguished as structured deposits that consist of material that has been *specially selected*, *treated*, and/or *arranged*, a level of care indicating that they are not simply being removed from the behavioural system, but on the contrary are expected to exercise agency, either through or after deposition. The characterization of selection, treatment, and arrangement as 'special' is contextually specific, requiring an objective contrast with material from similar or surrounding contexts. The identification of both structured deposits and placed deposits is objective and empirically based, rather than dependent upon modern notions of what constitutes special material, or preconceived interpretations of the deposit or the intentions motivating the act of deposition. The definitions and terminology developed in this chapter will be used throughout this thesis, except where there is value in retaining the nomenclature of previous research.

It is accepted that a significant difficulty in identifying structured and placed deposits lies in recognizing active deposition in the archaeological record. Identifying formation processes from the archaeological record is a thorny matter indeed, and as much as this chapter has considered them in theory, the formation processes of real deposits must always be assessed on a case-by-case basis.[8] Most archaeological contexts are formed through a combination of cultural formation processes in addition to one or

[8] This has also been argued by Morris and Jervis (2011: 74–77).

more natural formation process, and rarely are any of these processes obvious at first glance. In collecting data for this study, the formation processes of contexts were considered individually as necessary in order to identify and interpret placed deposits.

Chapter 3
Identifying placed deposits in Anglo-Saxon settlements

The purpose of this chapter is to establish contextually specific criteria for identifying possible placed deposits in Anglo-Saxon settlements. As defined in Chapter 2, placed deposits are a subset of structured deposits consisting of material that has been specially selected, treated and/or arranged, as compared to material in similar and surrounding contexts. Criteria for identifying possible placed deposits must therefore be established specifically for Anglo-Saxon settlements (§2.3). This task requires two distinct analytical steps. First, the general characteristics of material in Anglo-Saxon settlements must be established so that contrasting characteristics can be identified. The second step is to show that these contrasting characteristics result from different formation processes than those that formed the material in similar and surrounding contexts: namely, that the material was specially selected, treated, and/or arranged.

The first part of this chapter establishes the general characteristics of material in Anglo-Saxon settlements (§3.1). Using these general characteristics, the second part infers a variety of processes contributing to the formation of the Anglo-Saxon settlement assemblage (§3.2). Material with certain contrasting characteristics is shown to have been specially selected, treated, and/or arranged; these contrasting characteristics are signifiers that can be used to identify possible placed deposits.

3.1 Characteristics of Anglo-Saxon settlements

The contrast between placed deposits and the material in similar and surrounding contexts is crucial to the definition of placed deposits (§2.3). In order to identify specially selected, treated, and/or arranged material, it is necessary first to identify some typical characteristics of the material recovered from Anglo-Saxon settlements. Hill (1995: 37–44) adopts a quantitative approach to identifying typical and exceptional characteristics of individual fill layers within Iron Age grain storage pits. As this section is intended to characterize the entire Anglo-Saxon settlement assemblage, a more qualitative approach must satisfy.

3.1.1 The material comprising the assemblage

Anglo-Saxon settlements produce mostly domestic material (e.g. animal bones, potsherds, spinning and weaving equipment, metalwork and other artefacts) in varying degrees of fragmentation. As is conventionally done during excavation, throughout post-excavation analysis, and in the final site report, this material can usefully be divided into three main classes: unworked bone, pottery, and 'small finds' (sometimes called 'registered finds'). Material whose characteristics (e.g. form, distribution, frequency and associations; Schiffer 1987: 15–21) stand in contrast to the usual patterns may have been specially selected, treated and/or arranged. Some usual and unusual characteristics of each class of material are listed below.

Unworked bone. On Anglo-Saxon settlements where soil conditions favour bone preservation, unworked animal bone is usually recovered in larger quantities than any other category of find, whereas human bone is comparatively rare. The animal bone is usually disarticulated, fragmented, and well distributed throughout the contexts in which it is found. Individual bones may or may not exhibit direct signs of butchery, but the high

level of disarticulation and fragmentation suggests that most animal bone ultimately derives from butchering processes. Articulated remains (not fully exploited for meat, hides, etc.) and clusters of animal bone stand out in contrast to the vast majority of the animal bone assemblage. It is relatively unusual to find significant quantities of human bone in Anglo-Saxon settlements because cemeteries were usually separate and distinct from settlements in the Anglo-Saxon period, but there are rare examples of disarticulated human bone as well as complete inhumations.

Pottery. After animal bone, pottery represents the second largest class of material found in Anglo-Saxon settlements. Like animal bone, pottery sherds are not concentrated but dispersed throughout the fills of features, highly fragmented, and quite worn (Tipper 2004: 112). Vessels are rarely reconstructable, and where cross-joining is possible it is usually limited to a few sherds (*ibid.* 120–121, 132–133, 137). Complete and semi-complete vessels, whether broken or intact, are comparatively rare.[9]

Small finds. Anglo-Saxon settlements contain a rich variety of small finds. Tools for textile production, dress accessories, combs, and glass objects are frequently recovered as fragments, but knives and toilet implements are more likely to be recovered complete. Once again, small finds are usually isolated finds rather than clustered or in discrete deposits.

3.1.2 The contexts in which the material is found

As is almost universally true of settlement archaeology, most of the material recovered from Anglo-Saxon settlements comes from negative features with a domestic primary function, such as postholes, wall slots and trenches, sunken-featured buildings, pits, ditches, and so forth. The bulk of material is well sorted and distributed throughout

[9] 'Complete' and 'semi-complete' vessels may be either intact or broken but reconstructable from the sherds recovered (Chapman 2000*a*: 23).

the fills of these features. Some contexts are more material-rich than others, and dense accumulations of material sometimes occurs in the fills of negative features. However, discrete primary deposits of a single type of material are comparatively rare.

3.2 Formation of the settlement assemblage

As discussed above, the Anglo-Saxon settlement assemblage is characterized by three salient attributes:

- it consists of domestic material;
- it is fragmented to varying degrees;
- it comes from negative features whose primary function was domestic.

Material with contrasting characteristics stands out against the background Anglo-Saxon settlement assemblage, but demonstrating contrasts is not sufficient to identify deposits as placed. It is also necessary to show that the contrasts are due to special selection, treatment, and/or arrangement (§2.3). Prior to making that assessment, it is necessary to consider the formation processes prevalent in Anglo-Saxon settlements in terms of the model advanced in Chapter 2, which distinguishes between passive and active removal and deposition (Tab. 2.1).

3.2.1 Loss, casual discard, and abandonment (passive deposition)

Although much of the material in Anglo-Saxon settlements may ultimately derive from activities characterized by passive deposition, such as loss or casual discard, the evidence argues against these processes being immediately responsible for the formation of most of the Anglo-Saxon settlement record. Loss and casual discard would be expected to result in scattered finds lying on occupational surfaces, the bases of negative features, or the surfaces of intermediate fills of negative features. Surviving Anglo-Saxon

occupational surfaces outside of buildings are notoriously rare (Flixborough, Lincs., Brandon, Suffolk, and Bloodmoor Hill, Suffolk, discussed below, are exceptions), so there is little evidence either for or against loss or casual discard outside of buildings. Survival of floor surfaces within buildings is also unusual. At Frocester Court, Glos., two and three layers of floor deposits survive in parts of post-built Buildings E and 21, preserved through the leveling-off of depressions that had formed through the compaction of soil in earlier underlying features (Reynolds 2006: 136–137). Where the bases of sunken-featured buildings (SFBs) have been interpreted as floors, as in SFBs 1 and 3 at Fremington, Cumbria, they contain very little material directly on the base, indicating that they were kept relatively tidy (Oliver *et al*. 1996: 166). Where SFBs are interpreted as having had suspended floors, as at West Stow (West 1985: 116–121), these floors of course no longer survive intact.

Some lost and casually discarded material collects in negative features. Small objects on the floors of post-built structures and SFBs with sunken floors could slip into stake holes, postholes, or wall trenches. In SFBs with suspended floors, small objects could slip through the floorboards to the base of the pit; this process has been observed in the reconstructions at West Stow (Tipper 2004: 106). Objects lost or casually discarded outdoors may collect in pits, ditches, or gullies. Even negative features that are deliberately backfilled may contain lost or casually discarded objects in secondary or tertiary context if they were contained in the material used for backfilling, such as soil derived from the occupation surface (see below). Whether indoors or outdoors, in primary, secondary, or tertiary context, loss and casual discard should be more likely to result in isolated finds than concentrated deposits of a single type of object, except in areas used for particular activities, such as workshops.

In a few cases the Anglo-Saxon settlement record may include abandoned material. The deposits most commonly attributed to abandonment are stacks or rows of loomweights in SFBs that appear to have been destroyed by fire. In some cases the clay loomweights are scorched or only lightly fired. Such deposits are usually interpreted as the remains of weights hanging from the loom or stored in stacks, preserved *in situ* when the building burned down (e.g. West 1985: 16, 23, 138, figs 35, 71; Philp 1976: 122–123, fig. 4; Jackson *et al.* 1969: 206–210, 213–214, figs 4, 5; for further examples see Tipper 2004: 165–167, tab. 55). It is argued in this study, however, that rows and stacks of loomweights on the bases of SFBs were not simply abandoned but represent placed deposits (§7.5.1).

3.2.2 Deliberate discard (active removal and active deposition)

There is a great deal of active deposition in Anglo-Saxon settlements. Both direct and indirect evidence suggests that in the first instance rubbish was probably deliberately discarded in surface refuse heaps. Although the occupational surface rarely survives in Anglo-Saxon settlements, there are surviving surface rubbish deposits at Flixborough, Brandon, and Bloodmoor Hill (Loveluck & Dobney 2007: 20–29; Tipper 2004: 158; Lucy *et al.* 2009: 116–121). At the middle to late Saxon settlement of Flixborough, occupational surfaces were preserved by the post-occupational accumulation of windblown sand, up to 2 m thick in some places (Loveluck 2007*a*: 6). In the late 7th to early 8th centuries, animal bones, tools and other artefacts were deposited just outside the buildings. The spatial pattern of deposition observed here suggests these deposits formed via the deliberate discard of refuse from the associated buildings (Loveluck & Dobney 2007: 20–21). From the mid 8th through the 9th centuries, this pattern shifted. The same sort of material was deposited either in surface deposits in a shallow central valley or in a

ditch at the western edge of the excavated area, in quantities suggesting that refuse from across the settlement was actively deposited in these two areas (*ibid.* 22–25).

If direct evidence for surface rubbish heaps is scarce, indirect evidence abounds in the fills of SFBs and other negative features, where mixed deposits of both refuse and topsoil appear to be redeposited from surface rubbish heaps (Tipper 2004: 157).[10] The mixed nature of the material and potsherd joins across contexts and features suggests that the surface heaps were extensively and frequently reworked as material was removed for backfilling or manuring and replaced by new refuse. The rubbish deposits at Flixborough also show signs of such reworking (Loveluck & Dobney 2007: 20–29).

At both of these sites, deposits resulting from the deliberate discard of refuse in surface rubbish heaps and the redeposition of material from those rubbish heaps in the backfill of negative features exhibit certain patterns in terms of composition and context, as expected for processes characterized by active deposition (§2.2). With comparatively little material resulting from passive deposition like loss and casual discard, the evidence from Anglo-Saxon settlements points toward the same conclusion that Hill drew for Iron Age settlements in Britain: namely, that the vast majority of the material appears to result from the structured disposal of waste and rubbish (Hill 1995: 95)

3.3 Material that has been specially selected, treated and/or arranged

Having inferred the various processes contributing to the formation of deposits usually found in Anglo-Saxon settlements, it remains to consider the formation of deposits with characteristics contrasting the typical ones described in §3.1. Do these unusual characteristics indicate that such deposits were specially selected, treated, or arranged?

[10] The redeposition of rubbish deposits in SFB pits after the destruction of the superstructure is discussed in more detail in §7.2.3.

It has been shown that most of the material in Anglo-Saxon contexts is domestic material—animal bone, pottery, domestic artefacts, and so forth—discarded or redeposited in the course of day-to-day domestic activity. Any non-domestic material or material that is not normally found in settlements may have been specially selected for deposition. The most obvious of these are human remains, since burials were normally made in cemeteries separate and distinct from settlements. Inhumations associated with settlement features may have been specially selected for burial within settlements.[11] Some human remains recovered from settlements vary significantly in form from the usual Anglo-Saxon mortuary rite. These so-called 'deviant' burials (Geake 1992: 87; Reynolds 2009) can be viewed as specially treated as well as specially selected. Human skulls and other disarticulated human bone, rarely found in settlements, may have been specially treated and/or specially selected for deposition.

The reworking and redeposition of rubbish heaps and other mixed refuse deposits has resulted in a characteristically fragmented and dispersed assemblage of secondary and tertiary material. It is improbable that these processes would produce clusters of like material. In contrast to the formation of the bulk of the settlement assemblage, groups of similar items or large clusters of one kind of material can therefore be viewed as specially treated, and may also have been specially selected for deposition—even though they may also represent primary refuse.[12] For example, collections of artefacts of a single type or associated with a single activity (such as weaving or metalworking); collections of bones from the same animal, species, or age group (e.g. neo-natal animals);[13] and collections of sherds from the same pot or of the same vessel type, fabric type, and so forth may have

[11] However, discrete clusters of such burials should probably be considered small cemeteries within settlements rather than placed deposits, even when they are associated with or near buildings (§8.1.1).
[12] The possibility that the deposition of primary refuse can have more complex motivations than the simple disposal of rubbish will be discussed in §3.4.
[13] Along with articulated skeletal remains (see below), concentrations of disarticulated remains can also be classed as 'associated bone groups', or ABGs (Hill 1995: 27; Morris 2008: 34–35; Morris & Jervis 2011: 67).

been specially selected for deposition. Similarly, complete or semi-complete pots may have been specially selected for deposition, and in any case appear to have been specially treated, since it is unlikely for vessels to survive the reworking and redeposition of rubbish heaps complete or semi-complete.

Disarticulation of animal remains occurred both through butchery for meat and raw materials and through decay, and the reworking and redeposition of surface deposits usually dispersed and fragmented the disarticulated remains. In contrast, articulated animal remains such as complete animals, limbs, torsos, and other articulated segments (so-called associated bone groups, or ABGs) may have been specially treated in deposition.[14] Such deposits may have been specially selected for deposition as well. Even though they could represent primary refuse of butchery waste or animals that were diseased or otherwise deemed unusable, additional complex motivations for deposition may have contributed to their deposition (Hill 1995: 13–14).[15] Groups of skulls, groups of articulated segments, and combinations of skulls or limbs with other articulated bone appear to have been specially selected as well as specially treated for deposition.

Finally, in contrast to the characteristically mixed and dispersed material assemblage in Anglo-Saxon settlements due to the reworking and redeposition of intermediate surface deposits, ordered configurations of material signify special arrangement. It is hard to imagine how stacks, heaps, circles, and other geometric formations could arise by chance. Material on or near the bases of negative features, particularly if the material is also grouped or in the centre of the context, should also be investigated as specially arranged deposits.

[14] See note 13.
[15] See note 12.

3.4 Summary

A variety of formation processes contribute to the formation of the Anglo-Saxon settlement record. Based on the general characteristics of Anglo-Saxon settlements, the most common of these processes is the deliberate discard and the deliberate redeposition of material from rubbish heaps, resulting in highly fragmented assemblages that are dispersed rather than concentrated. However, the contrasting characteristics of some deposits show that they formed from different processes than the bulk of the Anglo-Saxon settlement assemblage: specifically, processes involving special selection, treatment and/or arrangement.

These contrasting characteristics are signifiers that can be used to identify possible placed deposits. It is recognized that some deposits exhibiting unusual characteristics might not be placed, and there are no universal diagnostic identifiers of placed deposition. Not all ABGs are necessarily placed, for example. Determinations must be made on a case-by-case basis, specifically comparing the selection, treatment and arrangement of the deposit to material in similar and surrounding contexts. As discussed in the next chapter, deposits in this study were only identified as placed if they exhibited multiple unusual characteristics in terms of selection, treatment, and arrangement, in order to decrease the likelihood of a mistaken identification (§4.1.2). The analyses of later chapters identify clear patterns in the composition, context, spatial distribution, and stratigraphic associations of the deposits identified in this study, corroborating the identification of these deposits as placed.

It may be noted that placed deposits and redeposited rubbish material could both be present in a single context. It has been observed in a Romano-British setting that a complete or semi-complete object within a context that otherwise contains highly fragmented material ‘is difficult to explain except as the result of a careful and deliberate

placement' (Fulford 2001: 202). At the very least, (semi-)complete objects or discrete quantities of like material represent incidents of primary discard, as has been suggested for groups of loomweights in the otherwise well-mixed surface rubbish deposits of 9th-century Flixborough (Loveluck & Dobney 2007: 24–25). It is necessary to demonstrate on an individual basis that such deposits are specially selected, treated, and/or arranged, but their association with redeposited rubbish does not itself detract from the likelihood that they were placed (*pace* Morris & Jervis 2011: 71–72).

Chapter 4
Data collection and methodology

Having developed contextually specific and objective criteria for identifying placed deposits in early and middle Anglo-Saxon settlements, this chapter puts forward the data collection methods and analytical strategies employed in this study. The first section treats the data collection, including which settlements were examined, on what criteria placed deposits were identified at those settlements, and the characteristics recorded for each deposit. The second section introduces the statistical techniques used to analyse the data, particularly to identify interdependencies and correspondences between characteristics. Finally, the third section outlines the structure of the remaining chapters and denotes some conventions followed in the text.

4.1 Data collection

4.1.1 Selection of settlements for examination

This is a study of placed deposits in rural settlements of the early to middle Anglo-Saxon period (5th–9th centuries) in England. The term 'settlement' can be problematic, since some sites defy archaeologists' classifications.[16] This study follows convention in defining settlements as areas of habitation as indicated by possible dwellings (earthfast structures and SFBs) and other features associated with domestic activity (Darvill 2008: 'settlement'). Placed deposits in cemeteries or elsewhere in the

[16] In the Anglo-Saxon period, the presence of human burials in or near settlements presents a particular problem; see below.

landscape, for example at 'watery places' or the sites of ancient monuments, are not considered.

This study considers placed deposits from rural settlements. Both higher and lower status rural settlements have been included, and some documented Christian sites (*viz.* Eynsham, Wearmouth, Jarrow, Hartlepool, and Hoddom) and possible undocumented Christian sites (e.g. Flixborough; Staunch Meadow, Brandon; and Bloodmoor Hill) have been included in order to investigate the relationship of Christianity to placed deposition. Although there is evidence for placed deposits in *wics* (Morris 2008; Morris & Jervis 2011: 67, 74), sites of this type were excluded from the study. The higher density of occupation in *wics* would likely necessitate more intensive waste disposal strategies heavily featuring deliberate discard and resulting in structured deposits of primary refuse (§2.2). Criteria specific to proto-urban Anglo-Saxon contexts would need to be developed in order to distinguish placed deposits from primary refuse deposits, and/or to identify which if any primary refuse deposits also acted as placed deposits.

A special problem was presented by the presence of human burials in or near settlements. In some cases these were discrete burial areas that could be treated as separate cemeteries, and they were not examined for placed deposits.[17] In the middle Anglo-Saxon period, however, the distinction between inhabited areas and burial areas began to break down, and human burials were increasingly found directly associated with houses and other domestic features (Hamerow 2010*a*: 73). Areas of settlements in which earthfast structures and SFBs were present were therefore included in the study, and human burials associated with those structures were included as placed deposits. Chapter 8 tackles the question of burials in settlement contexts in detail.

[17] An exception is at Mucking, where animal burials associated with two *Grubenhäuser* in Cemetery II were identified as placed deposits in settlement contexts because that type of structure is usually identified with domestic functions (Tipper 2004: 160–185).

The chronological span of the 5th through 9th centuries was selected to enable consideration of how placed deposition changed in settlements in the late 6th and 7th century, a period when settlements were developing clear boundaries and foci (Reynolds 2003; Hamerow 2010*b*). It was hoped this would in turn yield a better understanding of the role placed deposits played in structuring settlements in both the early and middle Anglo-Saxon periods. Clear evidence has been found of placed deposits in the late Saxon period (Thomas 2008: 382–393; Morris 2008; Morris & Jervis 2011: 73), but whether placed deposition continued with similar intensity or how its characteristic patterns compared to the early and middle Anglo-Saxon periods cannot be assessed from this study.

It is not an objective of this study to create a comprehensive gazetteer of placed deposits in Anglo-Saxon settlements. Nevertheless, a substantial sample of placed deposits was needed in order to enable statistically significant results to be obtained from the data analysis. Even though there are comparatively fewer excavations of Anglo-Saxon settlements than cemeteries, and still fewer large-scale excavations, the amount of published and unpublished material for Anglo-Saxon settlements is still immense. The most recent (and therefore still definitive) gazetteer of approximately 200 Anglo-Saxon settlement sites was compiled by Philip Rahtz in 1976. It is difficult to quantify how many sites with early to middle Anglo-Saxon settlement features have been discovered since then, but at the time of writing, a search for settlements of the 'early Medieval' period (AD 410–1066) in England using the Archaeological Data Service's 'ArchSearch' web resource returns 2,324 results.[18] Considering the time-consuming, close examination required of each site report in order to identify placed deposits, priority needed to be given to settlements likely to provide examples of placed deposits that were well

[18] http://ads.ahds.ac.uk, accessed 13 July 2011.

excavated and well recorded, and whose presence within the settlement was clearly situated.

Research was mostly limited to excavations published from 1990 onwards that produced a significant number of early to middle Anglo-Saxon settlement features. If an excavation uncovered at least two earthfast buildings and/or five sunken-featured buildings it was considered to have a significant number of Anglo-Saxon settlement features. Excavations producing fewer early to middle Anglo-Saxon features were deemed less likely to include placed deposits and also provide too limited a context within which to analyse any deposits. Recent excavations are more likely than older excavations to have employed more detailed site recording strategies (including soil micromorphology, three-dimensional provenancing using a total station, etc.). Such records are vital to the identification of some placed deposits, such as sets of objects, deposits that may have included organic material, and deposits in the fills of negative features. Outside of these general bounds, settlements that were less extensively or less recently excavated were also examined if another source referred specifically to a possible placed deposit.[19] Unpublished ('grey') literature was examined under the same circumstances.

A total of 127 settlement excavations containing early to middle Anglo-Saxon features were thoroughly examined for placed deposits; at an additional 14 settlement sites, only specific references to possible placed deposits were followed up. These settlements are listed in Appendix A along with references. Most of these settlements were identified by systematically working through the 1990 through 2008 volumes of major archaeological journals, most regional archaeological journals, and journals focused on early medieval archaeology in England, including the fieldwork notes in

[19] Such sources include published site reports, Rahtz's (1976) gazetteer, fieldwork notices in *Medieval Britain and Ireland* or the *Medieval Settlement Research Group*, or personal communications.

Medieval Britain & Ireland and the *Medieval Settlement Research Group*, and by an online search of the British and Irish Archaeological Bibliography (<http://www.biab.ac.uk/>) for monographs and articles of Anglo-Saxon settlement excavations published in the same period. The Archaeological Data Service's 'Grey Literature Library' was searched for unpublished early medieval settlement excavation reports (<http: //archaeologydataservice.ac.uk/archives/view/greylit/index.cfm>). As a result, the sample of rural settlements examined is a representative sample of early to middle Anglo-Saxon rural settlements excavated to date. It includes settlements of various size and status, and the distribution map of settlements examined shows a concentration in the southeast of England that probably reflects the true distribution of Anglo-Saxon settlements of the period (Fig. 4.1).

4.1.2 Identification of placed deposits

Chapter 3 has established that the Anglo-Saxon settlement assemblage is typically characterized by fragmented domestic material well dispersed throughout the fills of negative domestic features, and that material with contrasting characteristics was deposited via different formation processes, including placed deposition. Examples of contrasting characteristics that might signify special selection, special treatment, and special arrangement were discussed at some length in Chapter 3. In this study, placed deposits were identified by examining excavation reports for a more extensive range of signifiers, summarized in Table 4.1. The signifiers of special selection, treatment, and arrangement vary according to material type, though there are some signifiers that can be used for all material types. Additionally, some of the characteristics are only possible signifiers of special selection, treatment, and/or arrangement.

It is acknowledged that, individually, any one of the characteristics in Table 4.1 might result from a process other than placed deposition. Therefore, a deposit was only confidently identified as placed if it exhibited a signifier from at least two of the columns in Table 4.1, or a signifier from one column and possible signifiers from the other two columns. Deposits exhibiting multiple signifiers of special selection, treatment, and/or arrangement are more likely to be correctly identified as placed.

Using these criteria, 151 deposits have been confidently identified as placed. These came from a total of 67 settlement excavations: 55 (43%) of the 127 excavations that were thoroughly examined, plus 12 of the 14 settlements for which only references to specific deposits were followed up (see above). The placed deposits are recorded in Appendix B, along with references and a number of characteristics for each deposit, including:

- Composition of deposit (type of material, condition of material, etc.)
- Context of deposit (including location within context, and location of context within feature)
- Positioning of deposit (orientation, arrangement, grouping, etc.).
- Any associations with nearby features
- Date and basis for dating

The analysis in the following chapter has been performed on the 151 placed deposits in Appendix B. An additional 74 possible placed deposits, which exhibited some signifiers or possible signifiers of special selection, treatment, and/or arrangement but which did not satisfy the criteria described above, are not listed in Appendix B and were not incorporated in the data analysis.[20] Nevertheless, some of these possible placed

[20] Even though some of these might actually have been placed deposits, it is not expected that including possible placed deposits in the correspondence analyses (see below) would significantly affect the results, since none of the correspondences tested for special selection, treatment or arrangement. It would be possible to re-run the correspondence analyses with the possible placed deposits included. If the results

deposits can be shown to fit patterns identified during the course of the data analysis, and on that basis are indeed probably placed deposits. They are often referred to as corroborating examples in the discussion of the data analysis.

4.2 Data analysis

4.2.1 Introduction

The goal of the present study is to identify and interpret patterns of placed deposition in Anglo-Saxon settlements, by considering a number of characteristics:

- *Composition*. The contents of placed deposits were categorized according to object type and, in the case of bone deposits, species and degree of articulation (Ch. 5).
- *Context*, categorized as the type of feature in which the deposit was placed (Ch. 5).
- *Location within the settlement*. This characteristic consists of association with other settlement features such as buildings or boundaries (Ch. 6).
- *Timing of deposition* relative to the history of the feature in which it was placed (Ch. 7).

The geographical distribution of placed deposits and chronological changes between the early Anglo-Saxon (5^{th}–7^{th} centuries) and middle Anglo-Saxon (7^{th}–9^{th} centuries) periods receive appropriate attention when applicable.

Assuming that placed deposits were made in specific circumstances and for specific purposes, the first four characteristics are likely to change according to those

---

were the same, they would either be corroborated, or it might mean that the observed correspondences were true for non-placed deposits as well. If they were significantly different, it could just mean that most of the possible placed deposits were not placed and obscured the correspondences with noise.

circumstances and purposes because they directly reflect special selection, treatment, and arrangement. By identifying recurring patterns among these four characteristics, it is hoped that some insight may be gained to what those circumstances and purposes were. The first four characteristics are not the only ones that might reflect the circumstances and purposes of placed deposition, but they are readily retrievable from most published site reports, they are broad enough to be supported by a data set of the size available, and they are hypothetically independent characteristics. Thus they provide a good starting point for identifying patterns in placed deposition. As patterns begin to emerge, further characteristics may present themselves as appropriate for analysis. Indeed, in Chapter 8, placed deposits of human remains are analysed according to age, sex, and treatment in burial, among other characteristics.

The first four characteristics listed above are discrete or 'categorical' variables: non-metric traits that have no intrinsic ordering (Fletcher & Lock 2005: 4). As such, they lend themselves well to two statistical techniques. The first is Pearson's chi-squared test, a well-known bivariate statistical test for dependence that applies to categorical as well as non-categorical variables (*ibid.* 129). The second is correspondence analysis, a multivariate technique that has been successfully applied to archaeological data in the past. This study uses the programming language R to perform chi-squared and correspondence analysis (R Development Core Team 2009). Both Pearson's chi-squared test and correspondence analysis are established analytical techniques, but because of certain idiosyncrasies in the placed deposit data, discussed below, it is necessary to discuss their application to the current data set in some detail in order to understand fully the significance of results of this study's data analysis.

4.2.2 Pearson's chi-squared test

Pearson's chi-squared test begins with a matrix called a *contingency table*, in which the rows and columns represent two different types of characteristics; in the current study, two such characteristics are object type and context type. Table 4.2 is an artificial example of a contingency table using these two characteristics; object types fit into the categories *a*, *b*, *c*, *d*, and *e*, and context types are categorized as *u*, *v*, *w*, and *y*. The individual cells in a contingency table indicate the frequencies with which the categories of one characteristic occurred together with the categories of the other characteristic; in Table 4.2, the value in the first cell indicates how many times object type *a* was found in context type *u*; the value in the second cell is the count of object type *a* in context type *v*, etc.

Pearson's chi-squared test assumes that if object type and context type were independent characteristics, then (given a large number of placed deposits) each type of object would be proportionally distributed across the contexts according to the total number of deposits in each context type: in other words, given a row total, the values in each cell across the row would be expected to be proportional to the column totals. (The analogous is true for each value in a column.) The expected value of any cell, therefore, is calculated from the totals of its row and its column:

$$\text{expected value} = \frac{(\text{row total}) \times (\text{column total})}{(\text{table total})}$$

For example, in Table 4.2, row *b* has a total of 24; multiplying this by each of the four column totals in turn and dividing by the table total of 100, the values in row *b* would be expected to be (9, 5, 5, 5). Their actual values are obviously quite different; there are actually five more occurrences of object *b* in context *u* than expected, three more in context *v*, and four fewer each in contexts *w* and *y*. Pearson's chi-squared test compares the expected value to the observed value for each cell in the contingency table, and by

summing these differences over the entire table (the exact calculation is simply described in Fletcher & Lock: 129–134), produces a test statistic χ^2. Large values of χ^2 are unlikely to arise under the so-called 'null model', in which object and context are independent variables. In fact, we can calculate the probability p for a test statistic as large as χ^2 or larger to occur by chance if the two variables are truly independent. The lower the value of p, the more likely that the two variables are dependent; by convention, values of $p \leq 0.05$ are interpreted as statistically significant. This study performs the chi-squared test using the chisq.test(x, …) function in R (R Development Core Team 2009). For Table 4.2, $\chi^2 = 87.0238$, df = 12, $p = 1.856 \times 10^{-13}$, indicating that there is only a negligible chance that the object type and context type are not dependent variables.[21]

As classically employed, Pearson's chi-squared test requires observed values of at least 4 or 5 in each cell of the contingency table in order to give reliable estimates for p given χ^2. This condition was not often satisfied in the present study, nor is it satisfied by Table 4.2. It is possible to circumvent this problem using a Monte Carlo simulation. This involves randomly generating a large number of synthetic replicates of Table 4.2, created using draws from the null model (in which the rows and columns are independent) adjusted so that the expected values of each cell are calculated from the row and column totals. The chi-squared test is performed on each synthetic table, resulting in a distribution of χ^2 values. This distribution is compared to the χ^2 value obtained from the actual data. The simulated probability, p, that the two variables are independent is then equivalent to the proportion of synthetic χ^2 values that are greater than χ^2 as calculated from the actual data (G. Nicholls, pers. comm.). This time-consuming analysis requires a computer; in this study, the chi-squared test with Monte Carlo simulation was performed in R by setting the simulate.p.value argument of the chi-squared function to

[21] 'df' denotes the degrees of freedom in the contingency table.

TRUE and using one million synthetic replicates of the contingency table (R Development Core Team 2009). For Table 4.2, the simulated probability $p = 1 \times 10^{-6}$, affirming that object type and context type are dependent variables.

4.2.3 Correspondence analysis

The second technique is *correspondence analysis*, a multivariate statistical technique that can be used to illustrate the nature of dependency among categorical variables (Hill 1974). Since computers made the necessary calculations feasible, correspondence analysis has been used widely and effectively on archaeological data, both to identify clusters of archaeological 'units' (such as sites or graves) that have similar characteristics and to develop seriations (e.g. Bølviken *et al.* 1982; various authors in Madsen 1988; Jensen & Høilund Nielsen 1997). The technique has less frequently been used to find associations between hypothetically independent characteristics of archaeological data; for example, Barclay *et al.* used it to look for correlations between type of find and type of site at medieval Winchester (Barclay *et al.* 1990: 47–66). In this study, I have used the programming language R to perform correspondence analysis, using the corresp(x, ...) function, available in the MASS package, and plotting the result using the biplot(x, …) function (R Development Core Team 2009; Venables & Ripley 2002).

There is no need to detail the mathematics of correspondence analysis here, as numerous expositions have been published; for example, a thorough and relatively accessible presentation can be found in Baxter (1994: 100–139). What follows is a brief summary of the procedure, its strengths and weaknesses, its applicability to the current data set, and how to interpret the results.

Like Pearson's chi-squared test, correspondence analysis begins with a contingency table, such as Table 4.2, but instead of comparing the expected values to the observed values in each cell, it compares the expected and observed 'profiles' of each row and column. Recall that, based on the row and column totals, the expected values for row *b* are (9, 5, 5, 5): this describes the expected profile of row *b*. The observed profile of row *b* is more heavily weighted towards column *u* and *v* than expected, and less heavily weighted toward columns *w* and *y*. The profile of row *a* has a similar 'shape', whereas the profiles of rows *c*, *d*, and *e* are weighted against the first two columns. The profiles of the context types (columns) can be compared in an analogous way.

In correspondence analysis, the profiles of each row (object type) in the contingency table are compared, and the differences between the profiles are quantified as 'distances' (Baxter 1994: 110–111). An analogous calculation is done for the columns (context types). The results are visualized on a graph, with each row and column represented as a single point (Fig. 4.2). Because the calculations are symmetric, the row and column points can be plotted on the same set of axes (*ibid.* 112). The distance of each row (or column) point from the origin represents the extent to which the observed profile deviates from the distribution that would be expected by chance, and the direction from the origin depends on the direction of that deviation. For example, Figure 4.2 indicates that object types *a* and *b* deviate similarly from a random distribution, but in an opposite direction to object types *c*, *d*, and *e*, as noted above. Furthermore, if a row point is near to a column point, it indicates that the deviations in the profiles of the object types and context types are associated. In Figure 4.2, the groups on the right can be interpreted to mean that object type *c* was found more frequently in context type *w* than could be expected from chance, and that object types *d* and *e* were similarly associated with

context type *y*; but *c*, *d*, and *e* were all more closely associated with context types *w* and *y* than with *u* and *v*.

Three mathematical properties of correspondence analysis are worth highlighting. First, differences between the row profiles are calculated from the proportions of the row totals, rather than from the absolute values of each cell: this means that rows with large and small totals are given equal weight in the calculation. Moreover the contribution of each column to the profile of the row is inversely proportional to the column total, so that columns with large and small totals are given equal weight in the calculation of row distance (Baxter 1994: 111). These two features help to ensure that correspondence analysis compares the shapes rather than the magnitudes of the row profiles and, analogously, the column profiles; in other words, common object types and context types are not allowed to influence the correspondence analysis by their comparative frequency. Second, although rows or columns with low totals may show strong correlations, these correlations should nevertheless not be trusted. Considering the small total number of object type *e* in Table 4.2, it is plain that Figure 4.2 overstates the strength of its association with content type *y*. This is because *e*'s profile is weighted at an inverse proportion to its row total, as discussed above. Indeed, row *e* could be excluded from the correspondence analysis (*ibid.* 115). When this is done, the resulting plot shows the same correspondences for the other characteristics (Fig. 4.3). This exemplifies the third property: namely, that including rows or columns with small totals will often not obscure correlations between other rows or columns. This is a useful property when rows or columns with small totals need to be included for archaeological reasons.[22]

Correspondence analysis can be thought of as a principal components analysis (PCA) of the chi-squared residuals, meaning that the eigenvalues of that PCA can be used

[22] Even then care must be taken, as undue influences can occur, especially when rows and columns both with small totals occur together in the same contingency table.

to estimate how completely the graph illustrates any dependence between the variables (Baxter 1994: 114–115). Crudely stated, the sum of the first two eigenvalues can be compared to the total sum of all the eigenvalues (the 'total inertia') to measure the proportion of the dependence between the two variables that is represented by the graph.[23] The closer that proportion is to 1, the more completely the graph illustrates the dependence between the variables. The proportions of the total inertia represented by the first two eigenvalues has been presented on the corresponding axes of each biplot produced from correspondence analysis.

Table 4.2 is a two-way contingency table in which both the rows and columns are archaeological 'variables'; the individual placed deposits are summarized in the cells of the contingency table. In most archaeological applications of correspondence analysis (e.g. various authors in Madsen 1988), the rows in the contingency table are archaeological 'units', such as graves, and the columns are all categories of the same characteristic, such as brooch type. If each grave has more than one brooch type within it, then when the graves are plotted alongside the brooch types in the graph, it is possible to identify clusters of graves containing brooches of similar type, and seriations of brooch type across time, space, social status, etc. However, this approach was not chosen for the present study for two reasons. First, most of the characteristics listed at the start of this section can only take one value per placed deposit. Performing correspondence analysis on a contingency table in which the rows are placed deposits and the columns are context types would not produce a meaningful result because each placed deposit has only one context type. The exceptional characteristic is composition, since placed deposits can contain more than one material or object. Second, the primary goal of the study is to

[23] The corresp(x, …) function returns 'first canonical correlations', the squares of which are the eigenvalues (Anderson 1984), but in this study, the eigenvalues were actually obtained using another correspondence analysis function written for R. The function ca(obj,…) from the ca package (Greenacre & Nenadic 2007) does not produce a biplot but does return the first three eigenvalues and their relative contributions to the 'total inertia'.

identify patterns *between* characteristics, such as composition and context. Reordering the placed deposits in order to identify 'clusters' of similar placed deposits or seriations across time or space is not a priority; true seriation of placed deposits probably could not be detected even if it did exist, given the relatively small number of placed deposits (151) and that most of the characteristics have a small number of categories that are all very different from each other.

An idiosyncrasy of this study's data set is that there is not always a one-to-one relationship between the variables being compared. This affects both the chi-squared test and correspondence analysis because in a contingency table summarizing these two variables, such a deposit would be counted more than once. For example, a placed deposit in context type *u* that contained object types *a* and *b* would appear under column *u* twice in Table 4.2: once in row *a* and once in row *b*, as if it were really two separate placed deposits in two different contexts of type *u*. This is an idiosyncrasy that must be acknowledged. Provided that no single deposit contains a large number of object types, it is unlikely to distort the correspondence analysis significantly (G. Nicholls, pers. comm.). That proviso always holds in this study, since each object type is counted only once per placed deposit and in each contingency table the number of object types is small compared to the number of placed deposits being analysed. The effect on Pearson's chi-squared test of multiple object types in a single placed deposit, however, cannot be ignored, but it is not necessarily problematic because it might accurately reflect the depositional act, for example if each object type were selected individually for deposition.

4.3 Strategy and conventions

The following four chapters present and discuss the analysis of the 151 placed deposits identified in this thesis and listed in Appendix B. Chapter 5 investigates

relationships between the composition of placed deposits and the contexts in which they were placed, as well as correspondences between different types of material in the same deposit. Chapter 6 explores the spatial distribution of placed deposits within the settlement, whereas Chapter 7 analyses the timing of placed deposition within the formation of features. Chapter 8 considers the specific question of human burials in settlement contexts. In each of these chapters, the results of the analysis will be discussed. Overarching themes arising from the results of all four chapters are considered in the context of current Anglo-Saxon scholarship in Chapters 9 and 10.

Throughout the text, placed deposits are identified by feature and site name. The 151 deposits confidently identified as placed are visually distinguished using Arial typeface and underline: for example, SFB 118 at Audlett Drive, Abingdon. Detailed descriptions of these placed deposits as well as references may be found in Appendix B, which is organized alphabetically first by site then by feature. References for placed deposits in the gazetteer are therefore omitted from the main text.

Chapter 5
The piglets and the pot: patterns of composition and context

SFB 1351 at Brooklands, Milton Keynes contains arguably the most complex placed deposit in this study (Fig. 5.1). Spread on the base of the pit was a collection of disarticulated animal bone, including an adult pig jaw, surrounding a burnished jar that was complete except for a hole drilled into its body. The jar was interpreted by the excavators as a ritually 'killed' vessel (Stansbie 2008: 27). From the soil inside the jar came a single pike vertebra, and head bones from at least ten more pike were recovered from soil samples taken from the lower fill of the SFB. Also in the lower fill was a relatively unabraded sherd of Oxfordshire white-ware mortarium, an import to the site since there is no known Roman presence at Brooklands, and most spectacularly 33 articulated segments of fetal or newborn piglets.

Do the various compositional elements in this SFB represent a single deposit, or multiple deposits within the same context? Are all of the objects placed, or were some incorporated into the deposit by accident, through rubbish disposal or redeposition? What if any significance can be attributed to the association of the objects that were placed? This chapter seeks to identify and interpret associations within the same placed deposit between different types of object and different species of animal. It also seeks to identify and interpret patterns of association between composition and context.

5.1 The contents of placed deposits

In order to investigate patterns in the composition of placed deposits, the contents have been categorized according to two characteristics: by object type and (for skeletal remains only) by species. The categorizations of these two characteristics are discussed below. For skeletal remains, dependence between object type and species is not assumed, but it is tested for later in this chapter.

5.1.1 Object types

Object types have been defined first by classifying them according to type of find (skeletal remains, pottery, or small finds) and then, in the case of skeletal remains, by degree of articulation, or, in the case of artefacts, by type of artefact:

- skeletal remains (human or animal):
    - complete or nearly complete articulated skeletons;
    - articulated segments (limbs, axial segments, etc.);
    - skulls;
    - disarticulated bone;
    - cremation pyre debris;
- pottery:
    - complete or semi-complete vessels;
- artefacts:
    - loomweights;
    - lead rings or discs;
    - lead vessels;
    - other artefacts or sets of like artefacts;
    - metalworking debris.

A few notes on the above categories are appropriate. Human and animal skeletal remains have been grouped together in the classification of object types because it cannot be taken as given that human and animal remains were viewed or treated differently in placed deposition (Hill 1995). Whether or not they were is considered throughout the analysis that follows. Although collections of loomweights could be regarded as selected assemblages of small finds, their frequent occurrence on their own (in 32 deposits) justifies categorizing them separately. There are a number of possible placed deposits of artefact assemblages that may be linked to gender or the household, such as a 'distinctly "female" assemblage' in SFB 12 at West Stow (West 1985: 20), but none of these could be positively identified as placed according to the criteria specified in Chapter 4.

Articulated skeletal remains and/or disarticulated bone from a single individual are sometimes grouped together under the heading 'associated bone groups', or ABGs (Hill 1995: 27; Morris 2008: 34–35; Morris & Jervis 2011: 67). In this study, skeletal remains were broken down further according to degree of articulation and parts of the body represented in order to enable analysis of patterns on that basis. Because categorizing skeletal remains according to degree of articulation was sometimes problematic, a few comments are called for.

Deposits described in excavation reports as 'semi-complete' or 'semi-articulated' have been classified in this study either as complete skeletons or as articulated segments, depending upon the cause and degree of dismemberment. Skeletons that appear to have been post-depositionally disturbed or affected by truncation, ploughing, bone decomposition, or other taphonomic processes, but that may nevertheless have been deposited as complete skeletons have been included as such; they are identified as *?complete* in Appendix B. In other cases, limited dismemberment has taken place, as in the small dog on the base of SFB 118 at Audlett Drive, Abingdon, whose hindlegs were

absent, or the cow near the base of Pit 977 at Eye Kettleby that was complete except for its missing skull. It was deemed appropriate to count nearly complete skeletons, described as **complete* in Appendix B, together with complete articulated skeletons for the purposes of statistical analysis.

On the other hand, some 'semi-complete' or 'semi-articulated' remains, such as the semi-articulated piglets in SFB 1351 at Brooklands, were at a more advanced stage of dismemberment, and are better included with 'articulated segments'. Most other deposits of articulated segments contained either limbs or axial segments. It was decided to group these deposits together under 'articulated segments', in order to obtain statistically desirable higher frequencies for that category. However, the six deposits containing articulated limbs and three containing axial segments will be considered in the analysis that follows in order to detect any distinction in terms of association with other object types or with particular species or contexts.

The two complete pots in placed deposits have been grouped together with semi-complete vessels ranging from 20 per cent to 99 per cent complete as specified in the excavation reports. An argument could be made for distinguishing between complete and semi-complete forms based on the fact that some vessels seem to have been deliberately broken before deposition; however, it is not possible to discern any differences in the placement of complete versus semi-complete vessels with only two complete examples.

The frequencies of object types are shown in Figure 5.2. Articulated skeletons and skulls together comprise a significant majority of the skeletal remains, and nearly half of all objects found in placed deposits. The proportional representation of the different types of skeletal remains broadly affirms the results of Hamerow's preliminary survey (Hamerow 2006: fig. 1).

The geographical distribution of placed deposits containing each of the nine most frequent object types are shown in Figure 5.3. Most of the object types are representatively distributed geographically among settlements where placed deposits have been found; however, lead vessels are notably clustered near the Humber estuary. Complete or semi-complete pots and lead rings or discs were primarily found in placed deposits in southern England.

5.1.2 Species

A wide variety of animal species were represented in placed skeletal remains (Fig. 5.4). The distribution by species in placed deposits was compared to the overall animal bone assemblage in early to middle Anglo-Saxon rural settlements (Tab. 5.1, Fig. 5.5). It is noteworthy that, among animal species, horses and dogs were disproportionately represented in placed deposits; to a lesser extent, so were wild species. Cattle were more-or-less proportionally represented in placed deposits, whereas sheep and pig were poorly represented in placed deposits compared to the overall assemblage. Overall, it is possible to distinguish species into three distinct groups (Fig. 5.6)

- dogs and horses were overrepresented in placed deposits by factors of 27 and 9, respectively;
- cattle were found in placed deposits and in the overall animal bone assemblage in roughly equal proportions;
- sheep and pigs were underrepresented in placed deposits by factors of 4 to 2.5, respectively.

Cats and wild animals were also grossly overrepresented and can be provisionally grouped with dogs and horses on that score, while domestic fowl were underrepresented

by a factor of 4 and may be provisionally grouped with sheep and pigs. However, the raw frequencies of these three species are too small to draw any firm conclusions.

It would overstate the point to read too much significance into the factors of over- or underrepresentation. The three groups merely indicate that the over- or underrepresentation of species in placed deposits is not the product of chance. These results affirm Hamerow's preliminary analysis, particularly in the high proportions of placed deposits containing horses and dogs (Hamerow 2006: 8), two species that are also disproportionately well represented in Iron Age placed deposits (Hill 1995).

Human remains were also found in placed deposits, in similar numbers to cattle (Fig. 5.4). A large number of the human remains were complete inhumations in purpose-dug graves. Chapter 8 considers to what extent these acted as placed deposits. The geographical distribution of the six most common species in placed deposits (human, cattle, horse, dog, sheep/goat, and pig) are shown in Figure 5.7. The geographical distribution of species appears to fit the overall geographic distribution of settlements in which placed deposits have been found.

5.2 Contexts containing placed deposits

Placed deposits were identified in a range of contexts (Fig. 5.8). Notably, no deposits confidently identified as placed were found in the postholes or foundation trenches of earthfast structures, although there were a number of placed deposits in pits or graves associated with earthfast structures.[24] Hamerow notes that the gold Merovingian coin in the foundation trench of Building A3(b) and a small ring of gold wire in a posthole of Building A4, both at Yeavering, might have been deliberately placed, but the evidence is not conclusive (Hamerow 2006: 26 n. 108; Hope-Taylor 1977: 182–183).

[24] Associations of placed deposits with nearby settlement features are considered in Chapter 6.

SFB pits and graves have been distinguished from other pits. The contents of SFB pits cannot be directly related to the use of the building (Tipper 2004); the relationship of placed deposits in SFB pits to the lifecycle of the building is a main focus of Chapter 7. Graves have been defined as features that contain complete human inhumations and are similar in plan and profile to graves in Anglo-Saxon inhumation cemeteries. Irregularly shaped features have been classed as pits even when they contained complete articulated humans (e.g. pit α at Sutton Courtenay), and pits containing complete articulated animals (and no human remains) have not been classed as graves even if they appear to have been purposely dug for the animal 'burial' (e.g. pit F2250 at Godmanchester). These definitions necessarily impact the analysis, and this has been taken into account as described in the relevant sections. There has been no attempt to distinguish other categories of pits, as the function of pits in Anglo-Saxon settlements is still poorly understood (Morris & Jervis 2011: 73).

The geographic distribution of the four most frequently occurring context types (SFBs, pits, ditches, and graves) is shown in Figure 5.9. The only context type for which a geographical bias is apparent is SFBs. Placed deposits in SFBs are largely concentrated in southern England; however, SFBs are less common in general in northern England (*cf.* Gates & O'Brien 1988).

5.3 The relationship of composition to context

Two kinds of associations are considered in the analysis that follows. This section investigates associations between the contents (object types and species) and contexts of placed deposits. The next section considers patterns within the composition of placed deposits, including patterns in the degree of articulation according to species, and associations between object types (or species) in placed deposits that contain more than

one object type (or species). Patterns involving neonate and juvenile remains are considered in §5.5. The sample set for all of the analysis discussed below (and in subsequent chapters) is the 151 deposits confidently identified as placed, and listed in Appendix B.

5.3.1 Object types and contexts

The frequencies with which object types were found in different types of context are shown in Table 5.2. Not all categories could be included in the correspondence analysis. Metalworking debris, lead vessels, and cremation pyre debris did not occur frequently enough in placed deposits to be included in the correspondence analysis, and 'single artefacts/artefact sets' is too heterogeneous a category to be included. Loomweights, lead rings or discs, and complete and semi-complete pots were also excluded from the correspondence analysis, but for a different reason. All three of these object types were found almost exclusively in SFBs, and the 32 placed deposits of loomweights dominate the 87 placed deposits from SFBs.[25] Since the correspondence between these object types and SFBs is obvious at first inspection of the contingency table, and since the correspondence between loomweights and SFBs is so strong that it would obscure the correspondences for other object types, these three object types were excluded from the correspondence analysis.

Among context types, 'other' contexts occurred too infrequently to be included in the correspondence analysis, while graves were excluded on analytical grounds. Graves contain human remains by definition; in fact, all the graves in the sample contained complete articulated human skeletons.[26] To include graves in the correspondence

[25] The column totals in Table 5.2 are the total numbers of object types placed in each context, not the total number of placed deposits.
[26] Only one of the graves contained other object types: Grave AX at Yeavering included a probable goat skull and a bronze staff in addition to an adult inhumation. These are best understood as grave goods.

analysis would only highlight the predefined connection between human inhumations and graves at the expense of other patterns of association.

Using four object types (complete articulated skeletons, articulated segments, skulls, and disarticulated bone) and three context types (SFBs, pits, and ditches), Pearson's chi-squared test suggests a statistically significant dependence between object type and context type.[27] Correspondence analysis was performed (Fig. 5.10), showing a clear separation into two groups, with disarticulated bone deposits hovering between the two:

1) Ditches show a strong correspondence with articulated segments.
2) Pits and SFBs correspond with complete articulated skeletons and skulls, perhaps indicating a similar purpose for these placed deposits in both contexts. Moreover, complete skeletons and skulls in pits and SFBs dominate the assemblage of placed skeletal remains (Tab. 5.2).

Though it was not part of the correspondence analysis, the association with SFBs shown by complete or semi-complete pots, lead rings or discs, and loomweights is also significant, considering that nearly all placed deposits containing pots, lead rings or discs, and loomweights were made in SFBs. However, these object types do not have a monopoly on placed deposits in SFBs. Although 44 placed deposits in SFBs contained some combination of semi-complete or complete pots, loomweights, or lead rings or discs, a comparable 41 contained human or animal skeletal remains. So whereas pots, lead rings or discs and loomweights are closely linked to SFBs only, skeletal deposits appear in significant numbers both in SFBs and in other contexts as well.

[27] Pearson's chi-squared test with Monte Carlo simulated p-value (based on 1×10^6 replicates): $\chi^2 = 17.8654$, df = N/A, $p = 0.005716$. This analysis is equivalent to degree of articulation versus context. The fact that a small number of contexts contained multiple object types must be noted (§4.2.3), but is unlikely to have had a significant effect either on the chi-squared test or the correspondence analysis.

5.3.2 Species and contexts

The frequencies of species placed in different context types are shown in Table 5.3. The same context types were included in the correspondence analysis as above. Six species occurred frequently enough in placed deposits to be included in the correspondence analysis (Tab. 5.3), but whereas human, cattle, dog, horse, and pig show similar distributions among contexts, with roughly equal occurrences in SFBs and pits and considerably fewer in ditches, placed deposits of sheep/goat remains occur primarily in pits. Since this association is obvious from the contingency table, sheep/goat remains were also excluded from the correspondence analysis, lest that correspondence obscure others.

Pearson's chi-squared test suggests associations between these species and context types may be random.[28] It is still worth considering the possibility that some pair(s) of species and context types are correlated, but that this effect has been masked by other non-correlated variables. Therefore correspondence analysis was performed, but it produced a biplot with a very small scale on both axes (Fig. 5.11). All the points are very close to the origin, and even the possible correspondence between humans and ditches must therefore be considered unreliable.

Nevertheless, some possible patterns deserve notice. A possible association between sheep/goat and ditches has already been mentioned. Although cats did not occur frequently enough to be included in the correspondence analysis, it is interesting to note that all four occurrences of cats in placed deposits came from SFBs. A further possible placed deposits of a cat skeleton came from SFB 1 at Sherborne House, Lechlade (Maltby 2003: 74).

[28] Pearson's chi-squared test with Monte Carlo simulated *p*-value (based on 1×10^6 replicates): $\chi^2 = 2.8623$, df = N/A, $p = 0.953$. The fact that a small number of contexts contained multiple species must be noted (§4.2.3), but is unlikely to have had a significant effect either on the chi-squared test or the correspondence analysis.

5.4 Patterns in composition

5.4.1 Species and degree of articulation

The frequencies of the different species by degree of articulation are shown in Table 5.4.[29] The same six species considered above (all the major domesticates except for cats) occurred frequently enough in placed deposits to be subjected to correspondence analysis. Only a handful of placed deposits contained disarticulated bone from a single species.[30] Because these might have undue influence over the less frequently occurring species (i.e. pig and sheep/goat), deposits of disarticulated bone were excluded from the correspondence analysis.

Pearson's chi-squared test suggests a statistically significant dependence between these six species and degree of articulation.[31] The correspondence analysis illustrated this dependence, showing three clear associations (Fig. 5.12):

1) Dog and human remains in placed deposits are disproportionately likely to appear as complete articulated skeletons. This is in contrast to all the other species, which are disproportionately unlikely to appear in placed deposits as complete articulated skeletons. This suggests a distinction in the treatment of humans and dogs versus other species.
2) Cattle are significantly more likely to be represented in placed deposits by skulls than any other species. Horses have a slight inclination in that direction as well. Notably, there are five placed deposits containing both cattle and horse skulls; these placed deposits and their contents are summarized in Table

[29] This analysis is equivalent to object type versus species because, as discussed above, degree of articulation is the second determinant of object type for bone deposits.
[30] Placed deposits containing disarticulated bone from a mix of species were excluded altogether from this analysis. There is no evidence whether or not the incorporation of any particular species within that deposit was intentional.
[31] Pearson's chi-squared test with Monte Carlo simulated p-value (based on 1×10^6 replicates): $\chi^2 = 40.0544$, df = N/A, $p = 1.9\times10^{-5}$.

5.5. Since there are only eight placed deposits altogether containing horse skulls, this evidence suggests a link between cattle skulls and horse skulls in placed deposits.

3) Figure 5.12 indicates that pigs were deposited as articulated segments more frequently than could be expected from chance. Three placed deposits are not a solid basis from which to draw firm conclusions, but there is reason to take the correlation between pigs and articulated segments seriously. All three of these deposits (in SFB 1351 at Brooklands, Building 7 at Gamlingay, and Enclosure 2 at Gosberton) consisted of the partial skeletons of fetal or neonatal piglets. In the Brooklands example, 33 different segments were recovered within the SFB, with multiple segments coming from the Gamlingay SFB as well. In addition, two possible placed deposits in intercutting pits F500 and F521 at Bloodmoor Hill consisted of the partial skeletons of a pig and at least two neonatal piglets (Higbee 2009: tab. 5.11). The remains of at least four piglets were found in SFB 330 at Sutton Courtenay; the degree of articulation of the piglets has not yet been reported, but a cattle spine was placed on the base of the feature. If these pig deposits were indeed placed, they would reinforce the pattern of partial piglet skeletons in Anglo-Saxon placed deposits. Interestingly, the disarticulated pig bones from Pit 38 and SFB 51 at Nettleton Top also came from neonatal piglets. The only placed deposits of pig not containing piglet remains were the pig skull on the base of Grubenhaus 10 at Mucking and the *en masse* deposit of disarticulated animal bone in pit 394 at Eynsham.

5.4.2 Associations between object types

This section considers combinations of object types within the same placed deposit, like the one in SFB 1351 at Brooklands described at the beginning of this chapter, which contained partial skeletons of piglets, a pig jaw, a nearly-complete pot and pike heads. Multiple object types were found in 27 features. Sometimes the different object types were grouped together in a single discrete deposit; in cases like the Brooklands example they were found in various places throughout the feature. What meaning might such associations have had, if any?

In order to perform a correspondence analysis for different object types appearing together in the same placed deposit, a contingency table was produced using the same variable, object type, as two hypothetically independent variables (Tab. 5.6).[32] All of the types of skeletal remains, as well as complete or semi-complete pots and loomweights occurred frequently enough to be included in a correspondence analysis. The frequency of lead rings or discs was also acceptable, but since they appeared alongside another object type in only one placed deposit (Building 7 at Gamlingay), they were excluded from the analysis.

Using this sample, Pearson's chi-squared test indicates a statistically significant dependence between object types when they are found together in the same placed deposit.[33] The results of the correspondence analysis suggest three non-random associations between different object types (Fig. 5.13):

[32] This created an interesting problem of what to enter into the cells along the diagonal of the contingency table. The solution adopted was to populate the diagonal with the total frequency of each object type. Correspondence analysis on a table thus constructed helpfully results in a graph where each object type—which must of course appear twice on the graph—appears coincident upon itself, making the graph easy to read. Another possible solution would have been to enter into the diagonal cells placed deposits containing more than one example of the same object type. However, to do so would have been inconsistent with the rest of the analysis, in which each object type is counted only once per deposit, irrespective of the number of examples of the object type that the deposit contained.

[33] Pearson's chi-squared test with Monte Carlo simulated p-value (based on 1×10^{6} replicates): $\chi^2 = 475.3352$, df = N/A, $p = 1\times10^{-6}$.

1) There is a correlation between pots and loomweights. This is based on five placed deposits, and both object types occur very rarely with skeletal remains. It is reasonable to conclude that pots and loomweights occur together more frequently than would be expected by chance.
2) Although they are located quite near the origin, there does seem to be some correspondence between skulls and disarticulated bone. In four of the five placed deposits in which skulls and disarticulated bone are associated, the skulls are part of the *en masse* bone deposit. In SFB 8516 at Horcott Quarry, the human skull seems to have been afforded prominence within the deposit, sitting atop and in the centre of the heap of animal bones.
3) Skeletal remains are distinctly separate from other object types. Both articulated segments and complete articulated skeletons are isolated in Figure 5.13. Complete articulated skeletons were found in association with other object types in only 11 out of 62 placed deposits; articulated segments likewise in seven out of 22. Their isolation suggests that no individual object type was associated with complete skeletons or articulated segments more frequently than could be attributed to chance, and it is notable that complete skeletons and articulated segments were associated with a non-skeletal object type in only one placed deposit. In general, it is striking how rarely skeletal remains occur with non-skeletal object types, in contrast to the frequency with which skeletal remains are found together.

5.4.3 Associations between species

A similar analysis was performed to consider combinations of species within the same placed deposits, using the same six species that occurred frequently enough overall

to be subjected to earlier analyses. In this case, two interesting points could be identified from the contingency table alone (Tab. 5.7). Human and dog remains were rarely found in combination with other species, whereas cattle, horse, pig, and sheep/goat remains appeared in combination with other species more frequently. In addition, cattle, horse, pig, and sheep/goat appear with a relatively wide range of other species—four or five of the major domesticates—whereas human and dog were found with only three other species (Tab. 5.7).

This pattern is corroborated by further analysis. A chi-squared test on the above data suggests that a statistically significant dependence exists between species found in the same placed deposit,[34] and correspondence analysis illustrates that dependence (Fig. 5.14):

1) Human and dog are clear outliers to the other species, which are broadly grouped together. Whereas there is a weak general correspondence among the other major domesticates, human and dog remains show no correspondences with other species. It is also worth noting that dog and human remains did not occur together in any placed deposits, although the dog remains placed in section 173 of ditch 7330 at Higham Ferrers were only a few metres away from the placed deposits of human remains in sections 383 and 123 of the same ditch.
2) There is a particularly strong correspondence between cattle and horse, indicating that they appear together more frequently than could be expected by chance. This fits with the pattern noted above of cattle skulls and horse skulls appearing together.

[34] Pearson's chi-squared test with Monte Carlo simulated p-value (based on 1×10^6 replicates): $\chi^2 = 296.6236$, df = N/A, $p = 1\times10^{-6}$.

5.5 Neonates and juveniles

Of the 95 placed deposits containing human or animal skeletal remains, 11 contained neonatal remains and another 12 contained other juvenile remains. Interestingly neonatal remains and juvenile remains were not positively identified together in any placed deposits. Table 5.8 breaks neonate and juvenile deposits down by degree of articulation, species, and context. The proportions for all categories where $n \geq 25$ were then subjected to a Student's t-test to determine if they were significantly different from the overall proportions, and the results are summarized below.

1) There are no neonatal skulls in placed deposits, and Student's t-test indicates that this is statistically significant.[35] Neonates make up a proportionate percentage of other skeletal deposits.
2) A statistically disproportionate number of human remains were infants.[36] For none of the other species tested were neonates disproportionately represented. A pattern of neonatal pigs deposited as partial skeletons has already been observed; however, there were not enough pig deposits to conduct a t-test. One placed deposit contained lambs.
3) The fact that no cattle deposits contained neonatal remains is also statistically significant.[37] There were also no horse or dog neonatal remains in placed deposits, but these species did not occur frequently enough for this to be statistically significant. On the other hand, neonatal sheep and pig remains were recovered, and although the numbers are not large enough to be statistically significant, it is notable that neonates of these species survived where those of more robust species did not.

[35] Two-tailed t-test, $t = 2.15$, df = ∞, $p < 0.05$.
[36] Two-tailed t-test, $t = 2.67$, df = ∞, $p < 0.02$.
[37] Two-tailed t-test, $t = 2.29$, df = ∞, $p < 0.05$.

4) Non-infant juvenile remains were statistically rare in SFBs.[38] The opposite might be true for ditches and graves, but the numbers were not large enough to justify a t-test. Older juvenile remains are proportionately represented among all species and degrees of articulation; an apparent lack of disarticulated juvenile bones can possibly be attributed to the difficulty in distinguishing them from adult bones.

5.6 Discussion

The most important theme running through all of the analyses described above is that skeletal remains, human and animal, are treated differently than other material in placed deposits. Human and animal skeletal deposits dominate other object types, occurring in 95 (63%) of the 151 placed deposits, and they are ubiquitous: whereas pots, loomweights and lead rings or discs are almost exclusively found in SFBs, skeletal placed deposits appear in significant numbers in SFBs as well as pits, ditches, and of course graves (Tab. 5.2). Furthermore, whereas multiple types of skeletal remains occur together within the same context relatively frequently, they are rarely found in combination with non-skeletal object types (Tab. 5.6, Fig. 5.13).

However, the analyses of this chapter have also shown considerable variation within skeletal deposits. It would be a mistake to view them as a homogeneous group or to assume that all placed deposits of skeletal remains served the same purpose. The nearly exclusive placement of non-skeletal deposits within SFBs suggests that skeletal deposits in SFBs had a different purpose than skeletal deposits placed elsewhere; this possibility is explored in detail in Chapter 7.

[38] Two-tailed t-test, $t = 2.83$, df = ∞, $p < 0.02$.

The following discussion mainly considers differences in the placed deposition of skeletal remains. Placed deposits of human remains are considered only in comparison to the patterns and associations shown by animal remains; human burials are treated as separate a topic elsewhere (Chapter 8). Placed deposits of non-skeletal object types will also be discussed briefly, but the bulk of that discussion is reserved for Chapter 7.

5.6.1 Butchery waste

Before discussing the patterns arising from this chapter's analysis, it is important to address the question of whether placed deposits of skeletal remains are actually just discarded butchery waste, since this is a question that has received considerable attention (Hill 1995; Hamerow 2006; Morris & Jervis 2011). It is a crucial point that butchery waste can be deliberately placed; the two processes are not mutually exclusive. Placed deposits have been defined here as consisting of material that has been specially selected, treated, and/or arranged (§2.3), and according to this study's criteria, a deposit must show at least two of those traits in order to be identified as placed (§4.1.2). Possible identifiers of the special selection, treatment, and arrangement of skeletal remains, contextually specific to Anglo-Saxon settlements, have been discussed (§3.3). Therefore, although some of the articulated skeletal remains and skulls identified in placed deposits could represent butchery waste, articulated remains and skulls were not automatically or invariably identified as placed deposits in this study. Moreover, although some of the animal remains in this study's placed deposits show signs of butchery, some do not, and for some butchery marks are not reported (Appendix B).

The analysis of object type versus context corroborates that we are not just looking at the mere discard of butchery waste. Wilson (1996) has demonstrated that the bones of large domesticates are generally found associated with the perimeters of

settlements throughout British prehistory and into the medieval period, and he attributes this pattern to the butchery of large animals taking place away from the centres of settlements. The correspondence between articulated segments and ditches seems at first to fit Wilson's model. Specifically, the deposit of the articulating spine and forelimbs of an adult horse in the horseshoe-shaped enclosure ditch at Higham Ferrers could fit Wilson's model—horse meat was sometimes consumed even though a taboo existed (Hagen 2006: 184–185), but whether or not the bones in this deposit showed cut marks is not published —as could the articulated cattle spine and pelvis in Feature 2547 at Yarnton, a section of a gully that might have been a replacement for the western boundary of the site. However, the other four placed deposits of articulated segments in ditches do not fit Wilson's model, for they were located in ditches that were not at the perimeter of the settlement. Furthermore, the deposits in Enclosure 2 at Gosberton and in ditch 2513 at Wharram Percy contained small animals (a piglet in the former, and a young sheep in the latter), which according to Wilson's model should have entered the archaeological record as table waste. Meanwhile, the articulated segments in section 383 of ditch 7330 at Higham Ferrers belonged to a partially decomposed human, certainly not butchery waste. In terms of other skeletal elements, cattle and horse skulls, which should also be deposited near butchering areas according to Wilson's model (1996: 79), were found almost exclusively in SFBs and pits. Clearly the location of articulated animal remains and skulls cannot be attributed solely to the discard of waste near the place of butchery. Even in placed deposits where the skeletal remains do represent butchery waste, their placement is not mere waste disposal.

5.6.2 Distinctions among animal species

Cattle, sheep, and pigs all showed a distinct tendency to be deposited as skulls or articulated segments rather than as complete skeletons (Fig. 5.12). This may suggest a connection between the economic exploitation of these animals and the placed deposition of their remains. Skulls and articulated segments of livestock are consistent with their normal exploitation for meat and raw materials, up to a point—namely, the reservation of some of the carcass for placed deposition. Disarticulated bone in placed deposits is fully consistent with normal economic exploitation. Articulated segments, skulls, and disarticulated bone in placed deposits thus probably derive from butchery, kitchen, and table processes. It is important to consider what happened to the parts of the animals that were *not* deposited, and how that might have related to the act of deposition (Morris & Jervis 2011: 76). That topic is discussed in §10.2.

Complete or partial articulated skeletons of livestock in placed deposits represent economic sacrifices of meat, raw materials, and (in the case of cattle and sheep) secondary products such as labour, dairy, and wool. The younger the animal, the more costly the sacrifice. The tender meat from neonatal piglets ('suckling pigs') and lambs would have been a luxury (Hagen 2006: 118), and yet piglets were disproportionately represented in 57 per cent of placed deposits containing pigs, often as partial skeletons or articulated segments.[39] These would have been particularly valuable remains to deposit, as would complete animals, such as the ?complete young calf in a pit at RAF Lakenheath, whose meat and raw material remained completely unexploited.[40]

[39] This does not count pit B383 at Hartlepool, in which the placed deposit consisted of 12 sheep skulls; disarticulated remains of at least 12 lambs less than a year old were also present, but as the disarticulated remains were scattered throughout the fill, they could not be confidently identified as placed.

[40] Although sickness was not identified as a cause of death for any of the complete articulated skeletons of livestock in placed deposits, it was also usually not ruled out. There may have been a reluctance to exploit the carcasses of diseased livestock that would mitigate the sacrifice their placed deposition represented. On the other hand, the complete cow in pit 6 at Cowdery's Down was deposited after some butchery had taken place, including skinning and the removal of some meat from one leg. It does not seem likely that a carcass

Even though horses appear to have been treated similarly to livestock in terms of degree of articulation (Fig. 5.12), placed deposits of horse remains cannot often be identified as economic sacrifices. Although horses were not put to the plough in the Anglo-Saxon period, they were not uncommon in rural settlements and probably contributed economically by transporting goods and people (Cathers 2002: 203–206, 211–214). It would have been a sacrifice of labour to slaughter a healthy horse, but no horses in placed deposits have so far been identified as slaughtered. The complete horse in the pit at Fowlmere was 7 years old, and the one in the pit 8 ft west of House VII at Sutton Courtenay died at an old age. Only one placed deposit (ditch 2 at Wolverton Mill) contained a foal, and its cause of death was not determined. Nor can horses in placed deposits be confidently identified as sacrifices of meat or raw materials, except at the few settlements at which horse bones have shown definitive signs of butchery.

In fact, two patterns suggest important differences between the treatment of horses and livestock species in placed deposits. First, horses (along with dogs) were a particularly favoured species for placed deposition, being significantly better represented in placed deposits than in the Anglo-Saxon bone assemblage more generally (Figs 5.5, 5.6). Second, horse skulls and cattle skulls often appear together in placed deposits (Tab. 5.5; and below, this section), and it will be shown that these placed deposits are strongly correlated with the final backfilling of pits and SFBs (§7.5.2). The significance of the second pattern aside, the disproportionate representation of horses in placed deposits appears to reflect the special status that horses held in the Anglo-Saxon worldview (Bond 1994: 124–126; Bond 1996; Cathers 2002; Fern 2005, 2007: 100–102). That status is discussed further in Chapter 10.

---

manipulated in such a way would have been considered unfit for normal consumption and exploitation (see also Morris & Jervis 2011: 75–76).

The most striking distinction among species in placed deposits is in the treatment of dog remains. Dogs were rarely found in combination with other animal remains (Fig. 5.14) and they were disproportionately represented as complete articulated skeletons. In both respects, the treatment of dogs resembles that of humans, and differs from that of other animal species. All other species are represented by complete articulated skeletons less frequently than could be expected by chance. Dog meat was very rarely consumed in the Anglo-Saxon period (Hagen 2006: 183–184), so the fact that dogs were treated differently from livestock is not surprising. Dogs, like horses, were much better represented in placed deposits than in the overall animal bone assemblage (Figs 5.5, 5.6), but horse and dog remains show different patterns in terms of context, degree of articulation, and associations with other species (Figs 5.11, 5.12, 5.14), suggesting that their overrepresentation in placed deposits was for different reasons. The treatment of dogs in placed deposits is considered further in light of other evidence in Chapter 10.

It is important not to overstate the similarities in the treatment of dogs and humans in placed deposits, as there are also important differences. Foremost among these are their relative frequencies: nearly twice as many placed deposits contained human remains as dog remains (Fig. 5.4). Second, the human remains were the primary focus of at least two of the three deposits in which other species were also present (Grave AX at Yeavering and pit α at Sutton Courtenay).[41] This is not so for the three placed deposits containing both dogs and other species: in ditch 7330 at Higham Ferrers, in the pit 8 ft west of House VII at Sutton Courtenay, and in pit 76/59 at Wharram Percy, the dog remains do not seem to be the primary focus of the placed deposit. Finally, an association between human burials and boundary features will be demonstrated in Chapter 6, and articulated dog skeletons do not share that correspondence, although the dog burial in pit

[41] In the third, ditch 2513 at Wharram Percy, it is not clear whether the primary focus of the deposit is the infant or the young sheep. Only the infant was complete, but an unusual stone and specks of amber were associated with the lamb.

F2250 at Godmanchester was adjacent to enclosure ditch 2007. The two dogs deposited in section 173 of ditch 7330, the horseshoe-shaped enclosure ditch at Higham Ferrers, can be directly associated with the human remains deposited a few metres to the north in sections 123 and 383 of the same stretch of ditch, although that was a 'deviant' burial (see Ch. 8). The excavators speculate that a personal association may have existed between these dogs and the incomplete female skeleton in section 383 (Hardy *et al.* 2007: 207).

Interestingly, pigs also seem to be treated differently than other animal species. Neonatal or juvenile piglets emerge as a recurring theme among the placed deposits (Tab. 5.8). Furthermore, a disproportionate number of pigs are represented in placed deposits by partial skeletons; again, these are predominately piglets, although the early Anglo-Saxon placed deposits in SFB 1351 at Brooklands and Building 7 at Gamlingay also both contain parts of adult pig skulls. Some of these placed deposits come from sites where pig remains were comparatively common, such as Brooklands and Mucking (Strid 2008: 72; Done 1993: 77). The relative abundance and economic importance of pig at these sites might help explain why pig remains were selected for placed deposition. At middle Saxon Wicken Bonhunt, another site where pig represented a large proportion of the animal bone assemblage, the pig bone assemblage was dominated by various skeletal elements of young pigs along with skull fragments, mandibles, and teeth from older pigs (Crabtree 1996: 70). Crabtree interprets this pattern as evidence that the inhabitants of Wicken Bonhunt were consuming young animals and selling on the partially butchered carcasses of older ones. This might help explain the age of the partial remains deposited on the middle Saxon sites, though neonatal piglet remains are still relatively unusual in the Anglo-Saxon bone assemblage; pigs were more often killed at an older age of 2 to 3 years (*ibid.* 69; Mulville 2003: 350). It is a less satisfying explanation for the placed

deposits at Brooklands and Gamlingay, which have been dated on the basis of pottery to the 6th century or earlier, when there is less evidence for specialized animal husbandry practices.

However, this evidence does not explain why partial skeletons of neonatal pigs were selected for placed deposition. Although neonatal ('suckling') pigs would have represented a rare and desirable meal (Hagen 2006: 118), the individuals in the Gamlingay deposit reportedly showed no signs of having been eaten. The slaughter of a large number of piglets would have been an important event whether or not they were eaten.

5.6.3 Animal (and human) skulls

The prevalence, treatment, and arrangement of skulls in placed deposits argues strongly that special significance was attached to animal and human heads in the early to middle Anglo-Saxon period. Skulls are often removed in the normal process of butchery, and skulls found in unspecific locations within the fills of ditches, pits, and SFBs might simply have been discarded. In the 31 placed deposits of skulls, however, their location in the centre of features and/or at the base of fill layers suggests that the deposition of these skulls is deliberate, even if they might also have been butchery waste.[42] The symmetrical arrangement of the cattle skulls in SFB 7395 at Yarnton, the stacked skulls in pit 76/59 at Wharram Percy, the probable goat skull in Grave AX at Yeavering, and most spectacularly the six-foot long stack of skulls extending from 16 inches below the

[42] The correspondence between skulls and *en masse* deposits of disarticulated bone occurring in combination within the same placed deposit may at first seem to argue against the evidence cited above, suggesting an equivalence between skulls and disarticulated bone in placed deposits. However, deposits like the one in SFB 8516 at Horcott Quarry offer a counterargument. In this SFB, a human skull was placed upright atop and in the center of an *en masse* deposit of animal bone, seeming to suggest that the skull and the disarticulated bones complement each other in the deposit.

surface and up the wall of Building D2 at Yeavering, hammer home the special significance of skulls in placed deposits.

Correspondence analysis of the placed deposits in this study has demonstrated a clear tendency for cattle and horse to be represented by skulls in placed deposits. Cattle and horse skulls often appear in combination within the same deposit, and when they do, the cattle skulls usually outnumber the horse skulls. But cattle remains vastly outnumber horse remains within the overall animal bone assemblage in Anglo-Saxon settlements, and with at most 15 cattle skulls and six horse skulls in all placed deposits containing skulls of both species (Tab. 5.5), horses are disproportionately well represented. Cattle and horse heads clearly played similar or complementary roles in placed deposits. The large size and similar shape of cattle and horse heads would make them impressive deposits, but high-status and possibly symbolic associations with oxen and horses may have contributed to their selection for deposition (§10.1.4). The purpose of placed deposits containing cattle and horse skulls is considered further in Chapter 7 and Chapter 10.

With only three placed deposits containing human skulls, it is impossible to be sure whether a distinction was made between human skulls and animal skulls in placed deposits. There is a correspondence between skulls on the one hand and SFBs and pits on the other (Fig. 5.10). Two of the human skulls (in SFB 8516 at Horcott Quarry, mentioned above, and pit 1073 at Cottam) conform to that pattern; in that respect these human skulls are not treated differently from animal skulls. The Horcott deposit is one of six placed deposits containing both skulls and disarticulated bone; however, it is the only one in which the skull is human, and the only one in which the skull sits directly atop the *en masse* bone deposit. In the third placed deposit containing human skulls, grave 3842 at Yarnton, fragments of children's skulls accompany an inhumation of a young woman,

and their presence clearly serves a different purpose than in the other two deposits. This deposit is considered along with other inhumations in Chapter 8.

The statistically significant absence of placed deposits of neonatal skulls, either animal or human, also requires explanation. Perhaps it is due to differential preservation, but the appearance of neonatal remains in other forms suggests that human selection might be at work.

5.6.4 Neonates

The importance of neonatal pigs has been discussed, and the overall frequency of neonatal animals in placed deposits seems significant. There are enough placed deposits of cattle remains to make it statistically significant that there were no placed deposits containing neonatal cattle, and it must be noted that no neonatal horses were found either. The similarity between cattle and horse in this respect is made more apparent by the presence in placed deposits of relatively less robust neonatal sheep and pigs, reinforcing the idea that cattle and horse played roles in placed deposits similar to each other and different from other species. There are also no placed deposits of neonatal dogs.

It is interesting that human remains placed in SFBs are almost exclusively infants. The other skeletal remains particularly associated with SFBs are complete dog skeletons, about half of which were found in SFBs (Tab. 5.3), and placed deposits containing skulls (Fig. 5.10). It is possible that human infants were not considered full persons (Crawford 1999: 77–89), but they would also not have been considered animals. Their placement in SFBs, a context more strongly associated with animal remains than with other human remains in placed deposits, is therefore intriguing. The role of infants in placed deposits is considered further in Chapter 8.

5.6.5 Non-skeletal remains

In contrast to placed deposits of skeletal remains, placed deposits of pottery and artefacts were overwhelmingly recovered from SFBs (Tab. 5.2). Most of these were placed deposits of complete or semi-complete pots, loomweights, and lead rings or discs.[43] Pots and loomweights are also disproportionately found together in placed deposits (Fig. 5.13). It may be significant that semi-complete, rather than complete, pots is a recurrent theme in placed deposits, with only two placed deposits containing complete or possibly complete pots as compared to nine containing semi-complete pots, and considering the possibility that the pot in SFB 1351 at Brooklands may have been 'ritually killed'. However, because these object types are so strongly associated with SFBs, it is better to delay discussing them until Chapter 7, when placed deposits in SFBs will receive particular analysis.

5.7 Conclusion

A number of patterns have been demonstrated in this chapter, relating to a variety of different characteristics of placed deposits: object type, species, degree of articulation, age, and context. It must be remembered that these correspondences are only trends, and there are often exceptions; a given characteristic does not always have the same associations or serve the same purpose. The most striking feature of Anglo-Saxon placed deposits is their variability: chronological and regional/local variability, but also within a given time and place.

As much as could be learned from patterns of composition in placed deposits, associations of certain deposit types with specific contexts implies that the true significance or purpose of placed deposits is connected to, even defined by, the context.

[43] Artefacts (single or sets) were also found primarily in SFBs, but this is a heterogeneous grouping.

The strong correlation between non-skeletal deposits and SFBs demonstrates the importance of the context to Anglo-Saxon placed deposition. It implies that a placed deposit does not consist solely of the contents, which can then be placed in any context: Anglo-Saxon placed deposition is not opportunistic. A placed deposit can only be fully understood in conjunction with its context, because the context is integral to, and may even determine, the purpose of the placed deposit. The following two chapters consider the significance of placed deposits in specific contexts.

Chapter 6
The spatial distribution of placed deposits in settlements

This chapter considers the spatial distribution of placed deposits in Anglo-Saxon settlements. Many early Anglo-Saxon settlements lack identifiable structure in terms of centres, activity areas, and boundaries,[44] and even for the middle Anglo-Saxon period, excavations often do not reveal enough of the settlement for us to characterize its structure fully. Therefore, this chapter analyses the spatial distribution of placed deposits in terms of their associations with certain types of features that may have helped focus or structure settlement space (e.g. buildings, enclosures), and with particular elements of those features (e.g. walls, boundaries, entrances, corners). Associated features are to be distinguished from 'context'. In some cases, the context containing the placed deposit could be part of the associated feature: for example, a fill of an enclosure ditch, or a posthole of a fence line. In others, the context of the placed deposit is located near the associated feature.

Associated features have been categorized on two different bases: *feature type* and *feature element*. Feature types correspond roughly to the feature's function in the settlement, and thus depend on interpretation; in terms of boundaries, categorization is aided by the work of Reynolds (2003). Many features such as earthfast buildings, enclosures, and long linear features consist of a variety of elements, including walls, doorways, boundary ditches, fence lines, corners, entrances, and termini. Similar elements are shared by a variety of feature types. The following sections analyse how the

[44] West Heslerton is a notable exception (Powlesland 1997, 1998).

contents of placed deposits vary according to associated feature type, associated feature element, or both. Through these correlations, it is possible to shed new light on how space was perceived in Anglo-Saxon settlements, including the relationship between settlement spaces and social units like the family and the community, and the role of placed deposits in structuring settlement space.

6.1 Types of associated features

6.1.1 Definitions

Associations were noted between placed deposits and the following types of features:

- *Buildings,* including sunken-featured buildings (SFBs) and earthfast buildings. Placed deposits are considered to be associated with buildings if they were associated with any elements of the building (e.g. outer walls, doorways, hearths, internal supports or walls), but not just the interior space. In terms of chronology, it should be noted that SFBs primarily belong to the early Anglo-Saxon period, a potential bias that is considered in this chapter's analysis.
- *Enclosures,* including ditched or fenced enclosures. Following Reynolds (2003), these have been categorized as 'minor' enclosures *c.*60 m across (*ibid.* 110–115); 'major' enclosures of larger dimensions (*ibid.* 115–119); and the linear features of 'rectilinear' settlements, characterized by trackways, plots, and paddocks set out at right angles to each other (*ibid.* 119–125). Interestingly, no placed deposits were associated with Reynolds' fourth category of enclosure: relatively small enclosed yards associated with individual buildings (*ibid.* 104–110). Some enclosures, such as the small rectangular Enclosure 2 at Gosberton Third Drove, just 6.5–8 m across, did

not fit into any of Reynolds' categories; these are considered separately. There is a chronological bias to the enclosure feature type, since as a rule enclosures in Anglo-Saxon settlements are features of the late 6th century and later (Reynolds 2003: 104). Again, this bias is considered in interpreting the analysis.

- *Other ditches and gullies*. This heterogeneous category includes linear features of various size whose function is not clear, sometimes because excavation was small-scale.
- *Prehistoric and Romano-British earthworks*, including partially filled ditches, likely to have been visible in the Anglo-Saxon period. In settlements such as Mucking and Bloodmoor Hill, ancient earthworks appear to have helped structure Anglo-Saxon settlements by serving as foci and boundaries, particularly in the 5th and 6th centuries in the absence of other boundary features (e.g. Hamerow 1993: 86, fig. 51; Lucy *et al.* 2009: 37; Reynolds 2003: 128–130).
- *Free-standing posts*.

Associations with pits and surface rubbish deposits were not analysed. There were two placed deposits at Mucking that were placed in SFBs within Cemetery II (*Grubenhäuser* 84 and 108). They appear to have been contemporary with the cemetery, since the SFBs cut and were cut by graves (Hirst & Clark 2009: ii.454–455), but in these isolated instances, it is not possible to determine whether the placed deposits were related to the presence of the cemetery in any way. Some placed deposits were identified in

features that cut prehistoric or Romano-British features that were *not* visible in the Anglo-Saxon period, but any such associations probably occurred by chance.[45]

Placed deposits were considered to be potentially associated with a feature if it was within 2 m of the feature, if it was in a context (e.g. pit) that cut the feature, or, in the case of postholes, foundation trenches, and ditches, if it was placed within the feature. Thus, some deposits associated with ditches were in pits near to or cutting ditches, whereas others were placed directly in the ditch; in this way, the analysis of this chapter differs from the previous, which treated associations between the contents of placed deposits and the features containing them. While recognizing that the 2 m guideline is essentially arbitrary and could lead to misattributions, it is necessary in order to enable analysis of the spatial distribution of placed deposits in settlements to include those settlements whose spatial organization is not apparent due to small-scale excavation or, in the early Anglo-Saxon period, a lack of boundaries or obvious foci. Similarly, this chapter's analysis includes placed deposits near to or cutting SFB pits, and placed deposits within SFB pits that were associated with the edges of the pit, since these are taken to be associated with the walls of the structure. It does not consider placed deposits elsewhere in SFB pits as being 'associated' with the building; to do so would replicate the analysis of the previous chapter.

6.1.2 Data and analysis.

A total of 55 placed deposits were associated with the types of features described above; these are summarized by type in Figure 6.1.[46] This total represents over a third of the 151 deposits confidently identified as placed in this study. A placed deposit was

[45] The SFBs at Mucking that cut earlier features were compared to those that did not in terms of whether they contained placed deposits; Pearson's chi-squared test with Yates' continuity correction did not suggest any correlation between earlier features and placed deposition ($\chi^2 = 0.376$, df = 1, $p = 0.5397$).
[46] In Appendix B, associated features are listed under each placed deposit.

associated with more than one type of feature in only two cases; both Grave AX at Yeavering and Pit 6 at Cowdery's Down were associated with both a doorway and a post, so they are counted under both categories in Figure 6.1. These were the only two placed deposits associated with free-standing posts.[47]

In order to identify patterns between the contents of placed deposits and their associated features, two independent correspondence analyses were run. The first compares object types (§5.1.1) with associated feature types. The numbers of placed deposits of each object type associated with each type of feature are shown in Table 6.1. Only four object types (articulated skeletons, articulated segments, skulls, and disarticulated bone) and four associated feature types (ground level buildings, major enclosures, minor enclosures, and earthworks) occurred frequently enough to be included in the correspondence analysis, but there is a statistically significant likelihood that associations between these object types and feature types are non-random.[48] The results of the correspondence analysis suggest that the dependence derives from two correspondences, represented in the resulting graph by two groups opposed to the left and right of the origin (Fig. 6.2):

1) The group on the right hand side suggests that placed deposits associated with major enclosures disproportionately contain articulated segments and disarticulated bone.

[47] Decayed bone was found in the packing or backfill of four free-standing posts at Yeavering: posts AX, BX, E, and the 'great post' near Building D2 (Hope-Taylor 1977: 259, 326). In contrast, bone was rarely found in structural postholes. Where species could be identified it was ovicaprid; this may be significant, particularly in the case of the 'great post', as most bone associated with Building D2 was bovid (*ibid*: 259). The free-standing posts at Yeavering played a demonstrable role in the alignment of the settlement and as foci for 'string graves', and it is possible that bone was deliberately placed in these postholes.

[48] Pearson's chi-squared test with Monte Carlo simulated *p*-value (based on 1×10^6 replicates): $\chi^2 = 17.036$, df = N/A, $p = 0.04179$. The fact that a small number of placed deposits contained multiple object types must be noted (§4.2.3), but is unlikely to have had a significant effect either on the chi-squared test or the correspondence analysis.

2) The group on the left hand side suggests that placed deposits of skulls and complete skeletons are disproportionately associated with earthfast buildings and minor enclosures.

Placed deposits associated with earthworks are not predisposed to any of the four object types.

The second analysis looked for correspondences between species and associated feature types. As shown by the contingency table (Tab. 6.2), only three species occurred frequently enough to included in the correspondence analysis: human, cattle, and horse. The four associated feature types used in the previous correspondence analysis were used in this one as well. Pearson's chi-squared test suggests associations between specific species and feature types may have been random.[49] However, it is still worth considering the possibility that some pair(s) of species and feature types are correlated, but that this effect has been masked in the chi-squared test by other non-correlated variables. Correspondence analysis, however, produced a biplot with all the species and feature types relatively near the origin, except for horse (Fig. 6.3). In the light of Figure 6.2, it may be possible to identify two groups again, though they are by no means definitive: toward the top right, placed deposits of cattle associated with earthworks and major enclosures; and toward the left, placed deposits of human remains associated with earthfast structures and minor enclosures; with placed deposits of horse remains an outlier.

When interpreting the above analyses, it is important to consider the samples they represent (40 and 33 observations, respectively). Because only skeletal remains are included in both analyses, there is considerable overlap between the two samples in terms

[49] Pearson's chi-squared test with Monte Carlo simulated *p*-value (based on 1×10^6 replicates): $\chi^2 = 5.7337$, df = N/A, $p = 0.4975$. The fact that a small number of placed deposits contained multiple species must be noted (§4.2.3), but is unlikely to have had a significant effect either on the chi-squared test or the correspondence analysis.

of the placed deposits they comprise. This makes comparing the biplots particularly useful for understanding this small sample of placed deposits. Figure 6.2 clearly shows two groups opposed across the origin, and Figure 6.3 possibly does. To the left in both graphs are earthfast buildings and minor enclosures, along with articulated skeletons, skulls, and humans. To the right in both graphs are major enclosures, along with articulated segments, disarticulated bone, and cattle.

Complete skeletons and humans are dominant within those samples (20 observations each); 17 observations in each sample are complete articulated humans. Perhaps unsurprisingly, then, the two graphs show similar correspondences for complete articulated skeletons and humans. Complete skeletons are associated with earthfast buildings and minor enclosures, and perhaps humans are as well. Six out of seven complete skeletons associated with minor enclosures were human, as were eight of the nine complete skeletons associated with earthfast buildings. All of this indicates that the correspondences demonstrated for humans and for complete skeletons are one and the same: that is, complete inhumations correspond with both earthfast buildings and minor enclosures. This hint of a pattern beginning to emerge will be discussed more fully in Chapter 8, which takes burial treatment into account in a more detailed analysis of placed deposits of human remains.

6.2 Elements of associated features

6.2.1 Definitions

Many features consist of a number of topological, geometric, or structural elements. For Anglo-Saxon buildings, such elements include walls, corners, doorways, and hearths; for enclosures, they include entrances, corners, and boundaries; for ditches and gullies, the terminus is a distinctive element. An important characteristic of placed

deposition may have been association with a particular element of a feature, either on its own, or in conjunction with the type of feature it belonged to. Placed deposits have been found in association with the following categories of feature elements:

- *entrances*, including enclosure entrances and building doorways;
- *corners* of enclosures and buildings;
- *termini* of ditches or gullies;
- elsewhere along *walls/boundaries*.

All of the above are elements of features that bound space within the settlement, and as such are potentially 'liminal', in that they are located at boundaries, and serve either to divide or connect two culturally constructed spaces (van Gennep 1960 [1909]; Woodward & Hughes 2007: 185). For earthfast buildings, placed deposits were found associated with the entrances and outer walls, but not with internal features (e.g. hearths, internal roof supports, internal walls).

Other feature types, specifically prehistoric or Roman earthworks and ditches, appear to have acted as foci in the settlements at Bloodmoor Hill, Car Dyke, Pakenham, and Mucking (see also Crewe 2008). This study identified only four placed deposits associated with earthworks acting as focal features; on this limited basis it has not been possible to categorize 'elements' of focal features. Another four placed deposits were associated with ditches or gullies whose function in the settlement was not clear. For these deposits, too, the associated element is therefore indeterminate.

6.2.2 Data and analysis

As stated above, 55 placed deposits had associated features.[50] As Figure 6.4 shows, a significant majority (46, or 84%) of these were associated with elements of the

[50] Individual placed deposits with associated features may be found in Appendix B. The feature element with which each placed deposit was associated is given under its entry.

features as listed above; nearly one-third (18) of this subset were associated with special places along the line of boundary (i.e. entrances, corners, termini). The remainder, representing more than half of all placed deposits with associated features, were placed at other locations along walls or boundaries. In fact, there were enough placed deposits associated with walls/boundaries to make a topological distinction for the purposes of analysis between placed deposits 'inside', 'outside', and 'at' the wall/boundary.[51]

The analysis below begins by considering whether placed deposits associated with certain feature types are also associated with particular feature elements. After that, correlations will be investigated between feature elements on the one hand and both composition types and species on the other. Patterns will primarily be elicited using correspondence analysis, but some individual examples will also be considered.

Feature type vs. element

Table 6.3 shows the frequency with which placed deposits were associated with different combinations of feature types and elements. Five feature types (earthfast buildings, major enclosures, minor enclosures, earthworks, and SFBs) and four categories of feature elements (outside, at, and inside walls/boundaries, and corners) were associated together with placed deposits frequently enough to warrant statistical analysis; these data are shown in boldface type in Table 6.3. A fifth category of element, entrances, also occurred frequently enough to be analysed, but entrances were not included in this analysis because two of the feature types, earthworks and SFBs, do not usually have archaeologically identifiable entrances. Pearson's chi-squared test on the boldface figures in Table 6.3 suggests that a non-random correlation exists between these associated

[51] There were too few placed deposits associated with entrances and corners to analyse their topological or orientational relationship in the analysis.

feature types and elements.[52] Correspondence analysis on the data in Table 6.3 illustrates these correlations (Fig. 6.5):

1) Placed deposits associated with SFBs were associated with the corners of the structures more often that would be expected by chance.
2) Placed deposits associated with major and minor boundaries tended to be *at* (or in this case, *in*) the boundary ditches, whereas deposits associated with earthfast buildings and prehistoric earthworks were placed *inside* the wall/boundary more often than would be expected to happen by chance.[53] These opposed patterns may reflect differences in the timing of the deposition. Placed deposits associated with earthfast buildings may have been placed while the structure was still standing, whereas some of the deposits at major and minor enclosure boundaries may have been associated with their backfilling (see Ch. 7).

In order to identify whether placed deposits in entrances correlated with any associated feature types, a second correspondence analysis was performed, this time using only three feature types (ground level buildings, major enclosures, and minor enclosures) and four categories of element (outside, at, and inside walls/boundaries, and entrances).[54] The resulting plot suggests a slight tendency for placed deposits at entrances to be at the doorways of earthfast buildings (Fig. 6.6). Figure 6.6 also reinforces two of the correspondences noted above, namely placed deposits associated with the inside walls of earthfast buildings, and deposits made at the line of boundary of major enclosures. Although minor enclosures and 'outside' are grouped closely, the fact

[52] Pearson's chi-squared test with Monte Carlo simulated *p*-value (based on 1×10^6 replicates): $\chi^2 = 29.0516$, df = N/A, $p = 0.002153$.
[53] Placed deposits were less frequently situated at the corners of prehistoric earthwork systems than would be expected by chance, but this might merely reflect a rarity of such places still visible in the Anglo-Saxon period.
[54] Pearson's chi-squared test with Monte Carlo simulated *p*-value (based on 1×10^6 replicates): $\chi^2 = 12.1483$, df = N/A, $p = 0.05365$.

that 97.9 per cent of the dependence is illustrated in the horizontal direction suggests that they are not really closely correlated; their proximity may more accurately be interpreted as meaning that neither shows any strong correlations.

Material type vs. element

Having shown that placed deposits associated with some feature types are disproportionately associated with certain elements of those features, associations of object types with feature elements are now considered. Table 6.4 is a contingency table showing the frequency with which each object type was found in a placed deposit associated with each category of feature element as defined above. Only four object types (articulated skeletons, articulated segments, skulls, and disarticulated remains) and four categories of elements (outside, at, and inside walls/boundaries, and entrances) occurred together frequently enough to be included in the correspondence analysis. Pearson's chi-squared test does not suggest a dependence between object type and feature element.[55] However, it is still worth considering the possibility that some pair(s) of object types and feature elements were correlated, but that this effect has been masked in the chi-squared test by other non-correlated variables. Indeed, correspondence analysis on the resulting contingency table reveals two interesting patterns (Fig. 6.7):

1) To the left of the origin, deposits placed either inside or outside walls/boundaries disproportionately contained skulls and complete articulated skeletons.[56] This pattern reinforces the conclusion that placed deposits made inside or outside walls/boundaries represent a particular practice associated

[55] Pearson's chi-squared test with Monte Carlo simulated *p*-value (based on 1×10^6 replicates): $\chi^2 = 7.8644$, df = N/A, $p = 0.5942$. The fact that a small number of contexts contained multiple object types must be noted, though it is unlikely to have had a significant effect either on the chi-squared test or the correspondence analysis (§4.2.3).

[56] Although skulls and skeletons appear to be more closely associated with 'inside' and 'outside', respectively (Fig. 6.7), this is actually only true for skulls; skeletons were found in equal numbers inside and outside walls/boundaries (Tab. 6.4).

with the active use of the wall or enclosure. It also fits with the correspondence identified earlier between complete articulated skeletons and earthfast buildings (Fig. 6.2), as placed deposits associated with the latter were disproportionately made inside the wall (Figs 6.5, 6.6).

2) To the right of the origin, placed deposits *at* boundaries showed only slight correspondences with articulated segments and disarticulated bone.

The analysis does not show any other convincing correspondences, but two observations are worth making about the placed deposits associated with corners, which were left out of the above analysis for reasons of frequency. First, burial 1960 at Flixborough was located inside the corner of building 1a, which had several other human burials placed inside or outside its walls. Burial 1960, therefore, must be considered to fit the correspondence between complete skeletons and deposits near walls/boundaries in active use. Although grave 3861 at Yarnton was cut into the corner of a minor enclosure boundary, it was probably done while the boundary was in active use; if so, then grave 3861 would also fit that correspondence. The other inhumation associated with a corner, however, grave 65 at Gamlingay was cut through the foundation of an earthfast building and obviously postdated it. Second, it is suggestive that three out of five placed deposits of lead rings or discs were associated with corners; all three of these placed deposits came from SFBs (Sunken hut 1190 at Barton Court Farm, the SFB at Berwick Ponds Farm, and Building 7 at Gamlingay). It is also worth noting that two placed deposits of lead vessels, in ditch 53 at Bottesford and ditch 191 at Riby Cross Roads, were found in ditch termini. The only other placed deposit of a lead vessel, in this case containing a hoard of iron tools, was found unstratified at Flixborough.

Species vs. element

Analysis of species versus associated feature element revealed little. Table 6.5 shows the frequency with which placed bone deposits of different species were associated with each category of feature element. Only three species (human, cattle, and horse) and four categories of feature element (outside, at, and inside lines of boundary, and entrances) were associated frequently enough to be included in the correspondence analysis. As noted in the previous section (§6.1), humans dominated other species in placed deposits placed near associated features. A glance at Tab. 6.5 suggests that the distribution of species across the four categories of element were fairly similar, and indeed chi-squared analysis suggests that associations between species and feature elements were virtually random.[57] Correspondence analysis was performed anyway (Fig. 6.8), but considering the small scale on the axes it revealed no convincing correspondences.

6.3 Discussion

6.3.1 Boundaries and entrances: 'liminal' places

The preceding analysis has educed a number of patterns relating placed deposits to walls, boundaries, doorways and entrances in Anglo-Saxon settlements. Boundaries and entrances can serve a number of purposes in settlements and more generally within landscapes. Functionally speaking, boundaries direct or restrict the movements of people and animals, but they may also be constructed to delimit activity areas, to define households or settlements within the social landscape, and to display status, among other purposes (Collis 1996: 88–90). In the British Iron Age, hillforts and other settlements

[57] Pearson's chi-squared test with Monte Carlo simulated *p*-value (based on 1×10^6 replicates): $\chi^2 = 0.9021$, df = N/A, $p = 1$. The fact that a small number of contexts contained multiple species must be noted, though it is unlikely to have had a significant effect either on the chi-squared test or the correspondence analysis (§4.2.3).

were enclosed by boundaries, sometimes over-elaborate and marked with placed deposits, that seem to have been symbolic as well as defensive and may have been constructed to define or isolate the groups using or living in the settlements, and to demonstrate their strength or prestige (Bowden & McOmish 1987). Similarly, entrances provide access across or through boundaries, but they can also be used to orient space within the landscape. The orientation of entrances can also have cosmological significance, aligned with solar events or cardinal directions.

Boundaries and entrances are often referred to as 'liminal' places, a concept pioneered by Arnold van Gennep (1960 [1909]). Boundaries and entrances divide or connect two socially constructed spaces; they belong to neither space, but to a neutral or liminal zone between them (*cf.* Woodward & Hughes 2007: 185). Van Gennep takes the crossing of a boundary as the physical model for rites of passage, in which individuals cross from one social state into another, passing through a liminal state in which they belong to neither; this state, which may involve physical separation from the community, is the state in which the transformation is enacted.[58] Working back from rites of passage to van Gennep's physical model, it is in the liminal zone between spaces that the transition from one space to another occurs. This may be why some societies view liminal places as powerful or dangerous places and endow them with special social significance (§9.2.2). Sometimes physical boundaries and entrances act as manifestations or agents of the social constructions that bind groups together and set them apart from others. In the Lamu area of Kenya, the word for 'clan' is the ki-Swahili word for 'gateway' or 'door', thought to refer to the practice of each kin-group having a reserved entrance for entering the ritual enclosure (Horton 1994: 151–152).

[58] The metaphorical language used for rites of passage is spatial and directional, due to van Gennep's use of boundary crossing as the physical model for rites of passage.

There are numerous examples of placed deposits associated with entrances and boundaries from prehistoric settlements in Britain and on the Continent and in early medieval settlements in Ireland, northern Europe, and Scandinavia (e.g. Hill 1995: 78, 82–83; Parker Pearson 1996: 120, 127; O'Sullivan & Nicholl 2010: 76; Hamerow 2006: 22–26; J. Ljungkvist, pers. comm.). Considering the ubiquity of this practice, and particularly its prominence in northwest Europe, it is not surprising to find Anglo-Saxon placed deposits associated with liminal places in settlements. The importance of liminal places in the larger Anglo-Saxon landscape has long been recognized, particularly in the siting of meeting places, execution sites, and execution cemeteries at hundred and parish boundaries in the late Saxon period (Reynolds 2009: 203–204, 209–218, 219–227). Locations along rivers such as the Thames and the Witham were sites of votive deposition of weapons in the prehistoric, Roman, Anglo-Saxon, and later medieval periods (Hines 1997: 380–381; Booth *et al.* 2007: 231–234). Generally considered to belong to a tradition of deposition in watery places, the possibility that rivers were also liminal places should be considered. In Anglo-Saxon settlements, Hamerow has already noted that placed deposits are often associated with entrances and boundaries (Hamerow 2006: 9–12). The analyses of this chapter, demonstrating that particular materials were placed at particular liminal feature types and elements, show that the association between placed deposits and liminal places is more than just a general tendency.

It should be noted that association of placed deposits with liminal places is not merely a consequence of differential preservation or this study's methodology. Although some negative features, such as boundary ditches and the settings of building walls, are by definition liminal places (§6.3.1), others such as pits, SFBs, free-standing postholes, and graves are not inherently liminal (even though some could be located in liminal places). Nearly two-thirds of placed deposits were not in identifiably liminal places.

6.3.2 Boundaries in Anglo-Saxon settlements

During the early Anglo-Saxon period, settlements were open in layout (Hamerow 2010*b*: 9–10; *cf.* Bowden & McOmish 1987: 81), although in some cases prehistoric and Roman earthworks still visible in the early Anglo-Saxon period may have influenced settlement layout, as at Mucking or Bloodmoor Hill (Reynolds 2003: 104; Hamerow 1993: 86, fig. 51; Lucy *et al*. 2009: 37). New forms of settlement began to appear as early as the late 6th century, featuring enclosures in a variety of forms. Reynolds was able to divide these into four broad groups: (1) small, predominantly fenced enclosures associated with individual structures, usually of high status; (2) ditched enclosures *c.*60 m across surrounding minor settlement 'modules' (farms?); (3) larger ditched enclosures containing multiple units of settlement and/or associated with minsters or secular high status settlements; and (4) planned 'rectilinear' settlements characterized by regular plots associated with trackways (Reynolds 2003). Reynolds finds each of these forms of enclosure exemplified in settlements of varying status, and both ascribed onto pre-existing settlements and as new foundations.

This shift in settlement layout has been attributed to political and economic changes in Anglo-Saxon society in the late 6th through 8th centuries. An increased reliance on landholdings and their produce by an increasingly complex political system involving the king, his 'aristocracy', and the Church resulted in intensified land use. Manifestations included local specialization in crops and animal husbandry and changing agricultural techniques. In settlements, the establishment of droveways and paddocks in settlement areas indicates both an intensification in animal husbandry and a move to keep animals closer to the settlement (Hamerow 2010*a*: 76). Major and minor enclosures would have kept animals out of farmyards and away from buildings. On a more symbolic level, in this period when landholding was becoming more important, enclosures may

have been expressions of control over land, with minor enclosures staking the claim of a family unit, for example, and major enclosures signifying a settlement's control over its immediate hinterland. Enclosures can also be used to express a 'shared identity' and 'close, symbolic relationship' among those dwelling within (Brück 1999*b*: 153–154). If this was the case, then placed deposits associated with enclosure boundaries might be expected to have served similar symbolic purposes.

6.3.3 Placed deposits at contemporary boundaries and entrances

Indeed, placed deposits associated with ground level buildings and minor enclosures, particularly burials, may well have helped to construct or assert control over that land by family units (Hamerow 2010*a*: 76). In this chapter, correspondence analysis has shown that complete skeletons, mostly human burials, were disproportionately associated with the walls of earthfast buildings and the ditches of minor enclosures surrounding small settlement units: 'farmyards' or 'homesteads'. In Chapter 8, a differentiation will be made between 'normative' and 'deviant' treatment of human remains in settlement contexts (§8.1.3; Geake 1992; Reynolds 2009). Using those definitions, it will be seen that nine out of ten normative burials identified in this study were positively associated either with an earthfast building or a minor enclosure (§8.5.1, Tab. 8.11). The majority of these normative burials were located just inside or outside the wall or enclosure boundary, suggesting that they were contemporary to the use of the feature. 'Deviant' burials, in contrast, were almost completely absent in association with earthfast buildings, though three were associated with minor enclosures (§8.5.1).

The 7th through the 9th centuries saw more frequent human burial within settlements, a trend that could possibly reflect communities' attempts to establish stronger links with their dead ancestors, in order to legitimize claims to landholdings passed down

from generation to generation (Hamerow 2010*a*: 75–76). That normative inhumations were disproportionately made along the walls of buildings and at the edges of minor enclosures while these features were in use seems to fit Hamerow's interpretation, perhaps indicating that attempts to lay claim to the dead were taking place primarily at the level of the family unit. Even though these burials came from only a few settlements (Flixborough, Gamlingay, and perhaps Yeavering), the correspondence is suggestive.

However, in some cases the human burials at minor boundaries were associated with the destruction of the boundary, and some were deviant burials (see Chapter 8); moreover, a correspondence was also found between minor enclosure boundaries and skulls (both human and animal). This suggests that while some human burials associated with the walls of buildings may be understood as attempts to reinforce the landholding claims of those dwelling there, that interpretation may not hold for human burials associated with minor enclosures. Placed deposits associated with minor enclosures are discussed further below (§6.3.4).

Other placed deposits contemporary to earthfast buildings and minor enclosures may have served a different purpose. The skulls stacked *en masse* against the inner wall of building D2 at Yeavering seem more associated with ritualized butchery or consumption (e.g. 'feasting') (§10.2). The horse skull in pit A2072 at Hartlepool and the human skull placed face-down in pit 1073 at Cottam fit a pattern identified in Chapter 7 of skulls placed in the final backfilling of pits and SFBs.

The six placed deposits associated with doorways and entrances were also probably contemporary to their buildings and enclosures, respectively, but are likely to have served a different purpose from the human burials. Placed deposits associated with entrances do not show the same patterns as deposits associated with and contemporary to earthfast buildings and minor enclosures. In fact, they show no correspondences with

particular object types or species. However, if there is little to tie together the contents of these placed deposits, the location of the deposit may be even more significant of their purpose. Three placed deposits in doorways—in pit 6 at Cowdery's Down, grave AX at Yeavering, and the door pit of the chancel at Staunch Meadow, Brandon—were situated such that anyone using the entrance had to walk over the placed deposit. Burial 3617 at Catholme was situated in an analogous position in the entrance of an enclosure. Additionally, pit 6 and grave AX were associated with posts located approximately 1 m and 3 m outside the doorway, respectively. These posts could have been perceived as physical obstacles that anyone entering or exiting the building had to circumnavigate. The placed deposits may likewise have acted as obstacles to be crossed on entering the building. As discussed above, entrances are paths of communication through boundaries, and as such they are inherently different from other places along the boundary, where communication is impossible (Woodward & Hughes 2007: 185). The special liminal significance that entrances can hold and the possible role that entrances, and placed deposits in entrances, may have played as agents in mediating that liminality is discussed further in §9.2.

6.3.4 Placed deposits at the close of boundaries

Eight placed deposits were associated with major enclosures at three settlements: Catholme, Higham Ferrers, and Wolverton Mill. They disproportionately contained articulated segments and disarticulated bone, and they were disproportionately made at the line of boundary, rather than at other elements of the enclosure (Fig. 6.5). Seven out of eight were placed within the boundary ditch. A few of these deposits were placed while the enclosure ditch was still open and in use. A collection of bone needles, probably strung together, was found on the base of the ditch 15165 (the horseshoe

shaped enclosure) at Higham Ferrers, and an antler cache was found at the bottom of the Anglo-Saxon recut 3958 of a Romano-British ditch at Mucking, although the function of the latter ditch in the Anglo-Saxon settlement is not clear. These placed deposits may have been associated with the construction and recutting of the respective ditches. Such placed deposits may have asserted the boundary, emphasizing its importance in distinguishing the enclosed area from the outside world.[59] Only one placed deposit, cattle burial 3663 at Catholme, is in a separate pit adjacent to a major enclosure, rather than directly in the enclosure ditch, perhaps to avoid hastening its infilling.

However, unlike most placed deposits associated with and contemporary to earthfast buildings and doorways/entrances, some placed deposits were associated with the destruction of major enclosures. The deposits of human and animal remains in ditch 7330 at Higham Ferrers were placed in the final backfill of the horseshoe shaped enclosure ditch. Other placed deposits are likely to be associated with backfilling, but the published record is not conclusive; for example, burial 3666 at Catholme appears to have been dug into a multi-phase enclosure ditch while it was only partly filled, but the possibility that the burial immediately preceded the ditch's final backfilling cannot be discounted. Placed deposits made during the backfilling of major enclosure ditches should be seen not as marking or asserting the existence of the boundary, but its destruction: the erasure of the enclosure from the settlement landscape. The removal of a major boundary would have been a watershed event in the life of a settlement, relating to a dramatic shift in location and perhaps function, as at Higham Ferrers (Hardy *et al.* 2007), or in some cases the final abandonment of the settlement. The placed deposits associated with these events may have been the result of activities involving the larger settlement community.

[59] It has been suggested that the lead vessels placed in ditch 53 at Bottesford and ditch 191 at Riby Cross Roads were stored in boundary ditches where they could be easily found and retrieved later (Cowgill 2009*a*: 84–85), but they also fit the pattern discussed here.

As mentioned above, placed deposits associated with minor enclosures were varied in terms of their contents and the element of the enclosure with which the deposit was associated. Some placed deposits associated with minor enclosures were contemporary with the boundary's period of use, and should perhaps be interpreted similarly to the deposits associated with earthfast buildings discussed above. Others were placed in the boundary feature and were associated with its destruction. The three graves at Yarnton (two normative and one deviant) were cut into the backfill of minor enclosure ditches, and articulated cattle midsection was in the fill of possible boundary ditch 2547. A collection of sheep skulls was recovered from the fills of disused palisade pit B383 at Hartlepool. In terms of timing and location in boundary features, these placed deposits resemble those in the fills of major boundary ditches, and they may have been made for analogous reasons, as the family gave up its claim to that piece of land in the settlement. If the possibility that human burials associated with standing buildings may have reinforced a family's claim to its landholdings is to be considered, it could also be speculated that placed deposits associated with the destruction of minor enclosures may have helped to achieve the cessation of land claims.

Placed deposits associated with the abandonment of earthfast buildings are rare, so their purpose is difficult to ascertain. Grave 65 at Gamlingay was cut through the foundations of an earthfast building, but it is not clear whether the significance of this deposit is more closely related to other normative human burials associated with buildings or with other deposits associated with the destruction of settlement features. On the other hand, more than half of all placed deposits identified in this study were associated with the destruction of SFBs, but only nine deposits in SFBs could be tentatively associated with specific elements of those features (Tab. 6.3). Three out of six placed deposits of lead rings or discs were associated with the corners of SFBs. Any

significance of this association is far from clear, especially since the function of the lead rings or discs is unknown (Blackmore 2008: 205). Deposits placed at the destruction of SFBs are discussed in detail in the next chapter, where it will be argued that they relate to temporal rather than spatial liminality.

6.3.5 Butchery waste and boundaries

As discussed in the previous chapter, a general trend has been identified in British settlements from the Iron Age through to the medieval period for the bones of large domesticates to be associated with the perimeters of settlements (Wilson 1996). The association of articulated segments with major enclosures could be seen as a result of normal butchery waste disposal. However, it has already been shown that some of the articulated segments found in ditches are of small domesticates or human remains (§5.6.1). Moreover, the partially articulated horse spine and forelegs in the horseshoe-shaped enclosure ditch at Higham Ferrers are in a part of the ditch that runs right next to buildings (halls) 2666 and 2664/5, so although they are on the site boundary, they are not far from the domestic centre. Cattle burial 3663 at Catholme consisted of parts of the head, right forelimb, and left hindlimb, suggesting an element of selection for deposition that goes beyond the mere opportune discard of butchery waste. The two other cattle deposits associated with settlement boundaries, both in the horseshoe-shaped enclosure ditch at Higham Ferrers, were associated with the semi-complete woman and two dog skeletons. As observed in the last chapter, if these articulated segments are products of butchery, their deposition nonetheless represents something more than mere waste disposal.

6.3.6 Non-skeletal object types: a change over time?

Because non-skeletal object types occurred too infrequently in association with other settlement features to be analysed statistically, the correspondence analysis in this chapter has considered only deposits of skeletal remains, although relevant anecdotal examples of other object types have been included. Non-skeletal material in placed deposits associated with liminal features include six deposits of loomweights (two of which also contained semi-complete pots), three deposits of lead rings or discs, two lead vessels, a set of bone needles and a brooch (Tab. 6.1; Appendix B). The lead rings and five of the loomweight deposits were associated with the walls or corners of SFBs, but it has already been noted that these content types are statistically more often found in SFBs than in other contexts (Ch. 5). SFBs are largely characteristic of early Anglo-Saxon settlements, whereas enclosure features are more common in the middle Anglo-Saxon period. The types of objects selected for placed deposition may likewise have changed around the 7th century. Whereas non-skeletal objects were frequently included in placed deposits in the early Anglo-Saxon period, when SFBs were prevalent, they may have been considered less suitable for placed deposition in the middle Anglo-Saxon period, when enclosures were common. The fact that three of the nine placed deposits associated with SFB pit edges consisted of lead rings or discs in the corners and postholes of the building suggest that the association of some placed deposits with liminal elements of SFBs was deliberate.

6.3.7 Conclusion

This chapter has identified a number of patterns associating placed deposits of certain object types and species with liminal places such as walls, enclosure boundaries, doorways, and entrances. Distinct patterns associated some placed deposits with the

creation and sustained presence of these liminal places in the settlement landscape on the one hand, and with their destruction on the other. These patterns can be resolved into three different themes relating placed deposition to the role of liminal places in Anglo-Saxon settlements: some Anglo-Saxon placed deposits at liminal places referred not to the liminal place itself but the socially constructed space it defined; others marked or reinforced the boundary; and still others operated against the boundary or entrance, in some cases negating it entirely.

By drawing boundaries, people impose structure on their surroundings, transforming homogeneous space into differentiated places (Zerubavel 1991). Boundaries are therefore important with respect to the socially constructed spaces that they define, and placed deposits at boundaries may refer to those defined spaces. This seems to be the case with one of the most important patterns identified in this chapter, namely human burials near the walls of earthfast buildings and some minor enclosure boundaries. In a period of intensifying exploitation of land-based resources, these placed deposits may have strengthened family claims not only to the building or the homestead defined by its enclosure, but to the wider landholdings that the family, building and/or homestead synecdochically represented.

Boundaries are also spaces in their own right: liminal zones that belong to neither of the spaces they bound (van Gennep 1960 [1909]). As such, they may have their own agency in the settlement (§9.2.2). Boundaries separate socially constructed spaces, but they are also the place where those spaces come together. Thus liminal places both divide and connect, and deposits in liminal places may likewise mark or reinforce both connection and division. Placed deposits in active enclosure boundaries can be understood in these terms. Enclosure boundaries divide the enclosed area from the outside world, and placed deposits at the base of enclosure boundaries, possibly

associated with the creation of the boundary, can possibly be seen as referring to or reinforcing that division.

On the other hand, some placed deposits in Anglo-Saxon settlements may have worked against the liminal places with which they were associated. Deposits placed during the backfilling and abandonment of major enclosures and some minor enclosures may have marked or enabled their erasure from the settlement landscape, eliminating liminality and reuniting separate social spaces. Entrances and doorways are points of 'access' or 'penetration' between the spaces defined by the boundary (Woodward & Hughes 2007: 185), but placed deposits in doorways, although integral elements of the feature, may have had a special agency to help control access to the building, acting as obstacles like the free-standing posts at the entrances to some Anglo-Saxon buildings, or as doors that both permit and prevent access.

With over a third of the placed deposits identified in this study associated with walls, boundaries, doorways, and entrances, association with liminal places is a major theme for placed deposition in Anglo-Saxon settlements. Nevertheless, that theme is only part of a larger association between placed deposition and liminality more broadly defined, which will be discussed in Chapter 9, using relevant evidence from the next two chapters.

Chapter 7
Liminal times? Placed deposits made during the backfilling of SFBs and other features

In Chapter 6, it was shown that about a third of all placed deposits in Anglo-Saxon settlements were associated with 'liminal' features such as walls, boundaries, and entrances, and that certain characteristics of placed deposits were correlated with certain types and elements of liminal features. This chapter will consider placed deposits made not at liminal places but at liminal times. Laying the foundations of a new building, closing up a long-used sand quarrying pit, and abandoning a particular zone of a settlement—all of these events could be viewed as boundaries in time, connecting and dividing temporal phases of the settlement just as entrances and boundaries connect and divide space. To what extent did placed deposits in Anglo-Saxon settlements serve to mark or construct these temporal boundaries?

Early Anglo-Saxons endowed a variety of types of events with significance. Some of these related to 'life course'. Correlations between age and grave goods provide evidence of transitions in people's lives, such as coming of age (Crawford 1999; Stoodley 2000), and of course the transition from life into death/ancestor, marked by furnished inhumation or cremation (Williams 2004, 2005). Anglo-Saxon interest in the passage of time was also deeply rooted. Bede's *Historia Ecclesiastica* and the *Anglo-Saxon Chronicle* provide ample evidence for a sense of history by the middle Anglo-Saxon period, and the early Anglo-Saxons engaged with the past when they situated some cemeteries and settlements with reference to ancient monuments (Williams 1998; Crewe 2008), perhaps attempting to associate their own communities with the *waldendwyrhtan*

(mighty or kingly craftsmen) of the past, as described in the late Saxon poem, 'The Ruin' (l. 7).

That buildings and settlements are sometimes thought to have a 'life history' (Binford 1968: 21–22; Schiffer 1987: 13ff.), often intrinsically linked to the lives of a community and its members, is attested widely ethnographically and has been suggested to apply in prehistoric northwest Europe (LaMotta & Schiffer 1999; Brück 1999*a*; Gerritsen 1999*a*). This chapter considers the role that placed deposits played in constructing the 'life history' of Anglo-Saxon settlements. These might include foundation and termination deposits, widely recognized archaeologically and anthropologically; transitions in form or use might also have been marked by placed deposits. Placed deposits and patterns in their characteristics can indicate events that were important in Anglo-Saxon settlements.

There is no direct evidence that Anglo-Saxons conceived of events as 'temporal boundaries' within a settlement's life, but that should not discourage archaeologists from seeking to identify such boundaries. It shall be argued in Chapter 9 that the similarity between rites of passage and the crossing of boundaries extends beyond mere metaphor. Considering events in the settlement as temporal analogues to boundaries and entrances might help us understand foundation deposits, termination deposits, and other placed deposits made at times of transition in a new way.

Placed deposits made at liminal times can most easily be identified in features that have contexts clearly associated with their construction, their destruction, or a change in their form or use. Such features include sunken-featured buildings (SFBs, also called *Grubenhäuser*) and postholes, and some pits and ditches. Since over half of all placed deposits were found in SFBs, this chapter begins by comparing these placed deposits to those in other contexts. It is then necessary to undertake a detailed critical review of SFB

fill formation processes in order to understand the role placed deposits play in that sequence. Quantitative analysis reveals patterns relating certain object types to specific phases in the destruction (or transformation) of SFBs. Placed deposits in postholes and in the final backfills of pits and ditches are also analysed for patterns in terms of content type and species. Finally, these patterns are examined together in order to identify which events within the life of Anglo-Saxon settlements were conceived of as liminal times, thus providing a firm basis for interpreting these patterns.

7.1 SFBs

The preponderance of material culture recovered from early Anglo-Saxon settlements comes from SFBs. This can be explained on several levels. SFBs are both numerous in this period and larger than most other features. In addition, SFBs were usually deliberately backfilled, with surface rubbish deposits providing much of the backfilling material (Tipper 2004: 99–111; and see §7.2 below). It follows that most of the material lost or discarded in early Anglo-Saxon settlements will have found its way into SFBs; it does not, however, necessarily follow that the preponderance of placed deposits should have been made in SFBs. Placed deposits by definition contrast with the material normally found in settlement features (§2.3), and it cannot be assumed that the distribution of placed deposits mirrors that of non-placed material. Therefore, it is worth asking why 58 per cent of placed deposits come from SFBs (Fig. 5.8). Is it mere chance, or were SFBs preferentially selected for placed deposition?

Three factors could contribute to SFBs containing the majority of placed deposits in early Anglo-Saxon settlements *by chance*: the number of SFBs, their size, and the length of time SFB pits remained open prior to backfilling. However, none of these factors results in large numbers of placed deposits in other context types. Postholes are

more numerous than SFBs in Anglo-Saxon settlements yet only five contained placed deposits, and four of those five were axial postholes of SFBs. Postholes are small compared to SFBs; but ditches have much greater fill volumes and surface areas, and yet only 13 placed deposits came from ditches. Many pits and ditches were open for extended periods, their stratigraphy showing evidence of natural silting as well as deliberate backfilling, but Tipper has shown that most SFBs were kept open for a very short time after the destruction of the superstructure (Tipper 2004: 104–106). In any case, placed deposition is not an opportunistic act. Prevalence, size, and the length of time features remained open do not appear to be factors that measurably improved the chances of placed deposition, either for SFBs or for any other feature type. The large numbers of placed deposits in SFBs, and the large proportion of SFBs containing placed deposits, results not from chance but from preference.

This conclusion is supported by the fact that SFBs were the preferred context for only certain object types (§5.3.1). The occurrences of each object type in each context type were quantified in Table 5.2. Complete or semi-complete pots, loomweights, lead rings or discs, and artefacts (single/sets) were overwhelmingly found in SFBs, whereas each of the skeletal object types (articulated skeletons, articulated segments, skulls, and disarticulated bone) were found in SFBs and pits in similar numbers.[60] Furthermore, SFBs were shown to be associated with placed deposits of partially articulated neonatal pigs and with human infants (§5.5), and it was also noted that all four placed deposits of cat remains were found in SFBs. Certain objects appear to have been selected for placement specifically in SFBs.

[60] The question of whether the deposits of loomweights are indeed placed receives due consideration below (§7.5).

Why were SFBs preferred for placed deposits of loomweights, lead rings or discs, and complete or semi-complete pots? In order to address this question, we must first consider how placed deposition fits into SFB fill formation processes.

7.2 The formation of SFB fills: a critical review

Placed deposition in SFB pits can only be understood in the context of the formation of the rest of the pit fill. As Chapter 2 established, it is necessary to understand the formation processes of the surrounding contexts in order to identify placed deposits in the first place. Even once that is done, interpretations of placed deposits depend on the nature of SFB backfilling processes, the state of the feature at various points in the formation sequence, and the timing of placed deposition within that sequence. The following critical review of SFB formation processes is inevitably detailed, but it is necessary for the next section (§7.3), in which analysis links certain object types to placed deposits associated with subtly different aspects of those processes (*viz.* the destruction of the superstructure and the backfilling of the pit).

Any study of SFB formation processes must turn in the first instance to Tipper's (2004) comprehensive reanalysis of Anglo-Saxon SFBs. Whereas the current study concerns placed deposits made (as we shall see) during or after the destruction of the building, Tipper seeks to reinterpret the architecture of the SFB superstructure and its purpose during the building's primary use, based upon evidence from recent excavations. However, since SFB fills are the main surviving archaeological trace of these structures, Tipper recognizes that in order to infer anything about SFB structure and use he must first understand the formation processes that led to their creation (*ibid.* 112, following Schiffer 1972, 1976, 1987). Appropriately then, Tipper's analyses rely heavily upon the

characteristics and contents of SFB pit fills in order to understand their formation (Tipper 2004: 99–159), and consequently they are very useful to the present study.

The discussion of SFB pit formation processes that follows reconsiders Tipper's analysis while paying specific attention to placed deposition, a process that Tipper recognizes but plays down as a contributor to SFB pit formation (*ibid.* 150–151, 153). Like Tipper's analysis, the evidence used is considerably weighted toward SFBs from the three large, extensively excavated and well-known settlements: West Stow, Mucking, and to a lesser extent, West Heslerton, for which detailed evidence is not readily accessible. Tipper offers a coherent, uniform interpretation of SFB fill formation that does not satisfactorily account for many examples of SFB fills (as Tipper himself admits; *ibid.* 107); the analysis below, however, accepts that variations and exceptions are inescapable characteristics of this class of features. Embracing conflicting evidence from specific SFBs, rather than explaining it away or ignoring it, produces a more flexible interpretation allowing for wider variation in SFB fill formation that is still consistent with the themes of Tipper's interpretation.

7.2.1 General characteristics of SFBs and their fills

SFBs typically consisted of a roughly rectangular pit, about 4 m by 3 m in plan and 30 to 50 cm deep below the surface of the substrate, over which was erected a superstructure usually supported by two or more posts. Once interpreted as dwellings, SFBs are now more commonly thought to have housed domestic industrial activities such as weaving or to have served as storage sheds. However, their exact structure and function are subjects of continued debate (see Tipper 2004: 64–93, 160–85).

In general, Anglo-Saxon settlement features contain fragmented domestic material (Ch. 3), and this characterization certainly holds true for SFB pit fills. In addition, three

characteristics of SFB fills are particularly relevant to this discussion. First, SFB fills usually exhibit a consistent, relatively straightforward two- or three-layer stratigraphy (Tipper 2004: 99–102). Second, the straight, steep sides of SFB pit cuts are preserved in the archaeological record (*ibid.* 103–4). Third, joining potsherds are occasionally found in different layers within the same SFB, or even in separate SFBs, sometimes dozens of meters apart (*ibid.* 107, 148).

Bearing these general characteristics in mind, the formation of SFB fills is analysed below sequentially by layer. The analysis distinguishes between basal *primary fills*, which probably formed during the use-life of the building while the superstructure was present, and secondary fills, formed during or after the destruction of the superstructure, that can be divided into *lower secondary fills* and *upper secondary fills*. These terms have been chosen to highlight formation processes.[61]

7.2.2 Primary fills

Some SFBs contain shallow basal fills that may have formed during the primary use of the building. In SFBs with suspended floors, primary fills could have formed from silting through the cracks between floorboards during the primary life of the building (Tipper 2004: 107). In SFB 15 at West Stow, two layers of planks, identified as the suspended floor and walls of the superstructure, lie about 5 cm above the base of the pit (West 1985: fig. 71), overlying material that must have accumulated during the life of the building. SFBs with evidence for sunken floors experienced primary accumulation as

[61] Many archaeological reports use the terms 'primary fill', 'secondary fill', 'lower fill', 'middle fill' and 'upper fill', but because these terms are ambiguous and used differently by different authors, they can be confusing. While in some site reports 'primary' fill refers to a superstructural-phase layer, in others it refers to the earliest post-superstructural layer (e.g. Bell 2004: 183). The term 'lower' fill, on the other hand, often refers to the lowest layer with no regard for when it formed; for example, Tipper (2004: 107) identifies both superstructural-phase silting and post-superstructural deposition as formation processes of the 'lower fill'. It shall be established that the basal layer, the lower fill, and upper fills are formed in separate depositional events, so it is sensible to interpret them as separate fills, even if they are not readily distinguished in excavation.

well. SFBs 1 and 3 at Fremington contain 5-cm-thick basal fills of compacted soil intermixed with lenses of sand, identified as 'occupation layers' because they appear to have formed while the axial posts were present (Oliver *et al.* 1996: 134–139, 145–146). Such primary fills, when present, represent material passively deposited during the primary use of the superstructure, prior to its collapse or disassembly. They were usually relatively shallow and contained little material culture (West 1985: fig. 71; Oliver *et al.* 1996: 134). Suspended floors would have kept most objects out of the pits, but even sunken floors appear to have been kept clean.

Placed deposits lying directly on primary fills must have been deposited after the building went out of use. However, as Tipper has shown, complete backfilling usually occurred very shortly after the destruction of the superstructure (Tipper 2004: 104–106). Tipper has shown experimentally that an SFB left open suffers erosion after only a few months that dramatically breaks down the sides of the pit and deposits layers of collapse with a messy stratigraphy (Fig. 7.1); most SFBs, however, preserve straight, steep sides and exhibit simple stratigraphy, even in soft substrates, indicating that erosion did not have time to take place. Therefore, as a rule placed deposits lying directly on the surface of primary fills must have been deposited shortly after the destruction of the building, before the formation of the rest of the fill. This study has found 33 such deposits, of which 20 contained loomweights. These deposits could have been associated either with the destruction of the building or with the backfilling process, or both if there was little intervening time.

7.2.3 Lower secondary fills

Tipper suggests that two formation processes typically contributed initially to fill SFB pits after the destruction of the superstructure. The first was the inward collapse of

the superstructure, either intentionally or through natural decay of the structure. The lower 15–30 cm of SFBs 3 and 15 at West Stow included layers of charred wooden planks and hazel sticks, interpreted as the remains of a suspended floor, walls, and a thatched roof (West 1985: 16, 23, figs 35, 71). In general, a high proportion of decomposed organic remains, resulting in 'greasy', 'loamy', 'sticky' and 'dense' fills, and areas of clay and charring could indicate the presence of turf and/or wattle-and-daub superstructure in the lower fills of SFBs (Tipper 2004: 99, 101, 106). The second process, accounting for the large quantities of fragmented domestic refuse in SFB fills, was deliberate backfilling with material from other sources, such as spoil heaps and rubbish deposits. Lower fills of natural substrate mixed with topsoil in SFBs at Northbrook may have come from the spoil heaps created when those SFBs were first excavated, whereas clean gravel middle fills at Mucking and West Heslerton may have been fresh spoil from the excavation of new SFBs (*ibid.* 106). Large quantities of fragmented and dispersed domestic material in the fills of SFBs are probably redeposited from contemporary surface rubbish heaps (*ibid.* 157–159); where this material includes animal remains and other organic waste, largely organic fills can once again be expected.

As discussed above, preserved pit sides and simple fill stratigraphy show that these processes took place shortly after the destruction of the building. It also suggests that the pits were completely backfilled at this time; this is corroborated by the presence of hearths lying across the pit edges at the same level as the surface of the substrate (see §7.2.4). This conclusion is not surprising, since an open pit in a settlement would represent not only a potential hazard but also a ready-made receptacle for all sorts of unwanted material. However, the motivation for completely backfilling an SFB pit need not have been purely functional (see §7.5).

Tipper portrays these processes as distinct, successive depositional events, forming discrete layers of fill: first collapse and/or demolition of the superstructure forms the lower secondary fill, and then backfilled material from rubbish deposits and spoil heaps forms the layer above (Tipper 2004: 107). However, as Tipper disclaims almost immediately, this pattern is not universal, and numerous variants can be identified. For instance the two processes could happen in a different order, as in SFB 12 at West Stow, where the remains of the walls were found higher up in the fill (West 1985: 20, fig. 59A), suggesting that some backfilling took place before the structure had completely collapsed. Both formation processes can occur at the same time, creating a single layer derived from multiple sources. The lower fills of SFBs at Mucking and West Stow were highly organic, suggesting inward collapse of the superstructure, but they also produced vast amounts of domestic artefacts, bone and other objects, some of which may have come from surface rubbish heaps, and some of which were relatively fresh and unabraded, representing primary refuse and/or placed deposits (Hamerow 1993: 13–14; West 1985).

Conversely, material from the same source could have been used in more than one fill within the same SFB. Using the pottery assemblages from just Mucking, West Heslerton, and West Stow, Tipper has shown that a small but significant percentage of joining sherds were deposited in separate layers within the same SFB, vertically separated by up to 40 cm, as well as in separate SFBs as far as 200 m apart (Tipper 2004: 112–138). Tipper concludes that the joining sherds were broken in common surface rubbish heaps or middens, from which material was taken for backfilling SFB pits (*ibid.* 148). Sherd joins across layers within the same SFB show that multiple layers could contain material from the same source, helping explain why the different layers within some SFB fills are often so similar to one another. Moreover, layers containing joining sherds must have been

deposited in rapid succession, in order for the edges of sherds broken on the rubbish heap to have remained fresh enough for joins to be identified.[62]

Based on these and numerous other examples, it seems that the backfilling of SFBs was often a complex process that potentially involved multiple depositional events in quick succession, even if it resulted in one 'homogeneous layer' or multiple layers with an apparently simple stratigraphy. Placed deposition could be part of this process. For example, in SFB 5087[=5112] at Horcott Quarry, the lower fill, excavated by the present author, was markedly loamier in the centre of the pit and became more gravelly toward the edges, suggesting that material from different sources was deposited in different areas of the pit. Within the loamy centre, at the base of the pit, were large, fresh sherds from one or more semi-complete Anglo-Saxon vessels. Large disarticulated animal bones were found in the loamy fill extending from the base up to about 20 cm above the base, at which level were two ox skulls, about 1 m apart. A number of large stones, alike in size, may have been deliberately arranged in a circle around one of the skulls. The loamy fill continued about 5 cm above the level of the skulls before the upper fill of the feature. Clearly different items were placed at various stages in the backfilling process: the semi-complete pottery at the beginning and the skulls near the end, with the disarticulated animal remains either already part of the backfilling material, or else deposited along with it.

[62] Chapman (2000*a*: ch. 2) argues that in the Balkans during the Mesolithic and Neolithic periods, joining fragments across contexts and features represent the deliberate fragmentation and dispersal of pottery as a material manifestation of social relationships through a process that he calls 'enchainment', which depends upon goods being regarded as 'inalienable' and people as 'dividual' (*ibid*. 28–29, 31–32). Although the deliberate fragmentation of pottery as part of some social process cannot be ruled out, there is no corroborating evidence for enchainment, inalienability of goods, and dividualism in contemporary written accounts or later Saxon texts. It has been argued from the mixed, fragmented nature of SFB fills that some of their material derives from intermediate rubbish deposits (Tipper 2004: 157–159), and it seems likely that joining sherds in different SFB fill contexts derive the same intermediate source.

7.2.4 Upper secondary fills

Sufficient will have been said to demonstrate that SFB pits were usually backfilled rapidly and completely after the demise of the superstructure. However, the formation of SFB fills does not end here. The concave interfaces of most multilayer SFB fills clearly show that compaction occurred subsequent to backfilling, resulting in shallow depressions or hollows. Remains of hearths as well as ash and other charred debris lying on the bases of some of these hollows indicate that they were utilized as 'sheltered working area[s]' (Tipper 2004: 106). This activity represents an 'afterlife' for these SFBs. West Stow produced post-backfill hearths in ten out of 69 SFBs: 6, 15, 18, 21, 24, 25, 27, 44, 49 and 61 (West 1985: 120). Most of the hearths lie on or near the edge of the SFB cut; in the case of SFB 49, the hearth lies across the edge of the cut, with half of it outside the pit, 5–10 cm above the level of the natural (Fig. 7.2). The rest of the hearth slumps downward toward the centre of the pit. The presence of hearths lying near or across the edge of the cut reinforces that the pits had been filled to the top of the cut, since the hearths would have been laid on flat ground; the subsequent slumping of the hearth is due to compaction of the lower fills. However, it could be argued that a depression had already started to form in the centre of the backfill, for it appears to have been that depression that attracted the construction of the hearths. Interestingly, the hearths in SFBs 6, 15, 44 and 49 must not have been laid within that depression, but just to the edge of it. The choice of positioning could be due to the direction of the prevailing wind out of the south and west. The hearths in SFBs 6, 18, 24, and 25 all lie on or in the lee of southwest slopes of the hollow, although it has to be said that in the latter two SFBs the hollow did not have much of a slope. Alternatively, where the shallow hollow lay on a slope, it may have been advantageous to have the hearth uphill of the hollow. In SFBs 18, 27, 44 and 49, the hearths were placed uphill of the SFBs, on or near the long edge.

Upper, post-backfilling layers of SFB fills appear to have derived from passive accumulation of material in these shallow hollows, both during and after their period of use (Tipper 2004: 106). At Bloodmoor Hill and West Stow, where parts of the settlement occupation layer survived, the upper fills of the SFBs seem to merge with the general occupation layer (*ibid.* 103). However, in some cases upper secondary fills of SFBs have distinct fills and appear to have been deliberately backfilled. Placed deposits made in or at the base of these upper fills could have been associated with the manufacturing or other use to which the hollow was put in the 'second life' of SFB pits; however, only three certain placed deposits like this have been identified in this study.

In addition to ploughing and other taphonomic processes, the cutting and filling of later features also contributes to the formation of post-backfilling upper layers of SFB stratigraphy. A large pit appears to have been cut into the upper fill of Structure 3 at Fremington, Cumbria, and the fill of this pit contained a substantial number of finds in a notably different soil from that of the upper fill (Oliver *et al.* 1996: 147, fig. 6:10). Obviously the fills of SFBs would be especially susceptible to later disturbance due to their comparative looseness.

7.2.5 Conclusion

When T. C. Lethbridge excavated an Anglo-Saxon SFB cut into the Car Dyke in 1927, he found it full of potsherds, broken and complete objects, and the complete skeleton of a dog. He concluded that Anglo-Saxons lived in squalor, crouched in sunken huts amongst their own rubbish and rotting animals, in 'complete disregard for cleanliness or comfort' (Lethbridge 1927: 146). As this section has shown, this was not the case; SFBs were kept relatively tidy, but copious material, including both rubbish and placed objects, was deposited after the building went out of use. The degree to which

Lethbridge was wrong reinforces the importance of understanding formation processes. The stratigraphic relationship connecting placed deposits to primary fills, lower secondary fills, and upper secondary fills indicates at what stage in the SFB pit's post-superstructural life the deposits were made, information crucial to interpreting their purpose, as demonstrated in the next section.

7.3 Timing of placed deposits in SFBs with respect to the formation of the fill

It has already been demonstrated that SFBs were a preferred context for placed deposition in Anglo-Saxon settlements, and that certain types of contents are statistically linked with SFB placed deposits. The complexity of SFB pit fill formation processes is such that different levels within the pit fill are associated with different stages in the use of SFB pits, from the destruction of the superstructure to the end of domestic use of sunken hollows resulting from fill compaction (§7.2). Is there a difference between deposits placed at different times in the formation of SFB pit fills, and what does that reveal about the purposes of placed deposits in SFBs?

7.3.1 Data

In this study a distinction has been recorded between placed deposits made prior to, during, and after the initial backfilling, when the stratigraphic location of the placed deposit has been reported in sufficient detail for it to be determined (Appendix B):

- prior to backfilling:
    - on the base or primary fill,
    - in a feature cut into the base or primary fill,
    - in a posthole of the SFB;

- during backfilling:
    - within the lower secondary fill(s),
    - at the interface of lower secondary fills;
- after fill compaction:
    - in or at the base of the upper secondary fill(s).

The totals are summarized by content type and species in Table 7.1.

For the purposes of the analysis, each of the categories above must be mutually exclusive. For example, deposits 'near' the base or primary fill were considered to have been made during backfilling, as were placed deposits with some elements on the base of the pit and others within the lower fill. Upper secondary fills refer to fills of compaction hollows or features truncating the backfill, rather than the upper layers of a multi-layer initial backfill.

For many placed deposits, especially those identified from older site reports or field notes, the reporting was not specific enough to distinguish the deposit's stratigraphic location. These deposits have simply been excluded from the analysis below. Even for well-recorded deposits, ascertaining the stratigraphic relationship of the placed deposit was sometimes problematic. The placed deposit of loomweights in SFB 15 at West Stow lay on top of a charcoal layer interpreted as the remains of a suspended floor, and below another interpreted as remains of the roof and walls. If this interpretation is correct, they could have been placed either before or after the suspended floor collapsed. Such deposits have been included with those placed prior to backfilling.

7.3.2 Timing of deposition compared

How does the composition of deposits in SFBs relate to the timing of the deposition? There were only three placed deposits in the fills of hollows resulting from

compaction or truncation, so it was not possible to do any statistical analysis on placed deposits in the upper fills of SFBs. However, it was possible to compare the deposits placed prior to backfilling to those made during backfilling.

As always, statistical analysis had to be limited to those object types and species that occurred frequently enough for the results to be reliable. Those object types were complete articulated skeletons, articulated segments, skulls, disarticulated bone, loomweights, and complete or semi-complete pots. The species that were used were human, cattle, dog, horse, and pig (Tab. 7.1). Sheep/goat occurred frequently enough to be used, but since all five placed deposits were in contexts other than SFBs, it was not necessary. Placed deposits of single artefacts or sets of artefacts occurred in seven placed deposits, but this category was excluded on account of its heterogeneity.

Pearson's chi-squared test suggests that the object types selected for deposition have a statistically significant dependence upon whether the deposit was made in an SFB prior to backfilling, in an SFB during backfilling, or in another context type.[63] Correspondence analysis illustrates this dependence, showing three distinct groups (Fig. 7.3):

1) On the right, loomweights have a strong association with deposition in SFBs before backfilling, as almost all loomweight placed deposits made in SFBs for which the stratigraphy has been clearly reported were made on the base.
2) At the bottom left, placed deposits made in SFBs during backfilling tended to contain (semi-)complete pots and skulls. However, while four complete or semi-complete pots were placed in SFBs during backfilling, five were placed before backfilling, suggesting that an equally strong association, not apparent

[63] Pearson's chi-squared test with Monte Carlo simulated *p*-value (based on 1×10^6 replicates): $\chi^2 = 47.7724$, df = N/A, $p = 2\times10^{-6}$. The fact that a small number of deposits contained multiple object types must be noted, though it is unlikely to have had a significant effect either on the chi-squared test or the correspondence analysis (§4.2.3).

in Fig. 7.3, may have existed between (semi-)complete pots and deposits made in SFBs prior to backfilling.

3) Other skeletal remains showed a strong correspondence with other context types.

Most of the differences between placed deposits made prior to and during backfilling relate to the use of loomweights and pottery. Indeed, if only skeletal remains are considered, there is no statistically significant difference between placed deposits made in SFBs prior to backfilling, in SFBs during backfilling, and in other types of features either in degree of articulation or in species.[64] Nevertheless, Figure 7.3 seems to show skulls more strongly associated with placed deposits made during backfilling than they are with placed deposits in non-SFB contexts. In fact, skulls occurred more frequently than any other object type in placed deposits made during the backfilling of SFBs, with eight examples (Tab. 7.1). Notably, seven out of these eight contained cattle and/or horse skulls. A similar trend will be identified for reused pits (§7.4), suggesting a larger pattern exists.

Two placed deposits were made in pits cut into SFB bases. The fill of pit F4405 was sealed by the lowest fill of SFB 6 at Harston, so the deposition of the lapwing skull at its base cannot be related to a particular time in the life of the building. The excavators interpreted the bird skull as a possible foundation deposit made prior to the construction of the building, but pit F4405 could equally well have been cut and backfilled immediately after the building went out of use and prior to the backfilling of the SFB pit. Pit 62 in SFB 1 at Pennyland was cut through the 2- to 5-cm-thick compacted basal layer

[64] Pearson's chi-squared test on the four skeletal object types vs. timing of deposition in SFBs (before backfilling, during backfilling, and in contexts other than SFBs or graves), with Monte Carlo simulated *p*-value (based on 1×10^6 replicates): $\chi^2 = 5.7461$, df = N/A, $p = 0.4724$. Pearson's chi-squared test on species vs. timing of deposition (as above), with Monte Carlo simulated *p*-value (based on 1×10^6 replicates): $\chi^2 = 3.6552$, df = N/A, $p = 0.9058$. Placed deposits of skeletal remains do not differ in terms of degree of articulation or species depending upon timing of deposition in SFBs or deposition in other contexts.

interpreted as a possible floor. This beehive-shaped pit was cut and the three mouse skeletons on its base were deposited after the building went out of use, and prior to the backfilling of the SFB, which stratigraphy and pit profile show was rapid and complete. In addition, an infant was placed in a shallow cut at the bottom of SFB 32 at Barrow Hills, probably after it went out of use.

Not enough placed deposits have been recorded from the upper fills of SFBs to test statistically whether they are more similar to the placed deposits made at other times in SFBs or to placed deposits in non-SFB features. The few examples that have been identified could fit with either group, although upper fills have produced no placed deposits with those object types that particularly distinguish placed deposits the lower fills (i.e. loomweights, complete or semi-complete vessels, and lead rings or discs).

It has been shown that placed deposits in the upper secondary fills of SFBs have been placed in hollows that resulted from compaction of the backfill and were sometimes used as working hollows. The placed deposits are stratigraphically linked to the phase in which the hollow was present, but they do not appear to be related to whether or not the hollow was used as a working area. Of the three placed deposits in the upper secondary fills of SFBs, none contained the lenses of charcoal or debris at their bases that would suggest manufacturing activity within the hollow (§7.2). A large number of charcoal inclusions and some fragments of fired clay, possibly from an oven, were in the upper fill of SFB 2233 at Brandon Road, Thetford, but they occur throughout the upper fill rather than as a lens at the base of the layer and were probably deposited along with a large assemblage of 57 iron objects, including fragments of metalworking tools and smithing debris (Atkins & Connor 2010: 33; Crummy 2010: 54–55; Eley & Fosberry 2010: 60). The stratigraphic information was not detailed enough to positively identify this deposit

as placed. Conversely, none of the ten SFBs at West Stow containing hearths in their fills had placed deposits in the upper layers.

7.3.3 Summary

Two seemingly contradictory conclusions can be drawn from the preceding analysis. On the one hand is the extremely strong tendency for placed deposits of loomweights to be found on the bases of SFBs and not anywhere else in the fill, suggesting that deposits made prior to backfilling should be distinguished from placed deposits made in SFBs at other times. On the other hand, complete or semi-complete vessels were found in nearly equal numbers on the bases of SFBs and in their lower fills, but infrequently in all other contexts. That suggests a similarity between placed deposits made prior to and during backfilling. This contradiction is discussed in §7.5, where the specific characteristics of placed deposits of loomweights will be considered in detail.

The evidence from the skeletal remains shows no definite statistical difference in the species or degree of articulation anywhere in SFBs or in other contexts. However, upon further examination placed deposits of cattle and horse skulls appear to be linked to the backfilling process. This association will be considered again below (§7.4). Other object types did not occur frequently enough to contribute to the analysis in terms of depositional timing, although lead rings or discs, infants/neonates, and single or sets of artefacts are generally linked to SFBs.

Although they were too few to be included in the statistical analysis, the placed deposits in the upper fills seem to be different from placed deposits elsewhere in the SFB, in two important respects. First, they are remarkably few, considering that SFBs were the most common context for placed deposits identified in this study. Second, no placed deposits in upper fills contain either of the two object types that are associated strongly

with SFBs, loomweights and (semi-)complete pots. Although they were probably placed in hollows formed by the compaction of the initial backfill, there is no correlation between placed deposition and evidence for secondary activity in the upper fill, such as domestic manufacturing. It may be that placed deposits in the compaction hollows of SFBs are most similar to placed deposits in pits, and that their small number reflects the fact that in many cases the compaction hollow would have been a comparatively shallow depression.

Unfortunately, it was not possible to test for chronological variation because not enough of the placed deposits in SFBs date from the Middle Anglo-Saxon period. This is not surprising given that SFBs were becoming less common in that period (Tipper 2004: 11–13).

7.4 Pits and other contexts

SFBs are not the only features in which placed deposits made at liminal times can be identified. The construction and destruction of earthfast buildings must have been important events, but placed deposits associated with postholes and wall trenches are rare; these are discussed later in this section. Some pits and most ditches were in use for an extended period of time, and their construction and closing could have been considered important events in the life of the settlement.

7.4.1 Pits

Some pits appear to have been specially dug in order to receive placed deposits, and then completely backfilled immediately after deposition. The location of such pits with respect to other settlement features could be relevant to interpretation (*cf.* Ch. 6). The deposits in specially dug pits might also have been made at liminal times, but for pits

backfilled in a single event, this would be difficult to assess unless there were stratigraphic links to contexts formed at other liminal times. No such links were identified in this study.

However, placed deposits have also been identified in a number of pits that appear to have been constructed for some other primary purpose, either because they were much larger than the material in the placed deposit, or because they were kept open for an extended period. Since placed deposition represents a secondary use of these pits, they will be referred to as 'reused pits' for convenience. In some 'reused' pits, it is possible to identify placed deposits made at a liminal time in the life of the pit.

This study has identified 14 placed deposits in pits that were probably reused for placed deposition. Of these 14, the stratigraphic relationship of the placed deposit in the pit was well reported in nine cases. With only nine examples, it was not possible to perform statistical analysis on the contents and timing of placed deposition in the secondary use of pits, but two trends can nevertheless be seen.

First, in eight of the nine pits, the placed deposit was located at or near the bottom of the uppermost layer of fill, as in pit 195 at Hartigans and a partly timbered waterhole (House XX1) at Sutton Courtenay (Figs 7.4, 7.5). In some cases, this uppermost layer represented the final backfill of a pit kept open for a long time. In others it was the fill of the final recut in a pit that had been opened and closed multiple times, like pit 195 at Hartigans. Later truncation of these fills was ignored if it was clearly part of an unrelated sequence. In House XXI at Sutton Courtenay an antler was arranged among some stones placed immediately above the disused waterhole, and a pot was placed nearby, before the remainder of the feature was completely backfilled. Activity overlying and truncating this backfill is clearly unrelated to the waterhole and its placed deposit (Leeds 1947: fig. 2).

The second trend is indicated by the four placed deposits out of the nine in reused pits that consisted entirely or primarily of cattle skulls and/or horse skulls. All four of these deposits were at the bottom of the final fill of the pits, and of these four, only pit F345 at Bloodmoor Hill contained additional placed material (namely, disarticulated animal bone). There was little in terms of composition to unite the other five deposits.

This evidence alone suggests a correlation between placed deposits of cattle/horse skulls and the final backfilling of reused pits. However, cattle and horse skulls have also been associated with the backfills of SFBs (§7.3). These two trends will be considered together in the next section (§7.4.2).

7.4.2 Other contexts

Although placed deposits made at liminal times were most often found in SFBs and pits, a handful of examples were found in postholes, wall trenches, and ditches. Posthole 2991 at Spong Hill, located about 2 m inside the doorway of an earthfast building, contained 13 complete loomweights, 12 semi-complete loomweights, and fragments of many others (Fig. 7.6). Many of the weights were stacked, 'as if they had slid off a pole, or been tied together' (Rickett 1995: 46), and they were in the centre of the posthole fill. The posthole is one of a pair interpreted as settings for a loom. Regardless of the function of the post, this apparent store of loomweights was deliberately placed in the posthole after the post had been removed. Hamerow has remarked that a gold coin and a ring of gold wire in the foundation settings of Buildings A3(b) and A4 at Yeavering could represent placed deposits (Hamerow 2006: 26 n. 8). They were in the original packing of the foundation trench and posthole, respectively, but they could not be firmly identified as placed according to the criteria used in this study (§4.1.2, Tab. 4.1). Placed deposits found in SFB postholes, such as the infant bones in the axial posthole of C18 at

Cowdery's Down or the bone comb and two of its teeth found in separate postholes of Building H4 at Hammersmith, are probably associated with the destruction and backfilling of the overall feature, and have therefore been included with other SFB deposits.

A few placed deposits in ditches were also associated with backfilling and abandonment. At least four discrete deposits were placed in different locations along the horseshoe-shaped enclosure ditch 7330 at Higham Ferrers at the base of the final fill, radiocarbon dated to the late 8th or early 9th century. These included parts of an articulated skeleton of a woman and a few other fragments of human bone, including the mandible of an adult male (section 383); a collection of bones deposited *en masse*, mostly cattle but including a human mandible from another adult male and a fragment of human pelvis (section 123); and two complete dog skeletons deposited along with a 'dense' deposit of mainly cattle bones (section 173). These deposits were made immediately prior to or at the start of the final backfilling of the ditch, after which that area of the settlement was abandoned in favour of an adjacent zone to the south. A semi-complete piglet found in the upper fills of Enclosure 2 at Gosberton Third Drove might similarly have been placed during the abandonment of the enclosure. At Wharram Percy, an infant appears to have been placed in the uppermost level of a section of Roman boundary ditch 2513, with a partially articulated sheep and a roughly spherical boulder nearby. A possible placed deposit of loomweights was similarly found on the surface of ditch 1567 at Wantage (Holbrook & Thomas 1996: 128). On the other hand, two placed deposits in boundary ditches might have been made at the time of their construction. The cache of antlers extending over 2.5 m along the bottom of ditch 3958 at Mucking may have been deposited just after the Romano-British ditch was recut in the Anglo-Saxon period. A pair of disassembled and folded lead vessels were found on the base of ditch 53 at Bottesford. It has not been possible to identify any patterns in the characteristics of

placed deposits made during the construction or backfilling of ditches and postholes, aside from their liminal timings.

7.5 Discussion

7.5.1 Termination deposits associated with the destruction of SFBs

It has been demonstrated that material resting on the base or primary fill of an SFB pit must have been deposited prior to the backfilling of the pit, either at the time the superstructure went out of use or shortly thereafter (§7.2). Although a range of materials have been found deposited in this narrow window, deposits of loomweights are almost exclusively found on the base or primary fill of SFBs. An association between loomweights and the lower levels of SFBs has been noticed in the past (Gibson with Murray 2003: 209–211; Tipper 2004: 165–167), but it has not been universally accepted that they were deliberately placed. A considered discussion of the evidence with reference to formation processes will show that, in most cases, they were.

Lines of loomweights in SFBs have often been interpreted as the *in situ* remains of upright looms. This study has identified 14 placed deposits containing lines or stacks of loomweights. A deposit of loomweights in a barrow ditch at Pakenham (Grimstone End), probably from an SFB not recognized during excavation, is the deposit that most likely represents an *in situ* loom. These loomweights were in two parallel lines, over 20 cm apart and each over 2 m long, that could represent weights hanging on either side of a shed bar (Fig. 7.7; *cf.* Leahy 2003: fig. 33). However, there are immediate problems with interpreting some of these deposits as the *in situ* remains of looms. An SFB at Dover contained at least five rows of loomweights (Fig. 7.8). The rows are so tightly stacked that they must have been either held together on a stick or carefully placed in rows on the base; they could not have fallen even a short distance from the warp threads to the base

and remained so tightly configured. Moreover, the rows are close together and askew in an arrangement that is not consistent with multiple looms; this problem is even more apparent in the case of the nine rows of loomweights in Grubenhaus 84 at Mucking. The lines of loomweights in Grubenhaus 105 at Mucking are parallel and less than 1 m apart, but at little over 1 m long seem too short to have spanned an entire loom (Hamerow 1993: fig. 77).

Deposits of loomweights in SFBs have alternatively been interpreted as stores of weights. The loomweights in the Dover SFB were thought to have been hanging from the ceiling when the SFB was destroyed by fire (Philp 1976: 122). The lines and clusters of loomweights in SFB 15 at West Stow, which were interpreted as the remains of at least three looms, could have been stores of weights instead. This SFB was also destroyed by fire. Charred wood filling the perforations of the fired loomweights in the SFB at Upton is apparently the remains of wooden dowels upon which the weights were stacked in storage.

These interpretations might work when considering only SFBs destroyed unexpectedly by a sudden fire, but that only accounts for up to ten of the 32 SFBs containing placed deposits of loomweights. Grubenhäuser 105 and 84 at Mucking both contain possible stores of loomweights: about 30 unfired loomweights mostly in two rough lines, and approximately 140 raw loomweights in at least nine side-by-side rows, respectively. Both deposits lay on the bases of the SFB cuts, and there was no evidence of burning (Hamerow 1993: figs 76, 77). Either the loomweights were placed on the base or they were abandoned in the SFB prior to the collapse or deliberate demolition of the superstructure. If the latter scenario took place, then the fact that they were not reclaimed prior to the destruction of the building requires explanation. Even though clay loomweights were relatively simple, utilitarian items, it is hard to believe that they would

have been wastefully abandoned (*contra* Tipper 2004: 169). New loomweights would require time and effort to make. Clay would have to be collected from an appropriate source, possibly tempered (whether or not the weight would eventually be fired; Leahy 2003: 71), shaped, and then either fired or dried. Perhaps loomweights would not be transported long distances, but it would certainly be worth moving them from one SFB to another within the same settlement.

Some of the deposits of loomweights in SFBs destroyed by fire require explanation as well. Even though the SFB at Upton was destroyed by fire, the raw loomweights in it were not fired 'to any great extent' (Jackson *et al.* 1969: 210). This is in contrast to other SFBs destroyed by fire (e.g. the presumed SFB in the barrow ditch at Pakenham (Grimstone End), or SFBs 3 and 15 at West Stow), in which the loomweights were found fired only on the upper side, having been scorched during the blaze (West 1985: 138). Thus the loomweights in the Upton SFB seem to have been deposited after the fire (Gibson with Murray 2003: 210–211). Some of the unfired loomweights in the Upton SFB underlay charred layers deriving from the walls and roof (Jackson *et al.* 1969: 208, figs 4, 5), suggesting that the raw loomweights were deposited in the base of the burnt out building, and then the remains of the walls were pushed back into the pit.

Equally indicative is the absence of other objects on the bases of SFBs that were destroyed by fire. The deposits of loomweights in SFBs destroyed by fire were not accompanied on the base by other weaving equipment such as pin beaters or weaving battens. Perhaps this is not surprising, given that such objects were both portable and, if their presence as grave goods is an indicator, personal—provided people were able to get into the building before the fire got out of control. But it is to be expected that in some cases this would not have been possible. Nor do buildings destroyed by fire contain indicators of the other functions besides weaving that have been proposed for SFBs, even

materials that would have been heavy or otherwise cumbersome, such as stores of grain. Of the SFBs containing deposits of vessels on the base, only Grubenhaus 84 at Mucking was destroyed by fire, and none of them contained complete vessels. A variety of small finds were recovered from the fill of SFB 15 at West Stow, but if any of them came from the layer of the floorboards, they were not reported as doing so. There was a complete chalk spindle whorl that had been burnt, and may have been present during the fire.

All of these deposits of loomweights in SFB pits must be viewed in comparison to placed deposits of loomweights from other contexts. Posthole 2991 at Spong Hill has already been mentioned (§7.4). Two other possible placed deposits may also be mentioned: a group of large loomweight fragments in an axial posthole of SFB 4 at Godmanchester (Gibson with Murray 2003: 162), and a deposit overlying ditch 1068/1567 at Wantage of fragments of six loomweights (Holbrook & Thomas 1996: 128).

In light of this evidence, lines and clusters of complete loomweights on the bases of SFBs must be reinterpreted as placed deposits, and particularly as termination deposits associated with the destruction of the SFB. In buildings destroyed by fire, the loomweights often appear to have been placed prior to the destruction of the building, raising the possibility that the building was deliberately burnt down with the loomweights inside it. The loomweights have survived the conflagration, but one wonders whether looms were present as well, or perhaps even woven fabric (Crawford 2010). In the SFB at Swindon Old Town, lengths of charred wood were thought to be the remains of a loom. What has not been found on the bases of burnt-down SFBs are other objects that might have been in the building during normal use, including other weaving equipment. The picture painted is one of the selection of loomweights (and possibly looms or textiles) for placement in SFBs, sometimes immediately after and sometimes prior to the destruction

of the building, either by fire or by demolition. The significance of this practice will be considered further in Chapter 10.

Other artefacts

All of the placed deposits of single or sets of artefacts that were identified in SFBs lay on the base of the pit or in an axial posthole and were placed prior to backfilling. This represents a systematic bias in the study, since according to the criteria used in this study, artefacts or sets of artefacts must almost always lie on the base of a feature in order to be identified placed (Tab. 4.1). Single artefacts placed later during backfill cannot usually be distinguished from objects already contained within the material being used for backfilling.

7.5.2 Termination deposits associated with the backfilling of SFBs and pits

Pottery and other artefacts

Complete and semi-complete pottery vessels were found placed on the bases of SFBs, but they were also likely to have been deposited during backfilling (Fig. 7.3). Thus, whereas loomweight deposits distinguish deposition prior to backfilling from deposition during backfilling, (semi-)complete pottery links those two depositional timings. This apparent contradiction might reflect a subtle distinction. Deposition on the base of an SFB happened after the structure went out of use and before the pit was backfilled. Even though there was not usually much time between these two events, and in many cases they might have been practically synchronous, they still might have been viewed as qualitatively different processes, associated with different kinds of termination deposits. Placed deposits of loomweights, almost always found on the base, seem to be associated with the destruction of the building. Deposition of complete or semi-complete

vessels, placed prior to or during backfilling, are also termination deposits, but are more closely associated with the closure of the pit, erasing the trace of the building from the ground and/or restoring the ground for future use. The distinction between these two possible purposes for placed deposits on the bases of SFBs might not have been conscious, and the same placed deposit might have served both purposes. In any given case, the choice of when to make the placed deposit may have been related to which aspect of the process required emphasis or construction: the destruction of the SFB or the restoration of its space. The distinction need not be clear cut, as shown at Mucking by Grubenhaus 93, in which a semi-complete bowl lay beneath a collection of clay loomweights on the base of the pit.

Although it could not be quantitatively verified, the few but remarkable deposits of lead rings or discs seem to follow the same pattern as (semi-)complete vessels, associated more with the backfilling of the pit than the destruction of the building. In terms of their elusive function prior to deposition, little can be said except that, whatever their use, they were viewed differently from clay loomweights when it came to placed deposition.

Skulls and other skeletal remains

The previous sections glimpsed possible associations of cattle and horse skulls with SFB backfills on the one hand and pits on the other. Of the 23 placed deposits containing skulls that were found either in reused pits or in SFBs, the stratigraphic relationships of the placed deposits are recorded for 17 of them. These 17 placed deposits are summarized in Table 7.2. Three patterns can be discerned.

1) These are not merely placed deposits that contain skulls along with other object types; they are placed deposits in which skulls are the focus of the deposit. In 11 of the 17 deposits, skulls are the only placed material. In other

cases, the skulls were placed separately from other material. The pig skull on the base of Grubenhaus 10 at Mucking was on the base of the feature whereas the dog skeleton was in an axial posthole. The cattle skulls in SFB 5087 at Horcott Quarry were vertically separated by about 15 cm from the semi-complete vessels on the base of the pit. Skulls seem to have played the dominant role in the placed deposits in pit F345 at Bloodmoor Hill and SFB 1351 at Brooklands, which contained skulls along with semi-complete pots and/or disarticulated animal bone.

2) Cattle and horse skulls predominate in deposits in SFBs and reused pits. Out of the 17 placed deposits in Table 7.2, 12 contain cattle and/or horse skulls, and skulls of both species appear together in pit F345 at Bloodmoor Hill. It has been noted elsewhere that cattle and horse both tend to be represented as skulls in placed deposits (§5.4.1). Seventeen of the 22 placed deposits containing cattle and/or horse skulls were in reused pits or SFBs.

3) The placed deposits in SFBs and reused pits were almost all made at the start of the final backfilling of the feature. In 12 of the 17 placed deposits in Table 7.2, the skulls were found either at the bottom of the final backfill layer of the feature or on the base of an SFB. Skulls on the floors of SFB pits must have been placed at the start of the final backfilling of the feature. They could not have been made long before backfilling, or else dogs or carrion could have disturbed them prior to backfilling, and it has already shown that backfilling of SFB pits was done all at once, even if the backfill comprises several layers (§7.2). The two cattle skulls just below the upper backfill layer of SFB 5087 at Horcott Quarry could be interpreted as the final material placed in a larger placed deposit of pottery and disarticulated remains before the pit was finally

closed off. The cattle skull at the base of the upper fill in SFB 45 at West Stow was placed on the base of a compaction hollow prior to backfilling.

The placed deposit of a human skull in pit 1073 at Cottam is notable for its similarities to placed deposits of cattle and horse skulls. It consists only of the skull and a block of chalk placed at the base of a deliberate and complete backfill. The fact that the skull is human may not be as significant as might be assumed, since evidence has already suggested that human and animal skulls sometimes received similar treatment in placed deposits (Ch. 5). SFB 8516 at Horcott Quarry contained a human skull placed among a collection of disarticulated animal remains that might well fit the three patterns above if the stratigraphic location of the deposit were known.

Placed deposits in Table 7.2 not fitting the above three characteristics often show multiple differences. SFB 330 at Sutton Courtenay and SFB 6 at Harston did not contain cattle or horse skulls and are not at the bottom of the final fill. The pit containing the lapwing skull in SFB 6 at Harston might not have been associated with backfilling at all.

Skull deposits in other pits do not fit the three patterns above. For example, the skulls play a decidedly subordinate role in pit α at Sutton Courtenay, in which a human adult and infant were buried together with cattle and horse skulls, and in pit 394 at Eynsham, where skulls were elements of a substantial *en masse* bone deposit that also included articulated animal limbs. Lenses of sand among the cattle skulls in Building D2 at Yeavering show that they were piled up over a long time, and they appear to have been stacked above the surface of their pit.

The evidence above shows a distinct pattern of placed deposition of skulls, particularly cattle and horse skulls, as secondary deposits in pits and SFBs. This accounts for the association of skulls with both SFBs and pits (§5.3.1); no other shared associations between SFBs and pits with respect to content types have been observed. It also accounts

for most of the instances of cattle and horse skulls in placed deposits. That so many of these deposits were placed at the start of the final backfilling of these features suggests that, like semi-complete pots in SFBs, these are termination deposits associated specifically with the closing of these features. Whereas placed deposits of loomweights and pottery were almost exclusively made in SFBs and might therefore have some connection to the prior use of SFBs specifically, placed deposits of cattle and horse skulls seem not to distinguish between SFBs and pits, indicating that they have little to do with the prior use of these features and all to do with the backfilling process. They also indicate that the backfilling of SFBs and the backfilling of pits were viewed as similar events.

Aside from skulls, other skeletal remains were placed in many SFBs, both on the base and in the lower fills, but like the (semi-)complete vessels, they showed no distinction in species or degree of articulation between the two depositional timings. Unlike the pottery, however, they were found in equivalent proportions in non-SFB contexts.

Material in axial postholes/cuts in base of SFB

Material in SFB postholes could be related either to the destruction of the building or backfilling, or both. No further conclusions on the basis of content type can be drawn from the four examples identified in this study, which consist variously of a human infant, a bone comb, a complete dog skeleton, and the fore and hind limbs of a dog in separate axial postholes (in Building C18 at Cowdery's Down, Building H4 at Hammersmith, Grubenhaus 10 at Mucking, and House XVII at Sutton Courtenay, respectively). The placed deposits in the pit cut into the base of SFB 1 at Pennyland and in a shallow scoop in the base of SFB 32 at Barrow Hills were probably made after the building went out use and prior to backfilling, but it is not clear whether they were

associated with demolition, backfilling, or both. The mouse skeletons in the Pennyland SFB lay at the very base of pit 62 and were covered by a thin lens of gravel deriving from the loose gravel sides of the beehive-shaped pit. This indicates that the pit remained open for a short period prior to its (and the SFB's) backfill.

7.5.3 Deposits in SFB compaction hollows

When considering placed deposits in hollows forming from the compaction of SFB backfills, the fact that the feature was originally an SFB does not seem relevant. There is no evidence for loomweights, vessels, or lead rings or discs that characterize placed deposits made earlier in the SFB backfilling sequence. Nor is there any sign of a link between placed deposition and the use of compaction hollows as working areas. The cattle skull at the base of the upper fill of SFB 45 at West Stow fits with the pattern of cattle and horse skull deposits in pits and SFBs, allowing speculation that deposits placed during the backfilling of compaction hollows might have served a similar purpose to deposits made during the deliberate backfilling of these features. Founded on the basis of one placed deposit, this link is tenuous. It seems probable that placed deposits in compaction hollows are termination deposits, but little else can be said until more examples have been excavated.

7.5.4 Termination deposits in other features

Termination deposits have also been recognized in postholes and ditches. The loomweights in posthole 2991 at Spong Hill were certainly deposited after the post was removed. Given the association between loomweight deposits and the destruction of SFBs, this might also have been the time when the building containing posthole 2991 was abandoned. Placed deposits found in SFB postholes are better considered in terms of the destruction and backfilling of the entire building. Most of the placed deposits in the

horseshoe-shaped enclosure at Higham Ferrers were at the base of the uppermost fill, indicating they were made when the ditch was filled in and that area of the settlement was abandoned. With only a handful of termination deposits identified in postholes and ditches, no patterns were evident; however, the kinds of material deposited in termination deposits in SFBs and pits—namely, loomweights, pots, and skulls—were notably absent from termination deposits in postholes and ditches. This reinforces the particular connection between these content types and termination deposits in SFBs and pits.

7.5.5 Other kinds of liminal times

The discussion so far has focused on termination deposits because there is little evidence for placed deposits made at other liminal times. Possible foundation deposits were the antler deposit on the base of recut boundary ditch 3958 at Mucking, the lead vessels at the base of ditch 53 at Bottesford, the lapwing skull in pit F4405 cut into the base of SFB 6 at Harston, and the possible placed deposits of a gold coin and ring of gold wire in the structural footings of Buildings A3(b) and A4 at Yeavering mentioned above (Hamerow 2006: 26 n. 8). These varied deposits share little in terms of content or context with each other, and they do not fit into other patterns of deposition identified so far, so not much can be deduced from them. On the basis of numbers alone, it is clear that archaeologically recoverable foundation deposits played a much less important role than termination deposits in Anglo-Saxon settlements.

It has been noted that hollows often result from the compaction of SFB backfills, and that in many cases this compaction hollow was used as a sheltered working area (§7.2). This could have been viewed as a kind of afterlife for the SFB; in which case, the destruction of the building and backfilling of the pit would not have been an end, but a transition into a new phase of the use of the building. If this were the case, then placed

deposits made prior to or during backfill might have marked or have been seen to facilitate this transition. Unfortunately, of the ten SFBs at West Stow that contain post-backfill hearths, only SFB 15 and SFB 44 contained placed deposits on their base or in their backfill, providing little support for this idea.

7.5.6 Preservation

Differential preservation must be acknowledged as a possible factor in the prominence of termination deposits in Anglo-Saxon settlements. A placed deposit made during the final backfilling of a feature is more likely to survive archaeologically than one on the surface of a partially filled feature or indeed on the occupation surface within or beside—or indeed incorporated into the superstructure of—a building currently in use. Although it is possible that placed deposits were made in archaeologically invisible ways at other liminal times, the sheer number of placed deposits associated with the final backfilling of features, not to mention the patterns they exhibit, empirically shows that termination deposits were in any case important features of Anglo-Saxon settlements.

7.6 Conclusion

In Chapter 6, it was shown that placed deposits with certain characteristics were associated with boundaries and entrances. Placed deposits in SFBs, postholes, and the final backfills of pits and ditches are associated with liminal times. Placed deposits of loomweights were overwhelmingly deposited during or immediately after the destruction of the SFB. (Semi-)complete pots were deposited just prior to or during the backfilling of SFB pits; cattle and horse skulls were deposited at the start of the final backfilling of both SFBs and pits. These were liminal times, temporal boundaries dividing and uniting different phases in the life of the settlement. Placed deposits may have served to mark,

emphasize, enable, or facilitate the transitions associated with these events. More will be said about the social significance of these events, and the role placed deposits played in them, in Chapter 9.

Since SFBs were deliberately, rapidly, and completely backfilled, placed deposits in SFBs were almost always made at liminal times. Cats, infants/neonates, and single or sets of artefacts have all been shown to be associated with SFBs (Ch. 5). Because they occurred in limited numbers, and because their stratigraphic relationships were not always fully reported, they could not be specifically tied to a particular aspect of that liminal time, such as the destruction of the superstructure. Nevertheless, these deposits in SFBs were associated with the end of the use-life of the SFB.

It might be objected that the very nature of the archaeological record in Anglo-Saxon settlements ensures that archaeologists can only find placed deposits that were made at liminal times. In order to have survived, deposits need to have been protected from disturbance by being covered up immediately after they were placed, either through deliberate backfilling (if in a negative feature), or by laying other deposited material over them (if on a surface). Therefore, every distinct context in a real sense represents a separate 'event'. However, not all backfilling and other depositional events are *ipso facto* liminal times in the use-life of the feature. In this study, only placed deposits clearly associated with the initial construction and/or final backfilling of a building or other longstanding feature have been identified with liminal times: 67 placed deposits were made at or during the destruction or backfilling of SFBs, 14 more were made at or during the final backfilling of pre-existing negative features (e.g. pits, postholes, or ditches), and three placed deposits were potential foundation deposits. Thus, out of 151 placed deposits, 67 were *not* made at identifiably liminal times. These include, for example,

placed deposits in the middle layers of ditches and pits and placed deposits in specially-dug pits (including graves).

Finally, the question arises of how placed deposits made in liminal places compare to those made in liminal times. No object types exhibited strong associations with both liminal places and liminal times. Loomweights and (semi-)complete pots, which are disproportionately represented in placed deposits made in termination deposits, were virtually absent from placed deposits in liminal places (Tab. 6.1). Out of only two placed deposits of cattle or horse skulls associated with liminal places, one was placed at a liminal time: the horse skull at the base of pit A2072 at Hartlepool lay immediately over the posthole in the base, having been deposited at the time the palisaded boundary was removed or replaced. Deposits of skeletal remains were proportionately represented in both liminal times and liminal places, according to their overall representation in placed deposits in general. This may be because, when it comes to deposits of skeletal remains, the material is not as specific to the purpose as the context.

That said, it is not always easy to distinguish deposits placed at spatial and temporal boundaries. Ditches and wall trenches containing termination and possible foundation deposits were also liminal places; the piglet burial in the final fills of Enclosure 2 at Gosberton Third Drove was in a doubly liminal place, in the terminus of the ditch. The relationship between spatial and temporal liminality will be considered further in relation to placed deposits in Chapter 9.

Chapter 8
Human remains in Anglo-Saxon settlement contexts

The vast majority of early to middle Anglo-Saxon burials were made in cemeteries: discrete burial grounds distinct from, but sometimes very near to or even within, settlements. Nevertheless, a small number of human burials have been found in Anglo-Saxon settlement contexts, closely associated with settlement structures. They have been variously interpreted as bodies hastily or carelessly disposed of, as victims of execution or 'domestic tragedy', as opportunistic or surreptitious burials of stillborn infants, and as deviant burials of convicted criminals (e.g. Rahtz 1979: 96; Moore 2001: 176; Richards 1999: 93; Leeds 1947: 87; Crawford 2008; Boyle 2004: 321). All of these interpretations focus on the identity and social status of the interred as an explanation for their burial in settlements. However, human burials in settlements may also on occasion have played a constructive or symbolic role in the settlement, as placed deposits.

This chapter considers human remains in settlements both as burials and as placed deposits. Age and sex, pathological traits, and mortuary treatment of human remains are analysed for clues as to who was selected for burial in settlements. These characteristics are then considered in conjunction with spatial and temporal patterns of deposition in order to identify how human remains, as placed deposits, served to mark, define or construct space in the settlement and events in its life and the lives of its inhabitants.

8.1 Definitions and categories

8.1.1 Definitions/Limits

This chapter considers placed deposits of human remains in *settlement contexts*: that is, in association with contemporary settlement features such as earthfast structures, SFBs, pits, ditches, and so forth. Such deposits include both those placed directly in existing settlement features and those in specially dug pits or graves within 2 m of settlement features (*cf.* §6.1.1).

Isolated burials—by which I mean inhumations or cremations within the settlement area that are not within 2 m of a settlement feature—are not included in the analysis. Discrete cemeteries within settlements—that is, groups of burials primarily associated with each other rather than with a settlement feature—have also been excluded, except for those constituent graves whose primary relationship seems to be with a settlement feature rather than the other graves in the cemetery.[65] Isolated burials and discrete cemetery groups may have played an important role in the structure of the settlement and the lives of its inhabitants, but because their relationships with settlement features cannot be directly established, they do not fit into the analytical methodology of this thesis. However, possible relationships between burials in settlement contexts and those in nearby cemeteries will be discussed (§8.6, §8.7.3). Only human burials associated with settlement features in contemporaneously active areas of settlement have been included. For example, graves cutting the fills of SFBs in the cemetery at Stretton-on-Fosse appear to have been dug after settlement in the immediate area had ceased (Ford 2002) and have not been included. Nor have the human burials associated with SFBs in

[65] Making such an assessment requires two levels of interpretation: whether a group of burials is a discrete cemetery within a settlement, and whether the primary association of individual burials in a group is with a settlement feature or with the other burials. Both of these interpretations are best made on a case-by-case basis. Rationales for specific cases are discussed in §8.2.

Cemetery II at Mucking been included; the SFBs appear to have been in contemporary use to the cemetery (Hirst & Clark 2009: 454–455), but were isolated buildings.

As in previous chapters, only human remains that could be confidently identified as placed have been included in the analysis (§4.1.2). Disarticulated human remains and cremation pyre debris could usually only be identified as placed if they were found either in large concentrations or on the base of a feature. In particular, the small assemblages of disarticulated infant bone collected from two ditches and six SFBs at West Stow (West 1985: tab. 70) were not identified as placed, even though Crawford (2008: 199) has argued that they might have been deliberately deposited.

8.1.2 Age and sex

Where possible, individuals have been assigned to one of five age ranges (all approximate):

- Mature (40 or more years old)
- Adult (20–40 years old)
- Adolescent (12–20 years old)
- Juvenile (3–12 years old)
- Infant (up to 3 years old)

These groupings derive from Stoodley's work on the Anglo-Saxon lifecycle and correspond to the life 'stages' he identifies from grave goods (Stoodley 2000). The biological sex of individuals has also been factored into the analysis below. Age and sex are recorded under each placed deposit in Appendix B.

8.1.3 Treatment of remains

In terms of treatment of the body, human remains in settlement contexts, like other bone remains, can be initially categorized as follows (*cf.* §5.1.1):

- complete or partial inhumations,
- skulls,
- other disarticulated remains, and
- cremation pyre debris.

Interestingly, no cremation burials were found in association with settlement features. This could suggest that, in the early Anglo-Saxon period at least, burial in settlement contexts was viewed differently from burial in cemeteries, but the fact that all of the early Anglo-Saxon burials in settlement contexts could date as late as the 7th century (§8.7.3) suggests a chronological explanation is more satisfactory.

Inhumation

Within these categories, inhumations require further categorization. Infant inhumations are usually only recorded as either complete or incomplete, but inhumations of juvenile, adolescent, adult, and mature individuals vary in terms of (Appendix B):

- aspect (e.g. supine, prone, on one side)
- body positioning (e.g. extended, flexed, crouched)
- other manipulation (e.g. amputation, severely bent body or limbs)

With respect to body positioning, *flexed* by convention refers to burials with the knees slightly bent, whereas *crouched* refers to burials lying on their side with legs and arms bent (Darvill 2008: 'burial site'). Burials have been characterized as extended or flexed regardless of whether the arms were straight or bent.

In cemeteries, certain characteristics of inhumations have been associated with 'deviant' burial practices (Geake 1992; Reynolds 2009). There is significant variation in

treatment of the dead, especially in the early Anglo-Saxon period, and burial practices predominant in one cemetery are sometimes absent in another. Nevertheless, for non-infants, complete supine extended burial can be considered 'normative' throughout the Anglo-Saxon period (*ibid.* 36–37). In the early Anglo-Saxon period, crouched burials, though rare, can also be considered normative (*ibid.* 63–64). Geake and Reynolds have used the term 'deviant' to describe some burials that deviate from these norms, particularly with respect to pre-, peri-, or post-mortem treatment of the body and positioning of the body within the grave (Geake 1992: 87; Reynolds 2009: 35). Signifiers of deviant burial change over time, but in both periods they include prone burial, decapitation, amputation, post-mortem exposure, binding, extreme flexion, and covering the body or partial grave fill with objects such as numerous or heavy stones (*ibid.* 63, 81, 160–177). Notably, Reynolds does not consider signs of haste or opportunistic burial, such as shallow or cramped graves, to be sufficient signifiers of deviant treatment (*ibid.* 67–68). Likewise, burial in already open features, such as empty SFB pits or partially filled ditches, does not necessarily indicate deviant burial.

Using Reynolds' criteria as a guide, this study has identified burials of non-infant human remains associated with settlement features as either normative or deviant. In a period when cemetery burial was the norm, deposition of human remains in or near settlement features may have been in a sense inherently non-normative, but it is the working assumption of this study that a common 'grammar' of burial practice applied to burials in settlements as well as in cemeteries (*cf.* Reynolds 2009: 89).

Skulls

In this chapter's analysis, deposits of human skulls are considered possible deviant burials, even if the bones bear no direct trace of decapitation. If the deposition of human skulls was viewed as burial, then that burial was non-normative, regardless of

whether the skull was separated from rest of the body at the time of death or after decomposition had occurred.[66] However, it is acknowledged that deposits of human skulls may not have been viewed as burials; that interpretation rests on unproven assumptions about the perceived individuality and humanity of human skulls. Even if these assumptions hold in some cases, in others they may not. By counting deposits of human skulls as possible deviant burials, this chapter's analysis tests those assumptions against evidence, presented earlier, which suggested that the treatment of human skulls in placed deposits may have been governed more from the fact that they are heads than that they are human (Chs 5, 7).

Remains from multiple individuals

In some cases, remains of more than one individual were found in the same deposit. Unless otherwise indicated, individuals in such deposits were counted separately for analysis of age and sex, but the deposit was counted as a single entity in terms burial treatment. This approach was the most appropriate for these two streams of analysis. The relationships among multiple individuals in the same deposit are never obvious and will be discussed (§8.8).

8.1.4 Chronology

As indicated above, the 7th century witnessed important changes in the burial practices in Anglo-Saxon cemeteries. In early Anglo-Saxon cemeteries (5th to mid 7th centuries), furnished inhumation, flexed burial, and cremation were all common, whereas from the middle Anglo-Saxon period (mid 7th to 9th centuries) onward, supine extended unfurnished inhumation was the norm. The first consistently unfurnished cemeteries, the

[66] Indeed, if the skull was curated prior to burial, then when or how it was removed from the body might not be relevant to the deposition.

lightly furnished 'final phase' cemeteries, and a short-lived spate of very richly furnished 'princely' burials, all appeared in the first half of the 7th century (Boddington 1990; Geake 1992). Execution cemeteries containing large proportions of deviant burials began to appear between the second half of the 7th century and the early 8th century (Reynolds 2009: 153–155). These changes in cemetery burial practice reflect a changing attitude toward the dead, and it is to be expected that this changing attitude also affected burial in settlement contexts, whether or not settlement burial and cemetery burial were viewed in the same way. Therefore, a chronological distinction consistently factors into the analysis below.

8.2 The data: an overview

This study identified a total of 31 placed deposits containing human remains, from 18 settlements. Of these, 26 were inhumation burials, containing complete or partial human skeletons; all were articulated except the disarticulated infant remains in the axial posthole of building C18 at Cowdery's Down, which was disarticulated but represented much of the skeleton. No cremation burials were found in settlement contexts. In addition, two placed deposits containing human skulls are counted throughout the analysis as possible deviant burials (§8.1.3). The other three placed deposits containing human remains are not counted as burials. The disarticulated human remains in section 123 of ditch 7330 at Higham Ferrers might be related to the burial in section 373, but the distance separating the two deposits (4 m) is too great to be certain. Two placed deposits, both at Friars Oak, Hassocks, consisted of cremation pyre debris, including some human bone.

The bulk of this chapter's analysis takes the 26 inhumations and the two skulls as its sample (28 burials). Of these, ten burials were found in early Anglo-Saxon contexts

(5th–7th centuries) and 18 in middle Anglo-Saxon contexts (7th–8th centuries). At least 34 individuals are represented in the 28 burials, with multiple individuals represented in section 383 of the horseshoe enclosure ditch at Higham Ferrers (two), pit α at Sutton Courtenay (two), and grave 3843 at Yarnton (at least five).

Excluded from the analysis are the constituent graves of discrete cemeteries within the settlement area, as identified at Bloodmoor Hill, Gamlingay, Mucking, Yarnton, and Yeavering (Lucy *et al.* 2009: fig. 6.37; Scull 2009: 385–426, fig. 7.1; Murray with McDonald 2005: figs 9, 37, 38; Hirst & Clark 2009; Hey 2004: 163, fig. 7.21, pl. 7.6; Hope-Taylor 1977: 70–78, 102, 108–116). Generally, the constituent graves in these cemeteries were first and foremost part of the cemetery, and are therefore not considered settlement burials in this study (§8.1.1), even though two of the cemeteries to which they belong—namely, the eastern and western cemeteries at Yeavering and the cemetery group at Yarnton—were placed near and possibly focused on earthfast structures (Hope-Taylor 1977: 70–78, 102, figs 33, 43; Hey 2004: 163–165, figs 7.21, 7.23). Identifying groups of burials as discrete cemeteries is a matter of interpretation, and 'grey areas' have inevitably been encountered. Some graves in burial groups, such as grave 65 at Gamlingay and grave AX at Yeavering, seem to have had stronger relationships with settlement features than with neighbouring graves.[67] All the constituent graves in the northern burial group at Flixborough appear to be primarily related to structures, with four out of six burials cut directly into the floors and/or gravel

[67] Grave 65 in the 'satellite cemetery' at Gamlingay was aligned with and cut through the sill-beam foundations of an earthfast building. The graves in the satellite cemetery appeared to be fairly dispersed, but the extensive ploughing that truncated several graves might have destroyed additional burials. Grave AX at Yeavering, although physically located at the edge of the Eastern Cemetery, was placed directly in the entrance to building A4, aligned with its axis and post AX; importantly, the grave was earlier than all of the graves in the Eastern Cemetery, with the possible exception of graves BX1 and BX2 (Hope-Taylor 1977: 67–69, 73, 245, fig. 31). Other graves at Yeavering, such as graves BX1 and BX2 and the graves in the Western Ring Ditch, were aligned on free-standing posts, but these posts are perhaps better viewed as cemetery features rather than as settlement features, even if, like post BX, they were contemporary to and aligned with settlement structures (*ibid.* fig. 63; Blair 1995). The child buried in a possible entrance to a square enclosure adjacent to Building D2 is suggested to be primarily a constituent of the Western Cemetery (n. 145).

foundation of the earlier phase of building 1a/b (Loveluck & Atkinson 2007: 49–50, fig. 4.2). In this chapter, the graves at Flixborough will be treated as burials in a settlement context. The alternative argument—that these burials should be identified as a discrete cemetery, with building 1a/b serving as a mortuary structure—will be assessed in the discussion, partly using the results of the analysis.

8.3 Age and sex

The age and sex of the 34 individuals represented in the 28 burials (including the two skulls; §8.2) are reported in Table 8.1.[68] The age distribution of the 26 individuals fitting into age ranges was compared to that of a sample of 1230 individuals from early Anglo-Saxon cemeteries (Stoodley 2000: 457, tab. 2). The distributions, shown in Figure 8.1, were statistically different.[69] The comparison is not wholly satisfactory because the two populations span different periods (5^{th}–9^{th} centuries vs. 5^{th}–7^{th}); age distribution figures have not been compiled for middle Anglo-Saxon communal cemeteries. Nevertheless, the two most striking differences between the populations probably hold true throughout the early and middle Anglo-Saxon periods. Infants (i.e. children under three) are much more highly represented in settlement contexts (7/27 = 26%) than they are in contemporary cemeteries, where their underrepresentation is well attested (e.g.

[68] In 14 instances age could be determined but sex could not; this is of course always the case for juvenile and infant remains, but one unsexed individual was adolescent. Note that for eight individuals, neither age nor sex was recorded. In six cases, these could not be determined with sufficient precision, due either to pre-depositional fragmentation or taphonomy. Burial 3666 at Catholme and grave AX at Yeavering were either adolescents or adults, and the fragmentary remains deposited beneath skeleton 3842 at Yarnton came from at least four subadults (i.e. age ranges infant through adolescent). The ages and sexes of two individuals were simply not reported: the skull in SFB 8516 at Horcott Quarry and the burial in the SFB at Headington).

[69] The age distributions of the two samples shown in Figure 8.1 were compared using Kolmogorov-Smirnov test for two samples (Fletcher & Lock 2005: 111–114). The maximum difference (*D)* was 0.30 and the test statistic ($n_A \times n_B \times D$) was 10,110. Comparing this value to the critical values (*ibid.* 199), the difference between the two age distributions is significant at the 5% level.

Evison 1987: 128, 146; Crawford 1993: 84; Stoodley 2000: 458).[70] This observation can be further refined: where the age of infants has been more precisely specified (i.e. in four cases), all were full-term fetuses or newborns. This contrasts with a complete absence of mature individuals (aged 40 and older), which are well represented in early Anglo-Saxon cemeteries, comprising 22 per cent of burials (Fig. 8.1; Stoodley 2000: tab. 2). No individuals were aged above 40 years, but a few were at the upper end of the adult age range. The male buried in House X, Room I (an SFB) at Sutton Courtenay was aged 30–40, and human burial 2 at Cheddar was slightly older than 30–40 years. These individuals would fit with the more senior average age (35–39) of males buried with axes and seaxes as opposed to spears, swords, and shields (Härke 1992: 156). The proportions of juveniles, adolescents, and adults buried in settlement contexts are more similar to those from cemeteries. Adolescents are better represented in settlement contexts, but the difference is not statistically significant.

There are some differences in age distribution of burials in settlement contexts between the early and middle Anglo-Saxon periods (Tabs 8.2 and 8.3). All six juveniles (ages 3–12) were buried in the middle Anglo-Saxon period; this number does not include the four partial remains of subadults (0–18 years old) from grave 3843 at Yarnton, but that deposit dates to the same period. There were also more middle Anglo-Saxon burials of adults (but see §8.4.2 regarding graves 1 and 2 at West Stow), whereas infants were better represented in the early period.

The total sample of burials in settlement contexts produced a nearly even balance of males and females among the 13 adults and adolescents who could be sexed, with only

[70] The proportions of individuals falling into each age range were compared between the two samples using Student's t-test (Fletcher & Lock 2005: 98–100). The test statistics are as follows (df = ∞): for infants, t = 5.54; for juveniles, t = -0.0763; for adolescents, t = 1.68; for adults, t = -0.827; for mature individuals, t = -2.79. There is a 99.9% certainty that infants are more common in settlement contexts than in cemeteries and 99% certainty that mature individuals are less common. None of the other age ranges occurred in significantly different proportions between the two samples.

three more being of indeterminate sex (Tab. 8.1).[71] The distribution at individual sites is similarly even (Tab. 8.4). There are noticeably more males buried in settlement contexts in the middle Anglo-Saxon period than in the earlier period, but the numbers are too few to warrant statistical comparison. This analysis cannot include children, for whom sex is not skeletally determinable, even though children may have been ascribed gender. Children, especially girls, were frequently buried with gendered grave goods in early Anglo-Saxon cemeteries (Stoodley 2000: 461, 462–463, tab. 5).

8.4 Treatment

There is little differentiation to be seen in the treatment of the infants placed in settlement contexts. All but one of the seven were complete and articulated; the exception was the disarticulated infant remains in posthole A of structure C18, a probable SFB, at Cowdery's Down. It is not clear whether the post, the ghost of which could be seen in the fill, was set in place before or after the infant was deposited, and what effect that might have had on the condition of the burial. In any case, none of the accumulated evidence for placed deposits of infant remains rules out that individuals were initially buried complete.[72]

The treatment of individuals over the age of 3, on the other hand, could be characterized as either normative or deviant (§8.1.3), though some uncertainty was inevitable in making this distinction. A number of the normative burials were incomplete, and even though their burial aspect and body positioning were normative, the possibility that the missing elements would have shown traces of deviant treatment cannot be definitively ruled out. The completeness of each skeleton is indicated in

[71] The three non-children of indeterminate sex were skeleton 3842 at Yarnton, an adolescent, and burial 3666 at Catholme and grave AX at Yeavering, both either adolescents or adults.

[72] The significance of infant remains that could not be identified as placed, such as the disarticulated remains found at West Stow (Grainger 1985: 59, tab. 70; Crawford 2008: 199), and the infant remains reported from West Heslerton (Powlesland 1998: §7.5.2), are discussed below (§8.6).

Appendix B. Soil conditions had largely degraded the bone in burial 3617 at Catholme, but the remains of the legs came together at the knees, with the lower legs slightly splayed (Losco-Bradley & Kinsley 2002: fig. 3.10; *cf.* grave 114 in West Heslerton cemetery: Haughton & Powlesland 1999: 189–190). On this basis the legs are suggested to have been bound at the knee, but no evidence of bonds has survived. There was no evidence of bonds from grave 3843 at Yarnton, but from the severe bending of the legs it is clear they were bound. The overlapping of the torso and upper legs of the female in section 383 of the horseshoe-shaped ditch at Higham Ferrers indicates that the body had been allowed to decompose prior to burial; the two parts may also have been bound together or held in a sack, but no direct traces remain.

The treatment of non-infants from human burials in or near settlement features has been summarized in Table 8.5. The 27 individuals came from 22 burials (including the two human skulls; §8.2).[73] Normative treatment and deviant treatment characterize similar proportions of the human remains placed in settlement contexts (Fig. 8.2), and this balance holds true within the middle Anglo-Saxon period more narrowly (Tab. 8.6). For the earlier period, the numbers are also even, but too small to be indicative. Even so, two out of four individuals receiving deviant treatment seems surprisingly large, considering that only an estimated 1 per cent of burials in early Anglo-Saxon cemeteries were deviant (Reynolds 2009: 94).

It shall be shown that the apparent balance between normative and deviant treatment in settlement contexts belies significant differences between the two, both in terms of changing demographics over time and in terms of spatial distributions within settlements. In the rest of this section, the demographics of first deviant treatment and

[73] Of these, the remains of four individuals were too incomplete for treatment to be identified, due to adverse soil conditions, truncation, or other taphonomic factors. The treatment of the individual in an SFB at Headington is not reported.

then normative treatment are compared over time. Depositional and spatial patterns of deviant and normative burials, as well as infant remains, are analysed in §8.5.

8.4.1 Deviant burials

There is a marked increase in deviant burial practice in settlements between the early Anglo-Saxon period (5th–7th centuries) on the one hand and the Middle Anglo-Saxon period (7th–9th centuries) on the other. This corresponds with an increase in deviant burial in cemeteries, particularly in newly established execution cemeteries (Reynolds 2009: 97–151). The number of deviant burials in settlement contexts increases from two to five, and the number of individuals in deviant burials increases even more dramatically, from two to ten (Tab. 8.6).[74] These numbers are too small to support statistical analysis, but direct comparison of raw figures is probably reliable, since the number of sites examined with early Anglo-Saxon features is comparable to the number with middle Anglo-Saxon features.

There is considerable variety in deviant treatments that individuals received, with only skulls occurring more frequently than other deviant characteristics (Tab. 8.7). Three burials exhibited more than one deviant characteristic. The adult female in ditch 7330 (section 383) at Higham Ferrers was prone, tightly bent at the waist, and probably bound, and disarticulated bone from at least two adult males was present in the same context and in section 123. The adolescent in grave 3843 at Yarnton was also prone and probably bound, with the legs tightly bent at the knee, and partial skulls from at least four subadults were also present. Finally, the woman in pit α at Sutton Courtenay appears to have been

[74] Section 383 of ditch 7330 at Higham Ferrers and grave 3843 at Yarnton contained two and at least five individuals, respectively, all with deviant characteristics. It is worth noting that one of the two early Anglo-Saxon deviant burials, the human skull nestled among cattle long bones in SFB 8516 at Horcott Quarry, might be better interpreted as a skull deposit than as a human burial (§7.5.2).

positioned on her side, and her head (as well as the infant) was sealed with a layer of compacted earth containing horse and cattle skulls.

The age and sex of deviant burials are broken down by period in Table 8.8. It is interesting that three out of six sexed individuals from deviant burials in settlement contexts were female, since the overwhelming majority of deviant burials in middle Anglo-Saxon execution cemeteries are male (Reynolds 2009: 170). On the basis of one or two individuals, nothing useful can be said about the age and sex of early Anglo-Saxon deviant burials in settlements, or how they compare to middle Anglo-Saxon deviant burials.

8.4.2 Normative burials

Insofar as the small numbers can be relied upon, comparing the age and sex demographics of normative burials in settlement contexts (Tab. 8.9) to those for cemeteries (*cf.* Stoodley 2000: tab. 2) shows two possible differences.[75] The complete absence of mature individuals (aged 40 and above) is surprising considering that they represent 22 per cent of the early Anglo-Saxon cemetery population (Fig. 8.1); mature individuals are absent not just from normative burials, but from settlement context burials generally (§8.3). Juveniles (aged 3–12), in four out of ten normative burials, are perhaps unusually highly represented, compared to less than 23 per cent of the early Anglo-Saxon cemetery population (Fig. 8.1). Statistically speaking, this difference could derive from chance; but a further two juveniles (in graves 1960 and 2230 at Flixborough), albeit too incomplete for treatment to be determined, might also be supposed to have been treated normatively, like the other Flixborough burials.

[75] On comparing like time spans, see §8.3.

Graves 1 and 2 at West Stow deserve particular attention when considering chronological changes in the demographics of normative burials in settlements. Although the West Stow settlement was originally thought to have spanned the 5th through 7th centuries (West 1985: 146), a revised starting date for Ipswich ware (Blinkhorn 1999: 8–10), present in numerous features of the latest phase of the settlement, indicates that settlement must have continued into the 8th century. This fits with the presence of significant ditched enclosures (Reynolds 2003: 110, fig. 6), since enclosures only became common in the middle Anglo-Saxon period (Reynolds 2003; Hamerow 2010*b*). In fact, graves 1 and 2 are associated with a large, frequently recut enclosure ditch, whose fill contained Ipswich ware (West 1985: 138): grave 1 is immediately adjacent to and roughly parallel to the ditch, and grave 2 is about 5 m away.[76] This association with a middle Anglo-Saxon feature could place the graves in the 8th century. Unfortunately, no finds or potsherds from graves 1 and 2 were diagnostically middle Anglo-Saxon, and they have no stratigraphic relationships to other features.[77] Therefore graves 1 and 2 have been tentatively assigned to the 8th century, but the possibility that they were earlier cannot be discounted.

If the West Stow graves were 8th century, then the data show a marked increase in normative burial in settlements in the middle Anglo-Saxon period over the earlier period (Tab. 8.8). Notably, all of the normative burials of the middle Anglo-Saxon period were female or subadult; this age/sex imbalance is given additional weight by the presence of an adult male normative burial in the earlier period. The numbers are too few to show conclusively that normative burial in settlements was reserved for women and children, but the pattern is certainly suggestive. In any case, it seems significant that all six

[76] Grave 2 is therefore technically an 'isolated' burial (§8.1), but it is included as a burial in a settlement context because of its association with grave 1.
[77] Indeed, the lack of grave goods is itself circumstantial evidence for an 8th-century date, since the nearby early Anglo-Saxon cemetery was richly furnished.

juveniles, albeit coming from only two settlements, came from the middle Anglo-Saxon period and were probably normatively treated.

8.5 Spatial patterns of burial

Normative burials, deviant burials, and infant burials exhibited different patterns in terms of associations with other human burials and with boundaries.

8.5.1 Associated features

In Chapter 6, correspondence analysis showed that human inhumations were statistically correlated with both earthfast structures and minor enclosures. It was also noted that, while most placed deposits associated with earthfast structures consisted of human remains, a variety of different deposit types were associated with enclosures. Are there differences between human burials associated with earthfast structures, and human burials associated with enclosures?

Table 8.10 shows the age and sex of individuals buried near structures and boundaries; Table 8.11 compares burial treatment and associated feature. Unfortunately, the numbers are too small to support statistical analysis, but one interesting pattern can nonetheless be seen, relating to burial treatment. Deviant burials were only found associated with enclosure boundaries, whereas normative burials and infant burials were evenly distributed between enclosure boundaries and earthfast structures. This pattern is convincing despite the small numbers involved and helps explain why the balance of adults (which were likely to be deviant, especially males; §8.4.1) was slightly weighted toward enclosure boundaries, while juveniles (none of which were deviant; §8.4.2) were not.[78]

[78] There are no other compelling associations based on age and sex: overall, human remains are associated more often with enclosures than with earthfast structures, and that bias holds true for all the sex and age

A pattern in terms of associated feature element is more difficult to discern. Overall, human remains were found much more often along the length of a wall or enclosure boundary than at a corner or entrance, except that deviant burials were found at enclosure entrances slightly more often than along enclosure boundaries (as stated above, no deviant burials were associated with earthfast structures). In fact, three out of four burials associated with enclosure entrances were deviant; the fourth, burial 3666 at Catholme, was of indeterminate treatment. This pattern cannot be considered conclusive based on the small numbers of burials identified.

8.5.2 Clusters and single burials

For human remains in settlement contexts, a distinction can be made between burials that occur singly and burials that are found in clusters. By 'single' burials I mean burials that are associated with a settlement feature (and thus may be included in this analysis, unlike completely isolated burials; see §8.1.1) and yet are not near any other human burials. Burials in a 'cluster' must be near to one another, and they could also share an association with the same settlement feature(s). The excavators at Gamlingay argue that grave 65, cut into the southwest corner of the backfilled sill-beam foundations of a 'hall', is part of a 'satellite' cemetery of at least six burials, all aligned with the earthfast structure and placed within about 10 m of the building, with a seventh burial some 10 m farther away still (Murray with McDonald 2005: 199, 266, figs 38, 39). Therefore grave 65 has been counted as belonging to a cluster, even though the other burials in that cluster are not in settlement contexts and may be better interpreted as a discrete cemetery within the settlement area (§8.6). On the other hand, Grave AX at

---

groups except for juveniles, with adults perhaps slightly more strongly weighted toward enclosures than the other age groups.

Yeavering, despite its association with grave AY and the string graves, has been counted as a single burial because it clearly predates those other graves.

For the purpose of identifying burial clusters, a feature containing multiple individuals is counted as a single burial. Thus pit α at Sutton Courtenay is counted as a single deviant burial for this analysis. Grave 3843 at Yarnton (containing remains of at least five individuals) counts as one deviant burial in a cluster, since it is only 1 m away from grave 3861, and cut into the same boundary ditch. The human remains in ditch 7330 (section 383) at Higham Ferrers are counted as a single deviant burial rather than as a cluster of burials, despite the presence of disarticulated human remains in section 123 of the same ditch, 4 m away.

Analysing the data after this fashion showed a tendency for individuals treated normatively to be found in burial clusters whereas deviant remains and infants tended to occur in single burials (Tab. 8.12). Of particular note is the cluster of graves associated with Flixborough's building 1a/b. Three of these graves were normative, and a further two were too incomplete for treatment to be determined. The Flixborough cluster did not include any deviant burials but did include one infant burial. Altogether, seven out of ten normative burials identified in settlement contexts belonged to groups of human burials at Flixborough, West Stow, and Yarnton, plus grave 65 at Gamlingay.

8.5.3 Burial treatment and geographical distribution

The geographical distributions of normative burials, deviant burials, and placed deposits of infant remains in settlement contexts are shown in Figure 8.3. Deviant burials are notably absent from East Anglia and present in the west of England, but it is not clear on the basis of small numbers whether this western bias is reliable. Normative burials

and infant remains show no noticeable geographical bias when compared to the overall geographical distribution of settlements containing placed deposits (Fig. 4.1).

8.6 Burials in settlement contexts vs. in discrete cemeteries

At five sites with burials in settlement contexts, nearby discrete cemeteries have also been excavated: Flixborough, Gamlingay, West Stow, Yarnton, and Yeavering (Tab. 8.13).[79] The cemeteries lay at a range of distances from the settlements. The cemeteries at Yeavering and Yarnton were within or immediately adjacent to the settlement, whereas the cemetery at West Stow was 350 m away—close enough to make it likely that it served the inhabitants of West Stow settlement (*cf.* Hamerow 2010*a*: 71, n. 6). In all five of these cases, the periods of use of the cemeteries and settlements at least partly overlap; in four of them, the burials in settlement contexts were roughly contemporary to the burials in the associated cemeteries (Tab. 8.13).[80]

How do burials in settlement contexts compare to burials in associated contemporary cemeteries? In this section burials within settlement contexts at Flixborough, Gamlingay, and Yarnton are compared to burials in their contemporary associated cemeteries in terms of age, sex, pathology, and burial treatment. At all three of these sites, the discrete cemeteries and the burials in settlement contexts are of middle Anglo-Saxon date.

---

[79] In addition, the existence of a cemetery is suspected at Sutton Courtenay on the basis of fieldwalking and metal-detected finds (Hamerow *et al.* 2007: 185). Also at West Heslerton several SFBs are reported to have produced human infant remains (Powlesland 1998: §7.5.2), although the details of these deposits are not yet available, and the largely contemporary cemetery lay about 450 m away (Haughton & Powlesland 1999: 6–9; Hamerow 2010*a*: 72).

[80] Regrettably, the cemetery at West Stow was dug up in the 19th century and was not recorded; but some of the grave goods were saved, and they indicate an early Anglo-Saxon date for the cemetery (Tymms 1853; West 1985: 141–145). Thus the cemetery seems to have been contemporary with all but the latest phases of the settlement at West Stow, so it probably predates graves 1 and 2. At Yeavering, the Western Cemetery might have been contemporary to Grave AX, but Grave AX predates the Eastern Cemetery (Hope-Taylor 1977).

8.6.1 Comparing treatment in burial contexts with nearby cemeteries

The treatment of burials in settlement contexts and in discrete cemeteries could only be compared at Gamlingay and Yarnton, since the remains in the associated cemetery at Flixborough were too heavily disturbed to determine burial treatment (Mays 2007: 121, fig. 8.4). At these two sites, all but one non-infant from a settlement context (burial 3843 at Yarnton) and all of the non-infants buried in the associated cemeteries exhibited normative treatment. On the basis of this evidence, no association could be seen between treatment and burial in a settlement context as opposed to an associated cemetery.[81]

8.6.2 Comparing age and sex in burial contexts with nearby cemeteries

The burials in settlement contexts and nearby cemeteries seem to complement one another in terms of age and sex of non-infants. At Flixborough, six individuals were buried in the settlement: one adult female with an infant buried nearby, and four children under 12 (two of these were of indeterminate treatment). In contrast, the discrete cemetery some 60 m to the south, though only partially excavated, produced nine adults over the age of 17 (including three males and one female) and one burial of indeterminate age (Tab. 8.14). The difference in these age distributions, with juveniles concentrated in the settlement and adults in the cemetery, is statistically significant.[82] There is also a possible emphasis on females in the settlement and on males in the cemetery. At Yarnton, all seven individuals associated with settlement features were adolescent or

[81] There were 12 prone burials in the cemetery at West Heslerton, including three males and seven females; two were adolescent (both female) and the rest were adults (Reynolds 2009: 198). However, no human burials have been reported for West Heslerton settlement except for infant remains from SFBs (Powlesland 1998), so it cannot be said that deviant burials were reserved for the cemetery.

[82] Fisher's exact test on frequencies of children 12 and under vs. adults 17 and over in the settlement cluster vs. cemetery at Flixborough (Tab. 8.14) gives $p = 0.00762$ (following Mays 2007: 121).

younger,[83] whereas the six individuals in the associated cemetery to the west of the settlement were all adults over the age of 18 (Tab. 8.15). Like at Flixborough, the difference in age between the two populations is statistically significant.[84] At Gamlingay, only grave 65 containing a male 15–25 years old was in a settlement context. The other burials in the 'satellite' cemetery and those in the 'main' cemetery covered a broad distribution of ages, with children and 'elderly' individuals unusually well represented, and roughly equal numbers of males and females (Waldron 2005: 243, tab. 21, graph 7).[85]

8.6.3 Comparing pathologies in burial contexts with nearby cemeteries

Seven skeletons buried in settlement contexts showed pathology due to congenital factors, nutritional stress, infection, injury, or cause of death. However, in only a few cases were pathologies sufficiently severe to have affected an individual's quality of life. The probable female in grave 1 at West Stow suffered from a congenital distortion of an upper arm and poorly healed injuries to a rib and the left tibia; there was also a congenital lesion in one femur of which the individual was probably not aware. An object found with the adult female in burial 3580 at Flixborough has been tentatively identified as a calcified lymph node, which could signify tuberculosis; but if so, the disease was not advanced, as there were no other skeletal effects. Three of the juveniles at Flixborough (burials 1960, 4010, and 2231/2) exhibited cribra orbitalia due to anaemia, most likely caused by a gut infection or parasite. More significantly, perhaps, burial 2231/2 at Flixborough had an intra-cranial infection at the time of death. The proximity of infant

[83] The adolescent in the Yarnton settlement was in deviant burial grave 3843 along with skull fragments from four subadults, but because it was in a cluster with normative burial grave 3861 it has been included in Table 8.15.

[84] Fisher's exact test on frequencies of children 12 and under vs. adults 17 and over in the settlement cluster vs. cemetery at Yarnton (Tab. 8.15) gives $p = 0.00217$.

[85] The age distribution in the satellite cluster at Gamlingay is statistically indistinguishable from that of the main cemetery of 109 burials: Fisher's exact test on frequencies of children 14 and under vs. adults 25 and over in the two burial groups gives $p = 1$. Unlike burials in settlement contexts, the satellite cemetery at Gamlingay was not used primarily for juvenile burials.

burial 3706 to adult female burial 3580 at Flixborough could be because both individuals died in childbirth, but it could likewise be a coincidence. At Yarnton, no significant pathologies were noted among the settlement burials; in the associated cemetery group, on the other hand, an adult male suffered from a number of spinal problems and a healed foot injury (Boyle 2004: 317–323, tab. 17.1).

8.6.4 Summary

To sum up, it has already been noted that normative burials in settlements include a larger than expected proportion of juveniles, especially in the middle Anglo-Saxon period, and no mature individuals. The preceding analysis shows that, correspondingly, the cemeteries associated with settlements at Flixborough and Yarnton have low numbers of juveniles and significant numbers of mature individuals. How adolescents fit into this pattern is not clear, as they are limited to only one individual in a deviant burial (grave 3843 at Yarnton) across the two sites, though it can be noted that the only individual buried in a settlement context at Gamlingay, in grave 65, was 15 to 25 years old.

Unfortunately, it cannot be determined whether infant burials in settlement contexts should be seen as part of the same pattern. One infant was buried in a settlement context at Flixborough (burial 3706), but all of the other placed deposits of infants identified in this study came from settlements where no cemetery has been excavated nearby. It might be relevant that an unusually large number of infants were buried in the cemetery at Gamlingay (Waldron 2005: tab. 21).

The only sexed burial at Flixborough, burial 3580, was female, and graves 1 and 2 at West Stow contained a probable female and a female, respectively, hinting that females as well as children might have been singled out for burial in settlement contexts (Crawford 2008). Again, it is regrettable that age and sex at the associated cemetery at

West Stow were not recorded. One also wonders whether graves 1 and 2 were originally accompanied by more burials, now lost to erosion; the published sections of the nearby enclosure ditches show that they were shallow (Reynolds 2003: 110).

There is little evidence to support the suggestion that populations of settlement burial clusters and associated cemeteries significantly differ in terms of pathology (*pace* Crawford 2008: 202). Although four out of six individuals at Flixborough may have suffered infections, none need have been severe enough to be noticeable and the evidence that the adult female and infant died in childbirth is only circumstantial. Moreover, the skeletons in the cemetery at Flixborough were too poorly preserved for pathologies to be identified, except for one mature male with osteoarthritis (Mays 2007: 120; Geake 2007: 113), so it is not possible to make a direct comparison between pathology and burial location. Similarly, although one out of two settlement burials at West Stow suffered significant pathologies, the cemetery burials were not examined. At Yarnton, the only burial exhibiting serious pathology belonged to the cemetery group.

8.7 Discussion, part i: social identity of burials in settlement contexts

Burial treatment reflects the social identity of the deceased, and the choice to bury individuals in settlement contexts rather than in cemeteries surely does as well. The first part of this discussion therefore considers human burials in settlement contexts in terms of their burial treatment (i.e. normative, deviant, and infant burials), age, and sex, in order to explore how social identity helped determine burial in settlement contexts. The second part of this discussion considers what role human burials in settlement contexts played in the life of the settlement, as placed deposits (§8.8).

8.7.1 Chronology

Overall, there was a marked increase in the deposition of human remains in settlement contexts in the middle Anglo-Saxon period (Tab. 8.6). Two-thirds of the human burials reliably date to the middle Anglo-Saxon period, and almost all of the early Anglo-Saxon non-infant burials could be as late as 7th century, including the two burials at Sutton Courtenay and grave AX at Yeavering. Only deposits of infant remains were more common in the earlier period. This 7th-century increase in human burial in settlement contexts can be viewed as one of a number of changes in burial practice (*cf.* Geake 1992). Burial in settlements may represent an attempt on the part of living communities to strengthen ties with their deceased kin, possibly as a means of strengthening claims to resources, particularly land, in a period when control of land and its agricultural production was becoming more important, as reflected in the introduction of enclosed settlements and boundaries within settlements (Hamerow 2010*a*: 76; Bradley 1980: 172–173).[86] That a third of human burials in settlement contexts are associated with boundaries or walls is surely significant (§8.5.1). This is certainly part of the story, but the differences in demography and spatial patterning according to the normative or deviant treatment of human remains reflect layers of complexity within that narrative.

8.7.2 'Deviant' burials

Reynolds' (2009) recent synthesis of deviant burial rites in Anglo-Saxon England—in communal cemeteries in the 5th to 7th centuries and in execution cemeteries from the 8th century onward—provides a robust framework within which to interpret deviant burials in Anglo-Saxon settlements. Like many deviant burials in early cemeteries (*ibid.* 201–203), the deviant burials in settlements identified in this study were

[86] An increase in settlement burial for the late Roman period has received a similar interpretation (Esmonde Cleary 2000).

all associated with boundaries (§8.5.1). The current study showed a marked increase in the middle Anglo-Saxon period in deviant burial practice in settlements, both in numbers of deviant burials and in total numbers of individuals with deviant characteristics, and adult males dominated that increase (Tab. 8.8, §8.4.1). This change coincides with a dramatic increase in the numbers of deviant burials in cemeteries, mostly in execution cemeteries emerging in the second half of the 7th or early 8th centuries (*ibid.* 153–155). Males dominate in middle Anglo-Saxon execution cemeteries: out of 797 burials from 27 execution cemeteries, only 60 were identified as females (*ibid.* 97, 170).[87] Notwithstanding difficulties assigning sex, which some deviant treatment might have exacerbated, it can be very roughly estimated from these figures that about 1 per cent of deviant burials in cemeteries were female. Comparing the deviant burials in settlements, the fact that three out of six sexed individuals were female hints that a different sex demographic might have existed in settlements.[88] Unfortunately the numbers are too small to draw any firm conclusions, but if this is true, the implications are not obvious. As Crawford warns, we must not resort to an uncritical assumption that female deviant burials in settlements represent 'some domestic tragedy' (Crawford 2008: 199; quoting Leeds 1947: 86). It may be that women and children who had contravened social lines were more likely to be held to a local (perhaps even ad hoc) system of justice, and were therefore buried in settlements rather than state-administered execution cemeteries; but, as shall be discussed below, it is not at all certain that the deviant burials in settlement contexts represent execution victims.

Deviant burials in settlements exhibit similar characteristics to burials in execution cemeteries (Tab. 8.7; Reynolds 2009: 160–177). Some of these could derive

[87] Neither all 60 nor all 797 were manifestly deviant, but a likelihood that those that were not deviant were executed may be inferred from their presence in execution cemeteries.
[88] Or possibly two out of four, considering that the two males in ditch 7330 at Higham Ferrers might have been grave accessories in the burial of the adult female; see §8.8.2.

from the manner of death. Tied legs, as seen in grave 3843 at Yarnton, burial 3617 at Catholme, and section 383 of ditch 7330 at Higham Ferrers, might indicate that the individual was bound for the purposes of execution, although if this were the case one would expect the hands to be tied as well (*ibid.* 165). Bodily contortion, as exhibited by individuals in pit α at Sutton Courtenay and burial 3843 at Yarnton, could result from certain violent deaths, but with no corresponding osteopathic signs of trauma, these body positions cannot be reliably ascribed to the mode of death rather than deliberate positioning or even careless deposition. More often, the deviant characteristics of burials in settlement contexts derived from post-mortem treatment of the body. The partial skeleton in section 383 of ditch 7330 at Higham Ferrers and the skull in pit 1079 at Cottam were displayed prior to burial, a treatment consistent with execution (*ibid.* 165). However, the Cottam skull showed no signs of decapitation, indicating it was separated from the rest of the body after advanced decomposition had taken place (Dobney *et al.* 1999: 85–86). Other deviant characteristics may likewise reflect preparation for and treatment during burial rather than execution, such as the prone aspect of some burials, and the stamped earth seal over the burials in pit α at Sutton Courtenay. Sealed graves have sometimes been proposed as live burials, but they have also been interpreted as attempts to prevent the soul of the deceased from rising up to haunt the living, or as a way of preventing accidental disturbance of the grave at a later date (Reynolds 2009: 54, 71, 82, 90). The layer of stamped earth and animals skulls in pit α at Sutton Courtenay would not have effectively held down a live adult female. In the end, whether the deviant burials identified in settlement contexts actually represent executions may be impossible to determine. Most of the deviant characteristics seem to reflect post-mortem rather than peri-mortem treatment, and none of the skeletons exhibited direct osteological signs of violence, though in some cases the crucial evidence for execution could be missing.

Whether or not deviant burials in settlements were executions (some of them probably were), the significance of their burial within the settlement remains to be considered. Reynolds has argued that Anglo-Saxon deviant burial treatment derives from a deep-seated fear of the 'powerful dead', and exclusion from communal cemeteries was not limited to criminals.[89] Also excluded were individuals perceived to have supernatural powers and who might still be powerful in death, those who died suspiciously of illness or accidents, as well as deformed individuals, foreigners, and other non-conformists (Reynolds 2009: 94, 235–236; see also Crawford 2008). But if the individuals in deviant burials in settlement contexts were to be excluded, then why were they were buried in and around settlement features? There are two possibilities (not mutually exclusive): first, that there was something about these individuals that warranted deviant burial in a settlement rather than in a cemetery, and second, that deviant burials played a structuring role in the life of the settlement.

Based on the deviant burials identified in this study, it cannot be shown what it was about these specific individuals that required deviant burial in a settlement rather than in a cemetery. The wide variety of deviant treatments observed in settlement contexts, with no particular treatments standing out or exhibiting specific patterns, means that specific reasons for deviant treatment cannot be linked to burial in the settlement. It is likely that decisions to give criminals and other social pariahs deviant burial in settlements were made locally on a case-by-case basis, even though recurring deviant characteristics indicate a common understanding of effective practice (Reynolds 2009: 89). Even in the middle Anglo-Saxon period, when the rise of execution cemeteries reflects a greater exercise of central authority over execution and deviant burial more

[89] Saxon law codes proscribe burying murderers, adulterers, and takers of false oaths, among others, in consecrated ground (Reynolds 2009: 24–25).

generally, the sporadic and varied nature of deviant burial in settlements indicates such burials were not necessarily a product of this developing judicial system.

Deviant burials in settlements, although much less common than in execution cemeteries, have similar characteristics and follow similar patterns to the latter, and could be the result of similar practices. If they do represent judicial executions, it was probably a justice devised and applied, not according to strict guidelines set down by a higher power, but locally according to a shared understanding. This variation at the level of the community prevents us from determining what it was about the individual that demanded deviant burial in a settlement context.

8.7.3 'Normative' inhumations

The crucial question in relation to normative burials in settlement contexts is: why were these burials not made in cemeteries? The overwhelming majority of Anglo-Saxon graves have been found in discrete burial grounds that were distinct from settlements. In at least one respect, then, burial in a settlement context was intrinsically non-normative. Therefore a similar pair of possibilities arises for normative burials in settlements as arose for deviant burials. Did the social identity of the deceased warrant exclusion from the communal cemetery and burial in the settlement instead? Or did the placement of normative burials in settlement contexts serve a purpose in the life of the settlement itself? These two possibilities are not mutually exclusive.

To investigate the first possibility, it is necessary to compare the population of normative burials in settlement contexts to the overall cemetery population, both in terms of demography and in terms of burial characteristics. Unlike the deviant burials, normative burials in settlement contexts did not appreciably differ from burials in cemeteries in terms of aspect, body positioning, and so forth. All of the middle Anglo-

Saxon burials in settlement contexts were characteristically unfurnished. Both of the early Anglo-Saxon burials were furnished; there was nothing unusual about the male burial in House X at Sutton Courtenay, but the grave goods in grave AX at Yeavering, a wooden staff or standard with bronze fittings and a probable goat skull, were unusual. At the foot of the grave stood a large free-standing post; a possible placed deposit of animal bone and a large stone was found in its fill, deposited after the removal of the post (Hope-Taylor 1977: 67). The unusual characteristics of grave AX probably indicate a special social identity for the individual buried within (§10.3.3). The unusual social identity of the individual in grave AX could be the reason for setting the grave at the entrance of the building.

In terms of demography, there were too few normative burials in settlements to perform a statistical comparison with the contemporary cemetery population. Nevertheless, the small sample indicates that juveniles were better represented in settlement contexts than in cemeteries, whereas mature individuals (aged 40 or older) were conspicuously lacking (§8.4.2). Overall, normative burials in settlements were balanced in terms of sex, but all the sexed normative burials of the middle Anglo-Saxon period were of women and subadults, giving the impression that women and children were particularly selected for burial in settlements in the middle Anglo-Saxon period. This fits with Crawford's observations (2008: 202), except that infant burials derive from a different pattern (§8.7.4), and adults buried in settlements did not have more significant pathologies than those in associated cemeteries.

Notwithstanding their exclusion from communal cemeteries, why were normative burials made in the settlement? In the middle Anglo-Saxon period, the selection of women and children for normative burial in settlement contexts could manifest a social identification of women and children with the home. One should not uncritically apply

such an assumption to all cases (Crawford 2008: 199), but there is some evidence for this interpretation. In early Anglo-Saxon cemeteries, certain grave goods of a domestic nature, such as keys, latchlifters, and tools for textile production, often accompanied female burials, possibly indicating a feminine authority in the home. The normative burial of females alongside walls and boundary ditches might have reflected a continuation of that role in death.[90] Placed deposits of loomweights, apparently associated with the deliberate destruction of SFBs (§7.5.1), could possibly have expressed feminine gender in a settlement context as well (§9.3.2). By their association with liminal places, normative burials, like other placed deposits, will be seen to have played a role in constructing space in the settlement (§8.8). The social identities of the people buried in liminal places within the settlement could well have contributed in this respect.

8.7.4 Infants

The age range of infants buried in settlement contexts suggests that perinatal infants were treated differently in death than older babies. Previous analysis of grave goods in early Anglo-Saxon cemeteries has identified the first lifecycle threshold at 2 to 3 years (Stoodley 2000: 459). All of the individuals under 3 years old buried in settlements whose ages have been precisely specified were in fact perinatal fetuses or newborns; the next youngest child buried in a settlement context was 3 to 4 years old (burial 2231/2 at Flixborough). The perinatal infants buried in settlement contexts could have been stillborn. Regardless of the cause of death of these infants, the selection of perinatal burials in settlement contexts indicates that an additional lifecycle threshold may have existed at around the time of birth. It could be that stillborn or other perinatal infants were not yet considered fully human (Crawford 1999: 77–89). Such a view is well

[90] The fact that these female burials in settlement contexts were unfurnished is not unexpected since they are 7th century or later.

attested ethnographically (Ucko 1969: 270–271), and may accord with infant burial practices in 4th century Roman Britain (Esmonde Cleary 2000: 135).

Can burials of infants be identified as normative or as deviant? No framework exists for identifying normative or deviant infant burials in cemeteries. Comprising 20 per cent of the individuals buried in settlement contexts, infants are much better represented here than they are in cemetery contexts; this is a characteristic that they share with (normatively treated) juveniles and adolescents. Crawford, noting this pattern, has argued that separate burial grounds in settlements were for infants as well as for juveniles, and disabled adults (Crawford 2008: 202). This study has partially corroborated Crawford's suggestion, identifying clusters of normative burials of juveniles and women in settlement contexts. However, infants, like deviant burials, tend to occur singly; only one infant burial was part of a cluster of burials in settlement contexts (Tab. 8.12). A further connection between infants and deviant burials could be argued from the presence of an infant in pit α at Sutton Courtenay, but the situation is obscured by the possible subordinate relationship of the infant to the adult woman in the structure of the burial (§8.8). The infant in an axial posthole of the probable SFB C18 at Cowdery's Down could also be argued to be deviant, on the basis of its disarticulation. One must entertain the possibility that infant burials in disused settlement contexts represent the surreptitious disposal of unwanted babies; however, the deposition of babies in highly visible locations, such as in the top fill of the enclosure ditch 2513 at Wharram Percy argues against that interpretation (*ibid.* 200), as does their placement at the bases of SFBs at Barrow Hills and Eye Kettleby, where placed deposits were often made, in what this study has proposed was a practice intended to end the use-life of the building and reclaim the ground for future use (§9.2.3).

However, the question of whether infant burials in settlements are normative or deviant might be the wrong one to ask. It presupposes that infants were afforded burial rites in the same way as older children and adults, even though their well-attested absence from communal cemeteries suggests otherwise. Among burials in settlement contexts, two infants were associated with non-infant burials, burial 3706 at Flixborough and the infant in pit α at Sutton Courtenay; however, in both cases, their burials might have been determined by their relationships to the adult females buried near them. It was suggested at the start of this discussion that human remains placed in settlement contexts could be interpreted as human burials or as placed deposits. In the case of infants, the latter interpretation might prove more fruitful (§8.8).

8.8 Discussion, part ii: burials in settlement contexts as placed deposits

The previous section considered the burial of human remains in settlement contexts as a function of the social identity of the deceased. That approach tends to reduce the settlement context of these burials to a mere indicator of unusual mortuary practice. However, this study has argued that placed deposits were actively used to structure and maintain Anglo-Saxon settlements. Human burials in settlement contexts bear a number of similarities to placed deposits of other types, both in terms of context and composition (Ch. 5) and in terms of associations with entrances and boundaries (Ch. 6). It is suggested here that the deposition of human burials in settlement contexts can be seen to fit into that larger practice. Therefore, this second part of the discussion considers human burials in settlement contexts as placed deposits. The spatial distribution of human burials in settlements, and their associations with liminal places and important events in the settlement, are analysed in conjunction with burial treatment, age, and sex,

to begin to understand how the placed deposition of normative, deviant, and infant human burials served to construct space and time in Anglo-Saxon settlements.

8.8.1 Infants

Deposits of infant remains provide a good starting point because certain patterns of deposition linking them to other placed deposits have already been identified in previous chapters. A correlation has been noted between placed deposits of infants and SFBs (§5.6.4). It may be significant that placed deposits of neonatal animals, particularly piglets, are also associated with SFBs (*ibid.*). In terms of arrangement, infant remains were placed in similar positions within SFBs to other types of placed deposits: either at the centre of the base, possibly in a small pit (SFB 895 at Eye Kettleby; burial 4562 at Barrow Hills), or in an axial posthole (probable SFB C18 at Cowdery's Down). Infants on the bases of SFBs were placed at the same liminal time in the lifecycle of the building as other placed deposits; namely, immediately following the destruction of the superstructure but prior to deliberate backfilling.[91] The infants in SFB 895 at Eye Kettleby and burial 4562 at Barrow Hills differ from other placed deposits in SFBs only in that they consist of human infant remains. It may reasonably be argued that, despite also being human burials, infants were deposited in SFBs for the same purpose as other placed deposits: to mark, signify, or construct the end of the life of the building and to reclaim the area in which it once stood for future use, as discussed in Chapter 7.

Similarly, the infant in a leveling deposit at the top of enclosure ditch 2513 at Wharram Percy may have played a role similar to other placed deposits in liminal places. Here the infant was part of a complex: nearby were placed the disarticulated remains of over half a sheep, as well as a nearly spherical boulder with an 'unusual veined

[91] The disarticulated infant remains in posthole A of probable SFB C18 at Cowdery's Down are more likely to be a foundation deposit, since the post appears to have rotted *in situ*.

appearance' (Richards 1992: 85). Although there may be a temptation to regard the infant as the primary element in the placed deposit, most of the attention in arranging the deposit seems to have been given to the sheep remains: the sheep bones were surrounded by minute specks of amber, and the unusual stone was placed directly on top of them. The entire deposit was immediately covered by a leveling deposit of sandy clay with chalk fragments, indicating an association with a liminal time (the leveling off of the remains of the ditch) as well as a liminal place. Like other such deposits, it may mark or help complete the erasure of the boundary from that part of the settlement.

8.8.2 Skulls and disarticulated human bone

Deposits of disarticulated or fragmented human remains resemble placed deposits more than they resemble human burials in cemeteries. One of the deposits of cremation pyre debris at Friars Oak (Site A) was in an SFB, the other in the single fill of disused storage pit 7. In terms of context, the deposit in pit 7 in particular fits the pattern of placed deposition prior to or during the final backfill of pits and SFBs, most commonly involving cattle and horse skulls (§7.5.2). The deposit in the SFB is near the edge of the pit and halfway up the fill, but it could nonetheless be a variation on the same process. The human skulls in SFB 8516 at Horcott Quarry and pit 1073 at Cottam fit into patterns exhibited by animal skulls in placed deposits; the former in its association with disarticulated animal bones (§5.4.2), the latter in its placement immediately prior to the backfilling of the pit (§7.5.2). This suggests that the placement of human skulls in settlement contexts was governed primarily by their identities as skulls rather than as human, and that they served a similar purpose as other placed deposits of skulls, even though they might have originated from—and/or been thought to originate from—executions or deviant burials (§8.7.1). A parallel to the Cottam skull may be the female

skull in grave 138 at Bidford-on-Avon, Warks., which was surrounded by a 'box' of limestone slabs (Reynolds 2009: 79).

In two deposits, disarticulated remains were found alongside more complete individuals, possibly serving as grave furnishings. The skull fragments of four subadults in grave 3843 at Yarnton appear to have been symbolically as well as literally subordinate to the complete adolescent skeleton overlying them. Similarly, the semi-complete articulated adult woman in ditch 7330 (section 383) at Higham Ferrers seems to dominate the disarticulated human remains from at least two adult males found in the same context and 4 m away in section 123 of the same ditch. The excavators interpreted these as fragments collected from a place where the bodies of executed individuals were publicly displayed (Hardy *et al.* 2007: 207). The only other settlement burial to contain multiple individuals, pit α at Sutton Courtenay, contained an adult female and an infant. The cattle and horse skulls placed by the prone adult woman's head suggest that she was the primary object of the deposit, with the infant buried to accompany her; at the very least, the packed earth overlying both the infant and the woman's head establishes a connection between the two individuals that goes beyond contemporaneity. While being wary of projecting too much on ancient deposits, the disarticulated bones and fragments in grave 3843 and ditch 7330 appear subordinate to the articulated individuals; if that is the case, then the same may be true for the infant in pit α. Nevertheless, the possibility that the disarticulated remains and the infant were placed deposits with their own intrinsic significance remains.

8.8.3 Complete inhumations

Complete inhumations can also be interpreted as placed deposits that played a role in the life of the settlement. This is most apparent in their associations with liminal

places and liminal times. About one-third of all human remains were associated with buildings or enclosure boundaries (§8.5.1). Five out of seven deviant burials were placed in or near liminal places, all enclosure boundaries. On the one hand, an association with the periphery could be interpreted as part of their deviant burial treatment. There is evidence for deviant burials in early Anglo-Saxon cemeteries being made at the edges of grave clusters or of the larger cemetery, and for later execution cemeteries and isolated deviant burials being associated with estate, parish, and hundred boundaries and other liminal places in the landscape (Reynolds 2009: 231–234). On the other hand, nine out of ten normative burials were also associated with liminal places, distributed almost evenly between building walls and enclosure boundaries. The tenth, in House X (Room 2) at Sutton Courtenay, was probably placed at a liminal time, namely, the final backfilling of that SFB. Some deviant burials were associated with both liminal times and liminal places. The skull at Cottam was placed in the final backfill of pit 1073. The remains of the possible execution victims at Higham Ferrers were deposited in the final backfill of ditch 7330. The two deviant burials not associated with liminal places, in pit α at Sutton Courtenay and SFB 8516 at Horcott Quarry, might have been placed at liminal times as well, but the stratigraphic evidence has not been reported in enough detail to say so conclusively.

Both deviant burials and normative burials were placed in or near enclosure boundaries, indicating that both types of burial could be used to construct liminality there. It is not clear at what stage in the construction of the boundaries that these deposits were placed. The deviant remains in ditch 7330 at Higham Ferrers may have been termination deposits associated with the abandonment of the horseshoe-shaped enclosure, and the infant burial in ditch 2513 at Wharram Percy may have been deposited during the leveling off of that feature. The other burials at settlement enclosures, whether normative

or deviant, all could have been placed at any time in the use-life of the boundary.[92] Direct evidence for both normative and deviant burial marking or constructing the same boundary comes from the U-shaped enclosure at Yarnton, in which deviant burial 3843 and normative burial 3861 were only a little over 1 m apart (Hey 2004: fig. 7.17). Notably, this study has identified three deviant burials and no normative burials at the entrances to enclosures, whereas most of the burials along enclosure boundaries were normative (Tab. 8.11). If these small numbers were representative of a real pattern, one could speculate that normative and deviant burials were used to construct different kinds of liminality along boundaries and at entrances, respectively. This would potentially strengthen the argument that placed deposits along boundaries and at entrances served different purposes (§6.3.3). Perhaps the normative burials along boundaries reinforced the division between the interior and exterior of the enclosure, whereas the deviant burials at the entrances protected communication or access across the boundary. This is speculation; but the emerging pattern on which it is drawn, if upheld by further excavation, would at the least indicate that normative and deviant burials were used differently as placed deposits for constructing space within the settlement.

Another distinction between normative and deviant burials as placed deposits is more apparent: normative burials could be associated with earthfast structures, whereas deviant burials were not. The normative grave 65 at Gamlingay, cut into the foundation of a disused earthfast building, may have served as a termination deposit; so might the burial in House X Room 2 at Sutton Courtenay, albeit in an SFB rather than an earthfast structure, and not associated with its walls. There might also have been a temporal relationship between building 1a/b at Flixborough and the normative burials surrounding.

[92] The burials in ditches (burial 3666 at Catholme and graves 3168, 3843, and 3861 at Yarnton) were all cut into partly backfilled ditches, and how soon afterwards the ditches were backfilled is not clear from the published reports. For human burials near to but not stratigraphically linked to boundaries, their temporal relationship is *ipso facto* not exactly known.

The graves were all cut into the gravel foundation and/or floors during the earlier phase of the building (Loveluck & Atkinson 2007: 49). The later phase of the building was rebuilt on the same footprint, with some walls exactly corresponding to the earlier building (*ibid.* 53). Although the excavators interpret this rebuilding as being in complete disregard of the graves, it could equally be interpreted as maintaining a direct connection to the graves, perhaps with the graves serving as foundation deposits for the second phase of the building. There is no stratigraphic link between grave AX at Yeavering and building A4. Regardless of the temporal relationship, normative burials associated with walls and doorways of buildings may have helped reinforce the claims of those dwelling within to the rights and property of their ancestors (Hamerow 2010*a*: 76). Why were no deviant burials found in association with earthfast structures? We can only speculate. Perhaps individuals not respected in death would be unable to perform the role required of placed deposits associated with a house. Alternatively, as social 'others' (Reynolds 2009: 89), individuals in deviant burials might not have been welcome choices for placed deposition so central within the settlement. If prone burial and other deviant characteristics were designed to prevent the dead from haunting the living (*ibid.* 89–91), then that fear might also have contributed to the decision to use normative burials for placed deposits in and around houses.

8.9 Conclusion

Social identity clearly contributed to the decision to bury certain individuals in settlement contexts. First, women and children, whether receiving normative or deviant treatment, were better represented in settlement burials than would be expected, based on a comparison with communal cemeteries on the one hand and execution cemeteries on the other. There may be a temptation to attribute this to a social identification of women

and children with the home, but it is not clear by what mechanism that social identification was made manifest. In any case, a similar identification does not seem to account for the large proportion of infants among placed human remains in settlements. Although infants are also better represented in settlements than in cemeteries, infant burials cannot be identified as either normative or deviant, and challenge interpretation as human burials at all. Second, both normative and deviant settlement burials became dramatically more numerous in the middle Anglo-Saxon period. This increase could be part of the trend toward greater diversity of burial practices emerging in the 7th century, including final phase cemeteries, unfurnished cemeteries, princely burials, and execution cemeteries (Geake 1992; Reynolds 2009: 153–155).

However, burials in settlement contexts also played an active role in structuring Anglo-Saxon settlements. Infants and human skulls placed during the final backfilling of disused pits and SFBs may have served a similar purpose to deposits of cattle and horse skulls in similar contexts in effecting the termination of the feature and possibly reclaiming the land for future use. An emerging pattern associating normative burials with the lines of boundaries and deviant burials with entrances through those boundaries may hint at differing perceptions of the roles of boundaries and entrances within settlements. By associating normative burials with buildings and deviant burials with enclosures, living inhabitants may have helped to construct claims over certain areas within the settlement. The associations of human burials with liminal places and times, and the patterns connecting normative and deviant treatment to different associated feature types and elements, show that human burials fit within the broader category Anglo-Saxon placed deposits, used to signify and construct boundaries and transitions in the spatial and temporal configuration of the settlement.

Chapter 9
Placed deposition as action: structuring settlements and society

The previous four chapters have identified patterns in the composition, context, spatial distributions, and temporal associations of placed deposits in Anglo-Saxon settlements. It is the task of the final two chapters to discuss these patterns in conjunction with relevant scholarship, in order to improve our understanding of Anglo-Saxon settlement structure, social structure, and worldview. Underpinning my approach to this task are two premises founded in recent anthropological and archaeological theory: first, placed deposition is an action performed to achieve a desired objective; second, expecting it to achieve that objective was rational within an Anglo-Saxon cognitive reality. If these premises are accepted, then it is possible, by considering placed depositional patterns, to suggest different ways placed deposits may have been intended to affect life in rural settlements and to infer some aspects of Anglo-Saxon worldview, though this will necessarily be speculative in parts.

This chapter begins by briefly developing the premises mentioned above in order to lay a theoretical foundation upon which to construct subsequent discussion of Anglo-Saxon placed deposits. The rest of this chapter considers how placed deposits may have been used to structure space, time, and society in settlements. First, the observation that placed deposits are often 'liminal' leads to a discussion of the significance of spatial and temporal boundaries in Anglo-Saxon settlements and the use of placed deposits to construct, mediate, and subvert liminal places and times. Next, placed deposits are considered in terms of Anglo-Saxon views on childhood, gender, and the family. Chapter

10 considers the worldviews and belief systems with which placed deposits operated to achieve their diverse objectives.

9.1 Placed deposition: ritual or action?

A first step in discussing the patterns identified in the preceding chapters is to answer a frequently-asked question: why did Anglo-Saxons make placed deposits? One way to approach this question is to think about placed deposits as the result of ritual activity; there may, however, be relatively little progress to be made down that path. Even if a suitable definition and interpretation of 'ritual' were found, this section argues that since the concept of ritual is probably anachronistic to the Anglo-Saxon period, most approaches to ritual would be of limited use in understanding the Anglo-Saxon world. Instead, this section will consider placed deposition using ideas of action, agency, practice, and ritualization.

9.1.1 Placed deposition as 'ritual'

Archaeologists have often attributed placed deposition to 'ritual', in Anglo-Saxon contexts as well as in other areas of archaeology (e.g. Stamper & Croft 2000: 37; Richards & Thomas 1984; see Hill 1995), but to do so can be contentious and uninformative. Ritual has provoked extensive debate in anthropology and archaeology, and many definitions and models have been put forward for understanding this diverse activity (e.g. Durkheim 1995 [1912], Leach 1970 [1954]: 10–16; Turner 2008 [1969], Bloch 1974; Bell 1992; Humphrey & Laidlaw 1994). Proposed definitions of ritual span wide ranges of human activity; indeed, it has been argued that ritual can in principle apply to *any* kind of action (e.g. Leach 1968: 523–524; Humphrey & Laidlaw 1994). Thus any acceptable definition of ritual must be so inclusive as to strip the term of any

real meaning (Humphrey & Laidlaw 1994: 72; Hill 1995: 101). Perhaps this is why archaeologists have been accused of resorting to the ritual label when faced with anything they don't understand (Brück 1999*b*: 317): 'it is ritual' can be an absence of explanation, an admission of interpretational failure, since all of the interpretative questions remain to be answered.

More importantly, it can be argued that to focus exclusively on ritual aspects of placed deposition in the Anglo-Saxon period is necessarily to misunderstand its purpose. Durkheim (1995 [1912]) presented ritual in contrast to biological or economic functional activity. Dominant theoretical approaches to ritual continued to divorce it from the functional aspects of actions for most of the century, either perceiving ritual as symbolic 'frills' (Leach 1970 [1954]: 11–12), or as actions completely unrelated to the actor's intent (Humphrey & Laidlaw 1994). A *functional:ritual* dichotomy, however, has been widely criticized over the past 25 years or so (Hill 1995; Brück 1999*b*; Chapman 2000*b*; Bradley 2003, 2005; Hamerow 2006: 2; Morris & Jervis 2011). Dividing the sacred and the profane may be analytically valid, but it reflects a modern Western worldview, not necessarily that of the actor. The distinction between sacred and profane is not usually important in non-Western worldviews. Behaviour that the Western scientific mind recognizes as a superfluous ('ritual') aspect of an activity is, in the actor's worldview, crucial to that activity's functional effectiveness. Therefore, to insist on an analytical division between the sacred and the profane in interpreting activities arguably impedes understanding (Brück 1999*b*). It distinguishes as special certain aspects of the activity that the actor might not have viewed as distinct elements; and it invites interpretation of those aspects in particular, rather than a holistic understanding of what the actor may have perceived as a single, undifferentiated act.

9.1.2 Placed deposition as action

Rather than invoking ritual, it may be more helpful to focus on placed deposition as an action. Through actions, people are able to create and modify social relations; navigate and promulgate society; and draw upon, protect against, and shape the world around them (Gosden 2005: 193). All actions have intentions, even if they can be difficult to ascertain, and even if they are not the same as the actual effects of the action (Taylor 1985: 78–79; Binford 1978: 348; Gell 1998: 16). This is true even of ritualized actions (Humphrey & Laidlaw 1994: 5). It is therefore possible to investigate the intentions motivating placed deposition—in other words, to consider the situations and strategies that provided its impetus (Bell 1992: 74)—without worrying about whether or not the action itself constitutes ritual.

It is suggested here that the intentions governing placed deposition bear some relation to the physical characteristics of the placed deposit, as analysed in the preceding chapters. Bell asserts that human action is by its nature both situational and strategic: it is undertaken because it is effective to the specific context in which it is performed (Bell 1992: 81).[93] All social actions are mediated through the physical world (Gell 1998: 20); those that involve the manipulation of material can potentially be studied by archaeologists (Gosden 2005: 193).[94] Placed deposition is an action well suited to archaeological study: it involves the special selection, treatment, and arrangement of material (§2.3), and the burial of that material in the ground, where its chances of surviving to be excavated considerably improve.[95] Since placed deposition involves real

[93] Bell is actually speaking about 'practice': 'a nonsynthetic and irreducible term for human activity', which she goes on to characterize as necessarily intentioned (Bell 1992: 81). In other words, the term 'practice' as she uses it here is arguably equivalent to 'action' in the present discussion, although she goes on to focus on other aspects of practice in order to develop the idea of ritualization.
[94] Some media of social actions (e.g. speech) are physical but not material.
[95] Placed deposition may be just one aspect of complex activities, other aspects of which leave no archaeological trace (Morris & Jervis 2011: 76). This idea underlies much of the discussion in this chapter and Chapter 10.

materials placed in a real world context, and since like all actions placed deposition was made with intention, then it is reasonable to consider how the material, form, and/or context of the deposit relate to the intention motivating its placement.[96]

In the discussions that follow, recurring patterns of placed deposition are examined in terms of their interaction with the physical structure of Anglo-Saxon rural settlements, in order to infer what aspects of that structure they were intended to construct or modify. The focus on recurring patterns is critical. Placed deposits are complex archaeological features with a range of traits, all of which might be significant of its purpose in different respects. Considering deposits individually, it is difficult to ascertain the significance of specific traits.[97] If patterns reveal that placed deposits were recurrently made under certain situations—for example at certain liminal places and times (§9.2)—then interpreting how those traits were related to the purpose of those deposits is both easier and more reliable.

In treating placed deposition as an action, we can also take an opportunity to consider agency. A social agent can be defined (in deliberately flexible terms) as an intentional entity perceived to cause action (Gell 1998: 16). In one sense, the agent of placed deposition is the person or people who made the deposit (although one could entertain the possibility that another agent, e.g. a ritual specialist, or even a perceived agent, a spirit or god, vicariously caused it by giving instructions for placed deposition to be carried out). Anglo-Saxon placed deposits are sufficiently anonymous, however, that

[96] To argue that this is not reasonable is tantamount to suggesting that archaeologists can infer nothing about the purpose of an artefact from its material, form, condition, context, etc. Humphrey and Laidlaw (1994: 267) have argued that prescribed ritual is like an object, external to the actor and perceived differently by different people. In prescribed ritual, the 'identity' (form, meaning) of the action is independent of the agent's intention (*ibid.* 88–89, 187). Although identity of ritual does not have to relate to intention, there remains the possibility that it does (Bell 1992: 100–101). The process of ritualization, discussed below in relation to placed deposition, seems especially likely to maintain a relationship between identity and intention.

[97] Deposits should be examined on an individual basis to understand the specific circumstances of their creation (Morris & Jervis 2011: 74–77, 78), but that does not preclude examining patterns as well. The specific circumstances of individual deposits are considered throughout the discussions of this chapter and Chapter 10 in the context of larger patterns.

one can only speculate who might have actually made the deposits. Although there is considerable evidence for placed deposits relating to the social roles of juveniles and adolescents in Anglo-Saxon society, for example, there are no placed deposits that were obviously made by them. Despite the anonymity of the human agent who made the placed deposit, his intention can nevertheless be inferred from its traits, especially when they fit recognizable patterns, as discussed above.

It may be possible to make further headway by considering the placed deposit itself as an agent (§9.1.2). In a scientific Western paradigm, inanimate objects by definition cannot have intentions. They may be perceived to have intentions in other worldviews, however. In terms of engendering action, then, they may be as effective as human agents. Gell classifies inanimate objects as 'secondary' agents because their agency is derived from human 'primary' agents (Gell 1998: 17–21). As will be discussed, placed deposits of certain animal remains may have been perceived to have active power over people and things by virtue of possessing animistic forces (§10.1). Gell also admits, however, that the agency of objects can transcend that intended by human agents (*ibid.* 16). In such cases, it is possible to argue that the objects are operating with intentions that are effectively autonomous (Gosden 2011: 1008). This may be seen, for example, in the agency artefacts can effect on each other. Gosden has argued that the world of artefacts, particularly when considered in groups, has a logic that transcends that of their human makers; for example, styles may be seen as reproducing and evolving in ways determined in an important sense by the corpus of objects itself, and not according to human design (*ibid.* 194–196). It is easy to imagine that a placed deposit, deemed for whatever reason to have been particularly effective at achieving a certain purpose, might influence how future placed deposits are made; as people try to emulate the first placed deposit, it in effect reproduces itself. Placed deposits might

inherit characteristics from more than one previous placed deposit, in a kind of 'sexual' reproduction. Through such processes entire classes of placed deposits could eventually be engendered.[98] It might be possible for placed deposits to operate an effectively autonomous agency on people as well, for example as they walk over placed deposits in entrances and doorways. The discussion that follows only begins to explore placed deposits as 'primary' agents, but it may prove to be an exciting direction for further inquiry.

9.1.3 Placed deposition and 'ritualization'

It has so far been observed that 'ritual' and 'functional' aspects of action, as distinguished in the modern Western mind, may be inseparable in the actor's worldview; as Brück argues (1999*b*), they are not even two sides of a coin (*ibid.* 325), but one and the same thing. Placed deposition, as action, is performed with intention, and its form is both situationally specific and strategic (Bell 1992: 81–82). It is possible to determine some of the circumstances in which placed deposition was performed from the patterns of placed deposition identified in the previous four chapters, and thus to infer purpose in those circumstances. Even though placed deposition might involve elements that a modern Western observer would regard as superfluous to achieving the intended result, it is very likely that the person performing placed deposition perceived those elements as both effective and integral to the action. That does not mean that those elements are not worth examining. On the contrary: by inferring the rationality behind some of the characteristics of placed deposits archaeologists can gain insight into the Anglo-Saxon worldview.

---

[98] Such processes are more likely to occur if placed deposits are performative rather than prescriptive actions (*cf.* Bell 1992: 41–42). The idea that placed deposition could engender further placed deposition through such processes resembles the more general idea of ritualization (*ibid.*; see below). Could the independent agency of emerging ritual forms be the force driving ritualization?

Building upon Bourdieu's theory of practice, which holds that human beings at the same time symbolically structure and are structured by the material world in which they live (e.g. Bourdieu 1990 [1980]), Bell has developed the idea of 'ritualization' as a special kind of practice that, by its very performance, distinguishes itself from other kinds of practice (Bell 1992: 88–93). The kinds of activities that are ritualized are the ones that need distinguishing from other, less distinctive practices; in other words, ritualization is an indicator of the importance that a group places on that particular activity (Gosden 2011: 1014). In a rural settlement, these might paradoxically include everyday activities, since these are the actions upon which subsistence depends. Indeed there are numerous examples from European prehistory of the 'ritualization' of domestic activities (Bradley 2003, 2005). Without worrying too much if placed deposition is 'ritual', it is useful to think of it as to some degree 'ritualized'.

Following on from Bourdieu's theory of practice, the practice of ritualization produces, and is produced by, ritualized people.[99] A corollary of this argument is that ritualization both draws upon and creates the worldview in which people view it as an effective action. As a ritualized action, placed deposition is strategic, but only in the paradigm of the structured/structuring society in which it takes place. Once the intention of placed deposition has been inferred, it is possible to look again at the characteristics of placed deposits in order to infer elements of the paradigm under which it could rationally be thought effective (Brück 1999*b*).

In the worldview of the actor, every characteristic of the activity has a functional purpose and contributes toward achieving the objective. To attempt to educe worldview on the basis of one deposit or a single characteristic, however, would be unreliable. As

[99] *Cf.* Ritualized 'bodies' (Bell 1992: 93).

with determining the intentions behind placed deposition, recurring patterns of placed deposition provide the surest grounds for inferring aspects of Anglo-Saxon worldview.

9.1.4 Summary

The thoughts above have only begun to develop theories of action, agency, practice, and ritualization with respect to placed deposition. There is scope for a much more thorough treatment of these ideas in understanding this particular type of ritualized action, which is so conducive to archaeological analysis. For the present (essentially empirical) study, however, what has been said so far will provide a foundation for discussing the patterns of placed deposition in the light of other scholarship, in order to understand the intentions of placed deposition and their rationality within an Anglo-Saxon worldview.

9.2 Placed deposits and settlement structure

In Chapter 6, placed deposits were analysed in terms of their spatial distribution within settlements, and over a third (55 out of 151) of all placed deposits were associated with spatial boundaries. Chapter 7, on the other hand, focused on placed deposits made at, during, or as parts of events forming temporal boundaries between phases of a building's or settlement's 'life history' (*sensu* Binford 1968: 21–22; Schiffer 1987: 13ff.; LaMotta & Schiffer 1999). These are more difficult to quantify, since any depositional event could potentially mark a temporal boundary, but 81 placed deposits firmly associated with the termination of features were identified, with a further three deposits potentially associated with the construction of features. Combined, at least 119 placed deposits were associated with liminal places and/or liminal times (20 were associated with both), representing 79 per cent percent of all placed deposits identified in this study.

As already argued in Chapters 6 and 7, this prevalence is not an artefact of formation processes or methodology; two-thirds of placed deposits were found in pits, postholes, and other contexts that were not associated with liminal places, and nearly half of placed deposits were in specially dug pits or the middle fills of features, contexts that have not been identified as liminal times.

But to what extent does it make sense to count liminal places and liminal times together, and what if any significance does liminality have for understanding the placed deposits themselves, their role in a given settlement, and the spatial, temporal, and social structuring of Anglo-Saxon settlements in general? The first task of this section is to show that spatial and temporal liminality can be treated as subsets of a more general phenomenon of 'liminality'. The impact liminal placed deposits have in structuring settlement space and time is then discussed. Finally, by analysing the patterns of placed deposits in liminal places and times, some features of the spatial and temporal structure of early and middle Anglo-Saxon settlements are identified and considered in conjunction with evidence obtained from other scholarly research.

9.2.1 Boundaries and liminality

Societies impose order on their environment by erecting boundaries (Zerubavel 1991; Ashford *et al.* 2000: 474; Kooyman 2006: 425). Boundaries may take physical form, such as walls, fences, and ditches that organize space in settlements and in the wider landscape. Societies also construct boundaries to organize time: age thresholds between stages of the lifecycle, divisions in the solar and lunar cycles, events in a historical chronology, and so forth (Ingold 1993: 157). 'Boundaries' in space and time are related in more than just a metaphorical or analogous sense. Their connectedness

merits a brief consideration of two points, in order to justify a discussion of 'liminality' as a characteristic of placed deposits.

First, most social 'domains' (Ashford *et al.* 2000: 474) have both spatial and temporal boundaries, which may be closely related. 'Places' are constructed, exist, and are bounded not just in space but in time as well (Bailey 1990: 27). Houses, for example, are not static or eternal places, but transient features with a beginning, an end, and important boundaries in between: a house is built, lived in, repaired, added to, and abandoned or demolished (Gerritsen 1999*a*: 81). Likewise, events and periods of time are often restricted spatially; for example, a wedding is an event in time, but it takes place at a particular venue, usually of a certain type. It can be difficult to distinguish places from periods of time. In our society, 'work' is both a time of day and a location, delimited by spatial and temporal boundaries crossed in 'the commute' (Ashford *et al*. 2000).[100] In this case, the same boundary can be argued to be both spatial and temporal.

In the second place, crossing both spatial and temporal boundaries is sometimes accompanied or accomplished by rites of passage (van Gennep 1960 [1909]). Whereas crossing spatial boundaries may involve 'territorial' rites of passage, other rites of passage attend the crossing of temporal boundaries, even though they might not be overtly recognized as such. Rites of passage that accompany birth, 'coming-of-age', death, and so forth enable the crossing of temporal boundaries constructed in and around the human lifecourse. Festivals attached to the changing of the seasons or the solar and lunar cycles relate to calendrical boundaries. Even rites of passage such as marriages, initiations, ordinations, and other transformations in social identity that do not simply

[100] Both spatial and temporal boundaries can be thought of as manifestations of more conceptual 'social boundaries' that are constructed by a society and in turn organize that society and its perception of the world. Social boundaries demarcate social 'domains' (Ashford *et al.* 2000: 474), which cannot be totally mapped in spatial or temporal dimensions (Corsín Jiménez 2003). Nevertheless, because people live in the natural world, the crossing of social boundaries necessarily happens at particular places and times (*cf.* Turner 1980: 159) and, therefore, can be identified with spatial and/or temporal boundaries.

depend on age or season still involve crossing a temporal boundary, in the sense that *after that time* the individual has a new social identity, and the old identity may be erased forever (Turner 1980: 158).

Discussions of liminality in anthropology and archaeology ultimately derive from van Gennep's recognition that both territorial and social rites of passage often comprise three phases: separation from the original place or social identity, transition through a liminal zone or stage, and incorporation into the new place or identity (van Gennep 1960 [1909]: 11; Turner 1980: 160). Thus spatial and temporal boundaries, which demarcate socially constructed places and times, may be viewed as places and times in their own right: in-between zones that are separate and distinct from the ones the individual is leaving and entering. Ethnographic evidence attests that liminal places and times are often perceived as full of possibility or confusion and therefore vulnerable, dangerous, or potent (e.g. Turner 2008 [1969], 1980; Westerdahl 2005; Kerns 2010). Rites of passage are sometimes performed to mitigate liminal danger, or to realize liminal potential (Turner 1980). Placed deposits made at liminal places and/or liminal times may be part of that process.

Liminal places and times are linked by more than just metaphor or liminality as an analytical construction. Although Chapters 6 and 7 have treated spatial and temporal boundaries separately, the distinction between space and time made in modern Western scientific thought cannot be universally applied to social boundaries: spatial and temporal boundaries may be closely identified and crossed together. To the extent that placed deposits at liminal places and times may have mediated rites of passage across social boundaries, it makes sense to consider them together.

9.2.2 Placed deposits in liminal contexts

The analyses of Chapters 6 and 7 have shown that placed deposits are predominantly associated with liminality in Anglo-Saxon settlements. Nearly 80 per cent of deposits were placed in recognizably liminal contexts: either at spatial boundaries within the settlement, or at temporal boundaries in the lifecycle of settlement features. It is likely that others were placed at liminal times as well, but that the liminality is not apparent in the archaeological record. Because placed deposits are so often associated with liminal places and times in Anglo-Saxon settlements, and in a patterned way (Chs 6, 7), they stand to contribute to discussions of the spatial and temporal structure of Anglo-Saxon rural settlements.

The discussion that follows employs three considerations regarding liminal placed deposits in the structuring of settlements. The first involves the relationship between the spaces and times on either side of a spatial or temporal boundary. A boundary distinguishes between two zones, which may reflect opposed, even antagonistic ideals (Turner 1980: 158; Westerdahl 2005: 3). The composition of placed deposits in liminal places and times may relate to the nature of such oppositions. Archaeologists, inspired by Bourdieu's application of his theory of practice to the Kabyle house (Bourdieu 1990 [1980]), have considered how standardized architectural forms of buildings and settlements may have embodied (and recursively generated) past societies' structuring oppositions (e.g. Hodder 1990).[101] It is likely that some placed deposits at spatial and temporal boundaries served to mark or reinforce distinctions between the practices and groups associated with either side of the boundary. The temporal structuring of settlements and structures has received less attention (Bailey 1990). Nevertheless, some

[101] This approach has been taken a step further with respect to Iron Age roundhouses, which have been interpreted as symbols of and mnemonics for Iron Age cosmology or worldview (e.g. Parker Pearson & Richards 1994; Parker Pearson 1999), but interpretations can be taken too far: it must not be taken for granted, for example, that one set of oppositions necessarily implies another (Pope 2007: 209–210).

studies have linked placed deposits with liminal events or times in an attempt to understand the lifecycle of buildings and its relationship to their inhabitants (Brück 1999*a*; Gerritsen 1999*a*) or the structure of the annual subsistence cycle (Barrett 1989; Cunliffe 1992; Cunliffe & Poole 1995).

Second, the perceived nature of the liminal place/time itself must be considered. Located at the interface of spaces and times that have come to embody, through practice, the often binary oppositions that in turn structure society, liminal zones are often perceived as 'area[s] of confusion' (Leach 1977: 168; Hingley 1990: 100). The ambiguity inherent in liminality has been perceived in a variety of ways.[102] Liminal places and times can be powerful, but they can also be vulnerable. This combination may be dangerous (Brück 1999*a*: 153), but at the same time it endows liminal places and times with unique potential. Using a linguistic analogy, Turner puts liminality in the subjunctive mood: it is 'not yet settled, concluded, known' (Turner 1980: 157, 165). Placed deposits can interact with the ambiguity of a liminal zone by affecting the ultimate outcome of crossing a spatial or temporal boundary. For example, it has been suggested that deposits placed at the closure of disused Iron Age seed storage pits were intended to ensure the success of the crop (Cunliffe 1992; Cunliffe & Poole 1995). The composition of placed deposits at liminal places and times could also embody the perceived nature of the liminality. Rubbish, perceived by some groups as dangerous or unclean because it is in the transformative process of deterioration, was often disposed of at boundaries in the Bronze Age, perhaps because the boundary itself was considered dangerous or transformative (Brück 1999*a*: 153).

The third consideration is what kind of agency placed deposits in liminal places and times exercised. Boundaries divide space into places and time into periods, and in

[102] Van Gennep (1960 [1909]: 18) characterized this ambiguity as 'sacred' with respect to the neighbouring zones, explaining the need for rites of passage, but it has been argued that it is better to avoid relying on ritual: functional or sacred:profane dichotomies in order to understand placed deposition (§9.1).

some cases placed deposits may have helped to construct, reinforce, or mark those divisions. Placed deposits made not at entrances but at other locations along spatial boundaries are perhaps best interpreted in this way (*contra* van Gennep 1960 [1909]: 17). On the other hand, boundaries are also interfaces where opposed places and time periods come together and interact (Gardner 2007; Sapwell & Spry-Marqués 2010: 2). Entrances (gates, doorways, causeways, etc.) are specifically constructed to allow an individual to cross back and forth between separate spaces. Sometimes the entrance is thought not only to allow transmission, but also to accomplish it (*cf.* van Gennep 1960 [1909]: 21–22). By mediating the crossing of spatial boundaries, entrances are not just liminal places but also 'liminal agents' (Turner 2008 [1969]; Westerdahl 2005: 3; see §9.1.2). Rites of passage perform the analogous function at liminal times. They can be envisioned as temporal entrances, mediating transmission from one temporal period to another, but only in one direction: once the boundary is crossed, 'the initial state is irrevocably destroyed and the new state constituted' (Turner 1980: 158, 164–165). Placed deposits made at entrances and during rites of passage might likewise act as liminal agents, enabling individuals and things to cross spatial and temporal boundaries. At the same time, placed deposits may act as obstacles, mitigating the vulnerability of entrances; or in rites of passage, preventing a return to the previous time or state. Viewed in this way, placed deposits exercise significant agency in structuring and transforming space and time within settlements (Kerns 2010: 117–118). Again, the composition of placed deposits could reflect the nature of their agency. Materials in a state of transformation or of ambiguous nature are often associated with liminal places. The disposal of decomposing rubbish at Bronze Age boundaries has already been mentioned. Dogs and horses, prevalent in Iron Age placed deposits, may have been perceived to exist in a liminal state between culture and the wild, due to training or taming (Hill 1995: 102–108). The

ambiguous or mutating nature of such material might have been considered important to its mediating role, either enabling or subverting transgression of the boundary.

Employing the characteristics of liminality treated above, the rest of this section discusses placed deposits at liminal places and times in relation to the zones on either side of the boundary, the perception of the boundary itself, and the role of the deposit in marking, constructing, and mediating that boundary. The discussion treats the early Anglo-Saxon and middle Anglo-Saxon periods separately, in each period starting at the house and household level and then expanding outward to take in the structure of the overall settlement and larger community.

9.2.3 Spatial and temporal structure: early Anglo-Saxon settlements

As discussed above, standardized architectural forms may be structured by, and in turn structure, practice (Bourdieu 1992 [1980]). For example, the typical structure of Iron Age roundhouses has been interpreted as an embodiment of the inhabitants' cosmology and a mnemonic for their social structure (Fitzpatrick 1994; Parker Pearson & Richards 1994; Parker Pearson 1996, 1999), though this interpretation has its critics (e.g. Pope 2007; Webley 2007). Placed deposits can mediate architectural structure. In the roundhouse example, placed deposits at the entrance reinforce its pivotal role in the structure and the importance of the building's orientation, while others at the rear of the structure establish or highlight the importance of the building axis (Woodward & Hughes 2007). Similar spatial patterning of placed deposits has been noted for Bronze Age roundhouses (Brück 1999*a*).

The ground plans of early Anglo-Saxon earthfast buildings exhibit considerable uniformity in terms of layout, orientation, and symmetry (James *et al.* 1984; Marshall & Marshall 1991; Hamerow 1999, 2011). Notwithstanding frequent irregularities and

incompleteness of ground plans, earthfast buildings were usually east-west oriented and based on a 'two-square module': rectangular buildings with opposed entrances in the centres of the long walls, sometimes with a subdivided internal compartment at one end (usually the east), and/or a third entrance centred in the short end. The architectural importance of the long and short axes is emphasized by the pairing of posts across the axes, providing structural symmetry across both axes (e.g. Hamerow 1999: figs 1, 2; 2011, fig. 1; but see also Leahy 2003: 43). Entrances were sometimes highlighted architecturally with substantial doorposts (Hamerow 2011: 140). This recurring emphasis on orientation, symmetry, and entrances might have generated from and in turn generated structuring oppositions in Anglo-Saxon society (*ibid.* 138).

Placed deposits might be expected to have played an active role as agents in that process. Only four placed deposits, however, three of them late 6th or 7th century, were associated with early earthfast buildings of this type. Both pit 6 at Cowdery's Down and grave AX at Yeavering lay outside doorways in the end walls, on or close to the long axis, emphasizing its symbolic and/or structuring role. Furthermore, free-standing posts were located outside of both entrances, on the building axis. The 'skull stack' in building D2 at Yeavering and posthole 2991 at Spong Hill were both near entrances but not clearly associated with them. All that can be said on the basis of so few examples is that placed deposits at entrances strengthen suspicions that the proportions, orientation, and symmetry of earthfast buildings had social and/or symbolic significance.

The significance of building axes and entrances is further signalled by alignments of multiple buildings, especially at high-status settlements, also dating to the late 6th or 7th century. Axially aligned buildings are notable at Yeavering, Cowdery's Down, and Chalton (Hope-Taylor 1977; Millett with James 1983: 247, fig. 31; Addyman *et al.* 1972: 17–19). Grave AX lies on the axial alignment at Yeavering; this is also the axis of

building A4, however, and the grave could refer to either or both. Orthogonal alignments of buildings on the axes of small rectangular fenced enclosures at Cowdery's Down, Foxley, and Chalton, would have been conducive to formalized or ritualized procession, connecting the interior spaces of the buildings to each other (Reynolds 2003: 104–106, fig. 2). Placed deposits have not been found associated with the entrances or on the axes of these building groups, however. Overall, the role of placed deposition in constructing or maintaining building axes and alignments of multiple buildings appears to have been limited.

Although the shapes of SFB pits range from rectangular to vaguely oval, their associated postholes indicate that SFBs were rectangular buildings structured on a single long axis. Placed deposits in the axial postholes of SFBs C18 at Cowdery's Down, Building H4 at Hammersmith, and House XVII at Sutton Courtenay possibly reinforce the axis's symbolic importance, but there are likewise numerous placed deposits on the bases of SFBs that do not lie on the building axis. The building axis is obviously important architecturally, although the extent to which SFB superstructures actually relied on the axial posts has been questioned (Tipper 2004: 93). Placed deposits of lead discs or rings were found associated with the corners of SFBs at Barton Court Farm (sunken hut 1190), Berwick Ponds Farm, Gamlingay (Building 7), and Mucking (*Grubenhäuser* 93 & 108); in Gamlingay Building 7, a lead ring was also found in an axial posthole. The placed deposits provide some indication that the corners of SFBs may have been symbolically important as well, but uncertainty as to the function of the lead discs or rings outside of placed deposits impedes further interpretation (Blackmore 2008: 205).[103] Although there appears to be a regional concentration of these placed deposits in the Thames valley, this merely reflects the overall distribution of lead discs or rings as currently understood

[103] Differences in the arrangement and distribution of lead rings or discs and loomweights in placed deposits argues they were not viewed analogously in placed deposition (§7.5.2).

(*ibid.*).[104] There is little evidence for entrances of SFBs (Tipper 2004: 81–84), and no placed deposits associated with SFB entrances have been found.

Placed deposits appear to have been important in the temporal structuring of early Anglo-Saxon buildings, particularly SFBs. Seventy-five placed deposits were associated with the destruction and backfilling of SFBs. In particular, loomweights were disproportionately associated with the destruction of the building, and complete or semi-complete pottery with backfilling the pit (Ch. 7). These deposits were made at the temporal boundary between the use-life of the building and the restitution of the land on which it lay. There are numerous ethnographic examples of the 'life history' of buildings (*sensu* Binford 1968: 21–22; Schiffer 1987: 13ff.) being recognized and to a greater or lesser extent anthropomorphized by societies (Parker Pearson & Richards 1994), and of rites of passage being performed at liminal times in a structure's 'lifecycle' (Brück 1999*a*; LaMotta & Schiffer 1999). There is furthermore considerable evidence that such a tradition existed in places in northwest Europe, at times ranging from the prehistoric period through the early medieval period (e.g. Brück 1999*a*: 154; Gerritsen 1999*a*; O'Sullivan & Nicholl 2010: 73–76). Considering the placed deposits in SFBs in this light, it is possible that a 'life history' was ascribed to SFBs in the early Anglo-Saxon period. Placed deposits on the bases of SFBs, which are stratigraphically more closely associated with destruction than with backfilling, can be read as traces of a rite of passage in the lifecycle of the building that is analogous to a mortuary rite (*cf.* Gibson with Murray 2003: 210). It is even possible that the materials in these placed deposits were analogous to grave goods in human inhumations.

Some deposits of loomweights appear to have been deposited or abandoned on the base of the structure before the SFB was deliberately destroyed by fire (§7.5.1).

[104] The placed deposits of lead rings or discs in SFBs at Gamlingay and Lyminge represent conspicuous outliers. This may indicate that the known distribution of lead rings or discs is inaccurate, but if they really are concentrated in the Thames valley, it adds to the significance of these placed deposits.

Ethnography attests that the lifecycles of anthropomorphized buildings are often directly linked to the lives of their inhabitants. In some cases the death of an inhabitant requires the deliberate destruction of the building (Brück 1999*a*: 153–155; LaMotta & Schiffer 1999: 23–24). It seems unlikely, however, that the lifecycles of particular SFBs were linked to the lives of particular individuals. SFBs were probably not dwellings but ancillary structures, constructed and used for a variety of tasks, perhaps by a household. Nevertheless, the possibility that the deliberate destruction of SFBs may have been undertaken upon the death of an individual in the household can still be speculated upon. Considering the lack of evidence for ranking between households in early Anglo-Saxon settlements, richly furnished inhumations in contemporary cemeteries have been suggested to represent important members within the household (Scull 2009: 424). The destruction by fire of an SFB would have been a conspicuous display that might likewise have helped construct social status within a household upon such a person's death (*cf.* cremation: Williams 2005). Alternatively, the deliberate destruction of an SFB and the deliberate placement of material inside it might have been a response to a sudden or distressing death in the household. A similar motivation has been proposed for some deviant burials in the same period (Reynolds 2009).

On the other hand, the deliberate destruction of an SFB may have been related to the structure itself, or to the activity or activities for which it was used. Considering the strong correlation of loomweights with placed deposits made at or during the destruction of SFBs and the likelihood that at least some SFBs were used for weaving, this is perhaps a more likely scenario. Placed deposits of loomweights in SFBs will be considered in terms of weaving's associations with women below (§9.3.2), and in conjunction with weaving as a transformative technology in the next chapter (§10.3.2).

Placed deposits made during the backfilling of SFBs might have served to decommission the area where the building once stood. SFBs were probably short-lived relative to earthfast structures and were usually replaced rather than repaired (Hamerow 2011: 151), yet later buildings relatively rarely intercut earlier ones, even in areas of dense occupation (Hamerow 1993: 86). It seems that an effort was made to remember and avoid the locations of previous buildings, in a way that brings to mind the lack of intercutting graves in early Anglo-Saxon settlements.[105] Such an effort may have been required for sanitary reasons, since SFB pits were probably often backfilled with material from surface rubbish (*cf.* Gibson with Murray 2003: 210), but the apparent effort taken to avoid the footprints of previous buildings could also support the idea that an anthropomorphized 'life history' was ascribed to SFBs.[106] Either way, placed deposition during the backfilling of SFBs could have acted as a 'technology of remembrance' to create a social memory of where SFBs once stood (*cf.* Jones 2003).

At the same time, placed deposits made in SFBs might have helped to restore the ground for other kinds of use. The material for backfilling SFBs and pits often comes from surface rubbish deposits (§3.2.2; §7.2). Perhaps because middened material was frequently used as fertilizer, middens are sometimes considered to be 'stores of fertility' (Parker Pearson 1996: 126). The placed deposits and the rubbish material might be attempts to regenerate the settlement land (*cf.* Turner 1980: 164, 165). Similarities in the stratigraphy and composition of placed deposits in SFB pits and in other reused pits (particularly the prevalence of cattle and horse skulls: §7.5.2), suggest that this process was related not to the building *per se* but to the backfilling process. It is not clear exactly what future use placed deposition enabled. Some SFBs may have been reused for

[105] The 'wandering settlement' phenomenon may also have facilitated this to some extent (Hamerow 1991).
[106] The deposition of 'decaying rubbish' (Gibson with Murray 2003) in SFBs would not be incompatible with this suggestion if it helped to prevent rebuilding on the same ground.

industrial activity, after subsidence formed a hollow (Tipper 2004: 106), but only one placed deposit has been identified in an SFB reused for industrial activity (§7.5.3).

Only one placed deposit can be tentatively associated with the destruction of an early Anglo-Saxon earthfast structure. The set of loomweights deposited in posthole 2991, one of a pair of non-structural postholes within a building at Spong Hill, was obviously deposited immediately after the post was removed, but whether those events were related to the abandonment or destruction of the building, like deposits of loomweights in SFBs, is unknown. The excavator interpreted posthole 2991 and its companion as emplacements for a loom; if so, the placed deposit of loomweights may relate to the decommissioning of the loom, not the building (§10.3.2). In any case, no other placed deposits associated with the destruction of earthfast structures have been identified in early Anglo-Saxon settlements; nor have any unambiguous foundation deposits associated with either SFBs or earthfast structures been found (§7.5.5).[107] If ritualized activities took place at these liminal times, they have not left an archaeological trace.

Aside from grave AX lying on the settlement axis at Yeavering, placed deposits in liminal contexts add little to our understanding of spatial or temporal organization at the overall settlement/community level in early Anglo-Saxon settlements. Most early Anglo-Saxon settlements lacked defining boundary features, except for prehistoric and Roman earthworks that were appropriated (or merely respected) as delimiting or focal elements at a few settlements (Hamerow 1993: 86, fig. 51; Lucy *et al.* 2009: 37). Even at one of the few early Anglo-Saxon settlements that shows substantial stability and organization, West Heslerton (Powlesland 1990, 1997, 1998), the published preliminary reports do not

[107] Several cattle skulls were found in the foundation trenches of a sub-Roman building at Frocester Court, Glos., and appear to have been either foundation or termination deposits (Price 2000; Reynolds 2006). As this phase of the settlement preceded the earliest morphologically Saxon phase (Reynolds 2006), this placed deposit was not included in this study.

reveal evidence for placed deposits playing a role in marking, creating, or sustaining overall settlement spatial structure.[108]

Summary

Placed deposits appear to have been used in the early Anglo-Saxon period to structure settlement space and time primarily on a household scale. Spatially, placed deposition interacts with the architecture of individual earthfast structures and SFBs in terms of building axes and walls. Temporally, the scale of placed deposition is that of the use-life of SFBs. It has been suggested that ritual activity is often linked to the cycles of domestic life (Barrett 1989). If that is true of placed deposition, then in the early Anglo-Saxon period, the individual building and its lifecycle seem to have provided the scale and rhythm for settlement structure. That would be consistent with the established model of wandering settlements for the earlier period.

An emphasis on termination deposits over foundation deposits has also been noted (Ch. 7), though the latter might have been of a form that is difficult to detect archaeologically. The importance attributed to endings, however, may be compared to the themes of transience, mortality and loss, written about in later Anglo-Saxon literature, especially in elegiac poems such as 'The Ruin', 'The Wanderer', and 'The Seafarer', and of course in *Beowulf*.

9.2.4 Spatial and temporal structure: middle Anglo-Saxon settlements

In the 8th and 9th centuries, buildings were more varied in form, and although they were still basically rectilinear, symmetry was not as strictly adhered to and orientation was not always east-west (Hamerow 2011: 138). At the same time, entrances continued

[108] Placed deposition does appear to have played a similar role in the destruction and/or backfilling of SFBs at West Heslerton as at other settlements, however, as suggested by the 50 loomweights and burnt planks in the SFB 011AA00005, as well as reported articulated infant remains from other SFBs and deposits of unusual assemblages, including girdle hangers, in pits nearby SFBs (Powlesland 1998).

to be important, with massive doorposts still indicating 'monumental' doorways in some buildings, and increased evidence for the repair or replacement of doorposts (Hamerow 2011: 140, 135). A horse skull and associated bones placed in the door pit of an entrance to the chancel of what appears to have been a timber church at Staunch Meadow, Brandon, reinforce the importance of entrances (and represent placed deposition in a probable Christian context; see §§10.4–10.5). Hamerow points to building A2 at Yeavering, where a sheep or goat's horn was found in a posthole of the south door and ox and boar teeth were identified in the door pit of the internal partitions (Hope-Taylor 1977: 53; Hamerow 2011: 140). Found in an advanced state of decay, these remains could have originally constituted complete or partial skulls, but as disarticulated elements they could not be identified as placed according to the criteria of this study without more detailed information about the deposits (Tab. 4.1; Hope-Taylor 1977: 53). Monumentalization and placed deposition associated with doorways heighten the significance of crossing into the interior of buildings (*cf.* Brück 1999*a*; 153), and important doorways could have been situated so as to control the first impressions of those entering.

Normative burials associated with building walls and minor enclosure ditches, possibly enclosing individual farms (Reynolds 2003: 110–115), help clarify the relationship that buildings and homesteads had to the rest of the settlement and the world beyond. Normative burials show a correspondence with the walls of earthfast buildings and, to a lesser extent, minor enclosure boundaries in the middle Anglo-Saxon period. Building boundaries is one way that groups establish a shared identity (Bowden & McOmish 1987). By burying their dead along the walls of the farmhouse and boundaries of the farmstead, middle Anglo-Saxon households might have been trying to build stronger, more permanent identities as social units. It was suggested above that the burials associated with buildings and minor enclosures might also represent an attempt to

reinforce ties between a kin group and its ancestral landholdings (§6.3.3). High-status 'halls' were central places in a number of ways, serving as outward symbols of lordly authority and foci for feasting, public assembly, acts of patronage, and the administration of justice (Pollington 2010: 101–119). A similar but more modest central role might have been played by the ordinary Anglo-Saxon house in the context of its yard and other landholdings (*ibid.*). Normative burials along the walls of buildings and at the boundary of the homestead may help stake a kin-group's claim not just on the building and farmyard, but on associated landholdings as well.

Patterns of placed deposition made at major settlement enclosure boundaries (Reynolds 2003: 115–119) indicate that a different kind of identity was constructed and embodied at the boundaries of settlements. Major enclosure boundaries would have constituted liminal places at the interface between the settlement and the outside world. This is supported by the association between deviant burials and major enclosure boundaries. In the middle and late Saxon periods, deviant burial treatment was afforded the 'dangerous dead' (Blair 2009) and society's 'others', including not only criminals but also strangers, those with supernatural powers, and social outcasts (Reynolds 2009). Marking the boundaries of the settlement with deviant burials of those who did not fit into the community might have been one way in which the inhabitants of a settlement sought to create a shared identity as a social unit (Bowden & McOmish 1987; Hingley 1990: 96; Brück 1999*a*: 153, 154).

Liminal agents sometimes personify concepts associated with the liminal place or time (§9.2.2). From the perspective of those within the settlement, a settlement enclosure ditch would represent a boundary with an outside world that may have been perceived as dangerous, and deviant burials of the 'dangerous dead' may have expressed that perception. Textual sources from the middle and late Saxon periods portray the outside

world as dangerous and the home as a safe haven. In *Beowulf*, the dangers of the outside world are made incarnate in Grendel as Hrothgar's people seek refuge in Heorot. 'The Wanderer' dreams of the protection of the mead-hall during his wintry and friendless wanderings. Middle and late Saxon legal documents provide corroborating evidence. At least as early as the 7th century, law codes proscribe violence within the homes of all ranks of freemen; from Alfred onward, people could take sanctuary in their homes (like in churches), under the special protection of the king (Lambert 2009: 72–84). Later Saxon laws extend 'the King's peace' to royal roads (Lambert 2009: 97–98), thus providing oases of protection in a dangerous landscape.

Summary

As boundaries became increasingly common in the middle Anglo-Saxon period, a new rhythm was introduced into the temporal structuring of settlements. Enclosures were comparatively stable spatial elements in some settlements. Buildings also showed increasing evidence for repair, extending their use over multiple human lifetimes (Hamerow 2011: 135). Placed deposits made at liminal times in major and minor boundary features may have helped to construct this longer rhythm, for example in termination deposits made in enclosure 2 at Gosberton Third Drove and in the horseshoe-shaped ditch 7330 at Higham Ferrers.

9.2.5 Conclusion

This section has discussed the spatial and temporal structure of Anglo-Saxon settlements using the evidence of placed deposits made in liminal places and times. It is worth reiterating that spatial and temporal boundaries, as physical manifestations of social boundaries, are often linked. Such a link is apparent in the major enclosure boundaries of the middle Anglo-Saxon period, which in spatial terms contribute to the

shared identity of the settlement community, and the construction and backfilling of which temporally bound that community's existence.

One temporal influence likely to have mattered to the inhabitants of Anglo-Saxon settlements throughout the early and middle periods is the subsistence cycle. The rhythm of the changing seasons and the cycles of animal husbandry must have structured time for inhabitants of Anglo-Saxon rural settlements, but there is little evidence from placed deposits to link the rhythm of the subsistence cycle to the temporal structure of settlements in either the early or middle Anglo-Saxon periods. Placed deposits that may have derived from seasonal sacrifice and/or large-scale consumption are discussed in the next chapter (§10.2), but in general they cannot be linked to a liminal time in the life of a structure or boundary. The recent excavation of a plough coulter deposited on the centre base of an SFB at Lyminge, Kent, in the 7th century does put an agricultural artefact in a temporally liminal settlement context.[109] It is also possible, however, that all placed deposits were perceived as 'chthonically liminal' because they were in negative features, penetrating into the underworld (Woodward & Hughes 2007). There is evidence that pits were perceived in such a way in Roman Britain (Esmonde Cleary 2000), and in the Iron Age, placed deposits in disused seed-grain storage pits may have propitiated deities of the earth for the successful germination of the seed grain, and/or for the expected growth and harvest (Cunliffe 1992). A similar interpretation could be made for placed deposits in SFBs that were used for storing grain, and the placed deposits of cattle and horse skulls in negative features might suggest agricultural connections.[110] Unfortunately the evidence

[109] Even if the plough coulter were speculated to have been deposited immediately after ploughing (in early spring; Hill 2011), there is no reason to suspect a causal relationship between the arrival of spring and the destruction of the building. The placed deposition of a ploughshare along with a cauldron chain in a small pit or posthole at Flixborough cannot be shown to have happened at a liminal time.

[110] Although horses were not put to the plough in the Anglo-Saxon period, they are likely to have been put to other agricultural use (Cathers 2002: 203–214).

for grain storage in pits and SFBs in Anglo-Saxon settlements is still too thin to develop this idea further.

9.3 Placed deposits and social structure

This section explores the possibility that some placed deposits may have expressed or related to Anglo-Saxon social structure and identity—particularly in terms of childhood, the family, and gender. Law codes and other documentary sources like *The Fortunes of Men* emphasize the importance of the nuclear family in later Saxon social structure (Crawford 2009: 66–67), but it is uncertain to what extent the primacy of that institution can be traced back into the early and middle Anglo-Saxon periods. Although the fundamental social unit in early and middle Anglo-Saxon settlements was probably the household (Scull 2009: 424–425), it is still not clear what constituted a household, or how family/kin-group structure was otherwise mapped onto settlement structure (*ibid.* 425; Crawford 2009: 66). Placed deposits offer a new source of evidence for addressing such questions. The following discussion considers first burials of children (ages 3–20), then placed deposits linked to gender. Although discussion based on the present limited evidence is necessarily speculative, it can be expected that placed deposits will contribute further to this area of inquiry as more are excavated and recognized.

Placed deposits of infant remains—all of which were neonates—are not considered in this discussion. There were two burials in which a newborn infant was associated with an adult female (burials 3580 and 3706 at Flixborough and pit α at Sutton Courtenay), but the suggestion that these are mothers and babies who died in childbirth remains speculative: the deviant treatment of the Sutton Courtenay pair could be a response to the nature of their deaths (*cf.* Reynolds 2009), but the Flixborough burials

were in separate graves.[111] Other placed deposits containing infant remains showed similar characteristics to placed deposits of other kinds of material, including animal remains (§5.6.4). For example, infants were just one of many content types placed during the backfilling of SFBs and the final backfilling of ditches. The lack of distinction between human infants and animal remains in placed deposits may support suggestions that, in social terms, infants were not perceived as complete people (Crawford 1999: 77). The possibility that some infant remains in placed deposits, even ones made at liminal times in the life of a building or the settlement, could also represent opportune or surreptitious disposal cannot be ruled out.

9.3.1 Children: home and family

Placed deposits have little to contribute to our understanding of what it was like to be a child in early and middle Anglo-Saxon England (for that, see Crawford 1999). No placed deposits made by children or containing objects particularly related to childhood have been identified as such, although the possible agency of children in performing placed deposition should not be dismissed out of hand. Burials of juveniles (3–11 years old) in settlement contexts, however, exhibit patterns that may express one role children played in society: namely, constructing social identities of home and family.[112]

It has been argued that normative human burials in middle Anglo-Saxon settlement contexts were primarily associated with the house and the homestead, and likely represent attempts to reinforce household and/or kin group identity, as well as claims not only on the house itself but on the larger ancestral landholdings in a period when control of land was increasing in economic and social importance (§6.3.2). Six out

[111] The skull fragments in grave 3843 at Yarnton belonged to subadults, i.e. individuals less than 16 or 17 years old (Boyle *et al.* 2005: 205, 206, 207). Thus they may have belonged to infants, juveniles, or adolescents. In any case, their placement below the prone burial of an adolescent does not appear to evoke a kin relationship.

[112] For the choice of these age ranges, see §8.1.2.

of eight normative burials associated either with building walls or minor enclosures contained the remains of juveniles or adolescents.[113] This is a strikingly high proportion, particularly considering the predominance of adults in excavated cemeteries near to three of the settlements in question (§8.6.2). Why did kin groups disproportionately choose to stake their claims on ancestral landholdings with the burials of juveniles and adolescents?[114]

It was suggested in Chapter 8 that children might have been identified with the home in middle Anglo-Saxon society. We must be wary of projecting onto the past modern tendencies to assign domesticity to certain family roles. There is ample evidence, however, that in Anglo-Saxon society children were critical to forming families, and associated with the family and the home. That children were required to make a marriage legally binding is suggested by the late 6th-century law 81 of Æthelbert of Kent, which permits a wife in a childless marriage to divorce her husband and return to her parents' home (Crawford 1999: 57). Later Saxon documentary sources emphasize the importance of the nuclear family with children at its core (Crawford 2009: 66–68). Children were expected to reside with their parents until they married, while those who did not marry continued to live at home, as illustrated by the Anglo-Saxon word for bachelor (*hægsteal*), which literally translates to 'home-stayer' (Crawford 1999: 107). If burials associated with earthfast structures and minor enclosures were intended to lay claim to ancestral landholdings, then the selection of juveniles and adolescents for such burials, in

[113] These juvenile and adolescent burials came from only four settlements (Flixborough, Gamlingay, West Stow, and Yarnton), but these were the only settlements to produce normative burials in middle Anglo-Saxon contexts. These four settlements can be argued to represent a wide cross-section of regions and statuses.

[114] Normative burial in settlement contexts cannot be satisfactorily explained away as an alternative method of disposal for individuals excluded from communal cemeteries; see §8.7 for a full discussion. Unlike in the earlier period, juveniles were well represented in middle Anglo-Saxon field cemeteries (e.g. at Gamlingay; Waldron 2005: 243, tab. 21, graph 7). There is little to differentiate the juveniles or the two adults (both women) found in normative burials in settlement contexts from individuals in contemporary cemeteries. The women's skeletons did not exhibit conclusive evidence for severe disability or deformity (§8.6.3; *pace* Crawford 2008: 201). Speculation that the woman contained in burial 3580 at Flixborough was considered 'child-like' (Geake 2007: 115) is intriguing, but cannot be verified.

clear preference to adults, could indicate that children were critical in the middle Anglo-Saxon period not only to marriage as a social unit but also, as 'ancestors', to the social identity of the household and even of the larger kin group.

9.3.2 Gendered deposits?

The deposit type with the strongest case for a gendered association is placed deposits of loomweights, for three reasons. First, weaving and other phases of textile production were strongly identified with women in Anglo-Saxon society. Documentary sources including poetry, riddles, and illustrations portray women spinning and weaving, and numerous Anglo-Saxon epithets for women refer to textile production. When objects associated with textile production such as spindle whorls and weaving battens appear as grave goods it is typically in female burials (Lucy 1997; Stoodley 1999*a*, 1999*b*). Second, placed deposits of loomweights are both numerous and consistently patterned in terms of context. The 34 placed deposits containing loomweights is greater than for any other content type except complete skeletons (Fig. 5.2), and 28 of them were on or near the base of an SFB, indicating that they were abandoned or deposited at the time the building was destroyed (§7.5.1). This suggests that a consistent intention governed these placed deposits. Third, many of these placed deposits contained clusters or lines of loomweights, indicating that entire stores of weights and/or complete looms were abandoned or deposited; for example, a site photograph of the SFB at Dover shows what appears to be five lines of weights and charred remains from a loom on the base of the pit (Philp 1976: fig. 4; *cf.* Leahy 2003: fig. 33).

Considering the strong links between women and weaving, loomweights (and possibly complete looms) may have been selected for deposition in order to express feminine gender. If so, it is notable that the object chosen to express gender,

loomweights, is one that almost never appears in Anglo-Saxon furnished burials (Lucy 2000). Crawford (2010) has suggested loomweights were not included in graves because, unlike spindle whorls and other spinning and weaving tools that do turn up in graves, loomweights show little variation in style, are not easily portable as a set, and may not have been considered personal items because weaving was a communal activity.[115]

The association of loomweights with SFBs is easier to understand. It has long been suspected that one of the activities that took place in SFBs was weaving. Somewhat circumstantial is the notable frequency with which artefacts associated with textile production are found in the fills of SFB pits. Since most SFB fills likely derive from nearby sources including surface rubbish deposits (§7.2), most artefacts found within the fills of SFBs are likely to be secondary or tertiary refuse (Tipper 2004). Small postholes and/or grooves in the bases of some SFBs have sometimes been identified as possible emplacements for looms (e.g. Jackson *et al.* 1969: 210; but see Mudd 2002: 52). Most convincing, however, are the placed deposits of loomweights themselves. Although the loomweights/looms deposited in SFBs may not have been used in the building, the sheer strength of the association between artefact type and context type implies some connection between the two. Considering that 25 of the 45 placed deposits on the bases of SFBs, and therefore made prior to backfilling, contained loomweights (§7.3.2), and that placed deposits of loomweights were found in almost no other context types, it is hard to escape the conclusion that, in this case, the decision to deposit or abandon loomweights or whole looms in SFBs related to the use of the building for weaving.

It is interesting that these deposits were consistently located on the bases of SFBs, and therefore were probably either abandoned *in situ* or placed in the building before its destruction, which in some cases may have been deliberate (§7.5.1). It has been

[115] Loomweights decorated with stamps have been found at some sites (Leahy 2003: 71), but the purpose of the stamps is not known.

suggested above that placed deposits made during the destruction of SFBs mediated rites of passage marking the end of the building's lifecycle (§9.2.3). The expression of feminine gender made at the (?deliberate) destruction of a building used for an activity associated with women could lead to speculation that some SFBs were assigned a feminine gender, possibly relating to their use (*cf.* Knox 2010), especially if the lifecycle of the building was anthropomorphized. Looms and/or loomweights could then be roughly analogous to grave goods accompanying the 'burial' of the building, remembering that much of the superstructure was probably pushed into the pit and then covered with backfill (§7.2).

It must be remembered that placed deposits of loomweights were found on the bases of only 25 SFBs, a small proportion of the total number of SFBs from the 141 settlements that were included in this study. Even though placed deposits of loomweights were consistently made in SFBs at the time of their destruction, this appears to have taken place only under certain circumstances. These circumstances may have been recurring, given the consistent patterning of the placed deposits. It was suggested earlier that one possible circumstance may have been the death of a member of the household (§9.2.3); if so, then the probable gendered associations of loomweights, looms, and weaving could point toward a woman. Alternatively, the circumstances may be more closely related to the building itself or the activity that it had been used for prior to destruction, which (it has just been argued) may have been weaving. If so, it may be relevant that weaving is associated with magic and prophecy in Germanic and Celtic folklore, with some Germanic goddesses portrayed as weavers or attributed weaving implements in both literature and art (Enright 1990: 55–59, 67–68; Leahy 2003: 70). Placed deposits of loomweights are discussed further in relation to these associations in the next chapter (§10.3.2).

Other assemblages of objects with feminine or masculine associations could have been intended to express gender (Hamerow 2006: 19). A possible 'female assemblage' comprising beads, needles, brooch fragments, and a fragment of an ivory bag ring were found the same SFB at Car Dyke, Waterbeach, as a placed deposit of a dog (Hamerow 2006: 19; Lethbridge 1927: 141–143). Because these objects did not form a discrete deposit and their stratigraphic provenances were not reported, they could not be positively identified as placed. It seems significant, however, that the 'female assemblage' comprises all of the artefacts from the SFB besides an iron nail and some pottery; also, the fact that all of the female objects were found at the edges of the pit may suggest deliberate placement (Fig. 9.1). Another 'distinctly "female" assemblage' was recovered from the fills of SFB 12 at West Stow, including beads, a brooch fragment, a girdle hanger, spindle whorls, loomweights, and other weaving equipment (West 1985: 20–22). Again, this was not a discrete deposit, and could not be positively identified as placed. Similar 'female' assemblages might be more common than appears from their small number, due to the difficulty of identifying assemblages not in discrete deposits as placed.

The unstratified find at Flixborough of nesting lead vessels containing a hoard of woodworking tools and a bell could express masculine associations, as could a similar hoard in the corner posthole of a cellared building backfilled in late Saxon Bishopstone, E. Sussex, not included in this study (Thomas 2008). In addition, a concentration of metalworking tools, scrap metal, and slag in the shallow lower fill of Structure 14 at Bloodmoor Hill probably represents debris from smithing, an activity with masculine associations.[116] These deposits might be better interpreted, however, in relation to the

[116] The scrap metal included a key and a fragment of a probable padlock case, objects found in higher status female burials in the small cemetery within the settlement (Knox 2010; Lucy *et al.* 2009: 245, 408).

associations that woodworking, smithing, and other transformative technologies may have had in the Anglo-Saxon worldview (§10.3).

Several placed deposits contained single artefacts that would be associated with one or the other gender in a mortuary context. On the feminine side, placed deposits in *Grubenhaus* 42 at Mucking and an SFB (Room II of House X) at Sutton Courtenay contained brooches, the latter a 5th-century import from lower Saxony (Hamerow 2007: 184); and a set of bone needles, probably strung together, was found on the base of the horseshoe-shaped enclosure ditch at Higham Ferrers, at the eastern terminus (ditch 15165). Only one placed deposit contained an artefact that would have been associated with a male in a mortuary context: a small lead spearhead was placed in SFB 3063 at Prospect Park, Harmondsworth.[117] On the basis of a handful of examples, one can only speculate whether single objects such as these would have carried any gendered associations in a non-mortuary context.

9.3.3 Conclusion

This section has considered the possibility that placed deposition in Anglo-Saxon settlements may have expressed social structure in terms of lifecourse, kinship, and gender. There is little evidence for the expression of other aspects of social structure through placed deposition, with the possible exception of social status. The possibility that the deliberate destruction of SFBs could have been undertaken when a high-status member of a household died has been suggested (§9.2.3). None of the artefacts in placed deposits can be securely tied to high status, but some of the placed deposits of animal remains may have shown high-status associations. In particular, several placed deposits

[117] An iron socketed spearhead and the tip of a double-edged sword blade were found in two separate sections (127 and 564), about 30 m apart, of a probable mid-Saxon boundary ditch at Willingham, Cambs., that contained no other datable artefacts (Fletcher 2008: 8, fig. 3; Crummy 2008: 75–76), but because their stratification is not reported they could not be identified as placed.

of animal bone appear to have derived from high-status consumption or feasting. These deposits are discussed together with other placed deposits of animal remains in the next chapter.

Chapter 10
Placed deposition: worldview and belief

No discussion of placed deposits would be complete without considering their relationship with worldview and belief systems. Even though, as has been discussed, it is probably more fruitful to consider placed deposition as an action carried out in order to achieve a specific intention than as a 'ritual' expression of belief or identity (§9.1), the analyses of the Chapters 5–8 have much to contribute to our understanding of early and middle Anglo-Saxon cognitive systems/realities. Whereas previously cemeteries, place names, and texts have been our richest sources for Anglo-Saxon belief systems, placed deposits provide settlement archaeology with a new opportunity to contribute to Anglo-Saxon 'cognitive archaeology.' As Brück observes (1999*b*), ritualized activity (including placed deposition) makes practical sense in the worldview of those practicing it, even if it is not rationally functional within a modern Western scientific paradigm. By considering the intentions governing placed deposition, it is possible to understand better the paradigm in which they would have been thought practical (§9.1). The goal of this chapter is to discuss how the characteristics and patterns of placed deposits in Anglo-Saxon rural settlements related to the worldviews in which they were deemed effective.

This chapter is thematically structured. It has been suggested that Anglo-Saxon interaction with the animal world will provide the most fruitful inroads to understanding Anglo-Saxon worldview and ideology (Pluskowski 2011). Discussion duly begins by considering the treatment of animals in placed deposits in terms of Anglo-Saxon worldview and cosmology before proceeding to consider placed deposition's potential relationship to concrete practices, ideologies, and systems of belief. The relationship of

placed deposition to each of these topics is therefore considered in turn—not just in pre-Christian contexts, but in terms of Christianity as well. Although this chapter primarily considers placed deposits in terms of a non-Christian worldview, the fact that this study includes placed deposits from the 7th through 9th centuries provides an opportunity to examine how (if at all) placed deposition changed with the conversion to Christianity. It should not be assumed that, as a practice, placed deposition is inherently either pre-Christian or Christian.

10.1 Animals in placed deposits

10.1.1 'Reflexes of shamanism'[118]

Animals—especially wild boar, horses, deer, and predators like wolves, bears, raptors, and predatory fish—recurrently appear in Anglo-Saxon stone carvings, metalwork, literature, and personal names (Glosecki 2000: 4). In recent years, scholars have increasingly interpreted much of this animal imagery in animistic or even shamanistic terms (e.g. Glosecki 1989, 2000; Williams 2005; Pluskowski 2011).[119] The totemic use of animals in personal names, including the names of ancestors in the genealogies of early Anglo-Saxon kings,[120] may have implied that the individual or the family exhibited the characteristics of the animal—or in more animistic interpretations, it may have conferred those qualities on the individual so named (Glosecki 1989: 189). Similarly, there is a growing understanding that animal mounts on shields and helmets were not mere adornments, but performed an apotropaic function by infusing the weapons and armour (and their users) with the ferocity, strength, and stamina of the

[118] Glosecki 1989: 1.
[119] The characteristics of shamanism and animistic beliefs are complex and vary considerably from one society to another, and the reader is referred to other, more complete treatments (Eliade 1989; Glosecki 1989; Price 2002: 233–328).
[120] For example, in the 8th century the kings of Kent were thought to have descended from *Hengest* (horse) (Bede, *HE*: II.5; McClure & Collins 1999: 378 n. 78 '*oiscingas*').

animals (Glosecki 2000; Dickinson 2005). The ambiguous human and animal forms in Style I metalwork evoke complex relationships between animals and men (Leigh 1984; Dickinson 2005; Webster 2011). In some images beasts appear to devour men, while other images transform from men into beasts depending on the orientation, possibly referencing an 'ideology of transformation' (Williams 2001; see §10.3). As recognition of these themes has grown, interesting motivations have been suggested for the use of animals in mortuary contexts, particularly in cremation rites, where both human and animal were burned in the same blaze and their partly commingled ashes buried in the same urn or in close proximity (Williams 2005).

The predominance of animal remains in placed deposits begs the question of whether animistic themes likewise feature in the structure and use of these deposits. In animistic worldviews, the spirit or animistic force of animals is usually thought to inhabit their bodies even after death, and particularly in the hard tissues such as bones, teeth, claws, and horns or antlers, which are the last to decompose (Glosecki 1989: 24; Poole 2010*b*: 240). If similar beliefs prevailed in the early Anglo-Saxon worldview, then animal remains could have been deposited in settlement contexts in order to confer the characteristics of the animal on a particular place or event, or even to apply animistic forces to achieve an objective. Such interpretations seem most likely in placed deposits of wild species, especially predators, boar, and deer, considering their prominence in most of the artistic imagery that has been linked with animistic and shamanistic concepts. It shall be argued, however, that other species in placed deposits might also have been agents of animistic forces, particularly horses and oxen.

10.1.2 Livestock

The frequency with which livestock species were chosen for placed deposits seems to reflect their relative social value rather than their relative abundance in Anglo-Saxon rural settlements.[121] Of the three main livestock species, cattle dominate the animal bone assemblage at some settlements and sheep at others, while pigs usually rank third (O'Connor 2011: 364–367, fig. 20.1, tab. 20.1).[122] These rankings have been read as proxies for the relative population of each species. In placed deposits, however, the species show a different distribution. Cattle remains were found in over four times as many placed deposits as either sheep or pig, which in turn appear in equal numbers (Tab. 5.4). These proportions recall the species' relative values in middle and late Saxon law codes. Ine's 7th-century law codes, for example, allowed a cow to be substituted for five sheep in payment of food rents (Hagen 2006: 92, 94). Other later legal documents likewise set more or less equal values on sheep and pigs, while valuing cattle much more highly (Hagen 2006: 78, 94, 113–114).[123] The relative frequencies of cattle, sheep, and pigs in placed deposits, then, seems to reflect the social value put on each species, rather than their relative populations or slaughter rates.

It appears that a positive correlation existed between the social value of livestock and their likelihood to be chosen for placed deposition. For placed deposits containing skulls and articulated segments, the social value of the animals might have been relevant

[121] Sheep are difficult to distinguish zooarchaeologically from goats (Poole 2010*b*: 26), but most ovicaprine remains from Anglo-Saxon settlements are thought likely to have been sheep. In this discussion, 'sheep' will refer to all ovicaprid remains not specifically identified as goat.

[122] Notable exceptions include Wicken Bonhunt, Brandon, and Nettleton Top, middle Anglo-Saxon settlements that may have specialized in pig rearing (e.g. Crabtree 2007). A recent review of the zooarchaeological data from a representative selection of early to middle Anglo-Saxon settlements found that, in number of identified specimens (NISP), cattle were most frequent overall (101,461), followed by sheep (81,141) and then pig (57,892) (O'Connor 2011: tab. 20.1). This survey included both rural and urban settlements, and NISP as a proxy for population tends to overcount larger species at the expense of smaller ones. The overall conclusion, that cattle and sheep were more similar in number to each other than to pigs, nevertheless stands.

[123] These ratios are only approximate. It should not be expected that the social values of different species remained constant between the early and middle Anglo-Saxon periods. Pigs, for example, are often better represented on higher status and ecclesiastical sites in the middle Anglo-Saxon period, but there are some indications it may have had wider availability in the earlier period (Poole 2010*b*: 155, fig. 3.30)

not just to the placed deposit, but to the large-scale consumption that may have preceded it (§10.2). It is possible that cattle were preferred for feasting because of the amount of meat they provided (Poole 2010*b*: 152)—it may be noted that multiple pigs were present in three out of the six placed deposits, and a large number of sheep in pit B383 at Hartlepool)—but cattle were also a measure of wealth and status in the early Anglo-Saxon period, and may have had symbolic significance as well (Poole 2010*b*: 100; Glosecki 1989: 181; see §10.1.4).

10.1.3 Horses

Horse remains were found in 15 (20%) of the 76 placed deposits containing animal remains, as compared to only a few percent of the overall animal bone assemblage (O'Connor 2011: 364). The proportion of placed deposits containing horse remains is much higher than there is reason to expect, even taking into account the possibility that the actual horse population of early and middle Anglo-Saxon England was greater than the settlement bone assemblage indicates.[124] It was suggested for livestock that a high social value was positively linked to selection for placed deposition. Horses had an even higher social value than cattle in the late Saxon period. In the 10th-century *Ordinance of the Bishops and Reeves*, horses commanded four times the value of an ox and six times that of a cow (Hagen 2006: 78, 185).

Although horse remains were present (albeit in small numbers) on virtually all settlements of all status throughout the Anglo-Saxon period and probably contributed to the rural settlement economy by transporting goods and people (Poole 2010*b*: 180–181;

[124] The settlement bone assemblage mostly derives from animals that were butchered. Although there are exceptions at some settlements (e.g. West Stow, Old Down Farm, and Ramsbury), a general lack of butchery marks on horse bones in Anglo-Saxon settlements corroborates the report in Book II of Theodore's *Penitentials* that horse was generally not eaten (Cathers 2002: 236–240; Hagen 2006: 183, 184–185). Consequently, their remains may not have normally found their way into settlement contexts. The same may be argued with respect to other animals that were not usually eaten, including dogs.

Cathers 2002: 203–214), there is evidence from the middle Anglo-Saxon period that some horses possessed elite and martial associations (Poole 2010*b*: 181–182). Horses buried in or near wealthy male human inhumations, many of which were furnished with weapons, indicate that elites used horses for hunting and battle from at least as early as the 6th century (Fern 2005, 2007). These were usually large, intact males, and a symbolic connection between the aggressive, fecund stallion and the virility of its rider may have been relevant to the association (Poole 2010*b*: 190–191). The elite value of horses is also apparent in the alliterative phrase *meara ond maðma* (horses and treasure), which occurs five times in Anglo-Saxon poetry (Cathers 2002: 43).

Horses were relatively frequent in mortuary contexts in the 5th through the 7th centuries, mainly in the Midlands and East Anglia (Fern 2007: 93, fig. 1). Over 30 horses were found in the elite horse-and-rider burials just mentioned (Fern 2005, 2007). Most of these burials contained complete horses, but four comprised just the head, and one an articulated leg (Fern 2007: 92, 96, 103 n. 9). Horses have been found in far greater numbers in cremation burials, however, with over 200 individuals identified at Spong Hill, where they were the most frequently occurring animal species in cremations (Bond 1994: 121; Bond 1996). They were even more dominant over other species in so-called 'animal accessory' cremations (McKinley 1994: 93; Williams 2005: fig. 3.23).[125] Horses were treated differently than other species in cremations as well. Whereas livestock species were usually represented as partial skeletons—possible 'joints' of meat from funerary meals—a lack of butchery marks and the presence of elements from all parts of

[125] Some cremation burials at Spong Hill, Sancton I, and other cremation cemeteries consisted of a primary cremation urn and a secondary 'animal accessory' cremation (McKinley 1994: 93–94). The primary vessel would contain mostly human remains with a small amount of animal bone. The secondary cremation would consist of mostly cremated animal bone with a small amount of human remains, and would be placed in the same burial, either in a separate vessel or as an unurned cremation around or next to the primary vessel. In some cases, joining fragments of grave goods proved that both cremations derived from the same pyre. In these paired cremation burials, the primary (human) urn was usually well decorated, but the animal accessory urn was comparatively plain (Fern 2007).

the skeleton indicate that most horse cremations incorporated one entire animal, and therefore do not represent food offerings (McKinley 1994: 93; Bond 1994: 123).[126]

The treatment of horse remains in cremations seems more attributable to totemic symbolism than to elite associations (Williams 2005).[127] Horses are widely represented in Anglo-Saxon art and metalwork (Cathers 2002: 254–257). They are the most commonly depicted animal in stamps on cinerary urns (Eagles & Briscoe 1999: 101); in addition horses' hooves comprise a stamp motif on metalwork and pottery (Fern 2007: 100, fig. 6). Mythological connotations are indicated by the two legendary leaders of the Anglo-Saxon invasion, the brothers Hengest and Horsa, whose names are variations of 'horse', and the latter of whom was later claimed as an ancestor of the Kentish kings (Bede, *HE*: I.15, II.5; Cathers 2002: 252–253; Fern 2007: 102). Associations between horses and particular Germanic gods have also been suggested (Owen 1981: 28, 91–92; Poole 2010*b*: 194).

The mortuary evidence is particularly informative to the interpretation of horses in placed deposits. Unlike in the horse-and-rider inhumations, all the articulated remains of horses in placed deposits that could be osteologically sized belonged to smaller animals, arguing against an expression of elite status. The largest horse in a placed deposit (building H5 at Hammersmith) was approximate 130 cm tall at the withers, a median height for Anglo-Saxon horses and at the low end of the range for horses in elite burials (Poole 2010*b*: fig. 4.1). In the case of complete articulated skeletons, it is possible that a personal relationship with a human was being expressed. Personal relationships between horses and people of all social statuses seem likely, given the amount of time and close contact required to break and train horses, which were probably obtained from managed,

[126] This despite the evidence from the Spong Hill settlement for the exploitation of horse remains for food (Bond 1995).
[127] Tentative associations between higher status males and horses in cremations have been made (Ravn 1999; Williams 2005), but there is disagreement (Bond 1994).

semi-wild herds (Poole 2010*b*: 188–189). Considering that only four out 14 placed deposits of horse remains probably contained complete animals, however, the symbolic and totemic associations of horses discussed above seem most relevant to placed deposition of horse remains. In the context of the traces of animistic themes identified in Anglo-Saxon literature and art (§10.1.1), and the totemic symbolism of horses, discussed above, it has been suggested that the presence of horses in cremation burials symbolized the ancestors, or even helped to construct the deceased's new identity as an ancestor, perhaps with horse-like attributes (*cf.* Williams 2005). Thinking along similar lines, it could be speculated that placed deposition of horse remains may have been intended to channel similar forces.

10.1.4 Cattle and horse skulls

A consideration of totemic and animistic forces may be particularly relevant to placed deposits of horse and cattle skulls. Placed deposits made prior to or during the final backfilling of SFBs and reused pits overwhelmingly contained cattle skulls and horse skulls, frequently together (§7.5.2). Cattle and horses heads would have made impressive placed deposits, but their full impact may have related to their symbolic or animistic traits already discussed. In animistic societies, the head is often perceived as the focus of the animal's spirit, either as the most characteristic part of the body or as the focus of the sensory apparatus (Glosecki 1989).[128] Caesar wrote that the Germanic tribes held the ox in special regard for its strength (*ibid.*: 181), and the head, and particularly the horns, may have been considered iconic of that strength. Drinking vessels made of or shaped like ox's horns may have even have conferred that power to the drinker (Glosecki 1989: 181). In medieval Scandinavia, according to Saxo's *Gesta Danorum*, and

[128] The head is also the source of breath. Classical and Carolingian writers record that Germanic tribes on the Continent are reported to have prognosticated using the breathing and snorting of both horses and oxen (Griffiths 1996: 155).

Egilssaga, horses' heads were mounted on staffs or poles in order to curse enemies, further attesting to their supernatural power (Griffiths 1996: 155; Glosecki 2000: 15).[129] These examples come from a variety of times and places, but they nevertheless offer hints that placed deposits of horse and cattle skulls may have been symbolic of or contained animistic force. The placement of the cattle skulls in SFB 7395 at Yarnton (Cresswell Field), in which the horns of the two skulls were arranged to form an S-shape, indicates the contribution that the horns made to the overall effect of the deposit (Fig. 10.1). It has been suggested that placed deposition in the final fills of pits and SFBs was intended to erase the negative feature and restore settlement space (§9.2.3). If that was the case, it is not clear what role the symbolic or spiritual characteristics of cattle and horses would play in that process.[130]

10.1.5 Dogs

The animal most overrepresented in placed deposits is the dog, found in 17 (22%) of the placed deposits, as compared to only a few percent of the overall animal bone assemblage (Tab. 5.1, Fig. 5.5).[131] The role of dogs in the rural settlement economy is difficult to assess, partly because of their small numbers (Poole 2010*b*: 198). The overall animal bone assemblage includes animals large enough to be guard or hunting dogs (*ibid.* 198), the latter role suggested by one or two dogs found in elite horse-and-rider

[129] An Old Norse poem called *Vǫlsa þáttr*, written down in the 14th century but incorporating older material, centres on the use of a horse's phallus for working *seiðr* (Price 2002: 217–219). It is salutary to remember that, since the horse does not have a baculum, a horse's phallus would be unlikely to survive in a placed deposit.

[130] The association between cattle and horse skulls in placed deposits may be compared to tentative links between the treatment of cattle and horse in cremation burials. First, in cremations at Spong Hill, cattle (like horse) exhibited fewer butchery marks than sheep and pig, and in some cremations elements from all parts of the cattle skeleton were present (Bond 1994: 123). This indicates that at least some cattle were, like horses, either cremated whole or only coarsely dismembered prior to being placed on the pyre (McKinley 1994: 94), although in other cremations only certain parts of cattle skeletons were represented (Bond 1994: 128). Second, horse and cattle were both disproportionately represented in 'animal accessory' vessels, while sheep and pig were not (Williams 2005: 33, fig. 3.23).

[131] See note 124.

inhumations of the types discussed above (Fern 2007: 100). However, small animals the size of modern lap-dogs have been interpreted as pets, and there is evidence to suggest that personal relationships between some dogs and humans did exist throughout the Anglo-Saxon period (Poole 2010*b*). Dogs in human burials have encouraged suggestions of personal relationships between those individuals; for example Grave 1 at Loveden Hill, Lincs., contained an old man with a child placed in his arms and a lame dog at his feet (Wilkinson 1980: 229; Crabtree 1995: 22; Poole 2010*b*). Healed trauma and congenital pathologies on some dog bones appear to have come from animals that required help from humans to survive (Poole 2010*b*). Dogs were identified in 26 cremations at Spong Hill, Norfolk, just over 1 per cent of the burials. The evidence that in most if not all cases the entire animal was cremated (Bond 1994: 132) may likewise suggest personal relationships with the deceased, but the totemic associations that have been suggested for horse in cremations (Williams 2005), and the fact that 71 per cent of dog remains at Spong Hill were associated with 'young adult' humans (Poole 2010*b*: 203) argue otherwise. It seems likely that if some dogs were 'owned', others were feral (Poole 2010*b*: 206).

Only one placed deposit containing a dog seems to reflect a clear, personal association with a human. One of the dogs in ditch 7330 (section 173) at Higham Ferrers suffered from rickets and appears to have been kept indoors for most of its life, and the other exhibited a healed trauma, leading the excavators to suggest that both animals belonged to the woman deposited nearby (Hardy *et al.* 2007: 207; Evans with Strid 2007: 151). Other complete skeletons could represent pet burials, but they could likewise represent the deposition of feral dogs; overall, dog remains almost never show signs of butchery for meat or skins, so even feral dogs were likely to have been disposed of complete (Poole 2010*b*: 205). It is not clear which way to interpret the nearly complete

dog skeleton in SFB 118 at Audlett Drive, Abingdon, which was missing only its hindlegs; it is not reported whether the osteological evidence could show if the legs were missing in life as well. A placed deposit of disarticulated dog limbs in the two axial postholes of an SFB (House XVII) at Sutton Courtenay—the forelimbs in one posthole and the hindlimbs in the other—suggests that the partial dismemberment of dogs was at least sometimes deliberate. It would be interesting to know if articulated dog limbs could be consistent with skinning.

Whether specific dogs were 'pets' or feral, they may also have expressed symbolic or totemic characteristics in placed deposition. Nine out of 14 placed deposits of dogs were made at liminal places and times, raising the possibility that they were particularly suited to mediating the ambiguity or vulnerability that may have been associated with liminality (§9.2.2). Dogs are sometimes perceived as occupying a liminal state between human and animal, perhaps due to their expressive facial musculature and the necessity to accustom puppies to humans from a young age if they are to be companions (Poole 2010*b*: 198–200). It is unknown whether dogs were attributed human characteristics in Anglo-Saxon England, but in Alamannic law codes, if a man's dog killed someone, the man would have to pay only half of the wergild, as opposed to the full amount if it was another of his animals (Poole 2010*b*: 200). This attributes a level of agency to dogs not attributed to other animals. It is possible to speculate that placed deposits of dog remains could likewise have exercised agency.

It was noted in Chapter 5 that placed deposits of dogs and humans were treated similarly in placed deposits in two ways. First, both were disproportionately deposited as complete burials (§5.4.1); second, both were usually not placed together with other animal species (§5.4.3). As noted in Chapter 5, it is important not to overstate the similarities between the treatment of dogs and humans in placed deposits, since there are

differences as well. Human remains were even more overrepresented than dogs in placed deposits as compared to the overall animal bone assemblage, were more often than dogs the dominant element in placed deposits, and exhibited correspondences with liminal features that appear to have depended upon burial treatment (§5.6.2; §6.3). Nevertheless, the similarities between humans and dogs as compared to other animals in placed deposits could suggest that the Anglo-Saxon worldview endowed dogs with human-like characteristics. What these characteristics would have been is not discernible from the present evidence but might include, for example, individual personality, intelligence, a sense of social hierarchy, and others (Serpell 1996: 126–128).[132]

Interestingly, placed deposits of infants have more in common with placed deposits of dogs than do placed deposits of other human remains. Infants, like dogs, were also usually deposited complete, and were rarely deposited together with other animal species. Both of these associations are true of humans more generally; but unlike children and adults, infants and dogs were rarely deposited in specially-dug pits or graves, but were instead placed in pre-existing negative features like SFBs and ditches. In contrast, non-infant human remains were very rarely placed in SFBs (§5.6.4), and human remains in ditches were often deviant burials (§8.5.1). Neither infants nor dogs are particularly associated with liminal features. The similar patterns attending placed deposits of infants and dogs, combined with their differences from those containing older humans, reinforces Crawford's suggestion that infants possessed human-*like* characteristics, but were not thought of as completely human; a perception shared by many pre-industrial societies (Crawford 2007).

[132] Notice should be given here to the five cats present in four placed deposits, an unusually large proportion (5%) compared to their representation in the overall assemblage. All four placed deposits were made at liminal times, during the backfilling of SFBs. Between two and four of the cats were probably deposited complete. The evidence for Anglo-Saxon perceptions of cats is rather less clear even than for dogs (Poole 2010*b*: 212–228).

10.1.6 Wild animals

Wild animals are disproportionately represented in placed deposits (Tab. 5.1, Fig. 5.5). Generally, wild animals comprise less than 1 per cent of the animal bone assemblage from settlements (Poole 2010*b*); this combined with a relative lack of arrows and other hunting weapons testifies to the rarity of hunting in the early to middle Anglo-Saxon periods (Sykes 2011), although wild animals are better represented among the middle Anglo-Saxon assemblage than in the earlier period (Poole 2010*b*: 267). When they are found, wild animals are most frequently represented in settlement contexts and in graves by amuletic objects, such as pendants made from pierced boar teeth, bear claws and raptor talons (Poole 2010*b*: 238). Skins have also been identified, both represented by mineralized pelts and by elements characteristic of skins, such as bear claws and fox skulls (*ibid.* 239).

A number of wild animal species exhibit protective or defensive qualities in Anglo-Saxon literature and art (Glosecki 1989, 2000; Dickinson 2005). Among these are three species present in placed deposits: boar, pike, and deer. Boar figures appear frequently on helmets of the types found at Sutton Hoo and Benty Grange, where their apotropaic agency is repeatedly attested in *Beowulf* (Glosecki 1989: 53–58; 2000: 10–12). Mounts shaped like pike were sometimes found on shields, suggesting a protective role (Dickinson 2005: 154–157). Pike are aggressive predators, referred to as 'water wolves' in the 12th-century *Liber Eliensis* (Dickinson 2005: 156; Hagen 2006: 157). Hrothgar's hall, called *Heorot* ('hart') was splendidly adorned with antler (*Beowulf*: ll. 778–782), linking the totemic deer with status and feasting, as well as with the protection the king

provides (*cf.* Lambert 2009: ch. 2).[133] The apotropaic qualities of these animals relate to the animistic echoes in Anglo-Saxon literature and art, as discussed above.

These apotropaic qualities may have been expressed in the few placed deposits containing boar, antler, and deer remains. A single boar's tusk pendant was found on the base of SFB 52 at West Stow; and the single maxilla of a possible boar contained in the centre of the fill of pure clay below the cow skeleton in pit 6 at Cowdery's Down may also have been deliberately placed.[134] A large deposit of deer antler was spread across the base of a ditch (cut 3958) at Mucking, and a single antler with cut marks on the tines was placed upright in a deposit sealing a partly-timbered watering hole (House XXI) at Sutton Courtenay.[135] The heads of ten pike were deposited in SFB 1351 at Brooklands, Milton Keynes. Many of these deposits were made at liminal times, including the destruction and backfilling of SFBs, the decommissioning and backfilling of a waterhole, and the recutting of a prehistoric or Roman ditch. Considering the possibility that liminal times may have been characterized by uncertainty and vulnerability (§9.2.1), it is possible that deposits of boar, deer, and pike were chosen for their apotropaic qualities in order to mediate that vulnerability.

[133] As Glosecki reads it, the antler decorations made the hall nearly indestructible, suggesting that the hart was the spirit-guardian of the hall (Glosecki 1989: 182).

[134] The possibility that some domestic pig remains in placed deposits expressed a symbolic link with wild boar could also be considered (*cf.* Poole 2010*a*: 155). Domestic pigs were often driven into woodland areas to forage, where they may have mated with wild boar (*ibid.*), and the illustration for September in the Cotton Julius calendar appears to conflate the woodland foraging of domestic swine with the boar hunt (Hill 2011: 15–16, fig. 2.9).

[135] Deer remains in pit F255 at Bloodmoor Hill and pit 394 at Eynsham are better considered in the context of high-status consumption or feasting (see §10.2). The functional and formal relationship of artefacts to their raw materials in Anglo-Saxon England is a topic worthy of further study (*cf.* Conneller 2011), and here the possibility that worked bone or antler artefacts retained the animal's symbolic qualities is worth considering. Although no antler artefacts were confidently identified as placed, there was an unusual quantity of antler offcuts present along with the placed deposit of lead rings or discs in Building 7 at Gamlingay.

10.2 Sacrifice, feasting, and placed deposition

Bede and other Christian writers relate that animal sacrifice featured in the practice of Anglo-Saxon 'heathen' religions, but they offer few details of the form, context, or purpose of these sacrifices. Bede records Pope Gregory I's reference to 'the habit of slaughtering much cattle as sacrifices to devils', possibly connected with feasting (*HE*: I.30), and in *De temporum ratione* he records that sacrifices were dedicated to various gods in certain months of the year (Owen 1981: 48–49; Wilson 1992: 35–36). Injunctions against sacrificing to devils appear in the late 7th-century law code of Wihtred of Kent (Wilson 1992: 36–37). It has been argued in Chapter 5 that placed deposits of meat-bearing livestock, and especially the articulated remains of young animals, could be understood as sacrifices (at least in the mundane sense of underexploited meat, secondary food products, and raw materials), and may have been made in connection with mass slaughter and/or high-status consumption.

In the absence of more specific textual support, two lines of investigation could lead to a limited understanding of how sacrifice and large-scale consumption articulates with the Anglo-Saxon worldviews and belief systems. The first would be to consider evidence connecting placed deposits deriving from sacrifice with the annual subsistence cycle. The placed deposits with the best chance of being confidently assigned to a season would be those containing lamb or calf remains, since, like today, lambing and calving in the Anglo-Saxon period would have taken place in March or April. None of the lamb or calf remains in placed deposits, however, were aged precisely enough to assign them to a particular month. Placed deposits of neonatal pigs in SFB 1351 at Brooklands, pit 38 and SFB 51 at Nettleton Top, and building 7 at Gamlingay were aged precisely, but farrowing can in theory take place at any time of the year (O'Connor 2011: 369–370), though there is some osteological evidence that piglets were born in the spring in the Anglo-Saxon

period (Poole 2010*b*: 158). Nevertheless, it is not possible to identify these placed deposits to the spring with real confidence. Nor could any placed deposits be closely dated to the autumn to coincide with the slaughter of cattle in Bede's *Blod-* or *Blot-monaþ* (Owen 1981: 46, 48; Wilson 1992: 36).[136]

The second line of investigation is to consider placed deposits of material that may have derived from high-status consumption or feasting. These can be divided into two types. Deposits of the first type contain livestock remains in large quantities, and often comprise young animals, presumably slaughtered early in order to obtain choicer meat. Five placed deposits with these characteristics have been identified. Twelve sheep skulls were found, along with disarticulated remains of at least twelve lambs, in pit B383 at Hartlepool. Thirty-three articulated fragments of neonatal piglets were found in SFB 1351 at Brooklands; large quantities of piglet remains were also placed in building 7 at Gamlingay and pit 38/SFB 51 at Nettleton Top. The stack of bones inside the wall of building D2 at Yeavering consisted almost entirely of cattle, and mainly skulls, but need not have included any individuals younger than 18 months (Higgs & Jarman 1977: 328–331, graphs 1, 2; Hagen 2006: 75). Each of these five deposits is likely to derive from a communal meal or feasting event; or, in the case of the Yeavering skull stack, perhaps several such events.[137] The presence of lambs and piglets in the other deposits suggests that all the animals were slaughtered at the same time, and the partial articulation and location in the same context suggests they were all deposited at the same time.

---

[136] Sometimes mentioned in relation to *Blod-monaþ* is Harrow Hill, Sussex, where the mandibles of thirteen or fourteen oxen were discovered within the early Iron Age enclosure (Manning 1995: 133). Considering the name (from Anglo-Saxon *hearg*), these skull fragments could derive from Anglo-Saxon reuse of the site for ritual (Meaney 1995: 31), but no Anglo-Saxon finds have been recovered there (Manning 1995). Based on the number of skulls discovered in only two trenches, the excavator extrapolated that the entire monument must have contained thousands (Holleyman 1937: 250). This extrapolated number has sometimes been reported as the actual number of skulls excavated (e.g. Owen 1981: 45).

[137] That the skulls may have derived from not one but several instances of large-scale consumption is suggested by fine layers of 'blown sand' between nine separate deposits and an 'unusually slight degree of interlocking' between skulls of successive deposits (Hope-Taylor 1977: 100). The source of the blown sand within building D2 seems somewhat problematic, however, even for a site as windy as Yeavering.

The other type of placed deposit probably deriving from feasting or high status consumption consists of large quantities of animals from a number of species, including domestic fowl, game, and fish. This study has identified two such deposits, in pit 394 at Eynsham and pit F255 at Bloodmoor Hill. Both were very large deposits, containing 2407 and 2981 fragments identifiable to species (NISP), respectively; the animal bone in pit F255 weighed 15 kg. In addition to cattle, sheep, and pig remains, one or both pits also contained bones from horse, dog, cat, duck, chicken, crane, partridge, buzzard, perching birds, deer, hare, freshwater fish and eel, saltwater fish, and oyster.[138] The mere number of species represented, together with the presence of exotic species, reflects the pains someone took to assemble the meals from which these deposits derived. Domestic fowl may have had high status and medicinal associations (Hagen 2006). Hunting, fowling, and fishing were aristocratic activities in the late Saxon period, and although wild animals are rare in early and middle Anglo-Saxon settlements, they are slightly better represented on higher status sites emergent in the middle period such as Flixborough and Bloodmoor Hill (Sykes 2011: 332–336). The symbolic and animistic agency that predators appear to have exercised in literature, in artwork and on weaponry and armour has already been mentioned (Glosecki 1989, 2000; Dickinson 2005). The placed deposit in SFB 1351 at Brooklands deserves mention here as well because in addition to the numerous piglets the heads from at least ten pike were included in the placed deposit. Pike or pike-like fish feature on a number of high-status Anglo-Saxon artefacts, including a silver brooch from Westbere, a buckle from Crundale, Kent, and the pedestal at the base of the Sutton Hoo hanging bowl (Dickinson 2005: 152 n. 100, 155; Glosecki 2000: 17, figs 12, 13), and its meat may have been considered a high-status food (Nicholson 2008: 75–76).

[138] A much smaller animal bone assemblage (3 kg), but with a similar range of species, was found in pit F368 at Bloodmoor Hill (Lucy *et al.* 2009: 150, tab. 3.59), but because it was so much smaller it was not positively identified as placed in this study.

Feasting and sacrifice are difficult to distinguish in placed deposits, and were probably connected. The skulls of cattle were deposited in building D2 at Yeavering, but the rest of their physical remains were fully exploited, as demonstrated by the long bone fragments around building D3 and in the 'black ditch' (Hope-Taylor 1977: 105–107; Hamerow 2006: 15–16), and the exploitation of so many animals seems certain to have included large-scale consumption. Bede believed that pre-Christian rites of animal sacrifice incorporated feasting; that much is clear from Pope Gregory's instruction that the animals that would otherwise have been sacrificed should instead be slaughtered on saints' days and other Christian festivals and eaten as 'religious feasts…to the praise of God' (*HE*: I.30). Both the Hartlepool (pit B383) and Eynsham (pit 394) deposits can be viewed in the light of that instruction, since they are at documented monastic sites. Perhaps so can the deposit in pit F255 at Bloodmoor Hill (pit F255), where one of several possible interpretations of the cemetery within the settlement was that it served a small, short-lived female religious community (Scull 2009: 426); the cemetery and the pit were probably contemporary (Lucy *et al.* 2009: fig. 6.37).

10.3 Placed deposits and 'technologies of enchantment'

Traits in Anglo-Saxon literature, art, and metalwork evoking animistic and possibly even shamanistic themes have already been discussed in terms of animals and their relationship with humans (§10.1). Reference has also been made to transformative imagery in Anglo-Saxon artwork, particularly the Style I metalwork of the later 5th and 6th century (Webster 2011: 467–470). It has been observed that the highly stylized anthropomorphic and zoomorphic figures in Style I often share an ambiguous identity, with beasts transforming into humans and *vice versa* when the object is rotated, possibly

evoking concepts of shape-shifting or other transformation (Leigh 1984; Williams 2001; Dickinson 2005: 153; Pluskowski 2011: 769).

Not only might this artwork evoke a kind of magic; it may have acted as a 'technology of enchantment', designed to 'dazzle' the viewer (Gell 1992, 1998). Like an Anglo-Saxon riddle in visual form, the ambiguous images in Style I draw in and entrap the viewer, requiring knowledge and/or skill to unravel their hidden meaning (Webster 2011: 467–468). The Style II artwork of the late 6th and 7th centuries, characterized by complex designs of interweaving animals, also requires decipherment (Webster 2011: 470–474). The influence of Style II can be seen in later art, including manuscript illuminations and sculpture, such as the stone carvings of two intertwining reptilian creatures found on the doorjambs of St Peter's, Wearmouth (Cramp 2006: 173; Webster 2011: 472–474). As technologies of enchantment, objects of Style I and Style II metalwork could have served to embody the power or skill of its maker or bearer; or, considering the apotropaic role of some of this artwork, to ward off natural or supernatural threats (§10.1).

This section considers placed deposits connected with technologies of transformation, especially smithing and weaving. Both are shown below to be associated with magic in Germanic contexts, perhaps because they resonate within an 'ideology of transformation' (Williams 2001), and perhaps because, at the elite end of the scale, both of these technologies produced objects that could dazzle or entrap the viewer. Other placed deposits that may have been associated with magic or magical transformation are also discussed.

10.3.1 Smithing

Hedeager has argued for early medieval Scandinavia that specialist metalworkers, especially those who made high-status weapons and jewellery and votive items like gold bracteates, would have been viewed as workers of a transformative magic (Hedeager 2002: 7–10). Smiths also crafted wondrous or magical works in Anglo-Saxon art and literature. Evidence for an early Anglo-Saxon legend of Weland survives in several Anglo-Saxon contexts, including the 7th-century Franks Casket, the late Saxon poem 'Deor', and the Neolithic long barrow already called 'Wayland's Smithy' in a 10th-century charter ('Deor': ll. 1–12; Owen 1981: 37–39, pl. 10; Cecire 2010: 203). Smiths are credited with forging supernatural weapons in the 10th-century charm 'for a sudden stitch' (*wið færstice*), discussed below, and a similar supernatural attribution has been applied to the crafting of Beowulf's boar-adorned helmet (Griffiths 1996: 189–191; Glosecki 2000: 10).

Several placed deposits can be considered in the light of these ideas. The first is and the unstratified hoard of woodworking tools and a bell contained in nesting lead vessels at Flixborough; the bell and one of the lead vessels exhibited indecipherable markings. Woodworking, another transformative art, might also have had magical associations (Glosecki 2000: 4). More specifically, the Flixborough hoard has been proposed as an overtly Christian deposit (Ottaway 2009*b*: 261; see §10.4) below). A similar deposit of tools, structural ironwork, fittings, and horse equipment, found in a late Saxon context at Bishopstone, E. Sussex, in a deep corner posthole of a 'cellared' building backfilled in the late 9th or early 10th century, has been interpreted as a material metaphor of manorial life (Thomas 2008: 391–393). The unusual contents and contexts of these two hoards argue in favour of a symbolic interpretation.

Even though it was deposited in the early Anglo-Saxon period, a small lead spearhead at the base of SFB 3063 at Prospect Park, Harmondsworth, can be considered in the light of the 10th-century charm 'for a sudden stitch', mentioned above. Only 9 cm long (half the length of its nearest parallel, Swanton's type F1) and made of lead, the spearhead was clearly not a functioning weapon. In the charm, sharp pain or sudden illness is attributed to a 'little spear' thrown or shot by witches or evil spirits (Griffiths 1996: 189–191). Another charm is prescribed for 'elf-shot' horses (Griffiths 1996: 204). Although the charm hints toward possible magical associations for the spearhead, it is not clear in what way they would have contributed to its selection for deposition, but the argument that the backfilling of SFBs was a liminal time may be relevant (§9.2.3).

Although it is possible that ordinary smithing, as a transformative technology, carried magical connotations, it is difficult to interpret ordinary smithing debris, such as the deposit of fragmented metalwork and slag in structure 14 at Bloodmoor Hill, in such a way. It seems more reasonable simply to frame such a deposit in terms of other placed deposits associated with the backfilling of SFBs, noting that deposits of 'waste' can also be 'placed' (Ch. 3). Two separate deposits of tools, metalworking debris, slag, and vitrified clay at Brandon Road, Thetford, Norfolk (in pit 2223 and SFB 2233) may represent waste from steel-smithing, a process that requires much higher temperatures than ordinary metalworking (Atkins & Connor 2010: 33; Crummy 2010: 54–55; Eley & Fosberry 2010: 60), and could be therefore be argued more likely to have had magical connotations, but the stratigraphic information was not detailed enough to positively identify these deposits as placed.

10.3.2 Weaving

In Chapter 7, it was shown that placed deposits of loomweights were found almost exclusively on or near the bases of SFBs, and that placed deposits in such contexts disproportionately contained loomweights. This was interpreted to mean that collections of loomweights, and in some cases complete looms, were placed and/or abandoned in SFBs prior to the building's (deliberate?) destruction, often by fire (§7.5.1). So far this has been discussed in terms of the destruction of the building being a liminal time (§9.2.3), and as a possible expression of feminine gender, given the strong associations between women and weaving in Anglo-Saxon society (§9.3.2). It is interesting to consider these deposits further in relation to possible magical connotations of weaving in the Anglo-Saxon worldview.

If placed deposits of loomweights or other material were made in SFBs prior to their destruction, then it is impossible to talk about the deliberate destruction of the building without discussing the deliberate destruction of those objects as well. The 'ritual killing' of objects is well attested ethnographically and archaeologically, and has been suggested for Anglo-Saxon cremation urns (Leahy 2007: 82). The same interpretation has been offered for a hole drilled into a pot in SFB 1351 at Brooklands, Milton Keynes prior to its deposition on the base of the pit (Blinkhorn 2008: 46–47). Of the 28 placed deposits of loomweights on or near the base of an SFB, eight were in clusters and 12 were in lines. These are likely to represent either stores of loomweights, in bunches or on rods, or else weights still hanging on a loom at the time of the SFB's destruction, or perhaps both (§7.5.1). Many of the loomweights in these deposits were complete and could have been used again, but were abandoned (Gibson with Murray 2003). The complete looms might have been at the end of their useful life, but they also could have been deliberately destroyed while still functional for some other reason.

Weaving is connected with prophecy and fate in a variety of early medieval and medieval Germanic contexts. The Fürstenberg series of 6th-century bracteates from northern Europe depict a possible weaving goddess (Enright 1990; see below). In the 10th- or 11th-century Norse tale *Darraðarljoð*, possibly composed in Ireland, twelve women weave a ghastly tapestry out of human remains in order to ensure a bloody defeat of the Irish at the hands of the Norse (Price 2002: 332–334). Other Old Norse sources relate how three *nornir* determined each person's life and fate either by casting lots or by weaving a cloth (Price 2002: 56, 384). The fact that the Irish epic *Táin Bó Cuailinge* puts a weaving beam in the hands of a prophetess or priestess of Medb may also be relevant (Enright 1990: 66–67).

In specifically Anglo-Saxon contexts the evidence for an association between weaving and magic is more limited. Three cloaked figures who appear to be spinning or weaving, cautiously identified as *nornir*-type figures, appear on the Franks Casket, a 7th-century Northumbrian whalebone box depicting scenes recognizable from later Norse mythology (Owen 1981: 34–37, pl. 9). It has been suggested that the late West Saxon combining form *-siden*, used in a word describing the magical influence of elves, is cognate with a group of Indo-European words that suggest 'binding', including *seiðr*, an Old Norse term for a particular kind of sorcery (Griffiths 1996: 50 n. 27; North 1997: 55, 317; Price 2002: 64). Although there is no direct reference in surviving Old English texts to magic being performed through weaving, associations between weaving and women are clear (§9.3.2), and there is evidence to connect women with magic in later Saxon texts (Meaney 1989), so the possibility that some women might have been thought to perform magic by weaving exists.

In the light of Germanic and Irish associations between weaving and magic, the possibility that such a view played a part in the deposition and/or deliberate destruction of

looms or loomweights in SFBs should be considered. A loom and/or stores of weights could have been perceived as potent objects. Support for this suggestion in a Continental Germanic context comes from the Fürstenberg series of bracteates, mentioned above. These depict a full-breasted woman wearing a skirt, hands raised, and accompanied by amuletic symbols such as crosses, swastikas, stars, and crescents or horseshoes (Enright 1990). In some examples, the figure carries a staff-like object terminating in crosses in one hand and a smaller cross-shaped object in the other. Enright has suggested these may represent a weaving beam and a weaving swift, respectively.[139] A weaving beam is the horizontal bar at the top of an upright loom from which the warp threads hang. As a cloth is woven, the fabric may be taken up by rotating the weaving beam, which is held in its new position with the help of a cross-spoke passing through the beam near one or both ends (Leahy 2003: 67–68, fig. 33). Enright identifies the figure on the bracteates as a possible goddess associated with weaving (Enright 1990: 60–64, fig. 1); the amuletic symbols seem to suggest supernatural power, at least. If a weaving beam was as an attribute of such a powerful figure, it could point to supernatural connotations for weaving and looms.

Another possibility to consider is that cloth was present on the looms at the time of their destruction (Crawford 2010). Whether or not looms were symbolic, it seems plausible that a cloth, left unfinished for some reason, might have held powerful or magical connotations, particularly if it was a particularly fine work. The act of weaving, like smithing, is a transformative technology, capable of producing objects to enchant or dazzle the viewer. The language of *Beowulf*, describing the tapestries adorning the walls of Heorot as 'wondrously shifting' (*wundor-siona fela*) for everyone who looks at them

[139] On a bracteate from Oberwerschen, Saxony-Anhalt, the female figure is dangling what may be a spindle from her left hand (Enright 1990: 60).

(ll. 994–996), evokes the 'ideology of transformation' and technology of enchantment discussed above in terms of Style I and Style II metalwork.

10.3.3 Grave AX at Yeavering

It is appropriate in a discussion of magic and Anglo-Saxon placed deposits to mention grave AX at Yeavering. This burial contained a staff that was originally interpreted as a regal standard or surveying rod (Hope-Taylor 1977: 202), but similarities have been noted between Grave AX and two references in the Poetic Eddas to staff-bearing sorceresses (*vǫlur*) buried at entrances to the underworld (Hamerow 2006: 11; Blair 2011: 731). Viking-age burials have been identified of possible *vǫlur* featuring a characteristic staff, usually of iron, but sometimes of wood (Price 2002: 127–161, 175–204). The grave AX staff is not dissimilar to these in form or positioning within the grave, despite being of wood and considerably longer.

Another possible comparison may be made between the grave AX staff and the cross-terminated staff depicted on the Fürstenberg bracteates mentioned above. Near one end of the grave AX staff, three arms were found set out at right angles from the staff near one end, and a fourth was probably present (Hope-Taylor 1977: 200). That end of the staff terminated in a possible boar-shaped mount. A shorter length of staff or spear found below and askew the main staff, may have been broken off the opposite end of the staff, or a separate artefact altogether. With its cross-arms, the grave AX staff resembles the cross-staffs on the Fürstenberg-type bracteates. The grave AX staff could have been a weaving beam or a staff shaped like one; if the longer length of the staff were accepted, it would approach 2 m, the suggested width of Anglo-Saxon looms (Hoffman 1964: 313–314), and weaving beams sometimes had cross-spokes at only one end (Enright 1990: 63; Leahy 2003: 68, fig. 33). Regardless of whether the cross-staffs in grave AX and on the

Fürstenberg bracteates were weaving beams, however, the similarities between the staffs stand, providing further support that grave AX may have contained someone (a woman?) who was believed to possess potentially magical power.

10.3.4 Ditch 2513 at Wharram Percy

The well-preserved placed deposit of an infant and parts of a lamb or young sheep in the uppermost layer of ditch 2513 at Wharram Percy also deserves mention in the context of Anglo-Saxon magic. A nearly spherical boulder of unusual veined limestone, unworked, lay on top of the sheep remains, and sprinkled over and around the sheep were flakes of amber. Both the stone and the amber are unusual artefacts and clearly important in the structure of the deposit. The limestone was probably locally sourced, but the amber may have been either English or imported. Amber has been valued for thousands of years not only for its intrinsic beauty, but also for containing insects and for its ability to hold an electromagnetic charge. Amber might well have been perceived as 'magical' for these reasons, and it seems that some symbolic property was being applied to the placed deposit in ditch 2513. Divination or augury may have been performed by slaughtering and butchering animals (*cf.* Griffiths 1996: 154, 155).[140] The possibility that the lamb in this placed deposit was used in a similar rite cannot be discounted.

10.4 Placed deposits at ritual structures in settlements

Certain kinds of structures in Anglo-Saxon settlements have sometimes been identified explicitly with ritual. These include buildings interpreted as pre-Christian temples or shrines, Christian churches, and mortuary 'chapels' or 'mausolea'. Some structures with a variety of possible functions, such as free-standing posts and 'great

[140] Notably, Ælfric that he denounces consulting female witches for divination in his homily 'On Auguries' (Meaney 1989: 13).

halls', may have sometimes acted as foci for ritualized activities. While a full assessment of possible ritual structures and features in Anglo-Saxon settlements is beyond the scope of this study, a brief summary will make it possible to see how placed deposits relate to the activities associated with ritual structures and features in Anglo-Saxon settlements.

10.4.1 Ritual structures

The best-known pre-Christian ritual structure in an Anglo-Saxon settlement is the probable temple, building D2 at Yeavering (Hope-Taylor 1977: 97–102, figs 43, 44). Because the identification of this structure as a probable temple rests largely on the evidence of a placed deposit it is useful to describe it in some detail. The placed deposit (building D2 at Yeavering), comprising a mass of cattle skulls stacked against the wall near the eastern doorway, suggests that at least one of the activities associated with this building involved the ritualized butchering and consumption of cattle (§10.2). The actual butchering is likely to have taken place in a working hollow and pits to the north and west of the neighbouring building D3, where cattle long bone fragments were found; the flesh might have been cooked on two hearths symmetrically placed within building D3 (Hope-Taylor 1977: 105–106; Hamerow 2006: 15–16). Such activity might be expected at a pre-Christian Anglo-Saxon shrine, based on Pope Gregory's letter to Mellitus, in which he discusses pagan shrines and cattle sacrifices in the same passage (as related by Bede, *HE*: I.30; see also §10.2). A forest of small postholes or stake holes around the outside of the structure may be traces of temporary huts constructed out of the boughs of trees, structures mentioned by Gregory in the same letter (Hope-Taylor 1977: 277–278). The ritual status of the building appears to be confirmed by the presence of a contemporary cemetery apparently focused on a post-built enclosure annexed to the building's southern end (Hope-Taylor 1977: 102; but see below).

A few other structures in Anglo-Saxon settlements have been identified as possible 'pagan' shrines. Square-shaped post-built enclosures, usually containing focal free-standing posts, represent the Anglo-Saxon settlement version of a long-standing insular tradition of square enclosures with ritual associations and fit Bede's fleeting characterization of the Deiran shrine at Goodmanham (Blair 1995; Bede, *HE*: II.13). Examples, all featuring internal free-standing posts, include the square enclosure annexed to building D2 at Yeavering (just discussed), a similar annexe to building A1 at Cowdery's Down, and a free-standing square enclosure at New Wintles Farm, Oxon (Millett with James 1983: 192–205; Hawkes & Gray 1970: 1–4; Blair 1995: 18–19).[141] A circle of postholes surrounding central pits at Black Bourton, Oxon, has also been put forward as a possible shrine (Gilbert 2008).

A variety of structures in settlements acted as apparent foci of discrete burial groups or cemeteries (Geake 2007: 115–116). Building D2 and its post-built annexed enclosure must be mentioned yet again here as the focus of a large portion of the Western Cemetery (Hope-Taylor 1977: 102). Burials are associated with churches at documented monastic sites, as well as with suggested churches, for example at Staunch Meadow, Brandon, and building B at Yeavering (Carr *et al.* 1988: 374; Hope-Taylor 1977: 73–78, figs 26–27, 33). Other buildings associated with burial groups or cemeteries within middle Anglo-Saxon settlements have been interpreted as possible mortuary structures or mausolea. Most of these are at documented or suggested monastic sites (Geake 2007: 116); but in the 9th-century phase at Yarnton, building 2730 was associated with the western cemetery group of seven burials (Hey 2004: 163, fig. 7.21, pl. 7.6). Building 1a at Flixborough, with its five associated graves (burials 1960, 3580, 3706, 3878, and 4010), and the earthfast building at Gamlingay, with grave 65 cut through the southwest

[141] Annexes on earthfast buildings are relatively common (James *et al.* 1984: 186–190), but the square shape and internal postholes of the annexes on building D2 at Yeavering and building A1 at Cowdery's Down link them to other square-shaped enclosures (Blair 1995: 18–19).

corner of its sill-beam foundations, have also been suggested as possible mortuary structures (Loveluck & Atkinson 2007: 50–51; Murray with McDonald 2005: 267). However, grave 65 clearly post-dated the sill-beam building at Gamlingay, and building 1a at Flixborough contained a hearth and looks morphologically like an ordinary domestic structure (Geake 2007: 115).[142] This study has classed the burials associated with these two buildings as placed deposits because they appear to be more strongly associated with the buildings than with nearby graves (§8.2).

Free-standing posts constitute another type of possible ritual structure in Anglo-Saxon settlements, where they appear to have served a variety of functions. Free-standing posts present within the square-shaped post-built enclosures at Yeavering, New Wintles Farm, and Cowdery's Down, discussed above, may be assumed to have played literally a central role in the shrine. Blair cautiously equates these posts with the features that Aldhelm, in a late 7th-century letter, cryptically calls (*ermula*) ('pillars'?), where (he says) the snake and the stag were worshipped (Blair 1995: 2, 20). Other free-standing posts were associated with axes of settlements, as at Yeavering (Hope-Taylor 1977: 141, 161, figs 62, 63); or of buildings, such as building C13 at Cowdery's Down (Millett with James 1983: fig. 49). Finally, free-standing posts may have had royal or administrative functions. Located at the focus of the 'theatre' at Yeavering, post E has been compared with the Frankish *staffolus* (cognate with Old English *stapol*), a post or column at which the king passed judgement or made other pronouncements, according to the 7th-century *Lex Ribuaria* (Hope-Taylor 1977: 119–122, figs 55, 57; Barnwell 2005: 180–182). The

[142] Although it is possible that building 1a could have been originally constructed as a burial chapel, then later converted into a domestic building by adding an internal wall and a hearth (Geake 2007: 116), all within the generation or two that building 1a stood before it was demolished and rebuilt as building 1b (Loveluck & Atkinson 2007: 49, 53), such a complete transformation seems unlikely in so short a time. It seems more likely that building 1a possessed from its construction at least some domestic role, and there is no reason that this should have been at odds with its role as the context of human burials.

various functions suggested for free-standing posts need not have been mutually exclusive, and on the contrary may have been related.

Like free-standing posts, 'great halls' at high status and royal sites would have witnessed a variety of public, highly ritualized activities such as feasting, gift-giving, and oath-taking (Owen 1981: 61–62; Pollington 2010: 101–119). *Beowulf* bursts with ceremonial imagery: Wealhtheow offering the mead-cup first to the king and last to Beowulf; Hrothgar's formalized presentation of gifts to Beowulf and his men; the public speeches made before the assembled hall; the *scop*'s performance (ll. 612–641, 1020–1055, 1063–1160; *cf.* Owen 1981: 62; Pollington 2010: 102). The decorations of great halls may have featured animistic or apotropaic elements. The antlers adorning hall Heorot ('hart') have been mentioned in this context (Glosecki 1989: 182; §10.1), as have the tapestries, whose colours and images were transformed in the flickering light of the flames (*Beowulf*: ll. 994–996; §10.3.2;). Great halls might even have been the setting of overtly ritual activities led or overseen by the king or lord (Owen 1981: 51).

10.4.2 Placed deposits and ritual structures

Only four placed deposits associated with any of these types of ritual structures have been positively identified. The first is the stack of cow skulls along the inner east wall of building D2 at Yeavering. This has already been mentioned as one of the fundamental bases on which rests the interpretation of that building as a temple; to draw any further inferences from their relationship would inevitably by tautological. The second consisted of a horse skull and associated post-cranial elements in the door-pit of an entrance to the chancel of the church at Staunch Meadow, Brandon. This placed deposit is difficult to interpret in terms of any kind of Christian rite taking place in a church; its location in the entrance seems to have less to do with religion and more to do

with the continued importance of entrances as liminal places (§9.2.4). Of the last two, grave AX at Yeavering was associated with a free-standing post and pit 6 at Cowdery's Down with a post of uncertain function, and both were placed at the doorways of earthfast structures: building A4 at Yeavering and building C13 at Cowdery's Down. Building A4 was a 'great hall', and even though structure C13 at Cowdery's Down had the morphology of an ordinary early Anglo-Saxon earthfast structure, it was larger and part of a 'great hall' complex (Hope-Taylor 1977; Millett with James 1983). These two deposits have already been discussed in terms of their relationship to the doorways (§9.2.3). In terms of their relationship to the posts, it is difficult to draw any firm conclusions on the basis of just two deposits.

It may be relevant, however, that animal remains were found in the settings of several free-standing posts at Yeavering, remarkable considering how poorly animal bone survived at Yeavering and how little animal bone was found in structural postholes (Hope-Taylor 1977: 259, 326). Based on what was excavated, these deposits could not be positively identified as placed according to this study's criteria (§4.1.2; Tab. 4.1), but they may have originally been much more substantial than the traces that survived. Posthole AX contained the deposit most likely to have been placed. In the backfill of the socket formed from the removal of post AX were fragments of tooth enamel and a possible decomposed horn core, all probably ovicaprid, and a horizontal, flat piece of sandstone lay directly over the socket (Hope-Taylor 1977: 67). Could this have been a decomposed goat skull, mirroring the probable goat skull identified in grave AX? Traces of ovicaprid teeth were also found in the upper levels of the packing soil around the 'great post' northwest of building D2, and unidentified animal bone was found in the packing

soil around the bases posts BX and E (Hope-Taylor 1977: 100, 73, 119–120).[143] If the animal bone in these post settings was placed, and if animal remains in placed deposits carried totemic or animistic force (§10.1), such forces could have been relevant to the erection/removal of the posts and/or to the various ritualized activities focused around them, and even to the structuring of the entire settlement. It may be noted that these are the four posts lying on or close to the east-west axis of the settlement (Hope-Taylor 1977: 141, fig. 63). An animistic interpretation would resonate with Blair's hypothetical identification of the posts themselves with Aldhelm's zoomorphic *ermula cruda*, and would perhaps lend weight to Hope-Taylor's speculation that the posts were carved with the images of goats (Brythonic *gavr*), whose totemic association with the settlement may be preserved in the place name *Ad Gefrin* (Blair 1995: 2–3, 20; Hope-Taylor 1977: 15, 260). This line of reasoning, admittedly conjectural, is based entirely on the posts at Yeavering and can only be reliably applied to that site, insofar as it is reliable at all. It may be worth considering how animistic elements may have applied to the complete cow and set of boar maxillae in pit 6 at Cowdery's Down, and/or that the adjacent post was zoomorphic or totemic.[144]

The association of grave AX with post AX, on the other hand, is probably best understood in terms of the recurring association of mortuary practices with Blair's square enclosures and their focal posts, an association expressed in various ways at Yeavering (Blair 1995: 19). The central posts inside both square enclosures at Yeavering—one inside the Western Ring ditch and one annexed to building D2—were foci for successive phases of the Western cemetery (Hope-Taylor 1977: 108–116, figs 50, 52; 100–102, figs

[143] The bone in the latter post settings would have been contemporary to the posts, whereas that in post AX was deposited after the post's removal.
[144] The 'cow' element in Cowdery's Down is coincidental (Rumble 1983: 270).

41, 43).[145] In the Eastern Cemetery, smaller posts serving as the foci of string graves and as individual grave markers (*ibid.* 70–78, fig. 31) probably represent a development of that tradition (Blair 1995: 20, fig. 13). The graves associated with posts AX and BX could represent a variation in that developing relationship (Blair 1995: 20).

Perhaps the most important observation to be made about the role of placed deposits associated with ritual structures is that there are so few of them. Undoubtedly this is partly because both placed deposits and ritual structures are rare features in settlements. It is nevertheless striking that most placed deposition in settlements did not result from activities performed at putative ritual structures, and conversely the activities performed at these structures rarely involved placing material in contexts where it would survive archaeologically.[146] Except for the 'skull stack' inside building D2 at Yeavering, placed deposits that might have related to or helped construct the identity and function of ritual structures were usually one-time events in the life of the structure and not traces of any recurrent ritualized activity performed there. The implication is that even though placed deposition was a ritualized activity, it was one whose setting was as ordinarily domestic as the material placed deposits usually contain. Although placed deposition in

[145] One burial in the Western Cemetery actually intersected the line of the post-built square enclosure annexed to building D2 (Hope-Taylor 1977: 102, fig. 46(a), pls 84, 85). This was a crouched burial of a child lying on its left side, head to the east, at the east end of a grave long enough to contain its extended body. Lying on the base of the grave at its far western end was a single ox-tooth. The head of the grave lay in a possible entrance to the post-built square enclosure (*ibid.* 102, figs 41, 43; Blair 1995: 18, fig. 11). As a constituent of a discrete cemetery, the child burial is not counted as a settlement burial in this study (see §8.1.1). Nevertheless, it may be noted that the child burial would fit within the demographic pattern that this study has identified for normative burials in settlement contexts (§8.6). The child burial stands out within the Western Cemetery: it is the only crouched, east-west burial in a cemetery that is otherwise uniformly supine, extended, and oriented west-east, and it is the only burial to intersect the annexed enclosure. Rather than being the result of 'concealed nonconformity' (Hope-Taylor 1977: 244, 278), these characteristics might indicate that the child burial had a special status within the cemetery. What that status might have been is unknown, but it is not impossible that just as grave AX (a burial in a settlement context) apparently founded the Eastern Cemetery, so the child burial might have founded the Western Cemetery.

[146] The exceptions are, of course, the recurring and presumably ritualized slaughter, butchery, and consumption of cattle in area D at Yeavering that led to the creation of the skull stack in building D2; and any kind of mortuary rites taking place at free-standing posts prior to (or otherwise associated with) burial there—but aside from grave AX at Yeavering, all the burials associated with free-standing posts (also at Yeavering) belong to discrete cemeteries focused on a post, suggesting that the post itself is more a feature of the discrete cemetery within the settlement than a domestic settlement feature.

settlements surely articulated with Anglo-Saxon belief systems, it was apparently not usually an overtly religious activity in any organized sense.

10.5 Conclusion

Although the composition and context of placed deposits reflect cognitive elements of the Anglo-Saxon worldview and belief systems, placed deposits appear to have operated largely independently of organized 'religion', either pre-Christian or Christian. Placed deposits rarely appear to have been found in or near putative ritual structures or to have played a role in their associated rites, except in the form of human burials, and cemeteries are often the markers by which putative temples and churches are identified as such. Moreover, the placed deposits that were most clearly associated with ritual—placed deposits containing the remains of sacrifices or feasts—were not only made in both pre-Christian and Christian contexts, but the latter deposits appear to have their origin in the former, providing a possible example of continuity in the practice of placed deposition, despite a change in the overlying religious paradigm. A number of pre-Christian beliefs and traditions influenced later Christian lay practices in England (Blair 2011: 727–728), and placed deposition was one of them. This is to be expected in a rural society whose education primarily consisted of traditional knowledge handed down from father to son and mother to daughter (Meaney 1989). What is particularly interesting is that placed deposition influenced Christian religious practices as well. Placed deposits at Hartlepool and Eynsham show that placed deposition of the type practised in the pre-Christian era could take place at monasteries; the horse remains at Brandon show that placed deposition could even take place in a Christian church. One placed deposit (besides human burials) has been interpreted in overtly Christian terms: the hoard of woodworking tools and a bell placed in an unstratified pair of nesting lead

vessels at Flixborough have been speculated to be a ritual deposit representing Christ and the twelve apostles, perhaps made after the construction of Building 1a, a 'probable church' in this interpretation (Ottaway 2009*b*: 261). The interpretation rests largely on an eight-pointed asterisk-like mark on the bell, as if formed by combining a saltire cross with a Greek cross to create a symbol resembling the chi-rho. In the Roman period, 20 lead tanks marked with saltire crosses found across the country, eight of which also bore chi-rho symbols, are thought to have been used in baptism (Booth *et al.* 2007: 223). The larger Flixborough vessel has a band of linear marks, including a six-pointed asterisk, around the top edge. No other lead vessels in Anglo-Saxon placed deposits bear symbols, however, making it difficult to extend a Christian interpretation to these deposits.[147]

While this section has contributed to our understanding of Anglo-Saxon worldviews and belief systems, it also reinforces the argument of the first section: that it placed deposits are better interpreted in terms of what they mean to achieve, not in terms of what they mean. The 'meaning' of placed deposits might well have changed during the conversion; placed deposits in Christian contexts are unlikely to contain the remains of animals dedicated to the old gods, for example. The fact that placed deposits continued to be made, however, implies they were still being made for a purpose. That purpose is understood most completely not in terms of their composition or in terms of our understandings of Anglo-Saxon pre-Christian beliefs or Christianity, but in terms of the contexts of the placed deposits. Placed deposits can be seen to structure settlement space and time and to mediate relationships within and between communities throughout the 5th through 9th centuries (§§9.2, 9.3). This discussion of the paradigms and belief

[147] It might be relevant that a tool hoard was also deposited in a pagan Viking context near the high status site of Lake Tissø. The deposit was made at a ford leading from the settlement to a cemetery across the river, inviting an interpretation of the deposit in terms of its liminal location between the worlds of the living and the dead (Lund 2005: 118). The Lichfield Angel was also found in an entrance (Rodwell *et al.* 2008), but it may not have been placed.

systems under which the deposits were made has helped explain why placed deposition of certain objects was thought to achieve those aims.

Conclusion
Anglo-Saxon placed deposits in context

The discussions of the previous two chapters have yielded new insights into the physical, social, and cognitive structure of Anglo-Saxon rural life, primarily from patterns of placed deposition in Anglo-Saxon settlements. Considering the liminality of placed deposits has refined our understanding of how settlements were structured both in space and time. The placement of child burials and possible gendered deposits in settlements have offered some hints as to how social structure was mapped onto settlement layout in the early and middle Anglo-Saxon periods. The employment of animal remains, smithing and woodworking tools, and loomweights in placed deposition resonates with animistic notions and transformative magic present, if perhaps just beneath the surface, in the Anglo-Saxon cognitive reality. There is more to be gained, however, from further research: first, into themes only hinted at in the limited sample of placed deposits identified so far; and second, by comparing placed deposits in Anglo-Saxon settlements to traditions of placed deposition elsewhere in the Anglo-Saxon landscape, as well as in neighbouring geographical regions and chronological periods.

One theme worth pursuing is the relationship between material and form in Anglo-Saxon placed deposits. The present study identified some relevant patterns in terms of correspondences between degree of articulation and species (§5.4.1). The relationship between material and form can go much deeper, however, as the forms of artefacts can variously derive from, enhance, or subvert the physical characteristics of the raw materials from which they are made (Conneller 2011). The discovery in a 9th- to 12th-century ditch at Hall Farm, Baston, Lincs. of a possible 'mask' formed by cutting the

cranium away from the facial bones of a human skull (Jarvis 1993: 61) raises obvious questions about the relationship between the object and the material from which it was made. Subtler are questions about ordinary artefacts. To what extent might the deer, and its totemic or animistic characteristics, be present in an antler comb, and how would that relate to placed deposition? Unfortunately there is still too little evidence to explore such questions in this study.

Another theme that might be worth pursuing once more and better data are available is the evidence for the deliberate fragmentation or destruction of material prior to or during placed deposition. The ceramic jar in SFB 1351 at Brooklands had a hole drilled into its body, a trait it shares with some urns in funerary contexts, raising the possibility that the pot had been 'ritually killed' prior to deposition (Blinkhorn 2008: 46–47; *cf.* Chapman 2000*a*: 42–43, 58–65). Some vessels placed in SFBs, for example in Grubenhaus 105 at Mucking and House VII at West Stow, appear to have been smashed on the base of the pit as part of the deposition process; these appear to have been partial vessels even before they were smashed, and most other pots in placed deposits were deposited semi-complete (§5.1.1). Other placed deposits suggest deliberate fragmentation associated with placed deposition. The body of a comb was buried in one posthole of building H4 (an SFB) at Hammersmith, and two of its teeth were in another. Similarly, the hindlegs and forelegs of a dog were buried in separate postholes of House XVII (an SFB) at Sutton Courtenay. Finally, lines of loomweights on the bases of SFBs destroyed by fire may represent the deliberate destruction of both building and loom (§7.5.1; §9.2.3). Chapman's ideas of fragmentation and enchainment in deposition, derived from relational concepts of dividuality and the distribution of personhood through exchange, may find some resonance here (Chapman 2000*a*); but further work is required before applying Chapman's ideas to Anglo-Saxon placed deposits, since he developed his

ideas specifically in response to depositional patterns observed in Mesolithic, Neolithic, and Copper Age settlements of southeast Europe.

There is considerable scope to discuss middle Anglo-Saxon placed deposition outside of rural settlements, a topic that was beyond the remit of this study. Comparatively urbanized settlements, such as *wics* emerging in the 7th and 8th centuries, would be an obvious starting point. The difficulty of recognizing associations between deposits and other settlement features increases with intensity and density of occupation, but some placed deposits have already been identified, though not necessarily interpreted as such (e.g. Morris & Jervis 2011). Two male burials, furnished with weapons, at Melbourne Street, *Hamwic*, and a prone male burial at Jubilee Hall, London, all of 7th-century date (Holdsworth 1980; Cowie *et al.* 1988: 57; Boyle 2004: 321), for example, could potentially be better understood in connection to normative and deviant burials in rural settlement contexts (Chapter 8). 'Productive sites' and other sites whose status is more difficult to determine could also be considered. The three excavations near Dorney, Berks., uncovered over 100 7th- to 9th-century pits interpreted as water holes or cesspits, but no other settlement features, and little in the way of occupational debris, and may have been a meeting place for trade or other purposes, with limited industrial activity (Hiller & Mortimer 2002: 25; Hiller & Petts 2002: 61, 65–69). Three of the pits contained placed deposits of articulated skeletal remains from dogs and horses (Foreman *et al.* 2002: fig. 3.4, CD-ROM: 'pit 30264', 'pit 40474', 'pit 41324'; Powell & Clark 2002).

Placed deposition also took place in non-settlement contexts. The association of graves with mortuary structures, boundaries, and pre-existing earthworks outside of settlements may be comparable to the association of placed deposits with similar features within settlements (Ch. 6). Based on place-name and textual evidence, it is expected that

pre-Christian ritual activity frequently took place in natural places in the landscape, including groves, meadows, and hilltops (Semple 2011). If placed deposition occurred in such places, it might be the only evidence from open space Anglo-Saxon ritual sites to survive archaeologically. Exactly that interpretation has been proposed for the ox skulls found at the Iron Age enclosure of Harrow Hill, Sussex (Meaney 1995: 31–32). A large number of Anglo-Saxon weapons recovered from rivers such as the Thames and the Witham seem to relate to a long-standing tradition of deposition in watery places, attested in the prehistoric, Roman, and later medieval periods (Hines 1997: 380–381, Booth *et al.* 2007: 231–234, Semple 2011: 747–749). One concentration of middle Thames weapons finds near Shepperton, Surrey, spans the 5th to 11th centuries (Booth *et al.* 2007: 232–233, 234). The recently discovered 6th- to 8th-century hoard of mostly martial gold artefacts at Ogley Hay, Staffs. (Dean *et al.* 2010; Leahy *et al.* 2011; Webster *et al.* 2011), was also deliberately deposited, and if it was not cached for later retrieval, the reason for its placement may have affinities with motivations for placed deposition in settlements.

Placed deposits in Anglo-Saxon settlements can also be compared to contemporary deposits from settlements elsewhere in the North Sea zone and in Ireland. No overall synthesis has been undertaken for any given region along the lines of the current study for England, although John Ljungkvist has collated a large number of placed deposits from Vendel-period settlements in Scandinavia (J. Ljungkvist, pers. comm.). Nevertheless, some preliminary work has produced anecdotal parallels with some of the patterns identified in Anglo-Saxon settlements. A brief survey of placed deposits in settlements dating to the Roman Iron Age and Migration Period in the Continental North Sea littoral indicates that the distribution by species of animals in placed deposits there disproportionately favours dogs and horses (Hamerow 2006: 23–26; *cf.* §5.1.2). Complete animals were found in the entrances to several buildings at

Feddersen Wierde, Lower Saxony, providing possible parallels for the complete cow in pit 6 at Cowdery's Down. At Deer Park Farms, Co. Antrim, a wooden trough up to 150 years old was left in place during the destruction and subsequent rebuilding of a 7th-century house (O'Sullivan & Nicholl 2010: 74). A number of quernstones, often fragmented and placed in doorways, were likewise associated with the destruction of buildings (*ibid.* 74–76). Both the trough, possibly used for kneading bread, and quernstones are identified with women and women's roles in early Irish texts (*ibid*. 74, 76). These deposits invite comparison with the placement of loomweights in Anglo-Saxon SFBs. Some examples, however, highlight important differences with Anglo-Saxon England. Most noticeable are probable foundation deposits, which are poorly attested in Anglo-Saxon settlements (§7.5.5), but appear elsewhere in the North Sea zone. A stabbed and garrotted child was placed beneath a hearth in the 7th- to 10th-century *Wurt* at Hessens, near Wilhelmshaven, Lower Saxony (Hamerow 2006: 24). Probable foundation deposits have also been noted in early medieval Irish contexts (O'Sullivan & Nicholl 2010: 73).

Placed deposition has received comparatively better attention in prehistoric contexts, both in Britain and on the Continent, and particularly in settlements of the British Iron Age. Complete skeletons, skulls, and articulated skeletal segments in late Iron Age pits again disproportionately feature horses, dogs, and wild animals (Hill 1995; see §10.1). Placed deposits in liminal places at roundhouses in both the Bronze Age and Iron Age appear to resonated with the spatial structuring and orientation of those buildings (Parker Pearson 1996; Brück 1999*a*; Woodward & Hughes 2007). Placed deposits in liminal times in the use-life of Bronze Age roundhouses in Britain and late prehistoric farmhouses in the Netherlands mark stages in the buildings' lifecycles that may have connected with significant events in the lives of their inhabitants (Brück 1999*a*;

Gerritsen 1999*a*). The quern fragments sealing the Bronze Age structure at Trethellan Farm, Cornwall (Brück 1999*a*: 155), compare both with the querns placed during the demolition of early medieval Irish buildings and with placed deposits of loomweights and pots in Anglo-Saxon SFBs. Placed deposits were also made in Roman Britain. Human burials in and around the ditches bounding late Roman rural settlements, villas, and house properties in towns (Esmonde Cleary 2000: 129, 133) perhaps foreshadow the middle Anglo-Saxon burials of children and some women along walls and farmyard boundaries (§8.5.1; §9.3.1).

Anglo-Saxon placed deposits may have been heirs to a longstanding tradition of placed deposition in northwest Europe, but they have their own legacy in the late Saxon and medieval periods (e.g. Morris & Jervis 2011). Several high-status settlements have yielded complete skeletons of hunting birds (Sykes 2011: 337). A late Saxon or Norman deposit of loomweights in a building destroyed by fire at Back Street, St Cross, Winchester, could have just been accidental, or it might express similar agency to the loomweight deposits of the early and middle Anglo-Saxon settlements (Collis 1978: 31; Hedges 1978: 38). An empty grave (520, or 70/1) covered by a stone slab dating to the late 9th to 10th century was located in the centre of the putative eastern end of the earliest phase of St Peter's in Wearmouth, just inside the eastern wall (Cramp 2005: 63, 64, 69, 89, figs. 6.8, 6.17; 2006: 193, fig. 28.4.1): in other words, if there had been an eastern entrance to the building, grave 520 would have been in an almost analogous location to Grave AX at Yeavering. The Lichfield Angel was deliberately placed face-down in a specially-dug pit (coin dated to the late 10th century) immediately next to the putative location of the shrine of St Chad in Lichfield Cathedral (Rodwell 2008: 55–57, figs 4, 5). The Angel itself is interpreted as having been deliberately broken off of a shrine chest, presumably an earlier version of St Chad's shrine itself (*ibid.* 58–60). The burial of

disused liturgical furnishings in or near religious structures is attested in both Roman and later medieval Britain (*ibid.* 59–60), but the deposition of the Lichfield Angel may owe as much to traditions of placed deposition in early and middle Anglo-Saxon England.

This overview of placed deposition in northwest Europe from the prehistoric period through the Middle Ages has been exceptionally if necessarily brief and, given the lack of comprehensive surveys, limited as a rule to anecdotes and half-glimpsed trends. An in-depth study would be needed to tease out the common threads and determine the relative affinities of Anglo-Saxon placed deposits to earlier British deposits versus contemporary deposits in the North Sea zone and Ireland, in order to establish what aspects of placed deposition (if any) express continuities of practice. The preceding discussion nevertheless shows that, while the roles played by placed deposits in Anglo-Saxon settlements are contextually specific (like the criteria for identifying them), they belong in some sense to a long tradition of placed deposition in northwest Europe, not just in settlements, but throughout the landscape. Although the details of their deployment vary across time and space, what remains constant is the simple fact that people have used placed deposits to structure settlement space and lifecycle, to mediate social relationships, and to achieve practical ends (given a cognitive paradigm in which ritual is integral to function). This study has tried to take advantage of that fact in order to improve our understanding of the physical, social, and cognitive structure of rural life in early and middle Anglo-Saxon England.

Appendix A
Settlements

Number on Fig. 4.1	Site	County & OS Grid Ref.	Placed deposit(s) found?	References	
1	82 Eden St., Kingston	Gtr London (Surrey) TQ18206923	no	Cowie & Blackmore 2008: 108–109	
2	Abbots Worthy	Hants SU50503266	no	Fasham & Whinney 1991	
3	Abingdon Vineyard	Oxon SU499972	no	Allen 1990*a*, 1990*b*	
4	Audlett Drive, Abingdon	Oxon SU50559735	yes	Keevill 1993	
5	Barrow Hills, Radley	Oxon SU51359815	yes	Chambers & McAdam 2007	
6	Barton Court Farm, Abingdon	Oxon SU510978	yes	Miles 1986	
7	Baston (Hall Farm)	Lincs. TF114138	no	Jarvis 1993 Taylor 2003*b*	
8	Battersea	Gtr London (Surrey) TQ26867679	no	Cowie & Blackmore 2008: 101–105	
9	Berwick Ponds Farm, Rainham	Gtr London (Essex) TQ55508385	yes	Maloney 2000, 2002, 2003; L. O'Brien pers. comm.	*See note at end of table.**
10	Bishopstone (Rookery Hill)	E. Sussex TQ46840073	yes	Bell 1977	
11	Black Bourton	Oxon SP28590421	no	Gilbert 2008	
12	Bloodmoor Hill, Carlton Colville	Suffolk TM521901	yes	Lucy *et al.* 2009	
13	Botolphs, Bramber	W. Sussex TQ193092	no	Gardiner 1990	
14	Bottesford	Lincs. SE89850695	yes	Boyer *et al.* 2009: 67–103	
15	Bourton-on-the-Water	Glos. SP17082202	no	Dunning 1932	
16	Bowthorpe (Bishy Barnabee Way)	Norfolk TG17840873	no	Trimble 2004	

Number on Fig. 4.1	Site	County & OS Grid Ref.	Placed deposit(s) found?	References
17	Bramford, Ipswich (Whitehouse Industrial Estate)	Suffolk TM1347	no	Caruth 1996
18	Brentford	Gtr London (Middlesex) TQ17807750	yes	Canham 1978; Cowie & Blackmore 2008: 54–56
19	Brixworth (Northampton Road)	Northants SP751699	no	Ford 1995
20	Brooklands, Milton Keynes	Beds. SP895404	yes	Stansbie 2008
21	Broome (Yarmouth Road)	Norfolk TM35289209	no	Robertson 2003
22	Brougham (Whinfell)	Cumbria NY56542762	no	Heawood & Howard-Davis 2002
23	Butley (Neutral Farm)	Suffolk TM37625067	yes	Maynard 1952: 207–208
24	Car Dyke, Waterbeach	Cambs. TL49046533	yes	Lethbridge 1927
25	Carlton Colville (Carlton Colville Bypass)	Suffolk TM5189	no	Meredith 2002
26	Catholme	Staffs. SK197163	yes	Losco-Bradley & Kinsley 2002
27	Catterick	N. Yorks. SE2399	no	Wilson *et al.* 1996
28	Chalton	Hants SU734144	yes	Addyman *et al.* 1972; Addyman & Leigh 1973; Champion 1977
29	Charlton (Goch Way)	Hants SU35604682	no	Wright 2004
30	Cheddar	Somerset ST457532	yes	Rahtz 1979
31	Chelsea	Gtr London (Middlesex) TQ27087763	no	Divers 2008*b*
32	Chopdike Grove, Gosberton	Lincs. TF19902950	yes	Crowson *et al.* 2005: 71–97

Number on Fig. 4.1	Site	County & OS Grid Ref.	Placed deposit(s) found?	References	
33	Clapham	Gtr London (Surrey) TQ29277588	no	Cowie & Blackmore 2008: 22–27	
34	Clerkenwell	Gtr London (Middlesex) TQ31708210	no	Sloane 2008	
35	Collingbourne Ducis (Cadley Road)	Wilts. SU24455400	yes	Pine 2001	
36	Corporation Farm, Abingdon	Oxon SU497957	no	Abingdon and District Archaeological Society 1973	
37	Cottam	E. Yorks. SE975667	yes	Richards 1999	
38	Cottenham	Cambs. TL449681	no	Mortimer 2000	
39	Countess Road, near Amesbury	Wilts. SU1642	yes	Lawson 2007	*See note at end of table.**
40	Cowdery's Down, Basingstoke	Hants SU6553	yes	Millett with James 1983	
41	Dover	Kent TR3141	yes	Philp 1976: 122 and fig. 4	*See note at end of table.**
42	Enfield	Gtr London (Middlesex) TQ35309910	no	Cowie & Blackmore 2008: 16–19	
43	Eye Kettleby	Leics. SK7318	yes	Hamerow 2006: tab. 1	*See note at end of table.**
44	Eynsham	Oxon SP430108	yes	Hardy *et al.* 2003	
45	Feltham	Gtr London (Middlesex) TQ12217734	no	Howell 2008	
46	Flitwick (Hinksley Road)	Beds. TL03633568	no	Luke 1999	
47	Flixborough	Lincs. SE876142	yes	Loveluck 2001; Loveluck & Atkinson 2007; Evans & Loveluck 2009; Dobney *et al.* 2007; Loveluck 2007*b*	

Number on Fig. 4.1	Site	County & OS Grid Ref.	Placed deposit(s) found?	References	
48	Flixton Park Quarry, Flixton	Suffolk TM3086	no	Boulter 2002*a*, 2002*b*, 2006	
49	Fowlmere	Cambs. TL42354590	yes	Spoerry & Hinman 2007	
50	Foxley	Wilts. ST907861	no	Hinchliffe 1986	
51	Fremington	Cumbria NY54702880	no	Oliver *et al.* 1996	
52	Friars Oak, Hassocks	W. Sussex TQ299162	yes	Butler 2000	
53	Gamlingay	Cambs. TL24305190	yes	Murray with McDonald 2005	
54	Godmanchester	Cambs. TL2570	yes	Gibson with Murray 2003	
55	Goltho	Lincs. TF116774	no	Beresford 1987	
56	Gosberton Third Drove, Gosberton	Lincs. TF17722888	yes	Crowson *et al.* 2005: 19–35	
57	Ham	Gtr London (Surrey) TQ17077152	no	Cowie & Blackmore 2008: 56–59	
58	Hammersmith	Gtr London (Middlesex) TQ23307790	yes	Cowie & Blackmore 2008: 36–49; Jamieson 2008	
59	Harlow	Essex TL47661116	no	Germany 2008	
60	Harmondsworth	Gtr London (Middlesex) TQ0778	yes	Andrews 1996; Farwell *et al.* 1999; Cowie & Blackmore 2008: 61–89	
61	Harston	Cambs. TL418508	yes	O'Brien forthcoming	*See note at end of table.**
62	Hartigans	Bucks. SP8839	yes	Williams 1993	
63	Hartlepool	Co. Durham NZ528337	yes	Daniels 1988, 2007	

Number on Fig. 4.1	Site	County & OS Grid Ref.	Placed deposit(s) found?	References	
64	Hay Green, Terrington St Clement	Norfolk TF53961790	no	Crowson *et al.* 2005: 147–171	
65	Headington	Oxon SP550079	yes	Leeds 1939: 356 Dickinson 1976: ii.139; Dodd 2003*a*	*See note at end of table.**
66	Heslington Hill, York	N. Yorks. SE62355085	no	Spall & Toop 2008	
67	Higham Ferrers	Northants SP959694	yes	Hardy *et al.* 2007	
68	Hinxton Hall	Cambs. TL4944	yes	Tipper 2005: tab. 55.	*See note at end of table.**
69	Hoddom	Dumfries & Galloway NY168728	no	Lowe 2006	
70	Hoe Hills, Dowsby	Lincs. TF11843029	no	Crowson *et al.* 2005: 56–69	
71	Horcott, near Fairford	Glos. SU145995	yes	Oxford Archaeology, unpublished site records	*See note at end of table.**
72	Hurst Park, East Molesey	Surrey TQ14506890	no	Andrews & Crockett 1996	
73	Ingleborough, West Walton	Norfolk TF47271481	no	Crowson *et al.* 2005: 171–190	
74	Itford Farm, Beddingham	E. Sussex TQ433059	no	James 2002	
75	Jarrow	Tyne & Wear NZ339652	no	Cramp 2005, 2006	
76	Keston	Gtr London (Kent) TQ41426322	no	Philp 1973 Cowie & Blackmore 2008: 13–16	
77	Leaves Lake Drove, Pinchbeck	Lincs. TF19212510	no	Crowson *et al.* 2005: 35–48	
78	Linford	Essex TQ669801	yes	Barton 1962	
79	Littlemore	Oxon SP53900210	yes	Moore 2001	

Number on Fig. 4.1	Site	County & OS Grid Ref.	Placed deposit(s) found?	References	
80	Lyminge	Kent TR161409	yes	Thomas 2011; G. Thomas pers. comm.	*See note at end of table.**
81	Marham (Old Bell)	Norfolk TF70840879	no	Archaeological Solutions n.d.; A. A. S. Newton pers. comm.	*See note at end of table.**
82	Maxey	Cambs. TF124081	no	Addyman 1964	
83	Melford Meadows	Norfolk TL878826	no	Mudd 2002	
84	Mitcham	Gtr London (Surrey) TQ27356801	no	Cowie & Blackmore 2008: 34–35	
85	Mornington House, Gosberton	Lincs. TF17473170	no	Crowson *et al.* 2005: 97–126	
86	Mortlake	Gtr London (Surrey) TQ20847660	no	Roycroft 2008	
87	Mucking	Essex TQ673803	yes	Hamerow 1993	
88	Nettleton Top, Nettleton	Lincs. TF107988	yes	Field & Leahy 1993	
89	New Bewick	Northd. NU060206	yes	Gates & O'Brien 1988	
90	New Wintles Farm, Eynsham	Oxon SP430107	no	Hawkes & Gray 1970; Berisford 1973; Gray 1974; Hawkes 1986	
91	North Elmham Park	Norfolk TF987215	no	Wade-Martins 1980	
92	Northampton	Northants SP75256030	no	Soden 1998	
93	Oakham (South Street)	Rutland SK85910869	no	Jones 1996	
94	Old Erringham	W. Sussex TQ20430754	yes	Holden 1976	
95	Old Parkbury Farm	Herts. TL15950220	no	Niblett 2001	

Number on Fig. 4.1	Site	County & OS Grid Ref.	Placed deposit(s) found?	References	
96	Orsett 'Cock' Enclosure	Essex TQ65348136	no	Carter 1998	
97	Pakenham (Grimstone End)	Suffolk TL935692	yes	Brown *et al.* 1955	
98	Pennyland	Bucks. SP862411	yes	Williams 1993	
99	Pitstone	Bucks. SP93821507	yes	Phillips 2005	
100	Polebrook	Northants TL063871	no	Upex 2003, 2004, 2005, 2006	
101	Puddlehill	Beds. TL00212347	no	Matthews & Hawkes *et al.* 1985	
102	Purwell Farm, Cassington	Oxon SP446122	no	Berisford 1973	*See note at end of table.**
103	Quarrington	Lincs. TF05814457	no	Taylor 2003*a*	
104	RAF Lakenheath	Suffolk TL7381	yes	Caruth 2002*a*, 2002*b*, 2002*c*, 2005, 2006; Gill 2002; Tester 2002, 2006	
105	Raunds	Northants TL0073	no	Audouy & Chapman 2009	
106	Riby Cross Roads	Lincs. TA18680813	yes	Steedman 1994	
107	Riverdene	Hants SU650523	no	Hall-Torrance & Weaver 2003	
108	Rose Hall Farm, Walpole St Andrew	Norfolk TF48741600	no	Crowson *et al.* 2005: 126–147	
109	Saxon's Lode Farm, Ripple	Worcs. SO86503920	no	Barber & Watts 2008	
110	Shap (Parker's Croft)	Cumbria NY56211513	no	Heawood & Howard-Davis 2002	
111	Sherborne House, Lechlade	Glos. SU21269974	no	Bateman *et al.* 2003	

Number on Fig. 4.1	Site	County & OS Grid Ref.	Placed deposit(s) found?	References	
112	Snetterton (Grange Farm)	Norfolk TM00659105	no	Robertson 2004	
113	South Lane, Kingston	Gtr London (Surrey) TQ17826887	no	Divers 2008*a*	
114	Spong Hill	Norfolk TF981195	yes	Rickett 1995	
115	St Mary Cray	Gtr London (Kent) TQ47076739	no	Cowie & Blackmore 2008: 11–13	
116	Staunch Meadow, Brandon	Suffolk TL7786	yes	Carr *et al.* 1988; Crabtree 2007	
117	Stretton-on-Fosse	Warks. SP216383	no	Ford 2002	
118	Sutton Courtenay	Oxon SU491933	yes	Leeds 1923; Leeds 1927; Leeds 1947; Hamerow *et al.* 2007; Hall *et al.* 2010	
119	Swindon Old Town	Wilts. SU157836	yes	Webster & Cherry 1977: 214; Tipper 2004: tab. 55, citing Canham and Phillips 1976: 10	*See note at end of table.**
120	The Bittoms, Kingston	Gtr London (Surrey) TQ18006855	no	Cowie & Blackmore 2008: 109–113	
121	Thetford (Brandon Road, HER 5756)	Norfolk TL863830	no	Dallas 1993	
122	Thetford (Brandon Road, HER 24849=37158)	Norfolk TL855832	yes	Atkins & Connor 2010	
123	Thetford (Redcastle Furze)	Norfolk TL86158305	yes	Andrews 1995	
124	Thirlings	Northd. NT956322	no	O'Brien & Miket 1991	
125	Tolley's Pit, Cassington	Oxon SP453103	yes	Berisford 1973; Case 1982: fig. 65 Dodd 2003*b*: 575–576; Hey 2004: 10–11, 30	*See note at end of table.**
126	Tulse Hill	Gtr London (Surrey) TQ31007350	no	Cowie & Blackmore 2008: 27–34	
127	Upton	Northants SP71466021	yes	Jackson *et al.* 1969	

Number on Fig. 4.1	Site	County & OS Grid Ref.	Placed deposit(s) found?	References	
128	Wantage	Oxon SU39588814	yes	Holbrook & Thomas 1996	
129	Wearmouth	Tyne & Wear NZ403577	no	Cramp 2005, 2006	
130	West Heslerton	N. Yorks. SE917760	yes	Powlesland 1990, 1997, 1998; Powlesland *et al.* forthcoming	
131	West Stow	Suffolk TL79707135	yes	West 1985; Crabtree 1989	
132	Wharram Percy	N. Yorks. SE858642	yes	Milne & Richards 1992 Stamper & Croft 2000 Rahtz & Watts 2004: 66–71	
133	Whitehall	Gtr London (Middlesex) TQ30107994	no	Green with Cowie 2008	
134	Willingham	Cambs. TL40407037	no	Fletcher 2008	
135	Willington	Derbs. SK288278	yes	Wheeler 1979	
136	Witham (Maltings Lane)	Essex TL814134	yes	Essex County Council Field Archaeology Unit 2003: 237; M. Atkinson pers. comm.	*See note at end of table.**
137	Wolverton Mill (Wolverton Turn Enclosure)	Bucks. SP80254066	yes	Preston 2007	
138	Worton, near Yarnton	Oxon SP44602111	no	Hey 2004	
139	Yarnton	Oxon SP47401125	yes	Hey 2004	
140	Yarnton (Cresswell Field)	Oxon SP44702114	yes	Hey 2004	
141	Yeavering	Northd. NT925306	yes	Hope-Taylor 1977	

* References to specific deposits were followed up at these sites, but the overall excavations were not thoroughly examined because only secondary references, fieldwork notices, and/or personal communications were accessible.

Appendix B
Placed deposits

Note: Next to each object type are three symbols in brackets. From left to right, these refer to ‘specially selected’, ‘specially treated’, and ‘specially arranged’ (see Chapter 4 and Tab. 4.1). The key to these symbols is as follows:

√ = yes

o = possibly

– = no

Site	Feature	County & OS Grid Ref.	References	Description
Audlett Drive, Abingdon	SFB 118	Oxon SU50559735	[1] Levitan 1993	Semi-complete dog skeleton on the centre base of an SFB ([1]: 75). Hindlimbs were missing. A small breed of Saxon dog.
Barrow Hills, Radley	Burial 4562 (in SFB 32)	Oxon SU 5135 9815	[1] Chambers & McAdam 2007 [2] McAdam 2007 [3] Hamerow 2006	Possibly complete skeleton of a human infant in a shallow cut in the base of an SFB ([2]: 201; [3]: tab. 1). Skeleton had been disturbed by burrowing. Dated to 5th or 6th century ([1]: 171).
Barton Court Farm, Abingdon	Sunken hut 1190	Oxon SU510978	[1] Miles 1986 [2] Chambers & McAdam 2007 [3] Tipper 2004	Thirteen annular lead rings 'on the base' of an SFB ([1]: 4:A10).* The rings were in the northeast corner of the pit; ten of them overlapped 'as if...threaded together on a cord' ([1]: 4:A10, figs 65, 92, 93). The pit had a single fill ([1]: 4:A8). The SFB is parallel to Romano-British ditch 1175, and at a slightly different orientation than nearby structures 1181 and 1178 ([1]: figs 13, 85). Dated to 5th or early 6th century ([1]: 7:F4, G1). **The section drawing appears to show the rings 10–30 cm above the base ([1]: fig. 65), but this may be a projection onto the plane of the section.*
Berwick Ponds Farm, Rainham	SFB	Gtr London (Essex) TQ55508385	[1] Maloney 2003 [2] Blackmore 2008 [3] L. O'Brien pers. comm.	Lead weights recovered from corners and postholes of an SFB ([2]: 205; [3]). Settlement dates to 5th–7th centuries ([1]: 43).
Bishopstone (Rookery Hill)	pits with cow skeletons	E. Sussex TQ46840073	[1] Webster & Cherry 1972 [2] Rahtz 1976 [3] Bell 1977	Cow skeletons found in pits ([2]: 410). No mention of cow skeletons in [1] or [3]. Settlement dated to 5th–6th centuries ([3]: 238).
Bloodmoor Hill, Carlton Colville	Pit F255	Suffolk TM521901	[1] Lucy *et al.* 2009 [2] Tipper 2009	Nearly 15 kg (2981 fragments) of animal bone in the single fill of a pit. The animal bone includes 'common' species as well as fowl, perching bird, roe deer, and freshwater and saltwater fish ([1]: 144, tab. 3.59). Also present were smaller quantities of potsherds, fired and unfired clay (including loomweights), slag, fragmented metal and bone Anglo-Saxon artefacts, and a flint awl, probably prehistoric ([1]: 146, tab. 3.59). The pottery includes three sherds from a semi-complete pot found in Structure 20 ([2]: tab. 4.10). Dated to phase 2b: AD 650–700 ([1]: 336, tab. 6.2).
Bloodmoor Hill, Carlton Colville	Pit F345	Suffolk TM521901	[1] Lucy *et al.* 2009	Two (semi-)complete cattle skulls and one horse skull in a deposit of animal bone within a 'grave-shaped' pit. The bone deposit, as well as 445g of fired clay, lay at the interface between lower fill and upper fills, about 25cm above the base. The pit had deep, vertical sides and a flat base. ([1]: 146, tab. 3.59). Adjacent to Structure 20, pit F345 lay 2 m from a Romano-British ditch, part of a group of features apparently defined on the east by the ditch ([1]: 37, fig. 1.7). Dated to phase 2a: AD 580–650 ([1]: 336, tab. 6.2).
Bloodmoor Hill, Carlton Colville	Pit [3429] = F366 (Pit Group L)	Suffolk TM521901	[1] Lucy *et al.* 2009	Complete cow skull in the centre of a pit, *c*.15 cm from base, amidst 'a black charcoal-rich silty soil [that] towards the centre contained frequent fire-cracked stones and numerous animal bones', including skull. Total depth of pit was 65 cm ([1]: 142, tab. 3.56). Dated to phase 2a: AD 580–650 ([1]: 336, tab. 6.2).

CONTENTS					CONTEXT		ASSOCIATED FEATURES		
Type	*Species*	*Age*	*Sex*	*Treatment (humans)*	*Type*	*Strati-graphic level*	*Type*	*Element*	**Date range (centuries)**
*complete articulated skeleton (o,√,√)	dog				SFB	on base	none	N/A	6th–7th
?complete articulated skeleton (√,–,√)	human	infant	indet.	complete	SFB	cut into base	none	N/A	5th–6th
lead weights (√,o,√)					SFB	on base	SFB	corner	5th–6th
lead weights (o,o,√)					SFB		SFB	corner	5th–7th
?complete articulated skeleton (√,√,–)	cattle				pit				5th–6th
disarticulated bone en masse (√,–,√)	various animal				pit	in fills	none	N/A	7th
skulls (√,o,√); disarticulated bone ?en masse (√,–,√)	*skulls:* cattle, horse				pit	base of final fill	linear earthwork	boundary (inside)	6th–7th
skull (o,o,√)	cattle				pit	base of final fill	none	N/A	6th–7th

Site	Feature	County & OS Grid Ref.	References	Description
Bloodmoor Hill, Carlton Colville	Structure 14	Suffolk TM521901	[1] Lucy *et al.* 2009	Over 4 kg of metal and nearly 6 kg of slag ('including substantial numbers of crucibles') in the fill at the base of an SFB. The metalwork contains both metalworking tools and scrap, including fragments of knives, a spearhead, a key, and a ?padlock case. Also present were copper alloy fragments and a large amount of fired clay. Unusually, this fill contained no bone or Anglo-Saxon pottery, and little unfired clay. Similar materials were found in the (much more voluminous) upper fill, in lesser but still significant quantities, and with other material as well ([1]: 65, tab. 3.11). Dated to phase 2a: AD 580–650 ([1]: 336, tab. 6.2).
Bloodmoor Hill, Carlton Colville	Structure 20	Suffolk TM521901	[1] Lucy *et al.* 2009 [2] Tipper 2009	Semi-complete pot covered by a layer of unfired clay loomweight material on the base of an SFB ([1]: 74). Most of the potsherds were found within a 2 m by 1 m area in the northwest quadrant, but one sherd was in the upper fill, and three were in pit F255, 2 m away ([1]: 45; [2]: tab. 4.10). The deposit was sealed by the lower fill ([1]: 74, tab. 3.17). A total of 21.5 kg of unfired clay, containing 84 loomweights, was found in the lower fill ([1]: tab. 3.17, fig. 4.56). Dated to phase 2b: AD 650–700 ([1]: 336, tab. 6.2).
Bloodmoor Hill, Carlton Colville	Structure 21	Suffolk TM521901	[1] Lucy *et al.* 2009	Several concentrations of unfired clay loomweight material (14 kg) either sealed by or in the basal fill (1274) and in the northern half of pit ([1]: 74, tab. 3.18). A smaller quantity of loomweight material (6 kg) was found in the upper fills. The unfired clay in both fills contained a total of 39 loomweights ([1]: fig. 4.56). Structures 21 and 22 have similar 'assemblage profiles', suggesting both SFBs might have been backfilled from the same source ([1]: fig. 6.33). Structure 21 had at least twice as much unfired clay as Structure 22, however. Structure 21 cut an earlier Romano-British ditch and lay 2 m from another ([1]: 74; fig. 1.7, fig. 2.1). The SFB does not appear to have respected the first ditch, but it is part of a group of features apparently defined on the east by the second ditch ([1]: 37). Dated to phase 2b: AD 650–700 ([1]: 336, tab. 6.2).
Bloodmoor Hill, Carlton Colville	Structure 30	Suffolk TM521901	[1] Lucy *et al.* 2009	Lightly fired and unfired loomweights on the base of an SFB, sealed by or possibly in the lower fill ([1]: 90). The loomweights were in the northeastern quadrant, and some lay against the side of the pit. A total of nine complete lightly fired loomweights (on the base) and 38 unfired loomweights came from the SFB ([1]: 90, fig. 4.56). Dated to phase 2a: AD 580–650 ([1]: 336, tab. 6.2).
Bloodmoor Hill, Carlton Colville	Structure 35	Suffolk TM521901	[1] Lucy *et al.* 2009	Three complete cattle skulls in a discrete group in the northwest quadrant of an SFB pit ([1]: 96). These were part of a large quantity of animal bone (nearly 10 kg) in the upper fill, particularly at the level of the 'very indistinct' interface between the lower and upper fills ([1]: 96, tab. 3.32). The upper fill also contained some unusual artefacts, while the lower fill contained an articulated goose wing and 5 kg of unfired clay, representing 14 unfired loomweights ([1]: fig. 4.56). The lower fill sealed the postholes ([1]: 93). The SFB cut and was aligned on a major Romano-British ditch that appears to have formed a focus for several Anglo-Saxon features ([1]: 37, 93, figs 1.7, 2.1, 3.1). Dated to phase 2a: AD 580–650 ([1]: 336, tab. 6.2).
Bottesford	Ditch 53	Lincs. SE89850695	[1] Boyer *et al.* 2009 [2] Young 2009 [3] Cowgill 2009*a* [4] Cowgill 2009*b*	Two lead vessel bases, folded, in the primary fill (37) of the terminal of a boundary ditch ([1]: 68). The vessels were neatly cut or torn apart, then folded ([4]: 73). The walls of a third vessel were found in the upper fill of same ditch further west, probably disturbed ([1]: 68). Pottery from the same fill is 8th century ([2]: 69).

CONTENTS					CONTEXT		ASSOCIATED FEATURES		
Type	*Species*	*Age*	*Sex*	*Treatment (humans)*	*Type*	*Strati-graphic level*	*Type*	*Element*	**Date range (centuries)**
iron assemblage (o,√,√)					SFB	in lower fill	none	N/A	6th–7th
semi-complete pottery (o,o,√); loomweights (√,–,√)					SFB	on base	none	N/A	7th
loomweights (o,o,√)					SFB	on base	linear earthwork	boundary (inside)	7th
loomweights (√,–,√)					SFB	on base	none	N/A	6th–7th
skulls (√,o,√)	cattle				SFB	?on lower fill	linear earthwork	indet.	6th–7th
lead vessels (√,√,√)					ditch	near base	ditch	terminus	8th

Site	Feature	County & OS Grid Ref.	References	Description
Brentford	SFB Z18	Gtr London (Middlesex) TQ17807750	[1] Canham 1978 [2] Sutton 1978 [3] Cowie & Blackmore 2008	Partial articulated skeleton of a cat on the base of a possible SFB ([1]: 30; [2]: 143; [3]: 55). Dated by pottery to mid-6th century ([3]: 56).
Brooklands, Milton Keynes	SFB 1351	Beds. SP895404	[1] Stansbie 2008 [2] Blinkhorn 2008 [3] Strid 2008 [4] Nicholson 2008	A semi-complete jar in the centre of a group of animal bones, including a sow's mandible, all on the base of an SFB; also in the lower fill were semi-articulated remains of neonatal piglets and bones from a number of pike heads ([1]: 20; [4]: 75). The jar was complete except for a hole drilled into its body ([1]: 20; [2]: 46–47). A total of 33 semi-articulated skeletal fragments of neonatal/juvenile piglets were found in the fills ([3]: 72). The pike bones, mainly found in the lower fill, came from a minimum of ten pike heads; the only post-cranial element was a pike vertebra found inside the jar ([4]: 75, tab. 1). The other disarticulated animal bone on the base, including the pig mandible, might also have been placed. A sherd of Oxfordshire white ware mortarium, the only late Roman artefact on the site, was also present in the lower fill ([1]: 27). The SFB cut two backfilled Roman period ditches, but these do not appear to have affected settlement layout ([1]: 20, fig. 4). The pottery in the SFB appears to date to the fifth century ([2]: 46).
Butley (Neutral Farm)	SFB	Suffolk TM37625067	[1] Maynard 1952 [2] Rahtz 1976	An ox skull 'in' a hearth 'in' a 'rectangular hut floor' ([1]: 208; [2]: 412). 'Fixed' in the skull was an iron spear head. 'Floor' appears to refer to the entire fill (*cf.* Lethbridge 1927: 141).
Car Dyke, Waterbeach	SFB	Cambs. TL49046533	[1] Lethbridge 1927 [2] Hamerow 2006	Articulated dog skeleton 'in' an SFB 'floor' ([1]: 146; [2]: 19, tab. 1). The dog was large, the size of a wolf ([1]: 146 n. 1). A sherd of Romano-British pottery was found on top of the dog. 'Floor' appears to refer to the entire pit fill ([1]: 141). The SFB was dug into the silt at the edge of the Car Dyke ([1]: 141). Dated to the 5th or 6th century ([2]: tab. 1).
Catholme	AS20	Staffs. SK197163	[1] Losco-Bradley & Kinsley 2002 [2] Tipper 2004	About 25 loomweights and unfired clay on the base of an SFB, mostly to one side, in two to three clusters ([1]: 54, figs 3.32, 3.33, 3.34; [2]: tab. 55). Dated by radiocarbon and stratigraphy to 7th–9th centuries ([1]: 122–123).
Catholme	AS63	Staffs. SK197163	[1] Losco-Bradley & Kinsley 2002 [2] Tipper 2004	Over 40 loomweights on the base of an SFB, in three clusters ([1]: 83, fig. 3.79; [2]: tab. 55). Dated by radiocarbon and stratigraphy to 7th–9th centuries ([1]: 122–123).
Catholme	Burial 3617	Staffs. SK197163	[1] Losco-Bradley & Kinsley 2002 [2] Hamerow 2006	Adult ?male burial in a grave dug into the backfill of SFB AS13 at the entrance (E1) of an enclosure (zone IV) formed by ditches D3 and D9 ([1]: 40–41, fig. 3.97; [2]: 9–10, fig. 4, tab. 1). Skeleton aged to over 20 years on the basis of tooth wear; size implies a male ([1]: 41). The knees were close together but the lower legs were splayed ([1]: fig. 3.10), consistent with legs bound at the knee. Zone IV was *c.*40 m across and represented a minor enclosure (Reynolds 2003: 110–111, fig. 6). The settlement was dated by radiocarbon to the 7th–9th centuries ([1]: 122–123).

	CONTENTS					CONTEXT		ASSOCIATED FEATURES		
	Type	*Species*	*Age*	*Sex*	*Treatment (humans)*	*Type*	*Strati-graphic level*	*Type*	*Element*	**Date range (centuries)**
	?complete articulated skeleton (o,o,√)	cat				SFB	on base			6th
	semi-complete pottery (√,√,√); articulated skeletal segments (√,o,√); skulls (o,o,√)	*artic. segments:* pig; *skulls:* pike	*pigs:* neonatal			SFB	on base/in lower fill	none	N/A	5th
	skull (√,√,√)	cattle				SFB				?
	complete articulated skeleton (o,o,√)	dog				SFB		linear earthwork	indet.	5th–6th
	loomweights (√,–,√)					SFB	on base	none	N/A	7th–9th
	loomweights (√,–,√)					SFB	on base	none	N/A	7th–9th
	complete articulated skeleton (√,–,√)	human	adult	?male	?bound	grave		minor enclosure	entrance	7th–9th

Site	Feature	County & OS Grid Ref.	References	Description
Catholme	Burial 3666	Staffs. SK197163	[1] Losco-Bradley & Kinsley 2002 [2] Hamerow 2006	Human burial in a grave dug into ditched boundary D49 just to the north of entrance E12 ([1]: 41, figs 3.8, 3.10, 3.97; [2]: 9–10, fig. 4, tab. 1). Stains showed the location of the skull, spine, and upper arms. A knife blade lay on the spine stain ([1]: 111, fig 3.95.3). A surviving fragment of cranium indicated an adolescent or adult ([1]: 41). The burial was oriented southwest-northeast, following the ditch. The depth implies the grave was dug before the ditch had been completely filled in. The boundary D49 is thought to have been visible in the Anglo-Saxon period and appears to have formed the eastern boundary of the settlement ([1]: 20). The settlement was dated by radiocarbon to the 7th–9th centuries ([1]: 122–123).
Catholme	Cattle burial 3663	Staffs. SK197163	[1] Losco-Bradley & Kinsley 2002 [2] Hamerow 2006	Articulated segments of a cattle skeleton in a pit parallel to ditched boundaries D47 ([1]: 41; [2]: 9–10, fig. 4, tab. 1). The cattle remains, probably from same individual, included an articulated lower jaw (both mandibles and nearly all teeth), a possible scapula blade, and probable articulated segments of a right foreleg and a left hindleg ([1]: 41). Bone was poorly preserved on site, but even so the animal must have been dismembered, because the pit was too small to contain the whole animal ([1]: 41). The ditch D47 was a Saxon ditch associated with multi-phase boundary D49 which is thought to have been visible in the Anglo-Saxon period and appears to have formed the eastern boundary of the settlement ([1]: 20). The settlement was dated by radiocarbon to the 7th–9th centuries ([1]: 122–123).
Chalton	'Giant *Grubenhaus*'	Hants SU734144	[1] Champion 1977 [2] Tipper 2004	Cluster of loomweights on the base of a large SFB (8.6 m x 5.4 m), 'apparently having collapsed from a stack or pile' [1]: 365; [2]: tab. 55). Burnt daub, burnt timbers, and charcoal overlay the loomweights, indicating the building was destroyed by fire ([1]: 365). Dated on artefact typology to the 7th century [1]: 367.
Cheddar	Human burial 2	Somerset ST457532	[1] Rahtz 1979 [2] Powers 1979 [3] Hamerow 2006	Human burial in a shallow grave within 2 m of structure Z ([1]: 96, fig. 29; [3]: 10, tab. 1). The interned was an adult probably male, slightly older than 30–40 years ([2]: 353). The body was crouched on its right side, head to the east; the shallow grave and body positioning suggested haste to the excavator ([1]: 96). Structure Z, probably contemporary to the burial, may have been a building or a pair of fence lines ([1]: figs 10, 29). The burial was assigned to period 1: pre-930 ([1]: 5).
Chopdike Grove, Gosberton	Pit 029	Lincs. TF19902950	[1] Crowson *et al.* 2005	Possibly complete skeleton of juvenile/neonatal sheep in a re-used pit ([1]: 77). The pit was only half excavated, and the sheep was in the centre (both vertically and stratigraphically), so it might have been complete ([1]: fig. 35). The sheep rested on partial backfill, and several layers above the sheep appear to have formed by silting, prior to the next deliberate backfill layer ([1]: 76). Pottery suggests and 8th- to 9th-century date for the deposit ([1]: 77).
Collingbourne Ducis (Cadley Road)	SFB 100	Wilts. SU24455400	[1] Pine 2001 [2] Timby 2001 [3] Hamilton-Dyer 2001 [4] Pine & Ford 2001	Partial skeletons of two young adult cats in the fill of a shallow SFB ([1]: 90; [3]: 104). Dated by pottery and radiocarbon to 5th–7th centuries ([1]: tab. 14; [2]: 98, tab. 3; [4]: 114).

CONTENTS					CONTEXT		ASSOCIATED FEATURES		
Type	*Species*	*Age*	*Sex*	*Treatment (humans)*	*Type*	*Strati-graphic level*	*Type*	*Element*	**Date range (centuries)**
complete articulated skeleton (√,–,√)	human	indet.	indet.	indet.	grave		major enclosure	entrance	7th–9th
articulated skeletal segments (√,√,o)	cattle				pit		major enclosure	boundary (outside)	7th–9th
loomweights (√,–,√)					SFB	on base	none	N/A	7th
complete articulated skeleton (√,–,√)	human	adult	?male	crouched	grave		earthfast building	wall (outside)	9th–10th
?complete articulated skeleton (o,√,√)	sheep	neonatal			pit	in early fill	none	N/A	8th–9th
articulated skeletal segments (√,√,–)	cat				SFB		none	N/A	5th–7th

Appendix B: Placed deposits

Site	Feature	County & OS Grid Ref.	References	Description
Cottam	Pit 1073	E. Yorks. SE975667	[1] Richards 1999 [2] Dobney *et al.* 1999 [3] Hamerow 2006	A human skull (without its mandible) found face-down in a pit with a block of chalk next to it ([1]: 36; [3]: 14, tab. 1). The skull belonged to a probable female, 25–35 years old, and showed some evidence of weathering; the mandible was not forcibly removed ([2]: 85–86). The skull was halfway down the pit, at the base of a single, final backfill ([1]: 36, 93). The skull was radiocarbon dated to the late 7th or 8th century ([1]: 92), but backfill is dated by a silver penny of Æthelbert of Wessex at its surface to before 858–862x864. The pit was located just inside the western boundary of a minor enclosure, *c.*60 m square ([1]: 36, illus. 18).
Countess Road, near Amesbury	SFB	Wilts. SU1642	[1] Lawson 2007	Horse skull in the centre of an SFB, apparently not on the base ([1]: fig. 9.36).
Cowdery's Down, Basingstoke	Building C18	Hants SU6553	[1] Millett with James 1983 [2] Tipper 2004	Remains of a human infant in an axial posthole (A) of a probable SFB, Structure C18 ([1]: 217; [2]: 153). Remains included indeterminate disarticulated bones and fragments from the torso, arms and cranium ([1]: M4:70). The remains were found in the lower fill of the posthole, which also contained the ghost of a timber ([1]: 217, M5:16). Structure phased to 6th–7th century ([1]).
Cowdery's Down, Basingstoke	Pit 6	Hants SU6553	[1] Millett with James 1983 [2] Maltby 1983 [3] Hamerow 2006 [4] Morris & Jervis 2011	Articulated cow skeleton in a pit outside an entrance to an earthfast building, structure C13 ([1]: 221, figs 49, 50; [3]: 11, tab. 1). The cow was over 5 years old, but not in old age; and although skinning and some butchery took place, including the removal of meat from the left leg, it was probably deposited otherwise complete ([2]: 258–259; [4]: 76). The cow lay on a level surface of cobbles, 1 m above the base of the pit, overlying a lower fill of pure clay that contained a single boar maxilla ([1]: 221, fig. 49). The pit cut the foundation trench of structure C13 but respected the timber wall line ([1]: 221). A post of uncertain function stood immediately outside the doorway, aligned on the building axis, and the pit also respected this posthole, lying just south of it and the doorway ([1]: 221, figs 49, 50). Structure assigned to 6th–7th century ([1]).
Dover	SFB	Kent TR3141	[1] Philp 1976 [2] Tipper 2004	Lines of 'burnt' loomweights on the base of a large SFB ([1], [2]: tab. 55). The record photo shows around 100 weights lying in at least five lines ([1]: fig. 4). The SFB was over 7.5 m long and was destroyed by fire ([1]: 122). Dated to the 8th or 9th century ([1]: 122).
Eye Kettleby	Pit 977	Leics. SK7318	[1] Hamerow 2006	Articulated post-cranial skeleton of a cow near the base of a pit, probably 6th century in date ([1]: tab. 1, citing N. Finn pers. comm.). The skull was not present.
Eye Kettleby	Pit 2229	Leics. SK7318	[1] Hamerow 2006	Two fragmentary cow skulls in the lower fill of a probable 6th-century pit ([1]: tab. 1, citing N. Finn pers. comm.). A sheep mandible and animal bones were also present, and may have been part of the same deposit.
Eye Kettleby	SFB 895	Leics. SK7318	[1] Hamerow 2006	Articulated infant skeleton near the base of a probable 6th-century SFB ([1]: tab. 1, citing N. Finn pers. comm.).
Eye Kettleby	SFB 2769	Leics. SK7318	[1] Hamerow 2006	Incomplete articulated skeleton of a dog 20 cm above the base of an SFB of probable 6th-century date ([1]: tab. 1, citing N. Finn pers. comm.).

CONTENTS					CONTEXT		ASSOCIATED FEATURES		
Type	*Species*	*Age*	*Sex*	*Treatment (humans)*	*Type*	*Strati-graphic level*	*Type*	*Element*	**Date range (centuries)**
skull (√,√,√)	human	adult	?female	skull	pit	base of final fill	minor enclosure	boundary (inside)	7th–9th
skull (o,o,√)	horse				SFB				?
disarticulated bone (√,o,√)	human	infant	indet.	incomplete	SFB	posthole	none	N/A	6th–7th
complete articulated skeleton (√,√,√)	cattle	5+ years	female		pit	base of final fill	earthfast building	doorway	6th–7th
loomweights (√,–,√)					SFB	on base			8th–9th
*complete articulated skeleton (√,√,√)	cattle				pit	near base			?6th
skulls (√,o,√)	cattle				pit	lower fill			?6th
complete articulated skeleton (√,–,√)	human	infant	indet.	complete	SFB	near base			?6th
*complete articulated skeleton (o,o,√)	dog				SFB	?in/on lower fill			?6th

Site	Feature	County & OS Grid Ref.	References	Description
Eynsham	Pit 394	Oxon SP430108	[1] Hardy *et al.* 2003 [2] Mulville 2003 [3] Dodd & Hardy 2003 [4] Hamerow 2006	Disarticulated bones of various animals deposited *en masse* in a pit ([1]: 45–46; [4]: tab. 1). There were over 2400 specimens, from over 90 individual animals ([2]: 357, tab. 10.1). The lower fills, which stratigraphy shows were characterized by relatively small, intermittent backfilling events, contained mostly butchery waste from cattle, sheep, and pig, including three cattle skulls, two sheep skulls, and a juvenile horse skull ([2]: 353, 357). The upper fills represented more rapid backfilling and contained a wider range of species (in addition to the three major domesticates, horse, dog, cat, deer, hare, fowl, crane, fish, and shellfish were present), primarily representative of kitchen and table waste, but also including seven skulls (3 sheep, 3 cattle, 1 pig), three sets of articulated limbs (sheep, cattle, and horse), and a complete fowl skeleton ([2]: 358). The lower fills show affinities with phase 2a: 5th–7th century; whereas the upper fills are linked with phase 2b: 7th–8th century ([2]: 358–359, tab. 10.8; [3]: 464).
Flixborough	burial 1960	Lincs. SE876142	[1] Loveluck & Atkinson 2007 [2] Geake 2007 [3] Mays 2007	Human burial in a grave parallel to and inside north wall of building 1a, in the northeast corner of the building ([1]: 50, figs 4.2, 4.4). The burial, oriented west-east, contained the poorly preserved remains of a juvenile, 11–12 years old, exhibiting cribra orbitalia ([3]: 120, fig. 8.5). The grave cut the gravel foundation of building 1a and was overlain by limestone slabs supporting the sill beam foundations of building 1b ([2]: 114). Building 1a belonged to phase 3a: early to mid-8th century ([1]: 49–50).
Flixborough	burial 3580	Lincs. SE876142	[1] Loveluck & Atkinson 2007 [2] Geake 2007 [3] Mays 2007	Human burial in a grave parallel to and inside the south wall of building 1a ([1]: 49, figs 4.2, 4.4, 4.5). The burial, oriented west-east, contained the supine remains of an adult female skeleton (3581), aged 20–30 years ([3]: fig. 8.5). The individual exhibited healed back and leg injuries, and signs of sinusitis and possible tuberculosis, albeit not far advanced ([3]: 120; [2]: 114). The burial was overlain by limestone slabs supporting the sill-beam of building 1b ([1]: 49, fig. 8.1). Burial 3706 lay just east of the foot of this grave ([1]: fig. 4.2). Building 1a belonged to phase 3a: early to mid-8th century ([1]: 49–50).
Flixborough	burial 3706	Lincs. SE876142	[1] Loveluck & Atkinson 2007 [2] Mays 2007	Perinatal foetus buried less than 1 m inside the southern wall of building 1a, 50 cm from grave 3581 ([1]: 49, figs 4.2, 4.4). The burial, aligned southwest-northeast, was well preserved (80% complete), and the infant was aged 38–39 weeks *in utero* ([2]: fig. 8.5). Building 1a belonged to phase 3a: early to mid-8th century ([1]: 49–50).
Flixborough	burial 3878	Lincs. SE876142	[1] Loveluck & Atkinson 2007 [2] Geake 2007 [3] Mays 2007	Human burial in a grave parallel to and 1 m outside building 1a ([1]: 49, figs. 4.2, 4.4). The poorly preserved burial, oriented west-east, contained the supine remains of a juvenile (skeleton 3878), *c.*11 years old, flexed, with bent legs and perhaps bent arms ([3]: fig. 8.5; [2]: 114). Building 1a belonged to phase 3a: early to mid-8th century ([1]: 49–50).
Flixborough	burial 4010	Lincs. SE876142	[1] Loveluck & Atkinson 2007 [2] Mays 2007	Human burial in a grave along the inside northern wall of building 1a and adjacent to an internal partition of building ([1]: 49–50, figs 4.2, 4.4). The burial, oriented west-east, was well preserved and contained the supine, extended remains of a juvenile, *c.*9 years old, exhibiting cribra orbitalia ([2]: 120, fig. 8.5). Building 1a belonged to phase 3a: early to mid-8th century ([1]: 49–50).

CONTENTS					CONTEXT		ASSOCIATED FEATURES		
Type	*Species*	*Age*	*Sex*	*Treatment (humans)*	*Type*	*Strati-graphic level*	*Type*	*Element*	**Date range (centuries)**
disarticulated bone en masse (√,–,√); skulls (√,o,o); articulated skeletal segments (√,o,o); complete articulated skeleton (o,√,o)	*skulls:* cattle, sheep, pig, horse; *segments:* cattle, sheep, horse; *skeleton:* domestic fowl	*horse skull:* juvenile			pit	in fills	none	N/A	5th–8th
complete articulated skeleton (√,–,√)	human	juvenile	indet.	indet.	grave		earthfast building	corner	8th
complete articulated skeleton (√,–,√)	human	adult	female	supine extended	grave		earthfast building	wall (inside)	8th
complete articulated skeleton (√,–,√)	human	infant	indet.	complete	grave		earthfast building	wall (inside)	8th
complete articulated skeleton (√,–,√)	human	juvenile	indet.	flexed	grave		earthfast building	wall (outside)	8th
complete articulated skeleton (√,–,√)	human	juvenile	indet.	supine extended	grave		earthfast building	wall (inside)	8th

Site	Feature	County & OS Grid Ref.	References	Description
Flixborough	burial 2231/2	Lincs. SE876142	[1] Loveluck & Atkinson 2007 [2] Geake 2007 [3] Mays 2007	Skull and cervical vertebrae of a human probably belonging to a complete inhumation which had slumped into a posthole of earlier building 19 ([1]: 43, 49). The head and neck, from a juvenile 3–4 years old exhibiting cribra orbitalia and signs of a *peri-mortem* intra-cranial infection, do not show evidence of forced dismemberment or redeposition ([3]: 120, 121, fig. 8.5). The burial was inside building 2, but it is thought (by comparison to the other burials) to have been contemporary with building 1a (13 m away), thus predating building 2 ([2]: 114). Building 1a belonged to phase 3a: early to mid-8th century ([1]: 49–50).
Flixborough	small pit or posthole	Lincs. SE876142	[1] Evans & Loveluck 2009 [2] Loveluck & Atkinson 2007 [3] Ottaway *et al.* 2009 [4] Ottaway 2009*a*	Iron cauldron suspension chain and iron ploughshare deposited together in a small pit or posthole ([3]: 173; [4]: 245). Both objects were complete, and the cauldron chain was carefully folded ([1]: figs 5.5, 6.1, pl. 5.1). The cauldron chain, 2 m long, could have held a cauldron as big as the one found at Sutton Hoo (70 cm across), and the ploughshare showed no signs of use ([3]: 173, 245). The deposit was assigned to phase 3biv-5b: mid-8th to early 10th century ([3]: 173; [4]: 245; [2]: fig. 2.21).
Flixborough	unstratified	Lincs. SE876142	[1] Ottaway 2009*b* [2] Cowgill 2009*c*	Hoard of woodworking tools and a bell contained in two nested lead vessels, unstratified ([1]: 256–261; [2]: 267–277). The tools, including axes, adzes, shaves, bits, a bill hook, and a hoe/spade sheath, date typologically to the 8th–10th centuries ([1]: 256–258). The bell was marked with an eight-pointed asterisk ([1]: 261). Along the edge of the rim of the larger lead vessel is a series of linear marks and a cross, each line stamped from a single template ([2]: 268).
Fowlmere	pit	Cambs. TL42354590	[1] Spoerry & Hinman 2007 [2] Blinkhorn 2007	Complete articulated horse skeleton in pit adjacent (1 m) to SFB of early Saxon date ([1]: 137). Small pony (115 cm tall), probably female, 7 years old, lying on its right side, head to south, legs flexed ([1]: 137–138). SFB dated by pottery to the 6th, or possibly 5th, century ([2]: 139).
Friars Oak, Hassocks (Site A)	SFB	W. Sussex TQ299162	[1] Butler 2000 [2] Hamerow 2006	Two clusters of burnt human and animal bone fragments, possible cremation pyre debris, surrounding a large piece of burnt flint ([1]: 6). The deposit contained 300 bone fragments, predominantly animal. Charcoal and ash were also present. Found in the lower secondary fill (context 10). Pottery consistent with the later 8th–9th century ([1]: 6).
Friars Oak, Hassocks (Site A)	Pit 7	W. Sussex TQ299162	[1] Butler 2000 [2] Hamerow 2006	Deposit of burnt human and animal bone, probable cremation pyre debris, in context 8 of a pit that may have first been used for storage ([1]: 6). Pottery dates to 9th or early 10th century ([1]: 6–8).
Gamlingay	Building 5	Cambs. TL24305190	[1] Murray with McDonald 2005 [2] Crummy 2005	Cluster of unfired loomweights at the interface between the primary and secondary fills of an SFB, close to the northwest edge of the pit ([1]: 186, 283). Also present in the fill was a prehistoric pebble hammer, possibly curated ([1]: 283). The distribution of finds types from buildings 5 and 7 stand out in contrast to the overall assemblage ([2]: graph 5). Pottery dates to 6th–7th century ([1]: 186).
Gamlingay	Building 6	Cambs. TL24305190	[1] Murray with McDonald 2005	Possibly complete vessel in the lower fill of an SFB ([1]: 283).

CONTENTS					CONTEXT		ASSOCIATED FEATURES		
Type	*Species*	*Age*	*Sex*	*Treatment (humans)*	*Type*	*Strati-graphic level*	*Type*	*Element*	**Date range (centuries)**
complete articulated skeleton (√,–,√)	human	juvenile	indet.	indet.	posthole		none	N/A	8th
artefact set (√,√,√)					pit				8th–10th
artefact set (√,√,–); lead vessels (√,√,–)					unstratified	N/A			8th–10th
complete articulated skeleton (√,o,√)	horse	7 years old	female		pit		SFB	wall (outside)	5th–6th
pyre debris (√,o,o)	human, animal			pyre debris	SFB	in lower fill	none	N/A	8th–9th
pyre debris (√,o,o)	human, animal			pyre debris	pit		none	N/A	9th–10th
loomweights (√,o,√)					SFB	on base	none	N/A	6th–7th
?complete pottery (o,o,√)					SFB	lower fill	none	N/A	5th–6th

Site	Feature	County & OS Grid Ref.	References	Description
Gamlingay	Building 7	Cambs. TL24305190	[1] Murray with McDonald 2005 [2] Crummy 2005 [3] Roberts 2005	The partial skeletons of piglets and nine lead weights in an SFB ([3]: 246, tab. 23; [2]: 232). The piglets showed no signs of butchery ([3]: tab. 23). The lead weights were found mostly in the corners and postholes of the structure, including two on the base and one in an axial posthole ([2]: 232; [1]: 259). Six of the weights were perforated discs and the other three were annular. The bone assemblage from this SFB was the richest and most varied on the site, and included a mature pig skull ([3]: tab. 23); the latter could not be identified as placed using this study's criteria. The distribution of finds types in building 7 was unusual, particularly in containing a large proportion of the site's antler offcuts ([2]: graph 5, tab. 8). The SFB was adjacent to an earlier boundary ditch (2818), but it did not respect the alignment of the ditch, which may no longer have been visible ([1]: 192, fig. 10). Pottery in the SFB dates to the 5th–6th century ([1]: 187).
Gamlingay	Grave 65	Cambs. TL24305190	[1] Murray with McDonald 2005	Human burial in a grave cutting the southwest corner foundation of an earthfast structure ([1]: 199). The burial contained the complete, supine, extended remains of a male, 15–25 years old ([1]: 312). The shallow grave was damaged by ploughing, and an 'additional' disarticulated leg in its southeast corner was probably intrusive ([1]: 311–312). The grave was on the 'exact alignment' of the former wall of the structure ([1]: 311). Grave 65 is considered contemporary to the other burials on the site, which have been dated by pottery to the 7th to 9th centuries ([1]: 199, 214).
Godmanchester	F2250	Cambs. TL2570	[1] Gibson with Murray 2003 [2] Lyne 2003 [3] Baxter 2003	Complete skeleton of a hunting dog, oriented east-west, limbs tucked under body, at the base of a pit ([1]: 154). The dog was a large male, fairly old at the time of death ([3]: 195–196). Possible cut marks and missing phalanges could indicate skinning (ibid.). The pit had two fills and was intercutting and parallel to Anglo-Saxon ditch 2007, the southeastern boundary of Enclosure 1 ([1]: figs 15, 16). Two other partial dog skeletons and a dog skull with associated postcranial elements were found in boundary ditches of Enclosure 1 ([3]: 196). Pit 2250 was tentatively assigned to the Roman period but contained very little Romano-British pottery, which could equally have been residual ([1]: 151–152, [2]: 156). The settlement has been classed as a 'rectilinear settlement' (Reynolds 2003: 119–120, fig. 10), dated by pottery to the 5th–7th century ([1]: 156).
Gosberton Third Drove, Gosberton	Enclosure 2	Lincs. TF17722888	[1] Crowson *et al.* 2005 [2] Blinkhorn 2005 [3] Baker 2005	Incomplete skeleton of a piglet in the upper fills of a ditch terminus flanking the entrance to the earliest phase of a small (7.5 m x 6 m) sub-rectangular enclosure ([1]: 24, 35, fig. 8, pl. 2). The animal was less than 4–6 months old ([3]: 32–33). It was about 1 m east of the entrance ([1]: fig. 8). Settlement activity was dated by pottery to before the 8th century ([2]: 32).
Hammersmith	Building H4	Gtr London (Middlesex) TQ23307790	[1] Cowie & Blackmore 2008 [2] Blackmore & Riddler 2008	The body of a bone comb and comb teeth recovered from separate postholes of the same SFB ([1]: 41). The near-complete body of the double-side composite bone comb was found toothless in axial posthole 288 ([1]: fig. 46); two teeth, probably from the same comb, were found in internal posthole 151 ([2]: 207–208). Dated by pottery to late 5th or early 6th century ([1]: 48).

CONTENTS					CONTEXT		ASSOCIATED FEATURES		
Type	*Species*	*Age*	*Sex*	*Treatment (humans)*	*Type*	*Strati-graphic level*	*Type*	*Element*	**Date range (centuries)**
lead weights (o,o,√); articulated skeletal segments (√,√,–)	pig	neonatal			SFB	on base/in lower fill	*lead weights:* SFB	*lead weights:* corner	5th–6th
complete articulated skeleton (√,–,√)	human	adolescent	male	supine extended	grave		earthfast building	corner	7th–9th
complete articulated skeleton (o,o,√)	dog	adult	male		pit	on base	rectilinear enclosure	boundary (inside)	5th–7th
articulated skeletal segments (o,√,o)	pig	juvenile			ditch	upper fills	enclosure	entrance	5th–7th
single artefact (o,o,√)					SFB	posthole	none	N/A	5th–6th

Site	Feature	County & OS Grid Ref.	References	Description
Hammersmith	Building H5	Gtr London (Middlesex) TQ23307790	[1] Cowie & Blackmore 2008 [2] Ainsley 2008	Articulated horse skeleton in a probable SFB ([1]: 41–42). The horse was about 13 hands (= 130 cm) high ([2]: 46). It was probably deposited complete, with the head and forelimbs truncated by a modern feature; other missing elements have been tentatively attributed to scavengers ([2]: 46). The building has been assigned a probable 6th-century date ([1]: 48–49.
Harmondsworth (Prospect Park)	SFB 3030	Gtr London (Middlesex) TQ0778	[1] Farwell *et al.* 1999 [2] Hutcheson 1999 [3] Cowie & Blackmore 2008	Approximately 31 fired, annular loomweights, many complete, on the flat base of the southern half of an SFB ([1]: 20; [2]: 43, 44). About a dozen were in a ragged line in the southeast corner ([1] 16, pl. 6). Settlement dated to 5th–6th centuries.
Harmondsworth (Prospect Park)	SFB 3063	Gtr London (Middlesex) TQ0778	[1] Farwell *et al.* 1999 [2] Hutcheson 1999 [3] Cowie & Blackmore 2008	Small lead spearhead from context 3179 at the base of an SFB ([2]: 27–28; [3]: 64). The spearhead, which was not functional, was 9 cm long, less than half the length of its closest Anglo-Saxon parallel, though it could also be Romano-British ([2]: 27–28, fig. 19). The settlement dates to the 5th–6th centuries ([1]: 70).
Harston	Pit F4405, in SFB 6	Cambs. TL418508	O'Brien forthcoming	Lapwing skull in the basal fill of a cylindrical pit dug into the base of an SFB, near its centre (O'Brien forthcoming). The fill of the pit was sealed by the lowest fill of the SFB. Dated by radiocarbon to the 6th or 7th century.
Hartigans	Pit 195	Bucks. SP8839	[1] Williams 1993 [2] Green 1993	Two complete ox skulls at the base of the final fill of a reused pit ([2]: 188, fig. 81). Present in the lower fill was a loose, carbonized stake, which could not be identified as placed using this study's criteria. The stake was dated by radiocarbon to the 5th century, and the Anglo-Saxon phase is dated by pottery to the 5th–7th centuries ([1]: 193–194, 211).
Hartlepool (Church Close)	Pit B383	Co. Durham NZ528337	[1] Daniels 1988 [2] Rackham 1988 [3] Daniels 2007 [4] Huntley & Rackham 2007	About 12 sheep skulls in the fills of a post-pit of the palisade delimiting the earliest phase of the site ([2]: 197; [1]: 161, fig. 4). The skulls included four rams, one wether, and one ewe or wether, and several had been split for the brain ([2]: 197). Also present were the disarticulated remains of at least 12 neonatal or juvenile lambs (up to the age of weaning), with six of these represented by most of the carcass ([2]: 198; [4]: 117). The lamb remains could not be identified as placed using this study's criteria. The pit section showed what appear to be four backfilled layers of equal thickness, with horizontal interfaces, and a final recut ([1]: fig. 4). The palisade to which the post-pit belonged was at least 40 m and maybe more than 60 m across ([3]: fig. 8.8). It went out of use in the mid-7th century ([1]: 161, 162; [3] 162).
Hartlepool (Church Close)	Pit A2072	Co. Durham NZ528337	[1] Daniels 1988 [2] Daniels 2007	Complete horse skull at the base of a post-pit, directly overlying the filled socket of the post ([1]: 181, fig. 26). Near the skull was a deposit of ash. There was also a broken but complete stone vessel in the fill of the pit ([1]: 190). The pit was located in the angle formed by three buildings, less than 2 m from the wall of one of them ([1]: fig. 7; [2]: fig. 8.8). The pit is thought to have been backfilled in the 8th century ([1]: 181; [2]: 167).
Headington	SFB	Oxon SP550079	[1] Leeds 1939 [2] Dickinson 1976 [3] Dodd 2003*a*	Unfurnished human burial in an SFB ([1]: 356; [2]: ii.139; [3]: 12). Pottery was also present. The burial is described as being 'in a house bottom' ([1]: 356), which could signify anywhere in the fill of the pit (*cf.* Lethbridge 1927: 141).

CONTENTS					CONTEXT		ASSOCIATED FEATURES		
Type	*Species*	*Age*	*Sex*	*Treatment (humans)*	*Type*	*Strati-graphic level*	*Type*	*Element*	**Date range (centuries)**
*complete articulated skeleton (√,o,√)	horse				?SFB		none	N/A	6th
loomweights (√,–,√)					SFB	on base	none	N/A	5th–6th
single artefact (o,o,√)					SFB	on base	none	N/A	5th–6th
skull (o,o,√)	lapwing				pit in SFB	basal fill	none	N/A	6th–7th
skulls (√,o,√)	cattle				pit	base of final fill	none	N/A	5th–7th
skulls (√,o,o)	sheep	adult	male, female, castrate		pit		minor enclosure	boundary (at)	7th
skull (o,o,√)	horse				pit	base of final fill	earthfast building	wall (outside)	8th
?complete articulated skeleton (√,–,√)	human				SFB				

Appendix B: Placed deposits

Site	Feature	County & OS Grid Ref.	References	Description
Higham Ferrers	Burial 2591	Northants SP959694	[1] Hardy *et al.* 2007 [2] Witkin 2007	Perinatal human infant or foetus buried in a shallow pit 1 m inside the wall of a demolished building (2666) from a previous phase ([1]: 58, fig. 3.25). The infant was premature, and the skeleton showed signs of gnawing ([2]: 142, 145). The remains were dated by radiocarbon to late 9th–early 10th century ([2]: 142). The demolished building was dated to the middle to late 8th century ([1]: 35), and curvilinear features contemporary to the infant do not respect its footprint ([1]: 55–57, figs 3.25, 3.26). The infant's relationship to the building is probably coincidental.
Higham Ferrers	Ditch 15165	Northants SP959694	[1] Hardy *et al.* 2007	Nine bone needles, probably on a string, on the base of the horseshoe-shaped enclosure ditch, near its southeast terminus ([1]: 39). The horseshoe-shaped ditch may be regarded as a major enclosure boundary (Reynolds 2003: 115–116, fig. 9D). The ditch fill contained 8th-century pottery ([1]: 39).
Higham Ferrers	Ditch 7330, section 123	Northants SP959694	[1] Hardy *et al.* 2007 [2] Witkin 2007 [3] A. Hardy, pers. comm.	A 'dense deposit' of animal bones, mainly cattle, and three disarticulated human bone fragments, at the base of or within the final fill of the horseshoe-shaped enclosure ditch ([1]: 207; [3]). The human bones included the mandible of a male, 30–38 years old, and the iliac blade of an unsexed adult ([2]: 143). The horseshoe-shaped ditch may be regarded as a major enclosure boundary (Reynolds 2003: 115–116, fig. 9D). This section of the horseshoe-shaped ditch was about 4 m away from a possible high-status building (7023) that was contemporary with and parallel to the ditch ([1]: 196–197, fig. 3.21). The placed deposits in sections 383 and 173 of the same ditch were some 4 m north and 5 m south, respectively ([1]: fig. 3.21). The mandible was dated by radiocarbon to the same phase as the final fill of the ditch: the late 8th–early 9th century ([2]: 141; [1]: 47).
Higham Ferrers	Ditch 7330, section 173	Northants SP959694	[1] Hardy *et al.* 2007 [2] Evans with Strid 2007 [3] A. Hardy, pers. comm.	The complete articulated skeletons of two dogs, together with a 'dense deposit' of disarticulated animal bone, mainly cattle, at the base of or within the final fill of the horseshoe-shaped enclosure ditch ([1]: 207; [3]). One of the dogs was a juvenile; the other suffered from rickets and may have been kept indoors ([2]: 151). Both animals appear to have been contained in sacks ([1]: 207). The horseshoe-shaped ditch may be regarded as a major enclosure boundary (Reynolds 2003: 115–116, fig. 9D). The placed deposits in sections 383 and 173 of the same ditch were some 10 m and 5 m north, respectively ([1]: fig. 3.21). The final fill of the ditch was dated to the late 8th–early 9th century ([1]: 47).
Higham Ferrers	Ditch 7330, section 383	Northants SP959694	[1] Hardy *et al.* 2007 [2] Witkin 2007 [3] A. Hardy, pers. comm.	The partial skeleton of a human adult female and four disarticulated human bone fragments at the base of or within the final fill of the horseshoe-shaped enclosure ditch ([1]: 48, 207; [3]). The adult female, aged 30–40 years, was represented by parts of the lower torso, pelvis, and legs ([2]: 141). The burial was tightly flexed, possibly bound or contained in a sack, and oriented along the line of the ditch ([2]: 141). The disarticulated human bone included the mandible of a male, 24--30 years old, and two skull fragments and a femur shaft, unaged and unsexed ([1]: 4.29). The mandible exhibited weathering and was dated by radiocarbon to the late 7th–early 8th century ([2]: 143), whereas the final fill of the ditch was dated to the late 8th–early 9th century ([1]: 47). The horseshoe-shaped ditch may be regarded as a major enclosure boundary (Reynolds 2003: 115–116, fig. 9D). The placed deposits in sections 173 and 123 of the same ditch were some 4 m and 10 m south, respectively ([1]: fig. 3.21).

CONTENTS					CONTEXT		ASSOCIATED FEATURES		
Type	*Species*	*Age*	*Sex*	*Treatment (humans)*	*Type*	*Strati-graphic level*	*Type*	*Element*	**Date range (centuries)**
complete articulated skeleton (√,–,√)	human	infant	indet.	complete	pit				9th–10th
artefact set (√,√,√)					ditch	base	major enclosure	terminus	8th
disarticulated bone *en masse* (√,–,√)	cattle; human	*human:* adult	*human:* male; indet.	disartic.	ditch	base of final fill	major enclosure	boundary (at)	8th–9th
complete articulated skeletons (√,√,√); disarticulated bone *en masse* (√,–,√)	dog; cattle	*dogs:* adult, juvenile			ditch	base of final fill	major enclosure	boundary (at)	8th–9th
articulated skeletal segments (√,√,√); disarticulated bone (√,o,o)	human	adult	*segments:* female; *disartic.:* male	*segments:* prone, tightly bent, ?bound; *disartic.*	ditch	base of final fill	major enclosure	boundary (at)	8th–9th

Site	Feature	County & OS Grid Ref.	References	Description
Higham Ferrers	Horseshoe enclosure ditch	Northants SP959694	[1] Hardy *et al.* 2007 [2] Evans with Strid 2007 [3] A. Hardy, pers. comm.	The partially articulated forelimbs and spine of an adult horse in fill 2302 of the horseshoe-shaped enclosure ditch ([2]: 149). Withers height is estimated at 139 cm (*ibid.*). This section of the horseshoe enclosure ditch was some 5 m away from buildings 2666 and 2664/5, which followed a corner in the ditch ([3]; [1]: fig. 3.31). This section of the ditch was filled in phase 2c: late 8th-early 9th century ([1]: 47, 30–31).
Hinxton Hall	SFB 1	Cambs. TL4944	[1] Tipper 2004	Eighty burnt loomweights in rows on the base of an SFB ([1]: tab. 55). The additional presence of burnt timbers indicates the building was destroyed by fire ([1]: 166). The SFB was identified as early Anglo-Saxon ([1]: tab. 55).
Horcott, near Fairford	SFB 5087[=5112]	Glos. SU145995		This deposit, excavated by the author, consisted of complete or semi-complete vessels on the base of an SFB and two cattle skulls about 15 cm above base. One of the skulls was upright, and contained within a possible circular setting of unworked stones of various types, each about 10 cm across. A large collection of ?cattle long bones, extending from the base to about 15cm above base, was also present.
Horcott, near Fairford	SFB 8516	Glos. SU145995	[1] Oxford Archaeology, unpublished site	A pile of animal bones, with a human skull face down in the centre of it, located in the centre of an SFB ([1]; [2]).
Linford	'Weaving hut'	Essex TQ669801	[1] Barton 1962 [2] Hamerow 1993	Twenty lead weights in a depression (?SFB) within a 'surface hut' (?later rectilinear structure) ([1]: 68). The weights were disc or bun-shaped, and were divided into three different types ([1]: 68, 100, fig. 17). They were in several groups of two or three, plus a line of six evenly spaced weights across about 3 m ([1]: fig. 12). The feature was within 2 m of a palisade ([1]: fig. 2), but it is not clear whether they were contemporary. The Linford site has been suggested to belong to the earliest phase of the Mucking settlement: 5th century ([2]: 57, 86).
Littlemore	pit 195	Oxon SP53900210	[1] Moore 2001 [2] Blinkhorn 2001 [3] Jackman 2001	A human skeleton contained in a pit ([1]: 176). The remains of a probable female, 17–21 years old, were in poor condition, with the skull fragmented and little of the post-cranial skeleton surviving ([3]: 202). The skeleton was either a flexed inhumation, oriented south-north, or else 'just thrown in' ([1]: 176). The pit had been partly silted up prior to deposition, and the deposit may have been associated with the closure of the settlement ([1]: 219). The settlement was dated by pottery to the 6th–7th century ([2]: 189).
Littlemore	SFB 3	Oxon SP53900210	[1] Moore 2001 [2] Blinkhorn 2001 [3] Ingram 2001	The partial skeleton of a hare in the single fill of an SFB (C. Ingram in [1]: 209; [1]: 175, fig. 5). This SFB contained the largest bone assemblage of any feature on the site, including an additional 11 hare bones ([3]: 209). The settlement was dated by pottery to the 6th–7th century ([2]: 189).
Littlemore	SFB 6	Oxon SP53900210	[1] Moore 2001 [2] Blinkhorn 2001 [3] Ingram 2001	An ox skeleton, possibly articulated, in the northwest quadrant of an SFB ([1]: 175). The animal was 6–8 years old and died of natural causes ([3]: 211). The skeleton was excavated under watching brief and was not observed to be articulated, but the bones showed no evidence of butchery or gnawing ([3]: 209). The settlement was dated by pottery to the 6th–7th century ([2]: 189).
Lyminge	SFB	Kent TR161409	[1] Thomas 2011	An iron plough coulter on the base of an SFB, deposited in the 7th century ([1]: 45).

CONTENTS					CONTEXT		ASSOCIATED FEATURES		
Type	*Species*	*Age*	*Sex*	*Treatment (humans)*	*Type*	*Strati-graphic level*	*Type*	*Element*	**Date range (centuries)**
articulated skeletal segments (√,√,–)	horse	adult			ditch		major enclosure	boundary (at)	8th–9th
loomweights (√,–,√)					SFB	on base			5th–7th
semi-complete pottery (√,o,√); skulls (√,o,√)	cattle				SFB	on base/in lower fill			
disarticulated bone *en masse* (√,–,√); skull (√,o,√)	*skull:* human			skull	SFB				
lead weights (o,o,√)					SFB				5th–6th
?complete articulated skeleton (√,–,√)	human	adolescent	?female	indet.	pit	?base of final fill	none	N/A	6th–7th
articulated skeletal segments (√,√,–)	hare				SFB		none	N/A	6th–7th
?complete articulated skeleton (√,√,o)	cattle	6–8 years			SFB		none	N/A	6th–7th
single artefact (√,o,√)					SFB	on base			7th

Site	Feature	County & OS Grid Ref.	References	Description
Lyminge	SFB	Kent TR161409	[1] G. Thomas pers. comm.	Nine lead weights in the basal fill of an SFB ([1]). The weights were disc-shaped and were all lying horizontal, but with no clear arrangement or clustering. They were part of a larger assemblage of complete and nearly complete objects all contained within the shallow (8–10 cm) basal fill. The SFB was provisionally dated to the 6th century ([1]).
Mucking	cut [3958] ('antler ditch')	Essex TQ673803	[1] Hamerow 1993	A substantial cache of antlers spread over 2.74 m on the bottom of the Anglo-Saxon recut of a Romano-British ditch ([1]: 19–20). Large amounts of Anglo-Saxon pottery were present in the same fill. The Anglo-Saxon settlement has been dated to the 5th–8th century ([1]: 86).
Mucking	GH 10	Essex TQ673803	[1] Hamerow 1993 [2] Clark 1993 [3] Hamerow 2006	A largely complete pig skull on the floor of an SFB, with a dog skeleton in its eastern posthole ([1]: 14; [3]: tab. 1). The SFB showed signs of deliberately dismantling. The SFB was adjacent to a small linear feature of earlier date not thought to have been relevant in the Anglo-Saxon period ([2]: fig. 6; [1]: fig. 51). The SFB was in an area of the settlement associated with phases A/B: 5th–6th century ([1]: figs 50, 195).
Mucking	GH 17	Essex TQ673803	[1] Hamerow 1993	Five lead weights lying on or near the base of an SFB ([1]: 70). Three are annular; for the other two, the shape is unreported ([1]: 114, figs 91, 92). The SFB was in an area of the settlement associated with phases A/B: 5th–6th century ([1]: figs 50, 195).
Mucking	GH 42	Essex TQ673803	[1] Hamerow 1993 [2] Hamerow 2006	At least seven complete or semi-complete vessels and two complete brooches, one on the base of the SFB pit and the other just above the base ([2]: 17). The pottery included a complete bowl ([1]: 122). The brooches were a garnet-headed pin and a safety-pin brooch, both 7th-century ([1]: 61, fig. 105). Charcoal and hearth debris were also present ([1]: 14; [2]: 17–18). The deposit containing the pottery was 'scattered across the floor' ([1]: 14) and extended from the base to 20 cm above the base ([1]: fig. 73).
Mucking	GH 79	Essex TQ673803	[1] Hamerow 1993 [2] Done 1993 [3] Clark 1993 [4] Hamerow 2006	Two horse skeletons on the base of an SFB ([2]: 78; [4]: tab. 1). One horse was 5 years and the other *c.*20 years old, and the heights were estimated at just over 14 hands (140 cm). Though the remains were poorly preserved, it was suggested that they may have been deposited complete on the basis of the range of elements present, including articulated forelimb bones, teeth, and axial and appendicular elements ([2]: 78). The SFB cut a small linear feature of earlier date not thought to have been relevant in the Anglo-Saxon period ([3]: fig. 6; [1]: fig. 51). The SFB was in an area of the settlement associated with phase A: 5th century ([1]: figs 50, 195).
Mucking	GH 84	Essex TQ673803	[1] Hamerow 1993 [2] Tipper 2004 [3] Hirst & Clark 2009	Approximately 140 unfired loomweights arranged in at least nine rough lines on the base of an SFB ([1]: 17, 68, fig. 76; [2]: 167). The SFB cut earlier grave 566 (dated to the 6th–7th c.) of Cemetery II ([3]: ii.454). The SFB appears to belong to the 7th century phase of the settlement ([1]: figs 195, 50).

CONTENTS					CONTEXT		ASSOCIATED FEATURES		
Type	*Species*	*Age*	*Sex*	*Treatment (humans)*	*Type*	*Strati-graphic level*	*Type*	*Element*	**Date range (centuries)**
lead weights (o,o,√)					SFB	in lower fill			?6th
antler *en masse* (√,–,√)	deer				ditch	base	ditch	indet.	5th–8th
skull (o,o,√); complete articulated skeleton (o,o,√)	*skull:* pig; *skeleton:* dog				SFB	on base/in posthole	none	N/A	5th–6th
lead weights (o,o,√)					SFB	on base/in lower fill	none	N/A	5th–6th
complete & semi-complete pottery (√,o,√); single artefacts (o,o,√)					SFB	on base/in lower fill	none	N/A	7th
?complete articulated skeleton (√,o,√)	horse	5 years and 20 years			SFB	on base	none	N/A	5th
loomweights (√,o,√)					SFB	on base	grave	N/A	7th

Site	Feature	County & OS Grid Ref.	References	Description
Mucking	GH 86	Essex TQ673803	[1] Hamerow 1993 [2] Clark 1993	Raw loomweights and semi-complete pottery on a 'slight ledge' in the northwest corner and nearby edges of an SFB pit ([1]: 14, 140–141, fig. 76). The SFB was adjacent to a small linear feature of earlier date not thought to have been relevant in the Anglo-Saxon period ([2]: fig. 6; [1]: fig. 51). The SFB was in an area of the settlement associated with phase C: 7th century ([1]: figs 50, 195).
Mucking	GH 93	Essex TQ673803	[1] Hamerow 1993 [2] Tipper 2004 [3] Hamerow 2006	A deposit of pottery, including a semi-complete bowl, lying beneath 'substantial quantities' of loomweights on the base of an SFB, in one corner of the structure ([1]: 17, 141; [3]: 17–18; [2]: tab. 55). Probably of 7th-century date ([2]: 18).
Mucking	GH 105	Essex TQ673803	[1] Hamerow 1993 [2] Clark 1993 [3] Tipper 2004 [4] Hamerow 2006	Approximately 30 raw loomweights and at least seven complete or semi-complete pots, apparently broken *in situ*, on the base of an SFB ([1]: 17; [3]: 167; [4]: 17–18). The SFB was adjacent to a small linear feature of earlier date not thought to have been relevant in the Anglo-Saxon period ([2]: fig. 6; [1]: fig. 51). The deposit is probably 7th century in date ([4]: 18).
Mucking	GH 108	Essex TQ673803	[1] Hamerow 1993 [2] Hirst & Clark 2009	Sheep burial cutting the wall of an SFB ([1]: fig. 64). It is presumed this refers to a complete burial. The SFB also cut two graves (925 and 926, the former dated to the second half of the 5th c.) and was cut by a cremation (927, dated to the 6th–7th c.) in Cemetery II ([2]: ii.454). The SFB was assigned to the 5th–6th centuries ([1]: figs 195, 50).
Mucking	GH 142	Essex TQ673803	[1] Hamerow 1993 [2] Clark 1993	Large 'puddles' of raw clay and some loomweights on the northern half of the floor of an SFB ([1]: 15, fig. 78). The SFB cut a large Iron Age ditch of the North Enclosure, which is thought to have been visible in the Anglo-Saxon period and appears to have been a local focus of settlement features ([2]: fig. 6; [1]: fig. 51). The SFB was in an area of the settlement associated with phases B/C: 6th–7th century ([1]: figs 50, 195).
Mucking	GH 168	Essex TQ673803	[1] Hamerow 1993 [2] Hamerow 2006	Three silver sceattas on the base of an SFB ([1]: 64, fig. 79; [2]: 18). The coins are of the BX type, dated to the late 7th century ([1]: 64, 159). Like the coins, the deposit probably dates to the 7th century ([2]: 18).
Nettleton Top, Nettleton	Pit 38/SFB 51	Lincs. TF107988	[1] Field & Leahy 1993 [2] Leahy 1993 [3] Berg 1993	A total of 28 fragments of disarticulated bone from a minimum of two newborn piglets in the combined fills of pit 38 and SFB 51, which was cut by the pit ([3]: 34). Just under 200 fragments of animal bone were recovered from pit 38 altogether ([3]: tab. 8); also present were nine loomweight fragments ([1]: 14). SFB 41 contained over 130 fragments of animal bone and 20 loomweight fragments in SFB 51 ([1]: 14; [3]: tab. 8). Settlement dated by pottery to the 6th–7th century ([2]: 24).
New Bewick	Grubenhaus	Northd. NU060206	[1] Gates & O'Brien 1988 [2] Tipper 2004	Twenty to thirty loomweights, two of them fired, scattered on the base of an SFB ([1]: 6–7; [2]: tab. 55). Four potsherds were also present. The SFB is early Anglo-Saxon ([2]: tab. 55).

CONTENTS					CONTEXT		ASSOCIATED FEATURES		
Type	*Species*	*Age*	*Sex*	*Treatment (humans)*	*Type*	*Strati-graphic level*	*Type*	*Element*	**Date range (centuries)**
loomweights (√,o,√); semi-complete pottery (√,o,o)					SFB	on base	SFB	corner	7th
loomweights (√,–,√); semi-complete pottery (o,o,√)					SFB	on base	SFB	corner	7th
loomweights (√,–,√); semi-complete pottery (√,o,√)					SFB	on base	none	N/A	7th
?complete articulated skeleton (√,√,√)	sheep				pit		SFB	wall (at)	5th–6th
loomweights (√,–,√)					SFB	on base	linear earthwork	indet.	6th–7th
artefact set (√,o,√)					SFB	on base	none	N/A	7th
disarticulated bone (√,o,o)	pig	neonatal			pit		SFB	wall (at)	6th–7th
loomweights (o,o,√)					SFB	on base	none	N/A	5th–7th

Site	Feature	County & OS Grid Ref.	References	Description
Old Erringham	SFB	W. Sussex TQ20430754	[1] Holden 1976 [2] Tipper 2004	About 75 loomweights, 53 of which were complete or near complete, on the base of an SFB ([1]: 313, 315; [2]: tab. 55). The loomweights were in two groups of similar number, one at the east end of the SFB and the other on or near the axis in the western half ([1]: fig. 309). A number of the western group were in a line. Also in the lowest fill of the feature were two spindle whorls, a whetstone, and quern fragments ([1]: 316–318), but these could not be identified as a placed using this study's criteria. The SFB was dated to the 7th–9th century ([1]: 311).
Pakenham (Grimstone End)	Barrow ditch	Suffolk TL935692	[1] Brown *et al.* 1955 [2] Hoffman 1964 [3] Berisford 1973 [4] West 1985	Two parallel lines of loomweights in the fill of a ring ditch, oriented transversely to the ditch, i.e. radially to the barrow ([1]: 198–199, fig. 23). The two lines, 8–9 in. (20–23 cm) apart, were each about 8 ft. (*c.*2.5 m) long, and comprised 30 and 32 loomweights, respectively. This is a feasible length for a line of weights hanging on an Anglo-Saxon loom ([2]: 313–314; [3]: 209; *contra* [1]: 199). Although not recognized in excavation, it can be presumed that the loom was in a building, probably an SFB. The loomweights were more fired on the upper sides and charred wood was present around them ([1]: 198), indicating destruction by fire of the loom and the building housing it ([1]: 198; [4]: 138). The loomweights were annular and intermediate ([1]: pl. 24), suggesting an early Anglo-Saxon date (Leahy 2003: 70).
Pennyland	Ditch 799	Bucks. SP862411	[1] Williams 1993 [2] Holmes 1993	Complete dog burial in a ditch ([2]: 146; [1]: 267). This appears to have been a complete articulated skeleton ([1]: pl. 15). The dog was medium to large ([2]: 146). Ditch 799 is not labelled on the published plans. The Anglo-Saxon settlement was dated to the early 6th to the 8th centuries ([1]: 92).
Pennyland	Pit 62 in SFB 1	Bucks. SP862411	[1] Williams 1993	At least three wood mouse skeletons at the centre base of a pit dug into the base of an SFB ([1]: 55). Pit 62 was beehive in section and 55 cm deep, and it was dug through a 2–5 cm thick layer of packed clay that did not seal pit 62 ([1]: 55, 57). The mice were overlain by a thin gravel lens slumped from the sides of the pit, which was dug into a loose gravelly subsoil, indicating that the pit was left open for a short time prior to complete backfilling ([1]: 55). This SFB belongs to a phase dated by Ipswich ware and a bone comb to the middle to late 7th century ([1]: 92–93; in light of the new chronology of Ipswich ware (Blinkhorn 1999: 8–9), that should be revised to the 8th century.
Pennyland	SFB 4	Bucks. SP862411	[1] Williams 1993 [2] Hamerow 2006	Complete ox skull on the base of an SFB ([1]: 59–62; [2]: tab. 1). Elsewhere in the publication it is reported as a horse skull ([1]: 267). In addition, up to 49 loomweights (one fired) were found dispersed throughout the single homogeneous fill ([1]: 59–62). This SFB belongs to a phase dated by Ipswich ware and a bone comb to the middle to late 7th century ([1]: 92–93; in light of the new chronology of Ipswich ware (Blinkhorn 1999: 8–9), that should be revised to the 8th century.
Pitstone	Building G32	Bucks. SP93821507	[1] Phillips 2005 [2] Wells 2005	Six complete loomweights, three halves, and fragments of others clustered in the lower fills of an SFB pit, in the northern corner ([1]: 8, fig. 4). Also present in the fill were three cylindrical lead weights, three bone pin beaters, a Roman tegula fragment, and animal bone ([1]: 8). The loomweights and the pin beaters were the only small finds on the site associated with weaving ([2]: 15). The loomweights appear from the plan to lie on the base; in any case, the lower fill was less than 10 cm deep ([1]: fig. 4). The Anglo-Saxon occupation was dated to before the mid-7th century ([1]).

CONTENTS					CONTEXT		ASSOCIATED FEATURES		
Type	*Species*	*Age*	*Sex*	*Treatment (humans)*	*Type*	*Strati-graphic level*	*Type*	*Element*	**Date range (centuries)**
loomweights (√,–,√)					SFB	on base			7th–9th
loomweights (√,o.√)					?SFB		barrow ditch	indet.	5th–7th
?complete articulated skeleton (o,o,√)	dog				ditch		ditch	indet.	6th–8th
complete articulated skeletons (√,–,√)	mouse				pit in SFB	on base	none	N/A	8th
skull (o,o,√)	cattle (or horse?)				SFB	on base	none	N/A	8th
loomweights (o,o,√)					SFB	on base	SFB	corner	5th–7th

Site	Feature	County & OS Grid Ref.	References	Description
RAF Lakenheath	pit	Suffolk TL7381	[1] Caruth 2005	Deposit of a young calf in a pit ([1]: 41). The settlement is early Anglo-Saxon.
RAF Lakenheath (ERL 101)	pit 0451	Suffolk TL7381	[1] Tester 2006	Burial of a large dog on the base of a pit not much larger than the dog ([1]: 16, 21, fig. 17). The fill above the dog was stratified, suggesting the pit was not completely filled after dog was deposited ([1]: 21). The Anglo-Saxon pottery at ERL 101 was dated to the 7th century ([1]: 11).
RAF Lakenheath (ERL 101)	SFB 0638	Suffolk TL7381	[1] Tester 2006	Two discrete deposits of loomweights, one directly above the other, in an SFB ([1]: 31). The loomweights were mostly raw, but a few, particularly in the upper deposit, appeared to have been exposed to heat. Dated by pottery to the 7th century ([1]: 17).
Riby Cross Roads	ditch 191	Lincs. TA18680813	[1] Steedman 1994 [2] Cowgill 1994 [3] Cowgill 2009	A lead vessel found in a terminus of the latest ditch on the south side of Enclosure 2 ([1]: 226; [3]: 85). The lead vessel, which was found lying horizontally in the fill, had been slightly folded prior to deposition ([2]: 267–268; [3]: 85). The ditch is phased as mid-Saxon: late 7th–middle 9th centuries ([1]: 225). Enclosure 2 was trapezoidal, measuring 28 m by 22 m, and has been classed as a minor enclosure ([1]: 225; Reynolds 2003: 110-111, fig. 7A).
Spong Hill	Posthole 2991	Norfolk TF981195	[1] Rickett 1995	Thirteen complete loomweights, 12 semi-complete loomweights, and many fragments of loomweights, all fired, in the centre of a posthole inside an earthfast structure, posthole group 2 ([1]: 46). Some of the loomweights were in stacks. The deposit was made after the post had been extracted. The posthole was one of a pair within 2 m of the south wall ([1]: fig. 65). These two postholes were interpreted as possible settings for an upright loom ([1]: 46; but see Mudd 2002: 52). The settlement dates to the early Anglo-Saxon period ([1]: 41-55).
Staunch Meadow, Brandon	door pit, chancel of probable church	Suffolk TL7786	[1] Carr *et al.* 1988 [2] Crabtree 2007	Horse skull and associated horse bones in the door pit of an entrance to the chancel of the probable church ([2]: 163; [1]: 374, figs. 2, 3). The teeth were more heavily worn than horse teeth recovered from West Stow ([2]: 163). The probable church was probably constructed around AD 700 ([2]: 163).
Sutton Courtenay	House VII	Oxon SU491933	[1] Leeds 1923 [2] Hamerow 2007	Two pots on or near the base of an SFB ([1]: 162). One pot was associated with a shallow pit dug into the base near the north wall of the SFB, although some sherds were found elsewhere in the fill. The second pot was a large vessel, 'completely smashed down' in the northeast quadrant. Also in the lower fill were clumps of clay, frequent animal bone, and other potsherds, including part of a Roman grey-ware bowl ([1]: 161–162). The settlement probably dated from the 6th to the 7th/early 8th centuries ([2]: 184).
Sutton Courtenay	pit 8' west of House VII	Oxon SU491933	[1] Leeds 1923 [2] Hamerow 2006 [3] Hamerow 2007	The articulated skeleton of a horse, the skull and disarticulated bones of a dog, and a 'profusion' of animal bones in a pit 8 ft (2.4 m) west of House VII ([1]: 165, fig. 8, pl. XXV; [2]: tab. 1). The head of the 'old horse of small size' lay inside and at the level of the top of a circular setting of stones of various types, with the rest of the body extending to the north. The dog remains lay to the east of the stone setting ([1]: 165, fig. 8). The stone setting was interpreted as a possible hearth, although there was little charcoal and no layer of burning ([1]: 165). A 'pot-boiler' (probably a loomweight) was also found inside the stone setting. The settlement probably dated from the 6th to the 7th/early 8th centuries ([3]: 184).

CONTENTS					CONTEXT		ASSOCIATED FEATURES		
Type	*Species*	*Age*	*Sex*	*Treatment (humans)*	*Type*	*Strati-graphic level*	*Type*	*Element*	**Date range (centuries)**
?complete articulated skeleton (o,√,o)	cattle	juvenile			pit				?5th–?7th
complete articulated skeleton (o,o,√)	dog				pit	on base	none	N/A	7th
loomweights (√,o,√)					SFB		none	N/A	7th
lead vessel (o,√,o)					ditch	in fill	minor enclosure	terminus	7th–9th
loomweights (√,–,√)					posthole		earthfast building	wall (inside)	5th–7th
skull (√,o,o); disarticulated bones (√,o,o)	horse	mature			pit		earthfast building	doorway	7th–8th
(semi)complete pottery (√,o,√)					SFB	on base/in lower fill	none	N/A	6th–8th
?complete articulated skeleton (√,o,√); skull (o,o,√); disarticulated bone ?*en masse* (√,o,√)	*skeleton:* horse; *skull & some disartic.:* dog	*horse:* mature			pit		none	N/A	6th–8th

Site	Feature	County & OS Grid Ref.	References	Description
Sutton Courtenay	House X, Room I (SFB)	Oxon SU491933	[1] Leeds 1923 [2] Hamerow 2006 [3] Hamerow 2007	A human burial on the base of an SFB ([1]: 169; [2]: tab. 1; [3]: 185). The extended, supine inhumation of a robust adult male, 30–40 years old, was oriented northwest-southeast, as was the axis of the SFB, and was accompanied by grave goods: a knife and a double-sided comb ([1]: 169). The burial was covered with a 'blanket of clay'. The SFB was adjacent to an earlier linear feature that had Anglo-Saxon remains in its upper levels and appears to have been relevant in the Anglo-Saxon period ([1]: 171, fig. 10). The settlement probably dated from the 6th to the 7th/early 8th centuries ([3]: 184).
Sutton Courtenay	House X, Room II (SFB)	Oxon SU491933	[1] Leeds 1923 [2] Hamerow 2007	An equal armed brooch on the base of an SFB, between the posthole and the edge of pit ([1]: 171; [2]: 185). The brooch, a 5th-century Continental type from the Elbe-Weser region, was imported and curated prior to deposition ([2]: 184). The SFB lay across an earlier linear feature that had Anglo-Saxon remains in its upper levels and appears to have been relevant in the Anglo-Saxon period ([1]: 171, fig. 10). The settlement probably dated from the 6th to the 7th/early 8th centuries ([2]: 184).
Sutton Courtenay	House XII	Oxon SU491933	[1] Leeds 1927 [2] Hamerow 2006 [3] Hamerow 2007	A large dorsal fragment of an ox skull, including the horns, on the centre base of an SFB ([1]: 64, fig. 2; [2]: tab. 1). Also present in the lower fill was a large quantity of animal bones, pottery, metalwork and other artefacts, including an antler toggle ([1]: 64). The settlement probably dated from the 6th to the 7th/early 8th centuries ([3]: 184).
Sutton Courtenay	House XVII	Oxon SU491933	[1] Leeds 1927 [2] Hamerow 2006 [3] Hamerow 2007	Articulated limbs of a dog in the axial postholes of an SFB ([1]: 71; [2]: 8, tab. 1). Parts of the forelimbs were in the east posthole, and most of the hind limbs were in the west posthole ([1]: 71). A heavily clipped fragment of Roman bowl was also found in the SFB. The settlement probably dated from the 6th to the 7th/early 8th centuries ([3]: 184).
Sutton Courtenay	House XX	Oxon SU491933	[1] Leeds 1927 [2] Hamerow 2007	A concentration of at least 14 loomweights, complete and in fragments, and a complete vessel on the base of the southeast quadrant of an SFB ([1]: 72–75). Some of the loomweights, excavated by quarry workers, 'came out on one fork'; those properly excavated were on the base of the pit, and all were in the same area ([1]: 75). The complete vessel was 1 in. x 1⅞ in. (2.5 cm x 4.8 cm). The settlement probably dated from the 6th to the 7th/early 8th centuries ([2]: 184).
Sutton Courtenay	House XXI	Oxon SU491933	[1] Leeds 1947 [2] Hamerow 2007	A deposit of large stones with an antler placed upright among them, and a semi-complete pot nearby, at the base of a party-timbered waterhole ([1]: 81–82, fig. 2; [2]: 185). The antler exhibited cut marks on the tines ([1]: 82). The deposit was at the base of the final backfill of the feature ([1]: fig. 2). The settlement probably dated from the 6th to the 7th/early 8th centuries ([2]: 184).
Sutton Courtenay	House XXIX	Oxon SU491933	[1] Leeds 1947 [2] Hamerow 2007	An articulated ox leg on the base of an SFB ([1]: 89). The articulated remains included the ulna, carpals, metacarpals, and part of the hoof. Little other animal bone was found. The settlement probably dated from the 6th to the 7th/early 8th centuries ([2]: 184).

	CONTENTS					CONTEXT		ASSOCIATED FEATURES		
	Type	*Species*	*Age*	*Sex*	*Treatment (humans)*	*Type*	*Strati-graphic level*	*Type*	*Element*	**Date range (centuries)**
	complete articulated skeleton (√,–,√)	human	adult	male	supine extended	SFB	on base	linear earthwork	boundary (inside)	6th–8th
	single artefact (o,√,√)					SFB	on base	SFB	wall (inside)	6th–8th
	skull (o,o,√)	cattle				SFB	on base	none	N/A	6th–8th
	articulated skeletal segments (√,√,√)	dog				SFB	postholes	none	N/A	6th–8th
	loomweights (√,–,√); complete pottery (o,o,√)					SFB	on base	none	N/A	6th–8th
	antler (√,–,√); stones (√,–,√); semi-complete pottery (o,o,√)	deer				pit	base of final fill	none	N/A	6th–8th
	articulated skeletal segment (o,o,√)	cattle				SFB	on base	none	N/A	6th–8th

Site	Feature	County & OS Grid Ref.	References	Description
Sutton Courtenay	Pit α	Oxon SU491933	[1] Leeds 1947 [2] Hamerow 2006 [3] Hamerow 2007	The articulated remains of two humans, an adult female and an infant, as well as two cattle skulls and a horse skull in a pit ([1]: 86; [2]: 14, tab. 1). The body of the adult female, which was 'slightly twisted' with the arms partly outstretched, lay angled downwards, with the head near the centre of the pit 4 ft. (1.2 m) below the surface and the feet at the edge only 9 in. (23 cm) below the surface ([1]: 86). The infant lay near the woman's arms. Above both was a stamped layer; in this layer, behind the woman's head, were the three animal skulls ([1]: 86). The pit, which was 6½ ft. in diameter, was much bigger than the deposit; the woman's body extended only 3½ ft. horizontally ([1]: 86). The settlement probably dated from the 6th to the 7th/early 8th centuries ([3]: 184).
Sutton Courtenay	SFB 330	Oxon SU491933	[1] N. Hall *et al.* 2010 [2] L. Mepham, pers. comm. [3] Wessex Archaeology, unpublished site records	An articulated segment of cattle spine and ribs on the base of an SFB ([1]: 19; [3]). Also present in the lower fill were a large dog skull and the remains of at least four juvenile pigs, but not articulated ([1]: 19; [2]). Since the location of the dog and piglet remains cannot be more closely specified, they cannot be identified as placed according to this study's criteria. The SFB was dated to the 5th–7th centuries ([1]: 25).
Swindon Old Town	SFB	Wilts. SU157836	[1] Canham & Phillips 1976 [2] Webster & Cherry 1977 [3] Tipper 2004	Over 100 burnt loomweights, many in a long line, on the base of an SFB ([3]: tab. 55, citing [1]: 10). The loomweights were associated with lengths of charred timber, thought to be remains of a loom, and sealed by a large quantity of daub showing impressions of the superstructure ([2]: 214), suggesting the SFB was destroyed in a fire ([3]: 166). The date of the SFB is 7th–9th-century ([3]: tab. 55).
Thetford (Brandon Road, HER 24849=37158)	SFB 2232	Norfolk TL863830	[1] Atkins & Connor 2010 [2] Blinkhorn 2010	Twenty unfired loomweights in a 2 m x 1 m cluster in the northwest quadrant of the lowest post-structural fill of an SFB, 'very near to its base' ([1]: 27). Some of the loomweights formed rough lines ([1]: fig. 10). This fill of the SFB sealed the postholes ([1]: 21). The feature was dated by pottery to the 5th–6th century ([2]: 78, 79).
Thetford (Redcastle Furze)	SFB 915	Norfolk TL86158305	[1] Andrews 1995	A deposit of fired and unfired loomweight fragments in the northeast corner of an SFB ([1]: 11, 17, 100). More than 1 kg of fired loomweights and 2.5 kg of unfired loomweights were represented, together including eight halves and nearly 40 fragments ([1]: 100). Only 1.4 kg of loomweight material was found in other features. One group of loomweight fragments, some nearly complete, lay in a roughly vertical stack against the edge of the pit ([1]: 11, 17). The SFB was dated to the 6th–7th century ([1]: 11).
Tolley's Pit, Cassington	SFB	Oxon SP453103	[1] Berisford 1973	Nine loomweights 'lying against one another' close to one wall of an SFB ([1]: 210, 211).
Upton	SFB	Northants SP71466021	[1] Jackson *et al.* 1969 [2] Tipper 2004	Over 60 loomweights in two or three groups on the base of a large SFB ([1]: 208, 210, fig. 4; [2]: tab. 55). At least some of the loomweights were annular ([1]: pl. XXXIVb). Although some of the loomweights were fired, others were not fired 'to any great extent' ([1]: 210). The loomweights lay in lines, stacks, and clusters, up to 6 m apart ([1]: fig. 4). Some of the fired loomweights were in tightly stacked rows with the remains of a charred stick threaded through their centres ([1]: 210). A layer of charcoal and burnt timbers lay on the floor, in some cases overlying and in one case underlying the loomweights ([1]: 208, figs 4, 5). The SFB was dated by pottery to the late 6th–7th century ([1]: 215–216).

CONTENTS					CONTEXT		ASSOCIATED FEATURES		
Type	*Species*	*Age*	*Sex*	*Treatment (humans)*	*Type*	*Strati-graphic level*	*Type*	*Element*	**Date range (centuries)**
complete articulated skeletons (√,√,√); skulls (√,o,√)	*skeletons:* human; *skulls:* cattle, horse	*humans:* adult, infant	*human adult:* female	*human adult:* on side, 'sealed'	pit		none	N/A	6th–8th
articulated skeletal segment (o,√,√)	cattle				SFB	on base	none	N/A	5th–7th
loomweights (√,–,√)					SFB	on base			7th–9th
loomweights (√,o,√)					SFB	near base			5th–6th
loomweights (√,o,√)					SFB	near base	SFB	corner	6th–7th
loomweights (√,–,√)					SFB		SFB	wall (inside)	?
loomweights (√,o,√)					SFB	on base	none	N/A	6th–7th

Site	Feature	County & OS Grid Ref.	References	Description
Wantage	deposit 107 (= 1002)	Oxon SU39588814	[1] Holbrook & Thomas 1996 [2] Timby 1996	Four complete loomweights and fragments of others, with three in a line, as if 'still attached to a rope when they were discarded' ([1]: 128). If the deposit, which also contained potsherds and a copper-alloy fragment, was in a feature, this was not recognized in excavation ([1]: 128, fig. 9). Pottery in the deposit was dated to the 6th–7th century ([2]: 136–137).
West Heslerton	011AA00005	N. Yorks. SE917760	[1] Tipper 2004 [2] Powlesland *et al.* forthcoming	A group of 50 loomweights and burnt planks in an SFB of early to middle date ([1]: tab. 55, citing [2]).
West Stow	grave 1	Suffolk TL79707135	[1] West 1985 [2] Powers 1985 [3] Molleson & Price 1985 [4] Hamerow 2006	Human burial in a grave adjacent to a boundary ditch ([1]: 58–59, fig. 7; [4]: 12, tab. 1). The supine, flexed articulated skeleton of a probable female, 12–23 years old, with healed leg injuries and a congenitally deformed left humerus, was in a burial oriented west-east ([2]: 58–59; [3]: 59; [1]: fig. 236). The boundary ditch formed part of a minor enclosure *c.*60 m square and contained Ipswich ware, suggesting an early 8th-century date (Reynolds 2003: 110, fig. 6B; [1]: 138).
West Stow	grave 2	Suffolk TL79707135	[1] West 1985 [2] Keepax 1985 [3] Hamerow 2006	Human burial in a grave near Grave 1 ([1]: 59, fig. 7; [3]: 12, tab. 1). The supine, extended articulated skeleton of a young adult female with little-worn third molars was poorly preserved in a grave oriented west-east ([2]: 59; [1]: fig. 236). Grave 2 was clearly associated with Grave 1, which was in turn associated with a boundary ditch forming part of a minor enclosure *c.*60 m square and containing Ipswich ware, suggesting an early 8th century date (Reynolds 2003: 110, fig. 6B; [1]: 138).
West Stow	SFB 3	Suffolk TL79707135	[1] West 1985 [2] Tipper 2004	A deposit of 73 loomweights at the base of an SFB ([1]: 16, fig. 35, tab. 59; [2]: tab. 55). Many of the loomweights formed a number of rough lines, but one of the loomweights was in a posthole, away from the others ([1]: fig. 35). The loomweights were only fired on their upper surfaces ([1]: 138). Also at the base were two layers of charred planks and wood in the SFB, one underlying and another overlying the loomweights ([1]: 16). Other artefacts were present, but of these only one (a spindle whorl) was associated with textile production ([1]: 138–139). The SFB contained Ipswich ware ([1]: 149, 148), suggesting a date no earlier than the early 8th century (Blinkhorn 1999: 8–9).
West Stow	SFB 15	Suffolk TL79707135	[1] West 1985 [2] Tipper 2004	A deposit of 170 loomweights in three large groups at the base of an SFB ([1]: 23, fig. 71; [2]: tab. 55). In all three groups the loomweights formed a number of rough lines, and in two of them there were horizontal stacks of weights ([1]: 23, fig. 71). The loomweights were only fired on their upper surfaces ([1]: 138). Two layers of charred planks and wood underlay and overlay the loomweights at the base of the SFB ([1]: 23). Other artefacts were present, but of these only two (a spindle whorl and a pin beater, broken in half) were associated with textile production ([1]: 138–139). The SFB was dated by artefact typology to the late 6th/7th century ([1]: 149).
West Stow	SFB 16 (lower fill)	Suffolk TL79707135	[1] West 1985 [2] Hamerow 2006	A complete articulated skeleton of a dog near the base of an SFB ([1]: 23–24, fig. 75; [2]: 2 n. 7, tab. 1). The skeleton lay in the lowest post-structural fill, 3 in. (8 cm) above the base of the pit. Another dog skeleton was present at the interface of the upper fill; it cannot be assumed that the two dogs were deposited at the same time. The SFB was tentatively dated to *c.* AD 500 ([1]: tabs 64, 65).

CONTENTS					CONTEXT		ASSOCIATED FEATURES		
Type	*Species*	*Age*	*Sex*	*Treatment (humans)*	*Type*	*Strati-graphic level*	*Type*	*Element*	**Date range (centuries)**
loomweights (√,–,√)					layer		none	N/A	6th–7th
loomweights (√,–,√)					SFB				5th–9th
complete articulated skeleton (√,–.√)	human	adolescent	?female	flexed	grave		minor enclosure	boundary (outside)	?8th
complete articulated skeleton (√,–,√)	human	adult	female	supine extended	grave		minor enclosure	boundary (outside)	?8th
loomweights (√,o,√)					SFB	on base	none	N/A	?8th
loomweights (√,o,√)					SFB	on base	none	N/A	6th–7th
complete articulated skeleton (o,o,√)	dog				SFB	near base	none	N/A	5th–6th

Site	Feature	County & OS Grid Ref.	References	Description
West Stow	SFB 16 (upper fill)	Suffolk TL79707135	[1] West 1985 [2] Hamerow 2006	A complete articulated skeleton of a dog in the upper fill of an SFB ([1]: 23–24, fig. 75; [2]: 2 n. 7, tab. 1). The dog skeleton showed evidence of injury, including a possibly fatal blow to the head. The skeleton lay at the interface of the post-structural fill and Layer 2, a mixed layer overlying and slumping into the settlement features ([1]: 10, figs 0, 75). Another dog skeleton was present near the base; it cannot be assumed the two dogs were deposited at the same time. The SFB was tentatively dated to *c.* AD 500 ([1]: tabs 64, 65).
West Stow	SFB 36	Suffolk TL79707135	[1] West 1985	A collection of loomweights near the centre of an SFB ([1]: 33–34, fig. 125). The loomweights lay *c.*10 cm above the base of the pit ([1]: fig. 125). The SFB fill also contained an ox mandible with an iron nail fixed into an incisor socket, but since it is not clear where in the fill it came from, it could not be identified as placed using this study's criteria. The SFB was dated by pottery to the early 5th century ([1]: 148, tab. 63).
West Stow	SFB 44	Suffolk TL79707135	[1] West 1985 [2] Hamerow 2006	A 'heap' of animal bones, mainly cattle and including a cat skeleton, in the fill of the southeast corner of an SFB ([1]: 37–38; [2]: tab. 1). The discrete collection of animal bone was 'half-way down' the fill ([1]: 37). Also present in the fill were fragments of disarticulated human infant bone and an unusually rich assemblage of pottery and small finds. The SFB cut a backfilled ditch or gully of unknown function (ditch 111). The SFB was probably 5th–7th century in date ([2]: tab. 1).
West Stow	SFB 45 (lower fill)	Suffolk TL79707135	[1] West 1985 [2] Hamerow 2006	A horse skull just above the base of an SFB ([1]: 38, fig. 153; [2]: tab. 1). An ox skull was also found at the interface above the primary fill of the same feature (see separate entry). The SFB was probably 5th–7th century in date ([2]: tab. 1).
West Stow	SFB 45 (upper fill)	Suffolk TL79707135	[1] West 1985 [2] Tipper 2004 [3] Hamerow 2006	An ox skull at the base of the upper post-structural fill of an SFB ([2]: fig. 32; [1]: 38; [3]: tab. 1). A horse skull was found near the base of the same feature (see separate entry). The SFB was probably 5th–7th century in date ([3]: tab. 1).
West Stow	SFB 52 (base)	Suffolk TL79707135	[1] West 1985	A pierced boar's tusk pendant on the base of an SFB pit. A complete dog skeleton was also found in the upper fill of the same feature (see separate entry). The SFB cut a backfilled Iron Age ditch that does not appear to have been relevant in the Anglo-Saxon period ([1]: 43, fig. 7). It also lay within 2 m of the 8th-century *c.*60 m square minor enclosure (Reynolds 2003: 110, fig. 6D), but the SFB was probably 5th–7th century in date ([2]: tab. 1).
West Stow	SFB 52 (upper fill)	Suffolk TL79707135	[1] West 1985 [2] Hamerow 2006	An articulated skeleton of a dog 'high up' in the upper fill of an SFB, in the centre of the pit ([1]: 43, fig. 175; [2]: tab. 1). A pierced boar's tusk was found on the base of the same feature (see separate entry). The SFB cut a backfilled Iron Age ditch that does not appear to have been relevant in the Anglo-Saxon period ([1]: 43, fig. 7). It also lay within 2 m of the 8th-century *c.*60 m square minor enclosure (Reynolds 2003: 110, fig. 6D), but the SFB was probably 5th–7th century in date ([2]: tab. 1).
West Stow	SFB 57	Suffolk TL79707135	[1] West 1985 [2] Hamerow 2006	A 'large pile of bones', including two ox skulls and the articulated skeleton of a cat, in the fill of an SFB, near the centre of the pit ([1]: 46, fig. 190; [2]: tab. 1). The material appeared to represent a single deposit ([1]: 118). It is clear from the section drawing that the deposit lay at an interface between layers of the fill, about 15 cm above the base ([1]: fig. 190). The SFB was probably 5th–7th century in date ([2]: tab. 1).

CONTENTS					CONTEXT		ASSOCIATED FEATURES		
Type	*Species*	*Age*	*Sex*	*Treatment (humans)*	*Type*	*Strati-graphic level*	*Type*	*Element*	**Date range (centuries)**
complete articulated skeleton (o,o,√)	dog				SFB	base of upper fill	none	N/A	5th–6th
loomweights (o,o,√)					SFB	near base	none	N/A	5th
disarticulated bone *en masse* (√,–,√); complete articulated skeleton (o,o,√)	*skeleton*: cat; *disartic.:* mainly cattle				SFB	in/on lower fill	ditch	indet.	5th–7th
skull (o,o,√)	horse				SFB	near base	none	N/A	5th–7th
skull (o,o,√)	cattle				SFB	base of upper fill	none	N/A	5th–7th
single artefact (o,o,√)	boar				SFB	on base	none	N/A	5th–7th
complete articulated skeleton (o,o,√)	dog				SFB	in upper fill	none	N/A	5th–7th
disarticulated bone en masse (√,–,√); skulls (√,o,√); complete articulated skeleton (o,o,√)	*skulls:* cattle; *skeleton:* cat				SFB	?on lower fill	none	N/A	5th–7th

Site	Feature	County & OS Grid Ref.	References	Description
West Stow	SFB 65	Suffolk TL79707135	[1] West 1985 [2] Hamerow 2006	An ox skull approximately 15 cm above the base of an SFB, in the centre of the pit ([1]: 50, fig. 212; [2]: tab. 1). The SFB was probably 5th–7th century in date ([2]: tab. 1).
Wharram Percy (Site 95)	ditch 2513	N. Yorks. SE858642	[1] Milne & Richards 1992 [2] Clark *et al*. 1992 [3] Pinter-Bellows 1992 [4] Mays 1992 [5] Richards 1992 [6] Hamerow 2006	The nearly complete articulated remains of a human infant and the nearby disarticulated remains of a young sheep associated with a spherical stone, all in the upper fill of a Romano-British enclosure ditch ([1]: 20; [6]: 9, tab. 1). The infant was aged 39–41 weeks *in utero* ([4]: 79). The partially butchered remains of a young sheep, about 1 year old and comprising about half the animal, were probably partially articulated and showed cut marks ([3]: 71; [5]: 84). A nearly spherical stone of fine-grained, local veined limestone lay directly on top of the sheep remains ([2]: 41, 43; [1]: 20). Specks of amber were also found around the sheep ([5]: 85). Both the infant and the sheep lay in the uppermost fill of a Roman ditch that was completely backfilled in the Anglo-Saxon period, probably immediately after the remains were deposited ([1]: 20, 24). The remains were dated by radiocarbon to the first half of the 7th century ([5]: 84).
Wharram Percy (South Manor)	Pit 76/59	N. Yorks. SE858642	[1] Stamper & Croft 2000 [2] Hamerow 2006	An ox skull, a cow metatarsal, and a dog skull, stacked and bordered by chalk blocks and a piece of flint in the primary fill of a pit ([1]: 37, fig. 20, pl. 4; [2]: 20–21, tab. 2). The ox skull was complete except for its mandible, the dog skull was upside-down, and the chalk and flint were 'carefully placed around the east and north sides of the skulls' ([1]: 37). Also present in the pit were 12 potsherds, each from a separate vessel, but not necessarily from the same layer of the fill. The pit dates to the 7th–8th century ([2]: tab. 1).
Willington	GH 1	Derbs. SK288278	[1] Wheeler 1979 [2] Tipper 2004	A disintegrating mass of about 40 raw loomweights on the surface of the basal fill of an SFB, about 10 cm or less above the base ([1]: 126, fig. 49; [2]: tab. 55). The SFB also produced a spindle whorl ([1]: 129). The basal fill was interpreted as an occupation deposit ([1]: 126). The SFB was 6th century in date ([2]: tab. 55).
Willington	GH 2	Derbs. SK288278	[1] Wheeler 1979 [2] Tipper 2004	Three groups of loomweights, numbering *c.*20 in all, 'apparently piled' on the basal fill of an SFB ([1]: 129, fig. 50; [2]: tab. 55). The basal fill, being heavy, sticky, and firm, was interpreted as an occupation deposit ([1]: 129). The SFB was dated to the 6th century ([2]: tab. 55).
Witham (Maltings Lane)	pit 4159	Essex TL814134	[1] M. Atkinson, pers. comm. [2] Essex County Council Field Archaeology Unit 2003	Two small semi-complete vessels, one at either end of a pit ([1]): a round-bellied bowl with a flaring rim and rounded base and a wide-mouthed, slightly shouldered globular jar with a flaring rim and flat-angled base'. The bowl was 11 cm tall and had a rim diameter of 13 cm. The jar was 7.5 cm tall and also had a rim diameter of 13 cm. Although they were fragmented, they were probably deposited intact. There was no other pottery in the fill, which produced a significant quantity of baked clay and two fragments of copper alloy ([1]). All the Anglo-Saxon activity on the site was early Anglo-Saxon ([2]: 237).
Wolverton Mill (Wolverton Turn Enclosure)	ditch 2	Bucks. SP80254066	[1] Preston 2007 [2] Sykes 2007	The semi-articulated remains of at least two horses, one an adult and the other a foal, in the ditch of a major enclosure over 100 m across ([2]: 105; [1]: figs 2, 3). The fill of the ditch was dated by radiocarbon to late 7th–late 9th century ([1]: 90).

CONTENTS					CONTEXT		ASSOCIATED FEATURES		
Type	*Species*	*Age*	*Sex*	*Treatment (humans)*	*Type*	*Strati-graphic level*	*Type*	*Element*	**Date range (centuries)**
skull (o,o,√)	cattle				SFB	?on lower fill	none	N/A	5th–7th
*complete articulated skeleton (√,–,√); articulated skeletal segments (√,√,√); stone (√,–,√)	*skeleton:* human; *segments:* sheep	*human:* infant; *sheep:* 1 year	indet.	complete	ditch	base of final fill	linear earthwork	indet.	7th
skulls (√,o,√); stones (√,–,√)	cattle, dog				pit	in lower fill	none	N/A	7th–8th
loomweights (√,o,√)					SFB	on base	none	N/A	6th
loomweights (√,–,√)					SFB	on base	none	N/A	6th
semi-complete pottery (√,o,√)					pit				5th–7th
articulated skeletal segments (√,√,–)	horse	adult; juvenile			ditch		major enclosure	boundary (at)	7th–9th

Site	Feature	County & OS Grid Ref.	References	Description
Yarnton	Context 2547, near south terminal of gully 2548	Oxon SP47401125	[1] Hey 2004	An articulated cattle spine and pelvis in a context near the termination of a gully ([1]: 30, fig. 6.28). The gully was a possible replacement of an earlier enclosure boundary further to the west ([1]: 31). That enclosure would have measured about 60 m across ([1]: figs 6.28, 6.1, 6.2). These features date to phase 2: 8th century ([1]: 21).
Yarnton	Pit 3884	Oxon SP47401125	[1] Hey 2004 [2] Hamerow 2006	An articulated goose skeleton deposited intact in the upper fill of a pit ([1]: 74; [2]: tab. 1). The pit was about 1 m away from ditch/gully 3828, of uncertain function ([1]: figs 3.9, 6.31). The pit was assigned to phase 2: 8th century, but could have been as late as phase 3: 9th century ([1]: 21, 129).
Yarnton	Grave 3168	Oxon SP47401125	[1] Hey 2004 [2] Boyle 2004	Articulated human burial in a shallow grave cut into the top fill of a ditch forming the southern boundary of a minor enclosure ([1]: 163, fig. 7.13). The supine, extended skeleton of a juvenile, 6–8 years old, was nearly complete and exhibited no pathologies ([2]: 322, tab. 17.1). The grave was oriented northwest-southeast along the line of the ditch ([1]: figs 7.20, 7.13). The enclosure was *c.*60 m across ([1]: fig. 7.13; Reynolds 2003: fig. 6C). The burial was assigned to phase 3: 9th century ([1]: 21).
Yarnton	Grave 3843	Oxon SP47401125	[1] Hey 2004 [2] Boyle 2004	A prone human burial overlying human skull fragments in a grave cut into the partial fill of minor enclosure ditch 3858 ([1]: 163; fig. 7.17). The complete skeleton of an adolescent, 13–19 years old and suffering no major pathologies, was prone with the spine arched and the legs folded back so that the feet, crossed, lay over the pelvis ([2]: 319, 322, tab. 17.1, pl. 7.4). The skull fragments beneath the adolescent belonged to at least four subadults ([2]: 322–323. The grave was oriented northwest-southeast along the line of the ditch ([1]: fig. 7.20). Ditch 3858 was the southern boundary of a possible enclosure containing building B3620 and measuring *c.*30 m x 50 m or more ([1]: 159, fig. 7.1). The burial was assigned to phase 3: 9th century ([1]: 21).
Yarnton	Grave 3861	Oxon SP47401125	[1] Hey 2004 [2] Boyle 2004	An articulated human burial in a grave cut into the partial fill of minor enclosure ditch 3858 ([1]: 163; fig. 7.17). The supine, extended skeleton of a juvenile, 6–7 years old and suffering no pathologies, was virtually complete ([2]: 323, tab. 17.1). The grave was oriented northwest-southeast, along the line of the ditch, and near its corner ([1]: figs 7.20, 7.17). Ditch 3858 was the southern boundary of a possible enclosure containing building B3620 and measuring *c.*30 m x 50 m or more ([1]: 159, fig. 7.1). The burial was assigned to phase 3: 9th century ([1]: 21).
Yarnton (Cresswell Field)	SFB 7325	Oxon SP44702114	[1] Hey 2004 [2] Bell 2004 [3] Bayliss & Hey 2004 [4] Mulville & Ayres 2004 [5] Hamerow 2006	A cattle skull and two horse skulls in the fill of an SFB ([1]: 75; [4]: 336, 337; [5]: tab. 1). The number of cattle skulls was reported elsewhere as four ([4]: 342). The mandibles of at least five horses were also present, as was other animal bone ([1]: 75; [4]: 342–343). The SFB had a single homogeneous fill and was *c.*40 cm deep ([2]: 185, fig. 9.6). A radiocarbon date from the SFB suggests it was backfilled in the 7th–8th century ([3]: 264), but the Anglo-Saxon material at Cresswell Field has been dated overall to the earlier 8th century ([1]: 21).

CONTENTS					CONTEXT		ASSOCIATED FEATURES		
Type	*Species*	*Age*	*Sex*	*Treatment (humans)*	*Type*	*Strati-graphic level*	*Type*	*Element*	**Date range (centuries)**
articulated skeletal segment (√,√,o)	cattle				ditch		minor enclosure	terminus	8th
complete articulated skeleton (o,√,o)	goose				pit	base of final fill	ditch	indet.	8th–9th
complete articulated skeleton (√,–,√)	human	juvenile	indet.	supine extended	grave		minor enclosure	boundary (at)	9th
complete articulated skeleton (√,√,√); skulls (√,o,√)	human	*skeleton:* adolescent; *skulls:* subadult	indet.	*skeleton:* prone, tightly bent, ?bound	grave		minor enclosure	boundary (at)	9th
complete articulated skeleton (√,–,√)	human	juvenile	indet.	supine extended	grave		minor enclosure	corner	9th
skulls (√,o,o)	cattle, horse				SFB	in lower fill	none	N/A	7th–8th

Site	Feature	County & OS Grid Ref.	References	Description
Yarnton (Cresswell Field)	SFB 7395	Oxon SP44702114	[1] Hey 2004 [2] Bell 2004 [3] Bayliss & Hey 2004 [4] Mulville & Ayres 2004 [5] Hamerow 2006	Parts of four cattle skulls placed upright within the southwest quadrant of an SFB, at the interface of the primary fill and upper layers ([2]: 183, fig. 9.5; [5]: tab. 1). One of the skulls came from a juvenile; the other three were from individuals at least 24–30 months old, but not senile, and two of those were probable females ([4]: 336–337). One of the probable female skulls may have been poleaxed, but otherwise the skulls showed no sign of butchery. Two horse jaws and several large burnt and unburnt stones were also found in the SFB ([4]: 343; [2]: 183). The skulls appear to have been laid on the surface of the primary fill, which was 10–15 cm thick, and at least two were symmetrically arranged ([2]: 183, fig. 9.5, pl. 9.1). Radiocarbon dating suggests that two of the skulls in the SFB dated to the 7th century ([3]: 264; [1]: 21), but the Anglo-Saxon material at Cresswell Field has been dated to the earlier 8th century ([1]: 21).
Yeavering	Grave AX	Northd. NT925306	[1] Hope-Taylor 1977 [2] Hamerow 2006	A complete articulated human skeleton buried in a grave outside the east entrance to building A4 ([1]: 67–69; [2]: 11–12; tab. 1). The supine, slightly flexed articulated skeleton was highly degraded. In the grave were fittings for two lengths of staff, 55 in. (130 cm) and 12 in. (30 cm) long respectively ([1]: fig. 25), which may have been fragments of the same broken object, and the skull of a probable goat ([1]: 67–69). The grave was oriented west-east and lay on the axis of the building and the settlement ([1]: figs 61, 63). Less than 1 m from the foot of the grave and on the same alignment was free-standing post AX ([1]: 67, fig. 25). The burial is dated to the late 6th–7th century ([2]: tab. 1).
Yeavering	building D2	Northd. NT925306	[1] Hope-Taylor 1977 [2] Hamerow 2006	A 'stack' of mostly cattle skulls in a pit on the inside of the east wall of building D2, just north of the doorway ([1]: 98–100; [2]: 12, fig. 7, tab. 1). Thin layers of sand separated at least nine successive layers of skulls, indicating that deposits were made at regular intervals ([1]: 100, pl. 83). The stack of skulls appears to have extended above the ground surface and leaned against the wall ([1]: 100). The deposit has been dated to the late 6th–7th century ([2]: tab. 1).

CONTENTS					CONTEXT		ASSOCIATED FEATURES		
Type	*Species*	*Age*	*Sex*	*Treatment (humans)*	*Type*	*Strati-graphic level*	*Type*	*Element*	**Date range (centuries)**
skulls (√,o,√)	cattle	3 adult, 1 juvenile	*adults:* 2 ?female		SFB	on lower fill	none	N/A	7th–8th
complete articulated skeleton (√,–,√); skull (o,o,√)	*skeleton:* human; *skull:* ?goat	indet.	indet.	flexed	grave		earthfast building	doorway	6th–7th
skulls (√,o,√)	cattle				pit		earthfast building	wall (inside)	6th–7th

Appendix C
Tables

Deposition	Removal	
	Passive	*Active*
Passive	e.g. loss, abandonment	e.g. casual discard
Active	e.g. caching, disposal of the dead	e.g. deliberate discard

Table 2.1: The binary processes of removal from the behavioural system and deposition into the archaeological record viewed together. Examples of formation processes described by each permutation are drawn from Schiffer (1976: 30–34, 1987: 47–98).

Table 4.1: Signifiers of special selection, treatment, and arrangement by object type.

	Specially selected	Specially treated	Specially arranged
all object types	*YES* · *curated material* · *very large objects* *POSSIBLY* · *very unusual objects or material*	*YES* · *modified in deposition* · *placed in a container or bag prior to deposition*	*YES* · *in a 'specially dug' feature* · *modified to fit into feature* · *on or near the base of a feature (SFB: within 20cm), or at an interface* · *in the centre of a context* *POSSIBLY* · *at/around the edge of a context* · *at the terminus of a linear feature* · *at or in an entrance*
complete articulated humans	YES · all examples	YES · dismembered or weathered remains · bound individuals	YES · deliberately positioned or orientated
complete articulated animals	YES · multiple individuals · individual large animals and livestock (e.g. horses, cattle, sheep, pigs) POSSIBLY · individual smaller animals (e.g. dogs, cats, neonates)	YES · skinned animals, or animals where butchery is aborted early on · domesticates that are usually butchered POSSIBLY · domesticates that are not usually eaten (i.e. horses, dogs, cats) · large wild animals NO · small animals (e.g. birds, rodents)	YES · deliberately positioned or orientated
articulated segments	YES · multiple or composite articulated segments from one individual or species, or comprising the same elements POSSIBLY · all other examples	YES · most examples POSSIBLY · possible butchery waste · possible table waste	YES · in a non-random formation

Table 4.1, *continued.*

	Specially selected	Specially treated	Specially arranged
skulls	YES · multiple skulls · modified skulls · with post-cranial elements from the same individual POSSIBLY · single skulls	YES · curated skulls POSSIBLY · complete skulls	YES · in a non-random formation
disarticulated bone	YES · deposits *en masse* · bones from one individual/species, or comprising the same elements POSSIBLY · single bone in an otherwise sterile context · an unusually large range of species	POSSIBLY · all cut the same way · disarticulated human bone · disarticulated bone of domesticates not usually eaten (i.e. horses, dogs, cats)	
complete or semi-complete pottery	YES · multiple vessels · modified vessels POSSIBLY · individual vessels	YES · complete vessels POSSIBLY · semi-complete vessels	
artefacts (single/sets)	YES · discrete clusters of artefacts POSSIBLY · artefacts not clustered · individual artefacts	YES · sets of complete artefacts POSSIBLY · sets of fragmented artefacts · individual complete artefacts NO · individual fragmented artefacts	

Table 4.1, *continued.*

	Specially selected	Specially treated	Specially arranged
metalworking debris	YES · discrete assemblages POSSIBLY · unusually large and/or homogeneous assemblages	YES · assemblages comprising complete artefacts	
lead vessels	YES · multiple vessels POSSIBLY · individual vessels	YES · folded and/or dismantled · containing a tool 'hoard'	
loomweights & lead rings or discs	YES · discrete clusters or lines of rings POSSIBLY · collections of rings not clustered	POSSIBLY · lead rings · complete raw loomweights	YES · lines or stacks of rings · in postholes and corners of SFBs
stones	YES · clusters or groups of stones POSSIBLY · shaped stone · exotic or unusual stone		YES · in a non-random formation

Object types	Context types				
	u	*v*	*w*	*y*	**Total**
a	20	11	0	0	**31**
b	14	8	1	1	**24**
c	2	1	13	5	**21**
d	0	1	7	11	**19**
e	0	0	1	4	**5**
Total	**36**	**21**	**22**	**21**	**100**

Table 4.2: An example contingency table, showing the frequencies with which each hypothetical object type was found in a hypothetical context type.

	as a proportion of overall animal bone assemblage	as a proportion of animal bone in placed deposits
sheep	34%	8%
cattle	33%	39%
pig	23%	9%
domestic fowl	5%	1%
horse	2%	18%
wild species	1%	8%
dog	0.7%	18%
cat	0.3%	5%

Table 5.1: Species representation in the overall animal bone assemblage from early to middle Anglo-Saxon settlements compared to their representation in placed deposits. Percentages for the overall animal bone assemblage were derived from Poole (2010*b*: appendices 2.1, 4.1) using a sample of over 233,000 (NISP) from 67 early to middle animal bone assemblages.

Object types	Context types					
	SFBs	pits	ditches	*graves*	*other*	*Total*
articulated skeletons	**18**	**14**	**3**	*15*	*1*	*51*
articulated segments	**7**	**2**	**6**	*0*	*0*	*15*
skulls	**16**	**13**	**0**	*2*	*0*	*31*
disarticulated bone	**4**	**6**	**3**	*0*	*0*	*13*
pots	*10*	*2*	*0*	*0*	*0*	*12*
loomweights	*32*	*0*	*0*	*0*	*2*	*34*
lead rings/discs	*6*	*0*	*0*	*0*	*0*	*6*
lead vessels	*0*	*0*	*2*	*0*	*0*	*2*
artefacts	*7*	*1*	*1*	*0*	*0*	*9*
metalworking debris	*1*	*0*	*0*	*0*	*0*	*1*
pyre debris	*1*	*1*	*0*	*0*	*0*	*2*
Total	*102*	*39*	*15*	*17*	*3*	*176*

Table 5.2 Contingency table showing occurrences of each object type with each context type. Entries in bold have been included in the correspondence analysis; those in italics are shown for completeness.

Species	Context types					
	SFBs	pits	ditches	*graves*	*other*	*Total*
human	**7**	**5**	**3**	*15*	*1*	*31*
cattle	**14**	**13**	**3**	*0*	*0*	*30*
dog	**8**	**4**	**2**	*0*	*0*	*14*
horse	**5**	**7**	**2**	*0*	*0*	*14*
pig	**4**	**2**	**1**	*0*	*0*	*7*
sheep/goat	*0*	*4*	*1*	*1*	*0*	*6*
cat	*4*	*0*	*0*	*0*	*0*	*4*
bird	*1*	*1*	*0*	*0*	*0*	*2*
other	*3*	*1*	*1*	*0*	*0*	*5*
Total	*46*	*37*	*13*	*16*	*1*	*113*

Table 5.3: Contingency table showing occurrences of each species with each context type. Entries in bold have been included in the correspondence analysis; those in italics are shown for completeness. 'Other' species include one deposit each containing mouse, rabbit, and fish remains placed in SFBs, and two deposits containing deer antler, one in a pit and the other in a ditch.

Degree of articulation	Species									
	human	cattle	dog	horse	sheep/ goat	pig	*cat*	*bird*	*other*	*Total*
articulated skeletons	**24**	**5**	**11**	**4**	**2**	**0**	*3*	*1*	*1*	*51*
articulated segments	**2**	**5**	**1**	**3**	**2**	**3**	*1*	*0*	*1*	*18*
skulls	**3**	**18**	**2**	**8**	**3**	**2**	*0*	*1*	*1*	*38*
disarticulated bone	*3*	*3*	*1*	*1*	*0*	*1*	*0*	*0*	*1*	*10*
Total	*32*	*31*	*15*	*16*	*7*	*6*	*4*	*2*	*4*	*117*

Table 5.4: Contingency table showing occurrences of degree of articulation by species. Entries in bold have been included in the correspondence analysis; those in italics are shown for completeness.

Placed deposit	Cow skulls	Horse skulls	Notes
Pit F345, Bloodmoor Hill	2	1	Also disarticulated bone *en masse*.
Pit 394, Eynsham	6	1	Also disarticulated bone *en masse*.
Pit α, Sutton Courtenay	2	1	Also an adult woman and human infant.
SFB 45, West Stow	1	1	Horse skull just above base; cattle skull on surface of lowest fill.
SFB 7325, Yarnton (Cresswell Field)	1 or 4	2	Also 5 left mandibles and one right mandible from horses, and other disarticulated bones.

Table 5.5: Placed deposits containing both cattle and horse skulls.

	articulated skeletons	articulated segments	skulls	disarticu-lated bone	pots	loom-weights	*lead rings*	*lead vessels*	*artefacts*	*metal-working debris*	*pyre debris*
articulated skeletons	**51**	**1**	**6**	**4**	**0**	**0**	*0*	*0*	*0*	*0*	*0*
articulated segments	**1**	**15**	**2**	**2**	**1**	**0**	*1*	*0*	*0*	*0*	*0*
skulls	**6**	**2**	**31**	**6**	**2**	**0**	*0*	*0*	*0*	*0*	*0*
disarticulated bone	**4**	**2**	**6**	**13**	**0**	**0**	*0*	*0*	*0*	*0*	*0*
pots	**0**	**1**	**2**	**0**	**12**	**5**	*0*	*0*	*1*	*0*	*0*
loomweights	**0**	**0**	**0**	**0**	**5**	**34**	*0*	*0*	*0*	*0*	*0*
lead rings/discs	*0*	*1*	*0*	*0*	*0*	*0*	*6*	*0*	*0*	*0*	*0*
lead vessels	*0*	*0*	*0*	*0*	*0*	*0*	*0*	*3*	*1*	*0*	*0*
artefacts	*0*	*0*	*0*	*0*	*1*	*0*	*0*	*1*	*10*	*0*	*0*
metalworking debris	*0*	*0*	*0*	*0*	*0*	*0*	*0*	*0*	*0*	*1*	*0*
pyre debris	*0*	*0*	*0*	*0*	*0*	*0*	*0*	*0*	*0*	*0*	*2*
Total	*62*	*22*	*47*	*25*	*21*	*39*	*7*	*4*	*12*	*1*	*2*

Table 5.6: Contingency table showing occurrences of two or more object types together in the same deposit. The numbers on the diagonal represent the total count for each content type. Entries in bold have been included in the correspondence analysis; those in italics are shown for completeness.

	human	cattle	dog	horse	pig	sheep/ goat	*cat*	*bird*	*other*	*Total*
human	**31**	**2**	**0**	**1**	**0**	**2**	*0*	*0*	*0*	*36*
cattle	**2**	**30**	**2**	**4**	**1**	**1**	*2*	*0*	*0*	*42*
dog	**0**	**2**	**14**	**1**	**1**	**0**	*0*	*0*	*0*	*18*
horse	**1**	**4**	**1**	**14**	**1**	**1**	*0*	*0*	*0*	*22*
pig	**0**	**1**	**1**	**1**	**7**	**1**	*0*	*0*	*1*	*12*
sheep/goat	**2**	**1**	**0**	**1**	**1**	**6**	*0*	*0*	*0*	*11*
cat	*0*	*2*	*0*	*0*	*0*	*0*	*4*	*0*	*0*	*6*
bird	*0*	*0*	*0*	*0*	*0*	*0*	*0*	*2*	*0*	*2*
other	*0*	*0*	*0*	*0*	*1*	*0*	*0*	*0*	*5*	*6*
Total	*36*	*42*	*18*	*22*	*12*	*11*	*6*	*2*	*5*	*154*

Table 5.7: Contingency table showing occurrences of two or more species together in the same deposit. The numbers on the diagonal represent the total count for each species. *En masse* bone deposits are only included if they comprised a single species.

		total placed deposits*	infant	juvenile	percentage infant	percentage juvenile
Degree of articulation	*articulated skeletons*	51	7	8	14%	16%
	articulated segments	15	2	2	13%	13%
	skulls	31	0	3	0%	10%
	disarticulated bone	13	2	0	15%	0%
Species	*human*	31	7	6	23%	19%
	cattle	30	0	2	0%	7%
	dog	14	0	1	0%	7%
	horse	14	0	2	0%	14%
	sheep/goat	6	1	0	17%	0%
	pig	7	3	1	43%	14%
Context type	*SFBs*	41	3	1	7%	2%
	pits	29	1	2	3%	7%
	ditches	9	1	3	11%	33%
	graves	15	1	6	7%	40%

Table 5.8: Numbers and proportions of infants and juveniles in placed deposits of skeletal remains, by degree of articulation, species, and context type. The yellow cells indicate proportions that were shown to be statistically significant by Student's t-test. The grey cells indicate a suggestive difference, but *n* was too small for a t-test to be reliable. Graves are a special case because they all contain human remains. **For context types: total number of placed deposits of skeletal remains.*

Object types	Associated feature types: earthfast building	major enclosure	minor enclosure	earthwork	*SFB*	*rectilinear enclosure system*	*other enclosure*	*other ditch/gully*	*Total*
articulated skeletons	**9**	**2**	**6**	**3**	*2*	*1*	*0*	*3*	*26*
articulated segments	**0**	**4**	**1**	**1**	*1*	*0*	*1*	*0*	*8*
skulls	**4**	**0**	**3**	**2**	*0*	*0*	*0*	*0*	*9*
disarticulated bone	**1**	**3**	**0**	**1**	*1*	*0*	*0*	*1*	*7*
pots	*0*	*0*	*0*	*0*	*2*	*0*	*0*	*0*	*2*
loomweights	*1*	*0*	*0*	*3*	*2*	*0*	*0*	*0*	*6*
lead rings/ discs	*0*	*0*	*0*	*0*	*3*	*0*	*0*	*0*	*3*
lead vessels	*0*	*0*	*1*	*0*	*0*	*0*	*0*	*1*	*2*
artefacts	*0*	*1*	*0*	*0*	*1*	*0*	*0*	*0*	*2*
Total	*15*	*10*	*11*	*10*	*12*	*1*	*1*	*5*	*65*

Table 6.1: Contingency table showing the frequency with which each object type was found in placed deposits associated with different feature types. Entries in bold have been included in the correspondence analysis; those in italics are shown for completeness.

	Associated feature types								
Species	**earthfast building**	**major enclosure**	**minor enclosure**	**earthwork**	*SFB*	*rectilinear enclosure system*	*other enclosure*	*other ditch/gully*	*Total*
human	**8**	**3**	**7**	**2**	*0*	*0*	*0*	*0*	*20*
cattle	**2**	**3**	**1**	**2**	*0*	*0*	*0*	*1*	*9*
horse	**2**	**2**	**0**	**1**	*1*	*0*	*0*	*0*	*6*
dog	*0*	*1*	*0*	*1*	*0*	*1*	*0*	*1*	*4*
sheep/goat	*1*	*0*	*1*	*1*	*1*	*0*	*0*	*0*	*4*
pig	*0*	*0*	*0*	*0*	*2*	*0*	*1*	*0*	*3*
cat	*0*	*0*	*0*	*0*	*0*	*0*	*0*	*1*	*1*
other	*0*	*0*	*0*	*0*	*0*	*0*	*0*	*2*	*2*
Total	*13*	*9*	*9*	*7*	*4*	*1*	*1*	*5*	*49*

Table 6.2: Contingency table showing the frequency with which each species was found in placed deposits associated with different feature types. Entries in bold have been included in the correspondence analysis; those in italics are shown for completeness.

Associated feature types	Associated feature elements: wall/boundary: *outside wall/boundary*	wall/boundary: *at wall/boundary*	wall/boundary: *inside wall/boundary*	corner	*entrance*	*terminus*	*Total*
earthfast building	**3**	**0**	**5**	**2**	*3*	*0*	*13*
major enclosure	**1**	**5**	**0**	**0**	*1*	*1*	*8*
minor enclosure	**2**	**3**	**1**	**1**	*1*	*2*	*10*
earthwork	**0**	**0**	**3**	**0**	*0*	*0*	*3*
SFB	**1**	**2**	**1**	**5**	*0*	*0*	*9*
rectilinear enclosure system	*0*	*0*	*1*	*0*	*0*	*0*	*1*
other enclosure	*0*	*0*	*0*	*0*	*1*	*0*	*1*
other ditch/gully	*0*	*0*	*0*	*0*	*0*	*1*	*1*
Total	*7*	*10*	*11*	*8*	*6*	*4*	*46*

Table 6.3: Contingency table showing the types and elements of features associated with placed deposits. Entries in bold have been included in the correspondence analysis; those in italics are shown here for completeness.

Object types	Associated feature elements						
	wall/boundary			entrance	*corner*	*terminus*	*Total*
	outside wall/boundary	***at wall/boundary***	***inside wall/boundary***				
articulated skeletons	**5**	**4**	**5**	**4**	*3*	*0*	*21*
articulated segments	**1**	**3**	**0**	**1**	*1*	*1*	*7*
skulls	**1**	**2**	**3**	**2**	*0*	*0*	*8*
disarticulated bone	**0**	**4**	**1**	**1**	*0*	*0*	*6*
pots	*0*	*0*	*0*	*0*	*2*	*0*	*2*
loomweights	*0*	*0*	*2*	*0*	*2*	*0*	*4*
lead rings/ discs	*0*	*0*	*0*	*0*	*3*	*0*	*3*
lead vessels	*0*	*0*	*0*	*0*	*0*	*2*	*2*
artefacts	*0*	*0*	*1*	*0*	*0*	*1*	*2*
Total	*7*	*13*	*12*	*8*	*11*	*4*	*55*

Table 6.4: Contingency table showing the frequency with which each object type was found in placed deposits associated with different feature elements. Entries in bold have been included in the correspondence analysis; those in italics are shown for completeness.

Species	Associated feature elements: wall/boundary: *outside wall/boundary*	wall/boundary: *at wall/boundary*	wall/boundary: *inside wall/boundary*	entrance	*corner*	*terminus*	*Total*
human	**4**	**4**	**5**	**3**	*3*	*0*	*19*
cattle	**1**	**2**	**2**	**1**	*0*	*1*	*7*
horse	**2**	**2**	**1**	**1**	*0*	*0*	*6*
dog	*0*	*1*	*1*	*0*	*0*	*0*	*2*
sheep/goat	*0*	*2*	*0*	*1*	*0*	*0*	*3*
pig	*0*	*1*	*0*	*1*	*1*	*0*	*3*
cat	*0*	*0*	*0*	*0*	*0*	*0*	*0*
other	*0*	*0*	*0*	*0*	*0*	*0*	*0*
Total	*7*	*12*	*9*	*7*	*4*	*1*	*40*

Table 6.5: Contingency table showing the frequency with which each species was found in placed deposits associated with different feature elements. Entries in bold have been included in the correspondence analysis; those in italics are shown for completeness.

		SFBs			all other context types except graves	Totals
		before backfilling	***during backfilling***	*after backfilling*		
Object types	**articulated skeletons**	**7**	**5**	*2*	**18**	*32*
	articulated segments	**3**	**2**	*0*	**8**	*13*
	skulls	**4**	**8**	*1*	**13**	*26*
	disarticulated bone	**0**	**2**	*0*	**9**	*11*
	pots	**5**	**4**	*0*	**2**	*11*
	loomweights	**25**	**3**	*0*	**3**	*31*
	lead rings/ discs	*1*	*3*	*0*	*0*	*4*
	lead vessels	*0*	*0*	*0*	*3*	*3*
	artefacts	*6*	*1*	*0*	*3*	*10*
	metalworking debris	*0*	*1*	*0*	*0*	*1*
	pyre debris	*0*	*1*	*0*	*1*	*2*
	Object Type Totals	*51*	*30*	*3*	*60*	*144*
Species	**human**	**2**	**2**	*0*	**9**	*13*
	cattle	**4**	**7**	*1*	**16**	*28*
	dog	**3**	**2**	*2*	**6**	*13*
	horse	**1**	**2**	*0*	**9**	*12*
	pig	**2**	**2**	*0*	**3**	*7*
	sheep/goat	*0*	*0*	*0*	*5*	*5*
	cat	*1*	*2*	*0*	*0*	*3*
	other	*2*	*1*	*0*	*3*	*6*
	Species Totals	*15*	*18*	*3*	*51*	*87*

Table 7.1: Placed deposits made in SFBs before, during, and after backfilling, and in all other context types except graves, by object type and species. Entries in bold have been included in the statistical analysis; those in italics are shown for completeness.

Site	Feature	Contents	Stratigraphic level
Bloodmoor Hill	pit F345	**2 cattle skulls** and **1 horse skull**, disarticulated animal bone ?*en masse*	**at base of final fill**
Bloodmoor Hill	pit F366	**cattle skull**	**near base of single fill**
Brooklands	SFB 1351	fish skulls, articulated pig segments, near-complete pot	mainly in lower layer of backfill
Cottam	pit 1073	human skull	**at base of final fill**
Harston	pit 4405, in SFB 6	lapwing skull	at base of multi-layer fill of pit cut into base of SFB
Hartigans	pit 195	**2 cattle skulls**	**near base of final fill**
Hartlepool	pit A2072	**horse skull**	at base, directly overlying posthole
Horcott Quarry	SFB 5087 [=5112]	**2 cattle skulls**, semi-complete pot(s), plus disarticulated bone	in lower layer of backfill (skulls just below upper layer)
Mucking	GH 10	pig skull on base, dog skeleton in axial posthole	**at base of backfill**
Pennyland	SFB 4	**cattle (or horse?) skull**	**at base of backfill (single layer)**
Sutton Courtenay	House XII [SFB]	**cattle skull**	**at base of backfill**
Sutton Courtenay	SFB 330	dog skull, articulated cattle spine, disarticulated piglet bones	in lower backfill layer
West Stow	SFB 45 (lower fill)	**horse skull**	**at base of single backfill**
West Stow	SFB 45 (upper fill)	**cattle skull**	**at base of upper fill (compaction hollow)**
West Stow	SFB 57	**2 cattle skulls**, complete cat skeleton, disarticulated animal bone *en masse*	**at base of upper backfill layer**
West Stow	SFB 65	**cattle skull**	**near base of backfill**
Yarnton (Cresswell Field)	SFB 7395	**4 cattle skulls**	**at base of upper backfill layer**

Table 7.2: Placed deposits containing skulls, made in SFBs or as secondary deposits in pits, that have recorded stratigraphic levels. Placed deposits in pits are shaded yellow. Cattle and horse skulls are coded red and blue, respectively. Deposits at the base of the final backfill layer of pits and SFBs and deposits at the base of SFBs are coded in bold black type.

Age	Sex			Total
	Male	*Female*	*Indeterminate or unreported*	
Mature (40+)				
Adult (20-40)	4	5		9
Adolescent (12–20)	1	2	1	4
Juvenile (3–12)			6	6
Infant (0–3)			7	7
Indeterminate or unrecorded			8	8
Total	**5**	**7**	**22**	**34**

Table 8.1: Sex versus age for individuals in burials in settlement contexts. Age ranges are in years and are approximate.

Age	Sex			Total
	Male	*Female*	*Indeterminate or unreported*	
Mature (40+)				
Adult (20-40)	1	1 *		2
Adolescent (12–20)		1 *		1
Juvenile (3–12)				
Infant (0–3)			5	5
Indeterminate or unrecorded			3	3
Total	**1**	**2**	**8**	**11**

Table 8.2: Sex versus age for individuals in burials in early Anglo-Saxon settlement contexts. Age ranges are in years and are approximate. **Not including graves 1 and 2 at West Stow, which have been assigned to the 8th century, but for which a 5th to 7th century date cannot be discounted (see text).*

Age	Sex			Total
	Male	*Female*	*Indeterminate or unreported*	
Mature (40+)				
Adult (20-40)	3	4 †		7
Adolescent (12–20)	1	1 †	1	3
Juvenile (3–12)			6	6
Infant (0–3)			2	2
Indeterminate			5	5
Total	**4**	**5**	**14**	**23**

Table 8.3: Sex versus age for individuals in burials in middle Ango-Saxon settlement deposits. Age ranges are in years and are approximate. *†Including graves 1 and 2 at West Stow, which have been assigned to the 8th century, but for which a 5th to 7th century date cannot be discounted (see text).*

Site	Sex			Total
	Male	*Female*	*Indeterminate*	
Barrow Hills			1	1
Catholme	1		1	2
Cheddar	1			1
Cottam		1		1
Cowdery's Down			1	1
Eye Kettleby			1	1
Flixborough		1	5	6
Gamlingay	1			1
Higham Ferrers	2	1	1	4
Littlemore		1		1
Sutton Courtenay	1	1	1	3
West Stow		2		2
Wharram Percy			1	1
Yarnton			7	7
Yeavering			1	1
Total	**6**	**7**	**20**	**33**

Table 8.4: Sex of human remains in placed deposits. Excluded are placed deposits of cremation pyre remains and individuals whose sex was not reported.

		Normative		Deviant			Indeterminate or unreported	Total
		Supine, extended	*Supine, flexed*	*Bound, tightly bent, on side, and/or prone*	*Skull*	*Disarticulated*		
Adult (20–40)	*M*	1		2		1		4
	F	2		2	1			5
	?							
Adolescent (12–20)	*M*	1						1
	F		1				1	2
	?			1				1
Juvenile (3–12)	*?*	3	1				2	6
Indeterminate or unreported	*?*		1		5		2	8
Total		**7**	**3**	**5**	**6**	**1**	**5**	**27**

Table 8.5: Age, sex, and treatment of human remains buried in settlement contexts. Infants have been excluded.

	Individuals		Burials	
	Early Anglo-Saxon	*Middle Anglo-Saxon*	*Early Anglo-Saxon*	*Middle Anglo-Saxon*
Normative	2	8	2	8
Deviant	2	11	2	5 *
Indeterminate	2	3	2	3
Infant	5	2	4 †	2
Total	**11**	**24**	**10**	**18**

Table 8.6: Treatment of individuals and treatment of burials in the early and middle Anglo-Saxon periods compared. **Ditch 7330 (section 383) at Higham Ferrers and burial 3843 at Yarnton are each counted as one burial (see text). †The deviant burial in pit α at Sutton Courtenay includes the infant.*

Characteristic	Occurrences
prone	2
on side	2
tightly bent	2
tied legs	3
sealed	1
displayed	2–5
skulls	6
disarticulated	1
Total number of individuals	12

Table 8.7: Frequency with which different deviant characteristics were found in burials in settlement contexts.

Age	Sex	Individuals with normative characteristics		Individuals with deviant characteristics	
		Early Anglo-Saxon	*Middle Anglo-Saxon*	*Early Anglo-Saxon*	*Middle Anglo-Saxon*
Adult (20–40)	*M*	1			4
	F		2 *	1	2
	?				
Adolescent (12–20)	*M*		1		
	F		1 *		
	?				1
Juvenile (3–12)	*?*		4		
Indeterminate or unrecorded	*?*	1		1	4
Total		**2**	**8**	**2**	**11**

Table 8.8: Age and sex of normative and deviant burials in the early and middle Anglo-Saxon periods. **Graves 1 and 2 at West Stow have been assigned to the 8th century because of their association with a major boundary feature, but a 5th to 7th-century date cannot be discounted (see text).*

Age	Sex			Total
	Male	*Female*	*Indeterminate or unrecorded*	
Mature (40+)				
Adult (20-40)	1	2		3
Adolescent (12–20)	1	1		2
Juvenile (3–12)			4	4
Indeterminate or unrecorded			1	1
Total	**2**	**3**	**5**	**10**

Table 8.9: Sex versus age for individuals in normative burials. Age ranges are in years and are approximate.

		Associated feature type		Associated feature element		
Age	**Sex**	*earthfast building*	*enclosure boundary*	*boundary or wall*	*corner*	*entrance*
Adult (20–40)	*M*		3	1		2
	F	1	3	3		1
	?					
Adolescent (12–20)	*M*	1			1	
	F		1	1		
	?		1	1		
Juvenile (3–12)	*?*	3	2	3	2	
Indeterminate or unrecorded	*?*	1	5	4		2
Total		**6**	**15**	**13**	**3**	**5**

Table 8.10: Age and sex of individuals buried in settlement contexts by associated feature type and element.

	Associated feature type		Associated feature element		
	earthfast building	*enclosure boundary*	*boundary or wall*	*corner*	*entrance*
Normative	5	4	6	2	1
Deviant		5 *	2 *		3
Indeterminate or unrecorded	1	1		1	1
Infant	2	1	3		
Total	**8**	**11**	**11**	**3**	**5**

Table 8.11: Treatment of human burials in settlement contexts by associated feature type and element. **Ditch 7330 (section 383) at Higham Ferrers* *and burial 3843 at Yarnton are each counted as one burial in this table (see text).*

	Single burials	Burials in groups
Normative	3	7
Deviant	6 *	1
Indeterminate	3	2
Infant	5	1
	0	11

Table 8.12: Frequency with which burials in settlement contexts occur singly and in groups (as defined in the text). **Ditch 7330 (section 383) at Higham Ferrers and burial 3843 at Yarnton are each counted as one burial in this table (see text).*

Site	Burial(s) in settlement contexts	Date	Discrete cemetery	Location	Date
Flixborough	burials 1960, 2231/2, 3580, 3706, 3878, 4010	early–middle 8th c.	'southern group' of 11 burials	*c.*60 m south of settlement	8th–10th c.
Gamlingay	grave 65	7th–9th c.	'main' cemetery of 109 burials and 6 'satellite' burials	within settlement	
West Stow	graves 1 and 2	?8th c.	West Stow Heath (unknown number of burials)	*c.*450 m. northwest of settlement	5th–7th c.
Yarnton	graves 3168, 3843, 3861	9th c.	western cemetery group of 7 burials	at western edge of settlement	9th c.
Yeavering	grave AX	late 6th–7th c.	Eastern and Western cemeteries	within settlement	

Table 8.13: Sites with burials in settlement contexts and discrete cemeteries nearby (Loveluck & Atkinson 2007: fig. 1.9; Geake 2007: 113–114; Murray with McDonald 2005; Tymms 1853; West 1985: 141–145; Hey 2004: fig. 7.1; Hope-Taylor 1977).

Settlement burials at Flixborough

Age	Sex			Total
	Male	*Female*	*Indeterminate or unrecorded*	
Mature (40+)				
Adult (20–40)		1		1
Young adult (17–25)				
Adolescent (12–17)				
Juvenile (3–12)			4	4
Infant (0–3)			1	1
Indeterminate or unrecorded				
Total		**1**	**5**	**6**

Cemetery burials at Flixborough

Age	Sex			Total
	Male	*Female*	*Indeterminate or unrecorded*	
Mature (40+)	1			1
Adult (20–40)	2*	1	4*	7
Young adult (17–25)			1	1
Adolescent (12–17)				
Juvenile (3–12)				
Infant (0–3)				
Indeterminate or unrecorded			1	1
Total	**3**	**1**	**6**	**10**

Table 8.14: Sex vs. age for individuals in Flixborough's (a) settlement burials and (b) associated cemetery (Mays 2007: 121, figs 8.4, 8.5). The age categories follow Mays and differ slightly from those used elsewhere in this chapter. **Three individuals (one male and 2 unsexed) were aged as 'adult' (i.e. 18+); they have been assigned to the adult (20–40) category in this table.*

Settlement burials at Yarnton

Age	Sex			Total
	Male	*Female*	*Indeterminate or unrecorded*	
'Ageing'				
Adult (25+)				
Young adult (18–25)				
Adolescent (12–18)			1	1
Juvenile (3–12)			2	2
Infant (0–3)				
Indeterminate or unrecorded			4 *	4
Total			**7**	**7**

Cemetery burials at Yarnton

Age	Sex			Total
	Male	*Female*	*Indeterminate or unrecorded*	
'Ageing'	1			1
Adult (25+)	3 †		1 †	4
Young adult (18–25)		1		1
Adolescent (12–18)				
Juvenile (3–12)				
Infant (0–3)				
Indeterminate or unrecorded				
Total	**4**	**1**	**1**	**6**

Table 8.15: Sex vs. age for individuals in Yarnton's (a) settlement burials and (b) associated cemetery (Boyle 2004: 317). The age categories follow Boyle and differ slightly from those used elsewhere in this chapter. **The individuals of indeterminate age are the partial remains of four subadults, in the same burial as the adolescent (grave 3843). †Three individuals (two males and one unsexed) were aged as 'adult'; they have been assigned to the adult (25+) category in this table.*

Appendix D
Figures

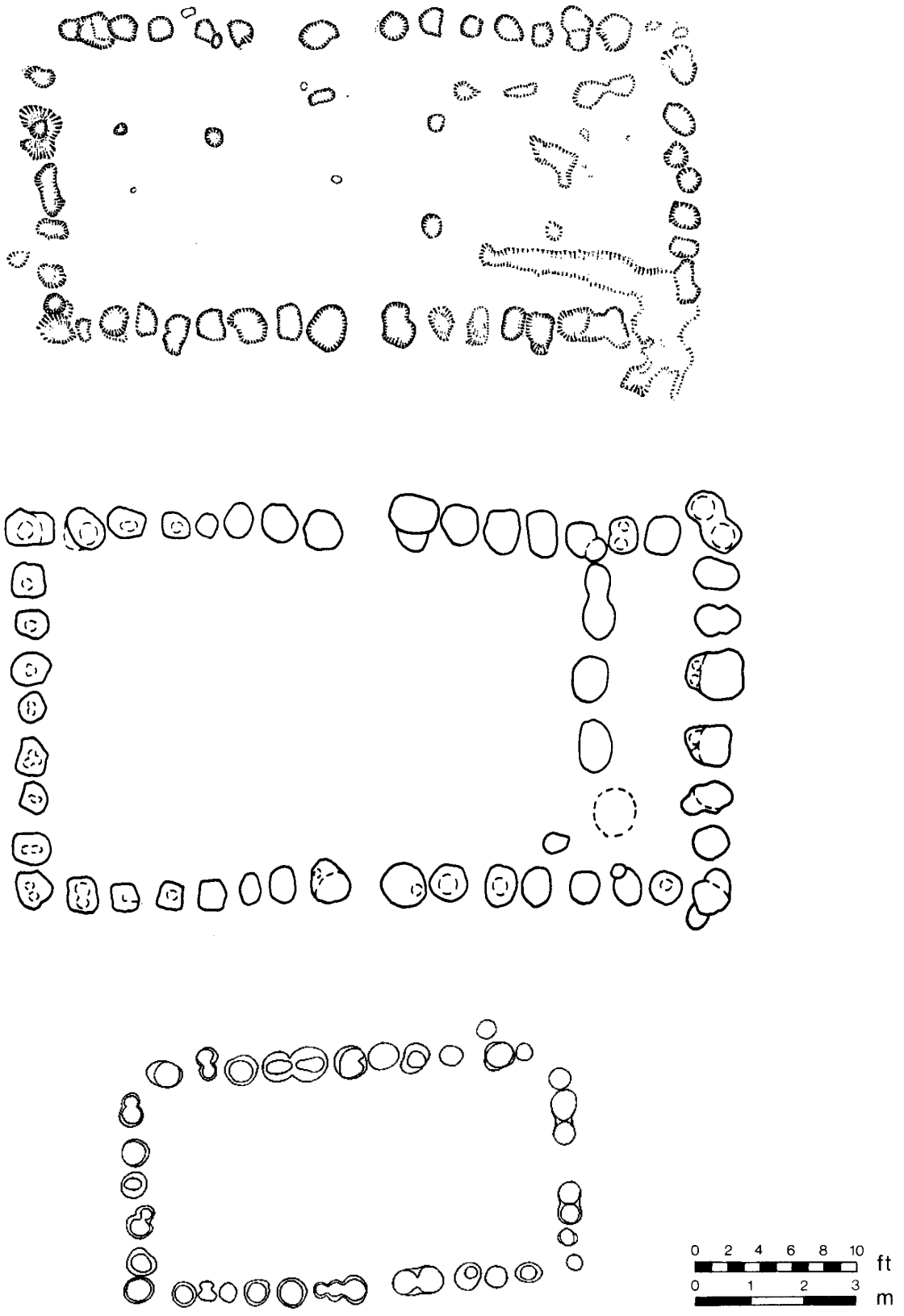


Figure 1.1: Early Anglo-Saxon earthfast structures. *Top to bottom*: Building A11 at Chalton, Hants; PHB 1 at Mucking, Essex; Building 1 at West Stow, Suffolk (after Addyman & Leigh 1973: fig. 7; Hamerow 1993: fig. 54; West 1985: fig. 8). *Top illustration © Society for Medieval Archaeology, used with the permission of Maney Publishing. Middle illustration © English Heritage. Bottom illustration © Suffolk County Council.*

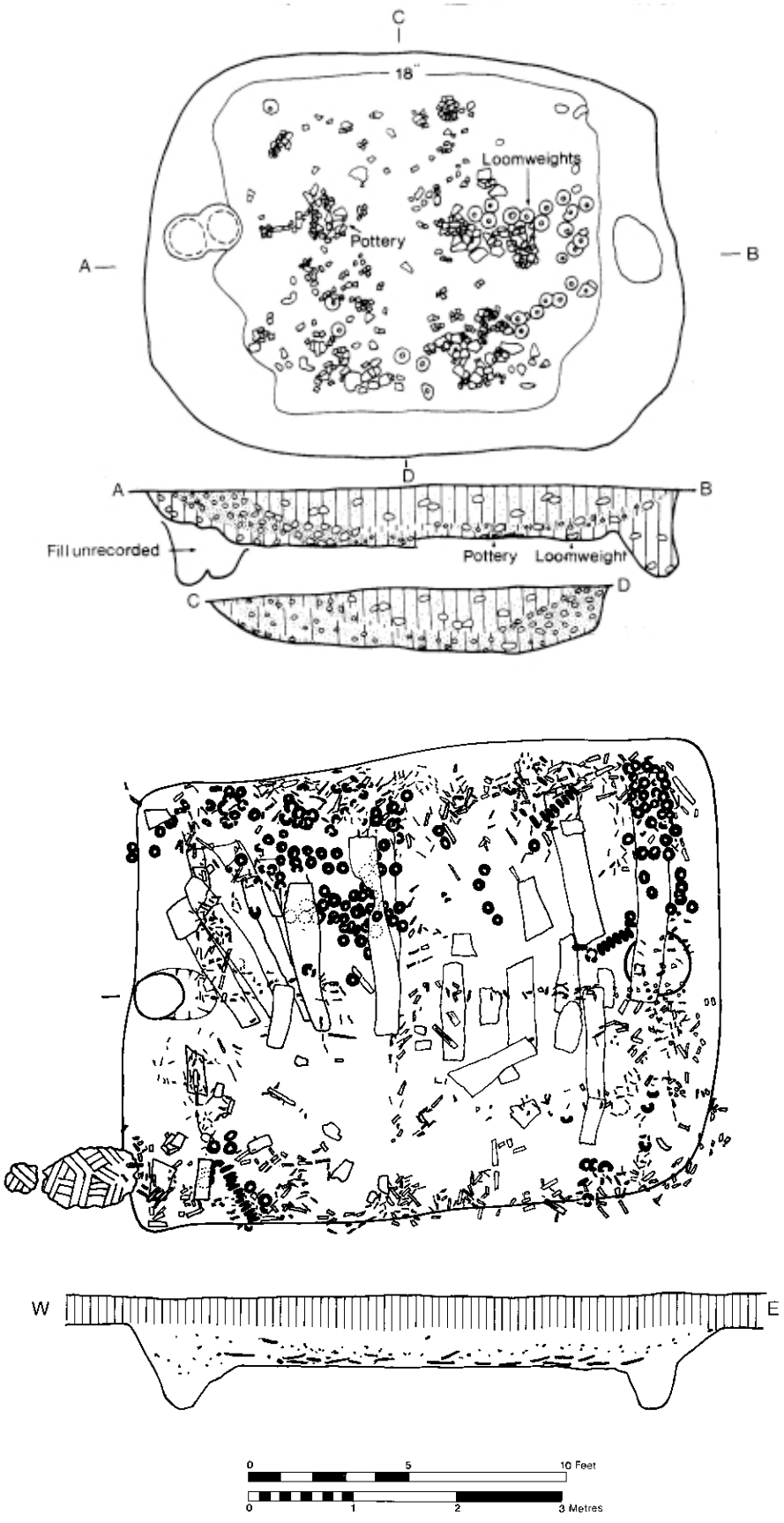


Figure 1.2: Early Anglo-Saxon SFBs. *Top*: GH 105 at Mucking, Essex; *bottom:* SFB 15 at West Stow, Suffolk (after Hamerow 1993: fig. 77; West 1985: fig. 71). *Top illustration © English Heritage. Bottom illustration © Suffolk County Council.*

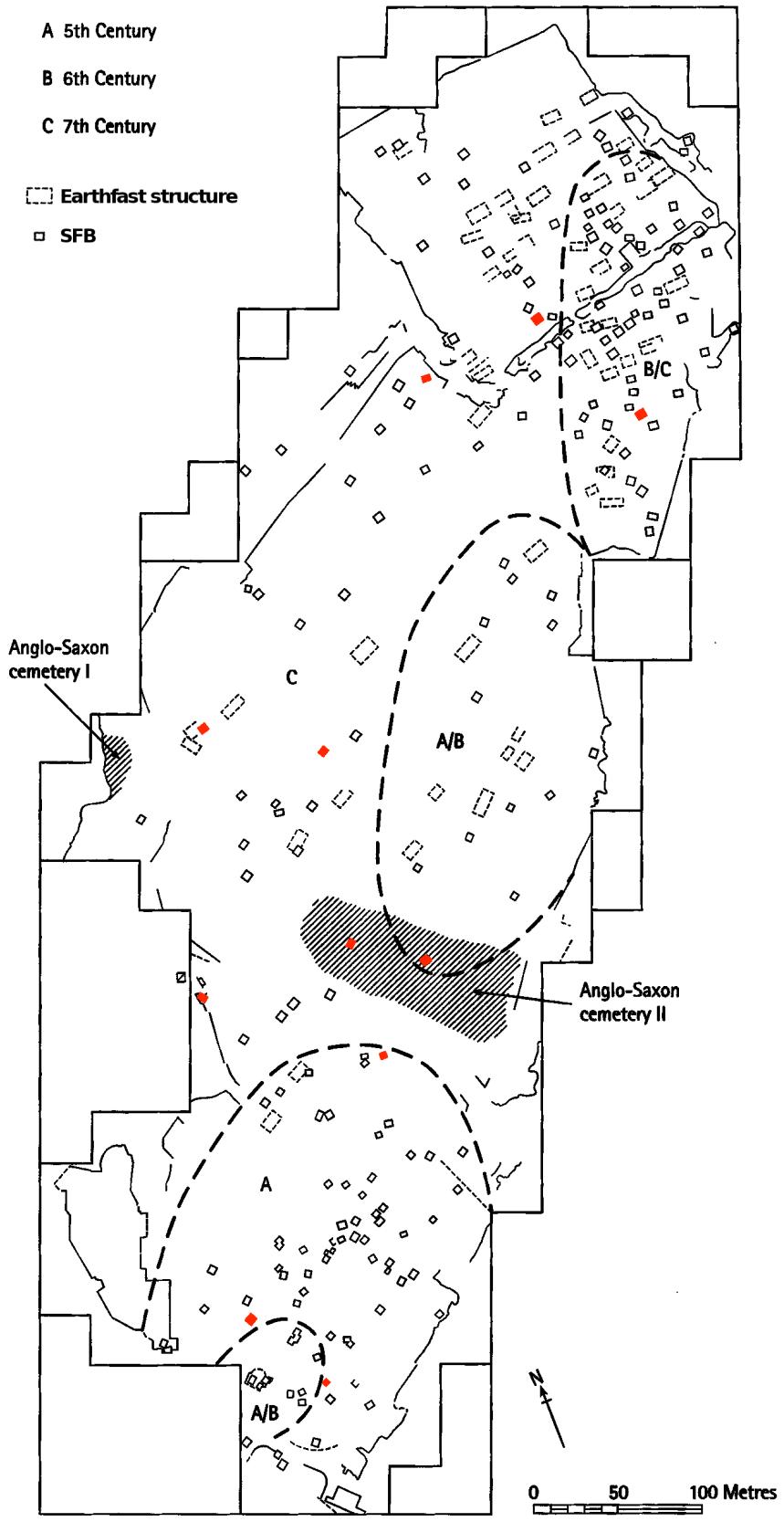


Figure 1.3: The early Anglo-Saxon settlement at Mucking, Essex (after Hamerow 1993: fig. 195, Hamerow 2002: fig. 3.26, and Ulmschneider 2011: fig. 10.1). Features containing placed deposits (listed in Appendix B) are shaded red. The placed deposit in recut [3958] ('antler ditch') is not shown. *Original illustration © English Heritage, used with the permission of English Heritage and Oxford University Press.*

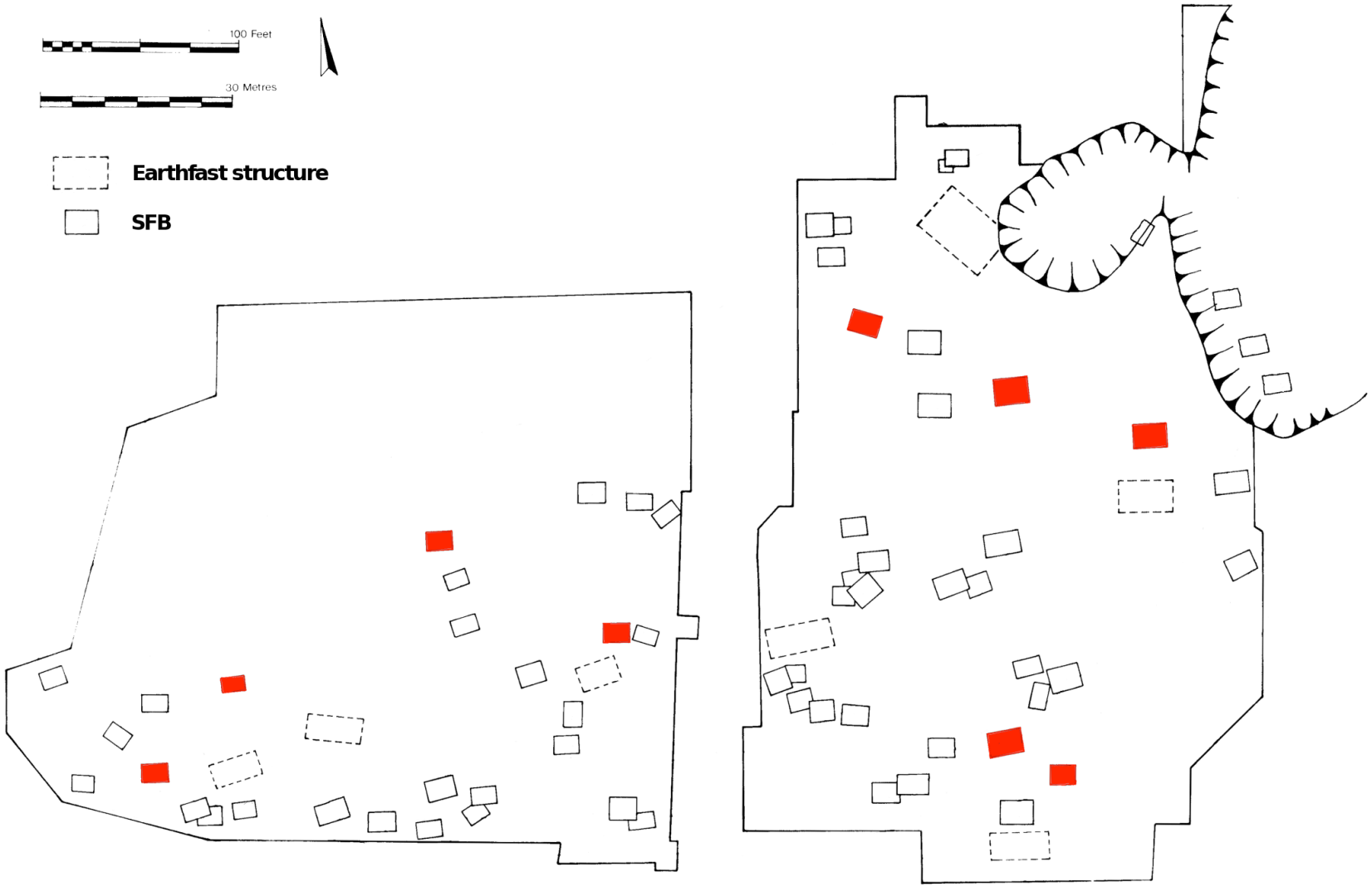


Figure 1.4: The early Anglo-Saxon settlement at West Stow, Suffolk (after West 1985: fig. 299). Graves 1 and 2 are not shown. *Original illustration © Suffolk County Council.*

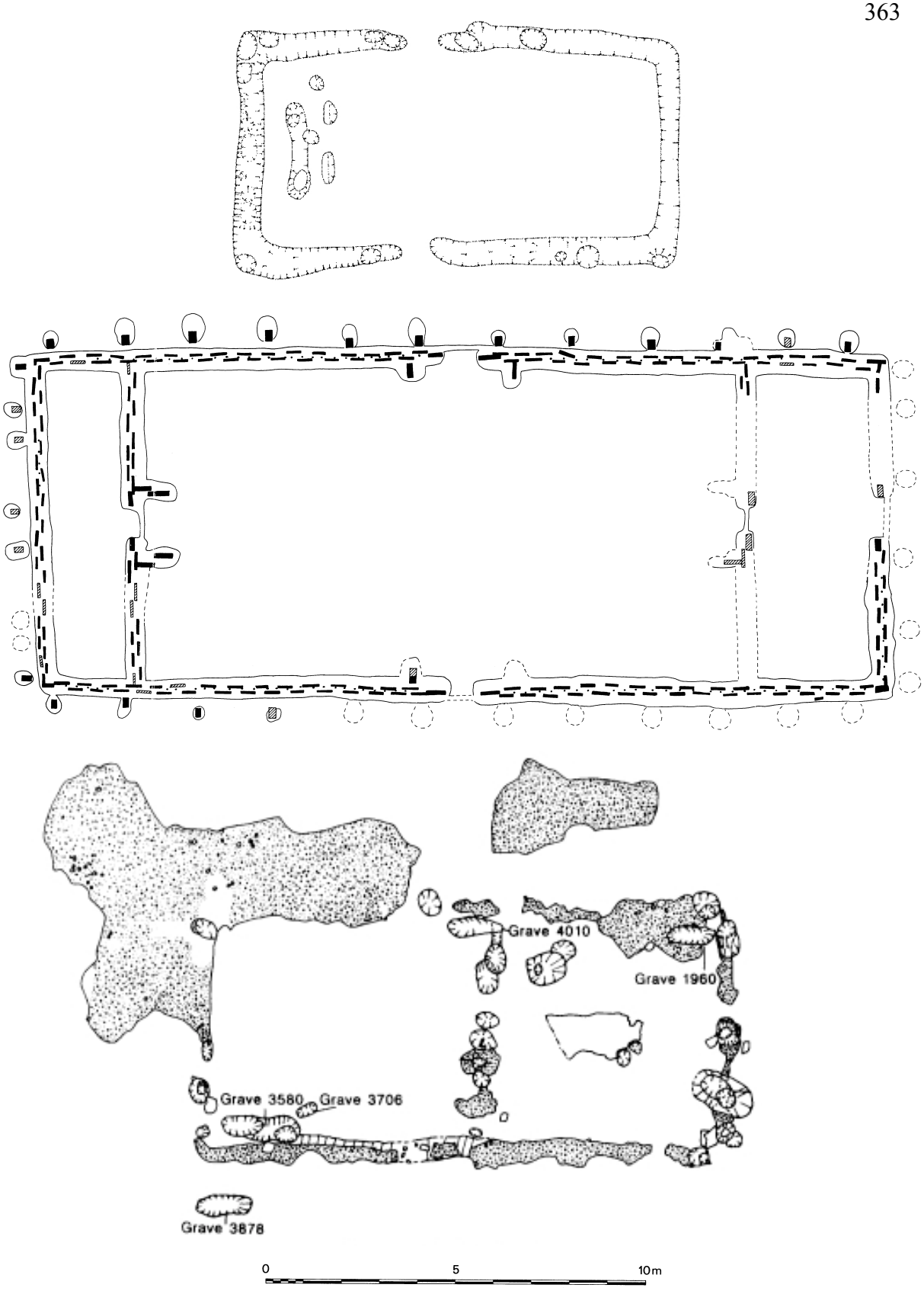


Figure 1.5: Middle Anglo-Saxon earthfast structures. *Top to bottom*: Structure 42 at Bloodmoor Hill, Suffolk; Structure C12 at Cowdery's Down, Hants; Building 1a at Flixborough, Lincs. (after Lucy *et al.* 2009: fig. 3.45; Millett with James 1983: fig. 46; Loveluck & Atkinson 2007: fig. 4.2). *Top illustration © Cambridge Archaeological Unit, reproduced by kind permission of Cambridge Archaeological Unit. Middle illustration used with the permission of Prof. Martin Millett and the Royal Archaeological Institute. Bottom illustration © Humber Archaeology Partnership, used with permission.*

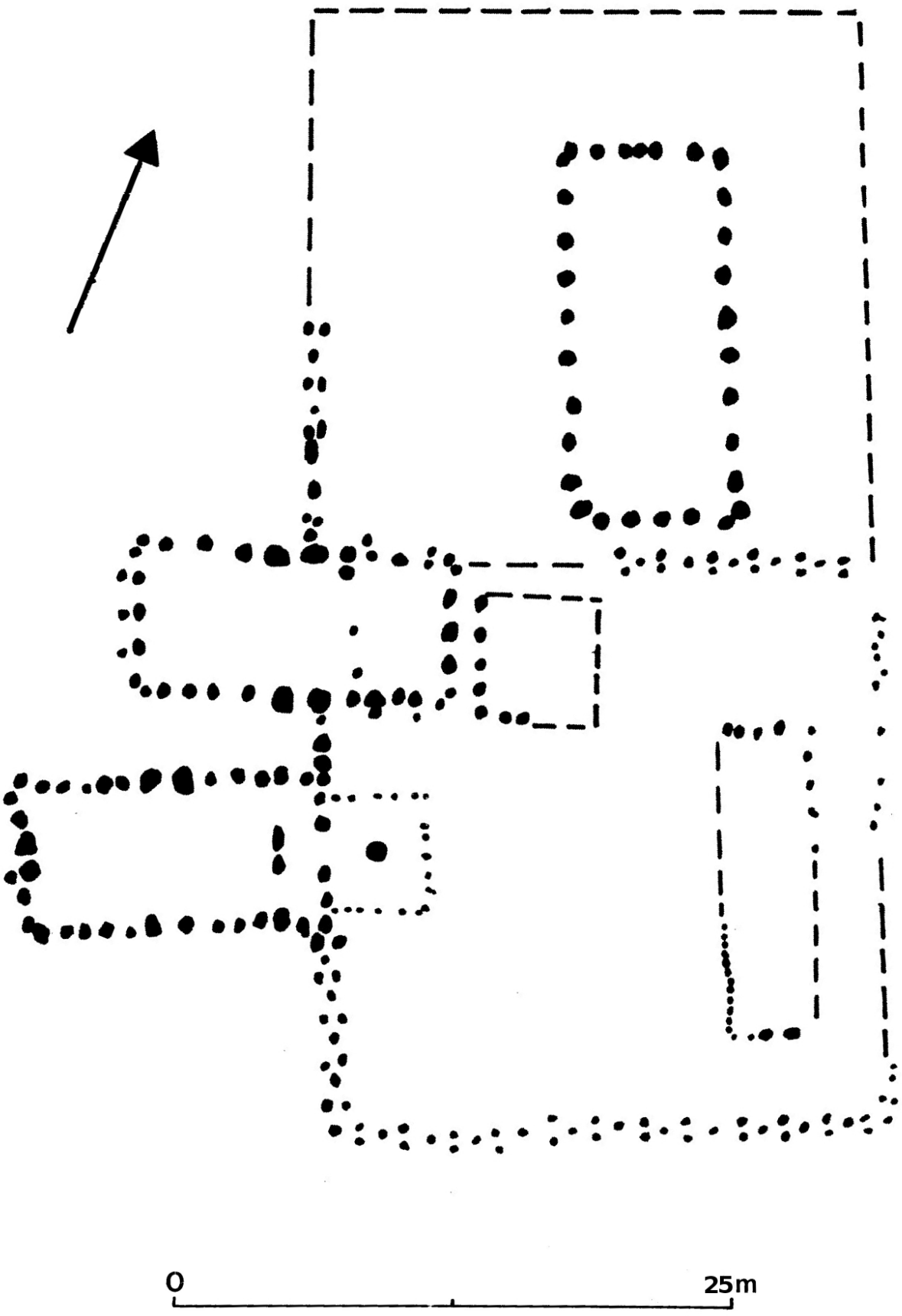


Figure 1.6: Late 6th- or 7th-century fenced enclosures at Cowdery's Down, Hants (after Reynolds 2003: fig. 1). *Illustration reproduced with the permission of the School of Archaeology, University of Oxford.*



Figure 1.7: Middle Anglo-Saxon minor enclosures at Yarnton, Oxon (after Hey 2004: fig. 3.6). Features containing placed deposits (listed in Appendix B) are shaded red. *Illustration used with the permission of Oxford Archaeology.*

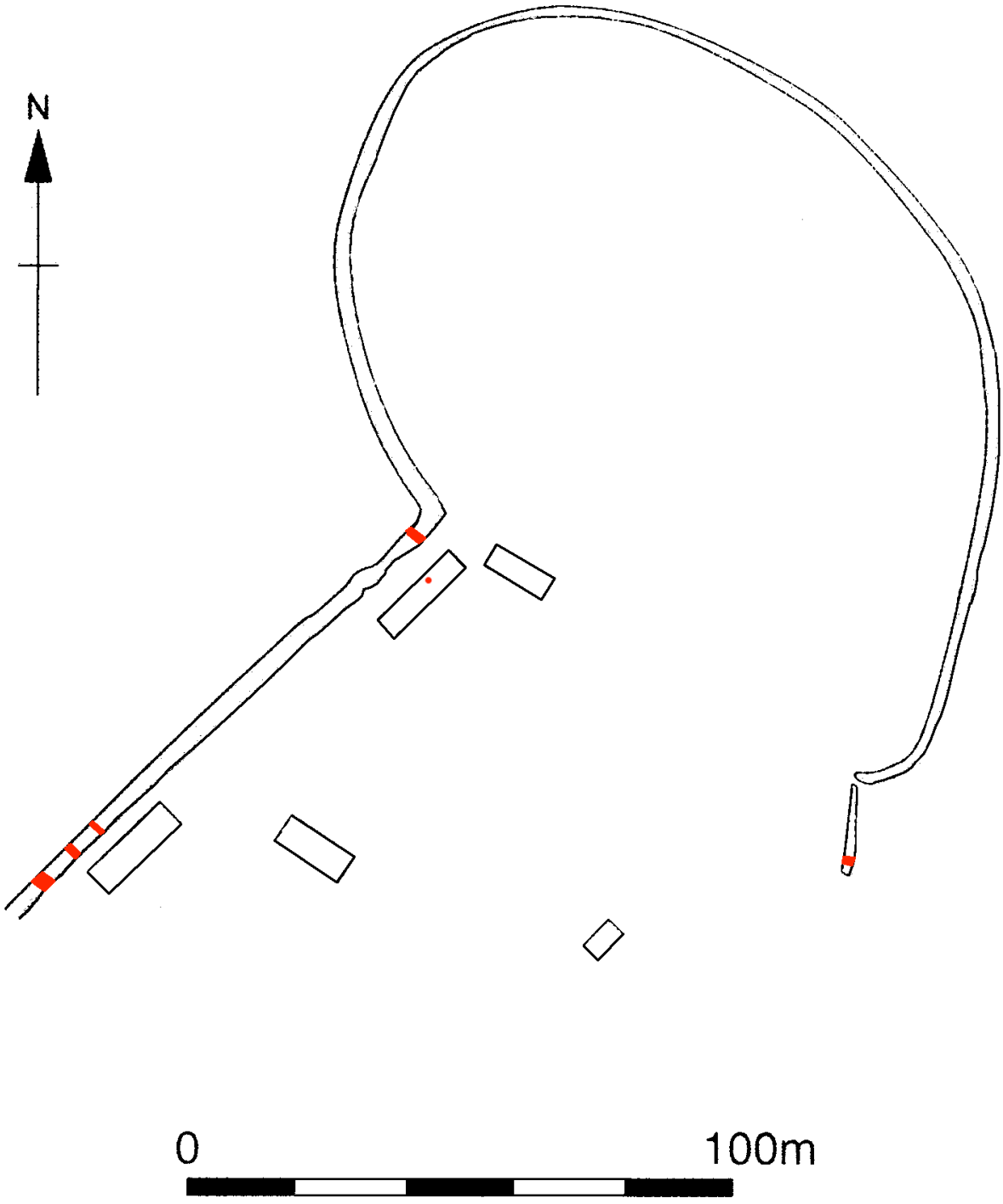


Figure 1.8: Middle Anglo-Saxon major enclosure at Higham Ferrers, Northants (after Hardy *et al.* 2007: fig. 5.5). Features containing placed deposits (listed in Appendix B) are shaded red. The location of the placed deposit at the northeast end of the western enclosure ditch extension is approximate (A. Hardy, pers. comm.). *Illustration used with the permission of Oxford Archaeology.*

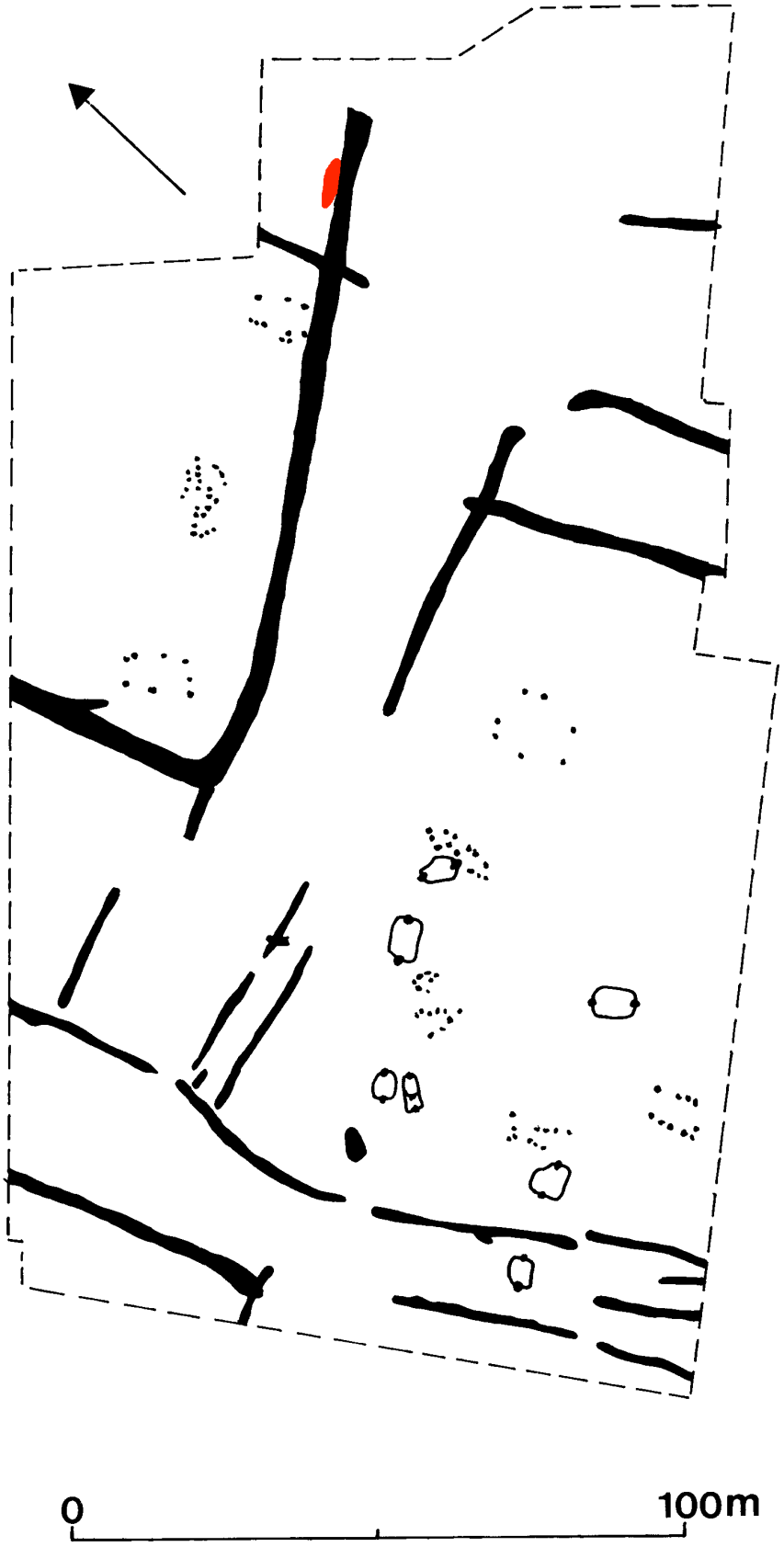


Figure 1.9: Middle Anglo-Saxon rectilinear settlement at Godmanchester, Cambs. (after Reynolds 2003: fig. 10). Features containing placed deposits (listed in Appendix B) are shaded red. *Illustration used with the permission of the School of Archaeology, University of Oxford.*

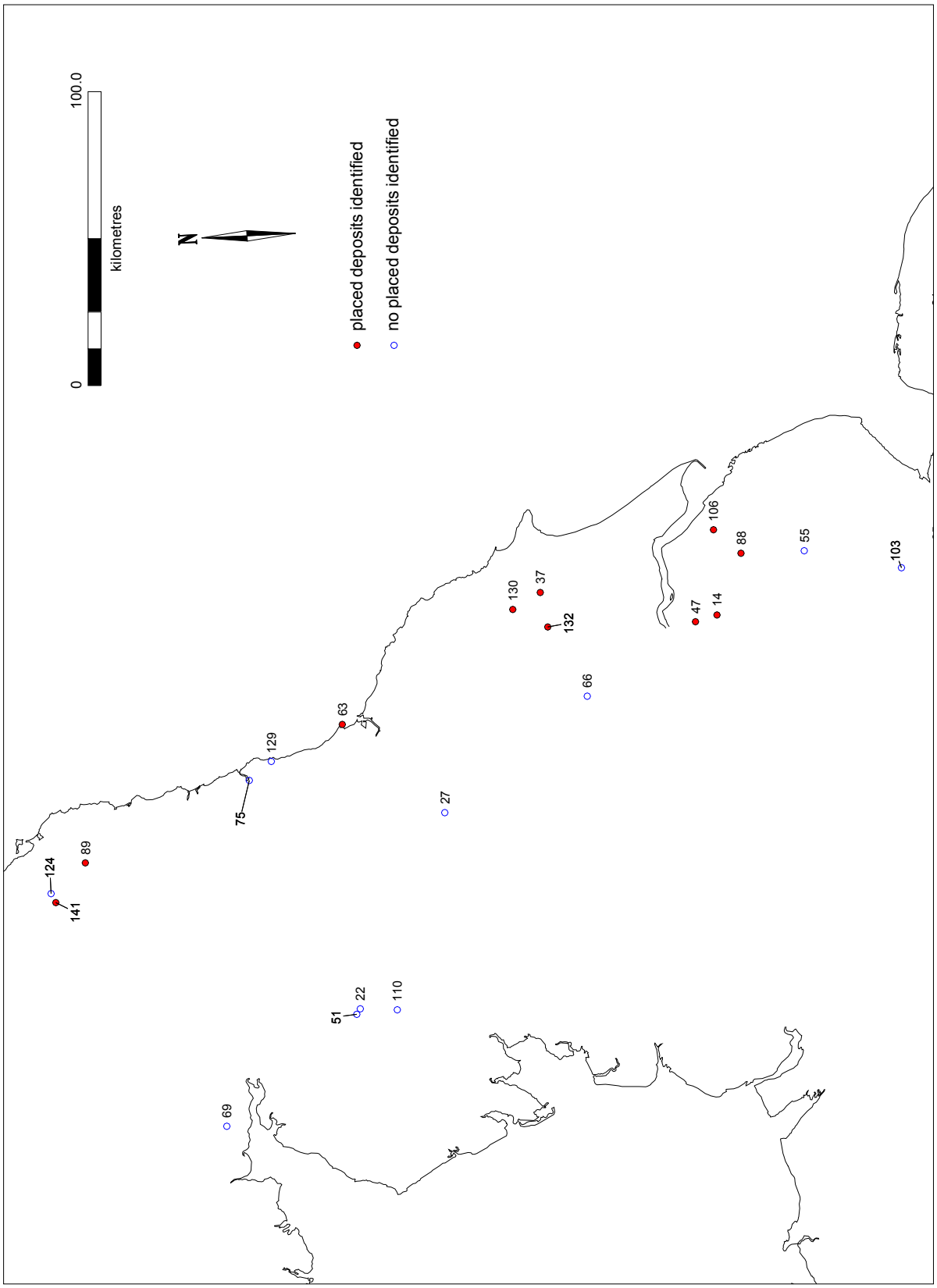
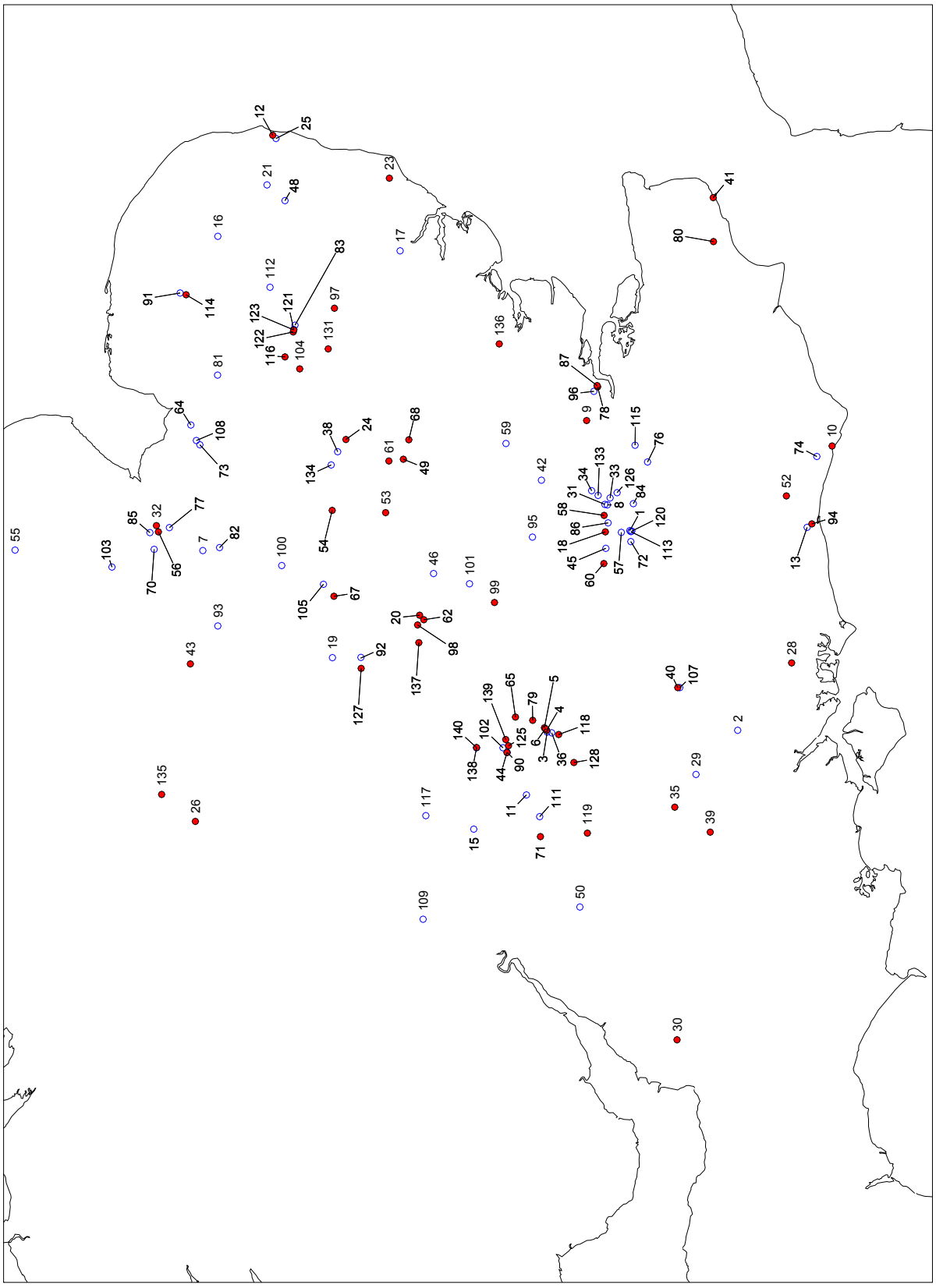


Figure 4.1: Locations of settlements examined in this study. The numbers correspond to the numbering in Appendix A.



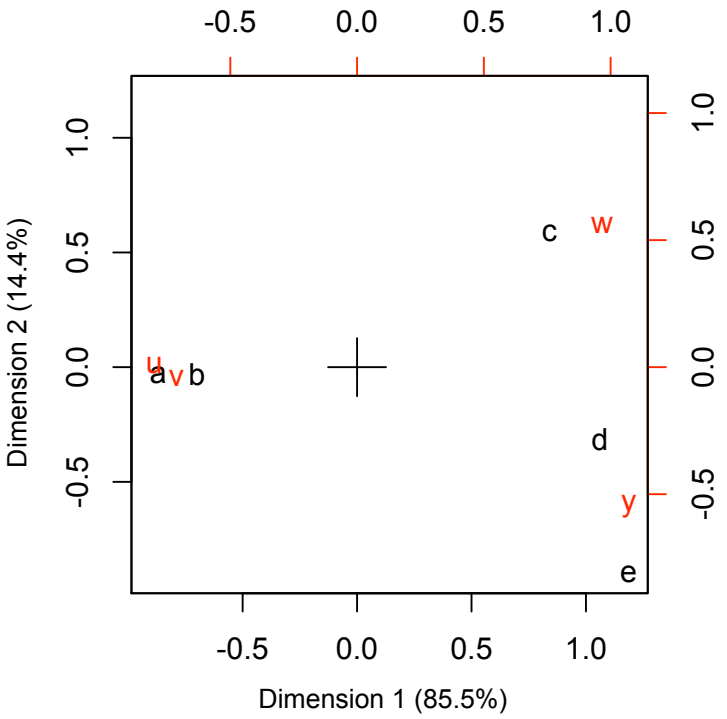


Figure 4.2: Example biplot produced by correspondence analysis of Tab. 4.1, showing correspondences between hypothetical object types (black) and context types (red).

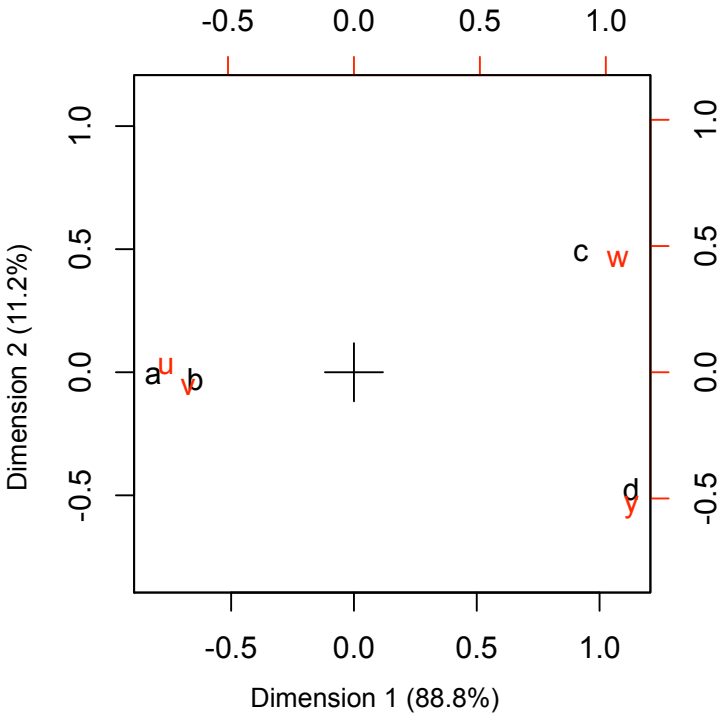


Figure 4.3: Like Fig. 4.2, an example biplot produced by correspondence analysis of Tab. 4.1, but excluding object type *e*.



Figure 5.1: Placed deposit at the base of SFB 1351 at Brooklands, Milton Keynes (Oxford Archaeology record photo). *Photograph used with the permission of Oxford Archaeology.*

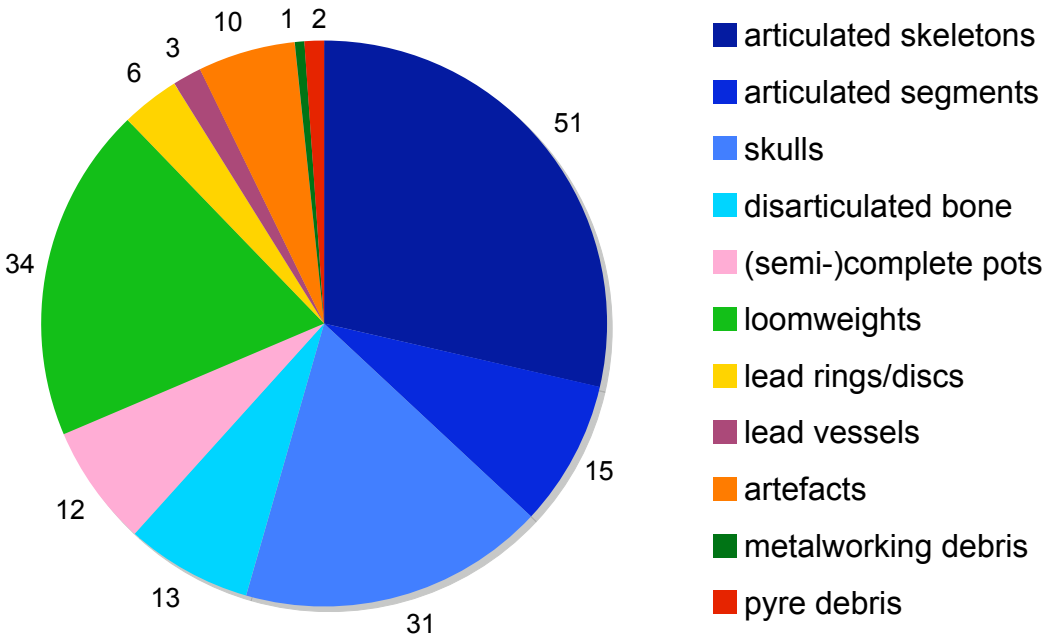


Figure 5.2: Object types in placed deposits. Skeletal remains are in shades of blue. The numbers of each type are included around the perimeter of the graph.

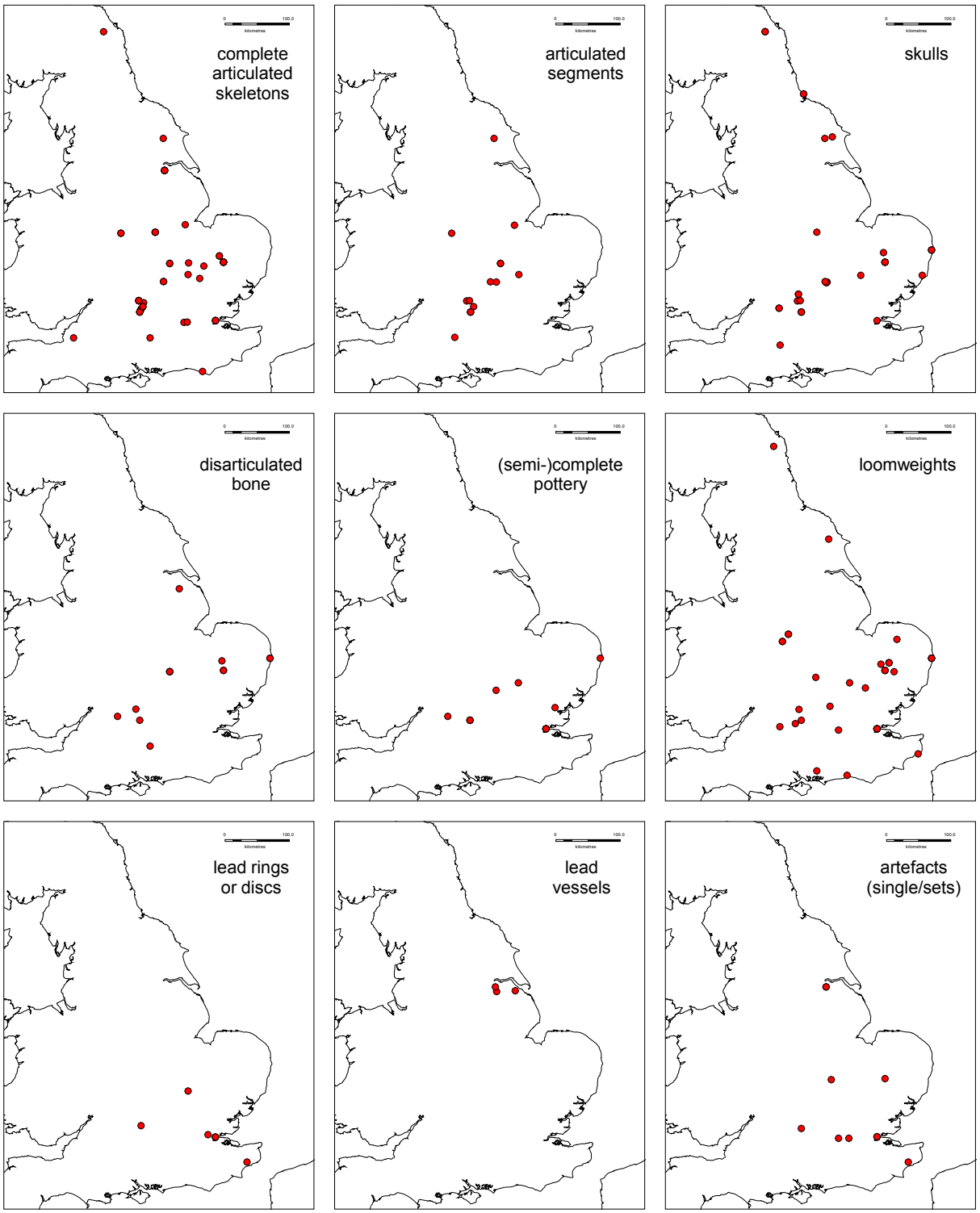


Figure 5.3: Geographical distribution of placed deposits by object type.

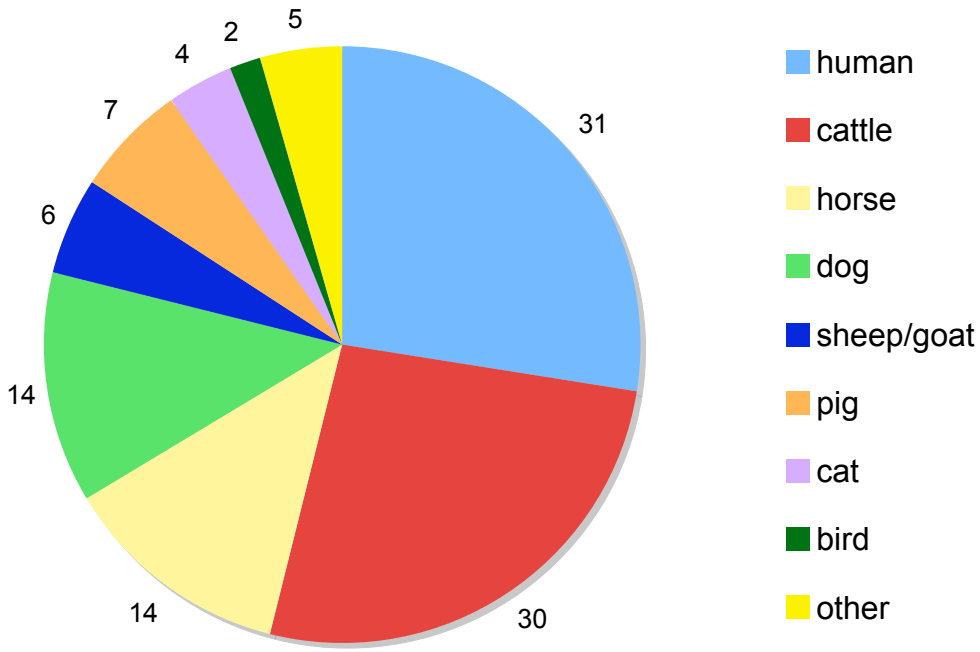


Figure 5.4: Species represented in placed deposits. The numbers of each species are included around the perimeter of the graph.

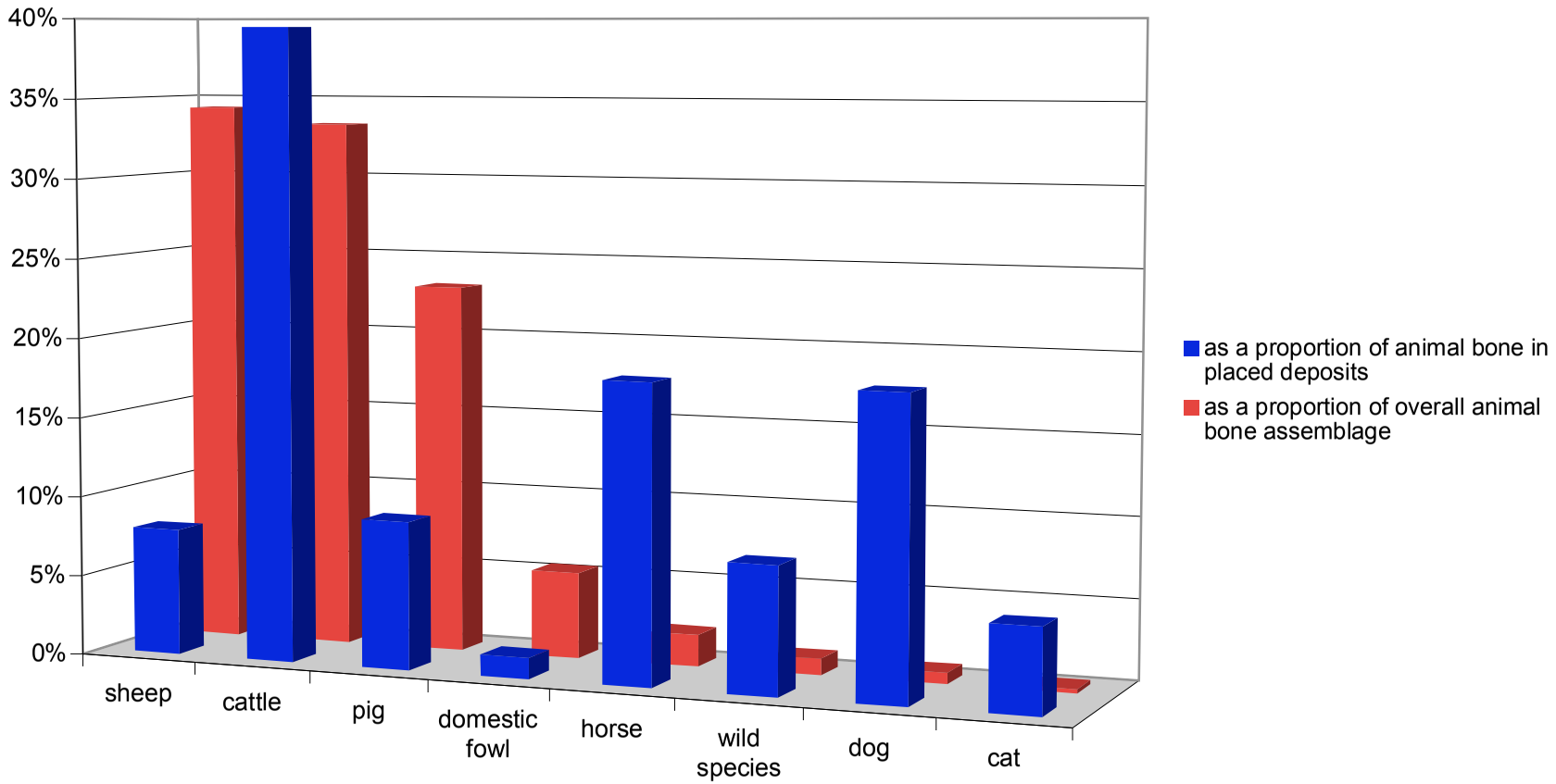


Figure 5.5: Proportional representation of animal species in placed deposits and in the overall animal bone assemblage from Anglo-Saxon settlements.

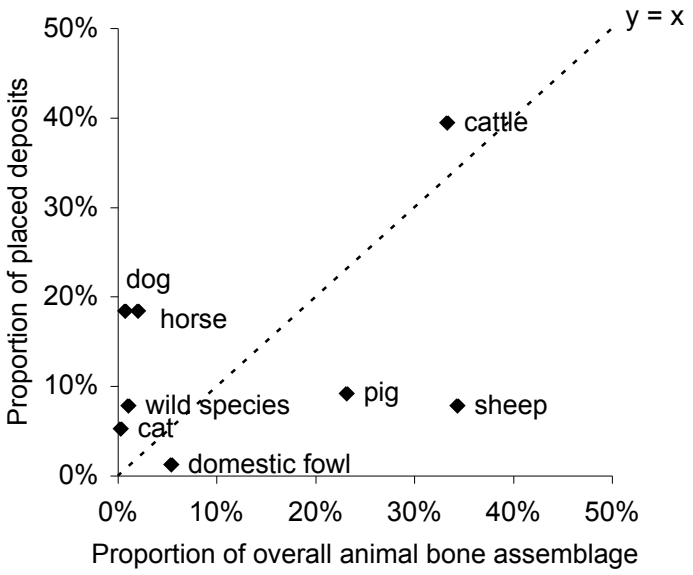


Figure 5.6: Comparing the proportion of placed deposits containing each species to its proportion in the overall animal bone assemblage for Anglo-Saxon settlements.

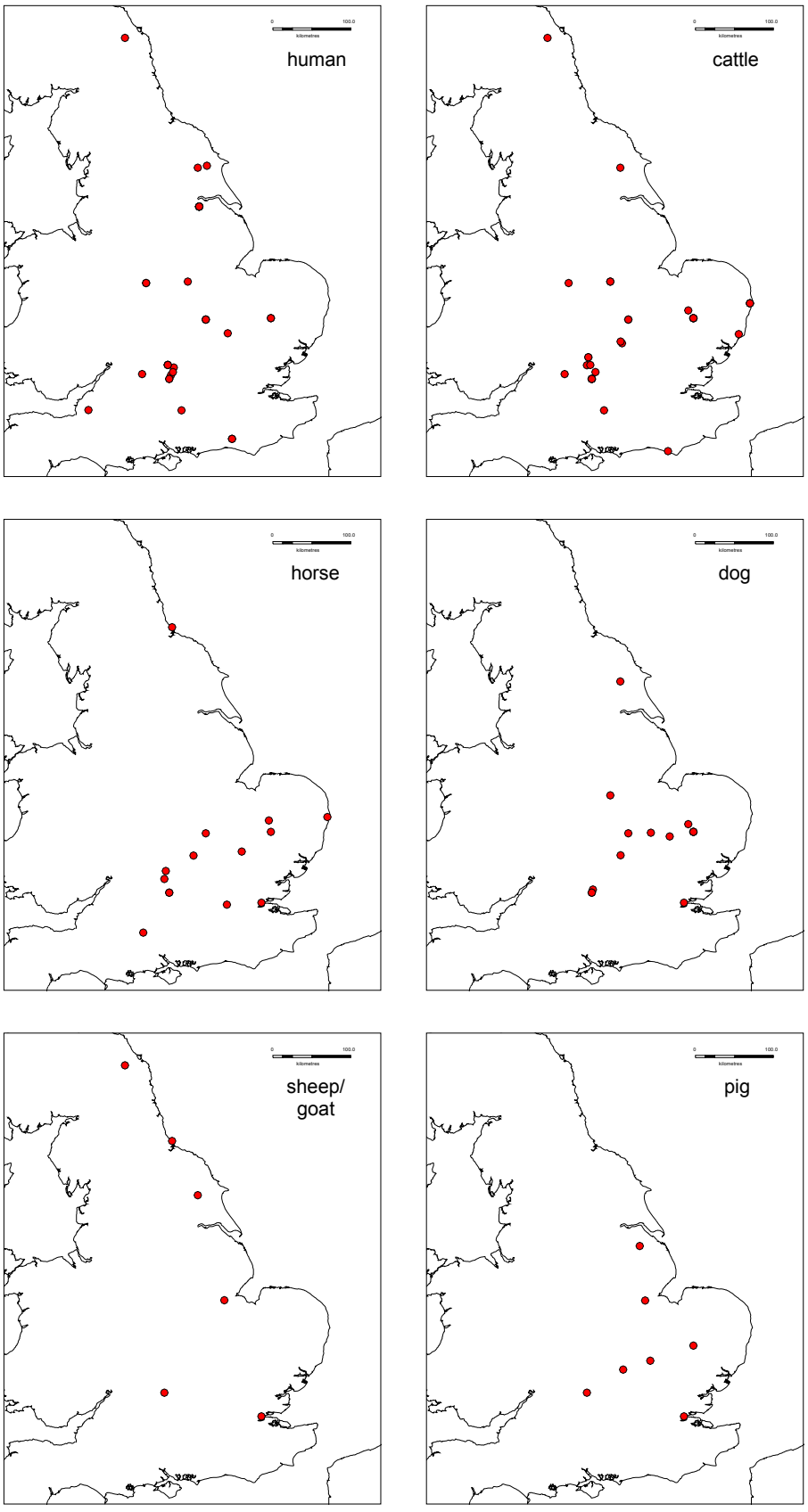


Figure 5.7: Geographical distribution of placed deposits by species.

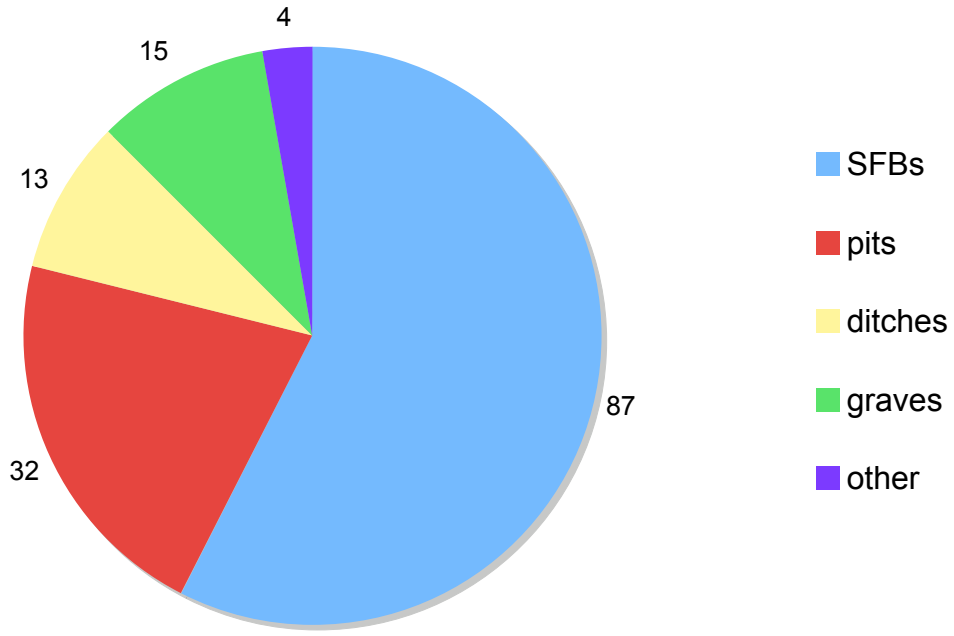


Figure 5.8: Contexts of placed deposits. The numbers of placed deposits in each context type are included around the perimeter of the graph.

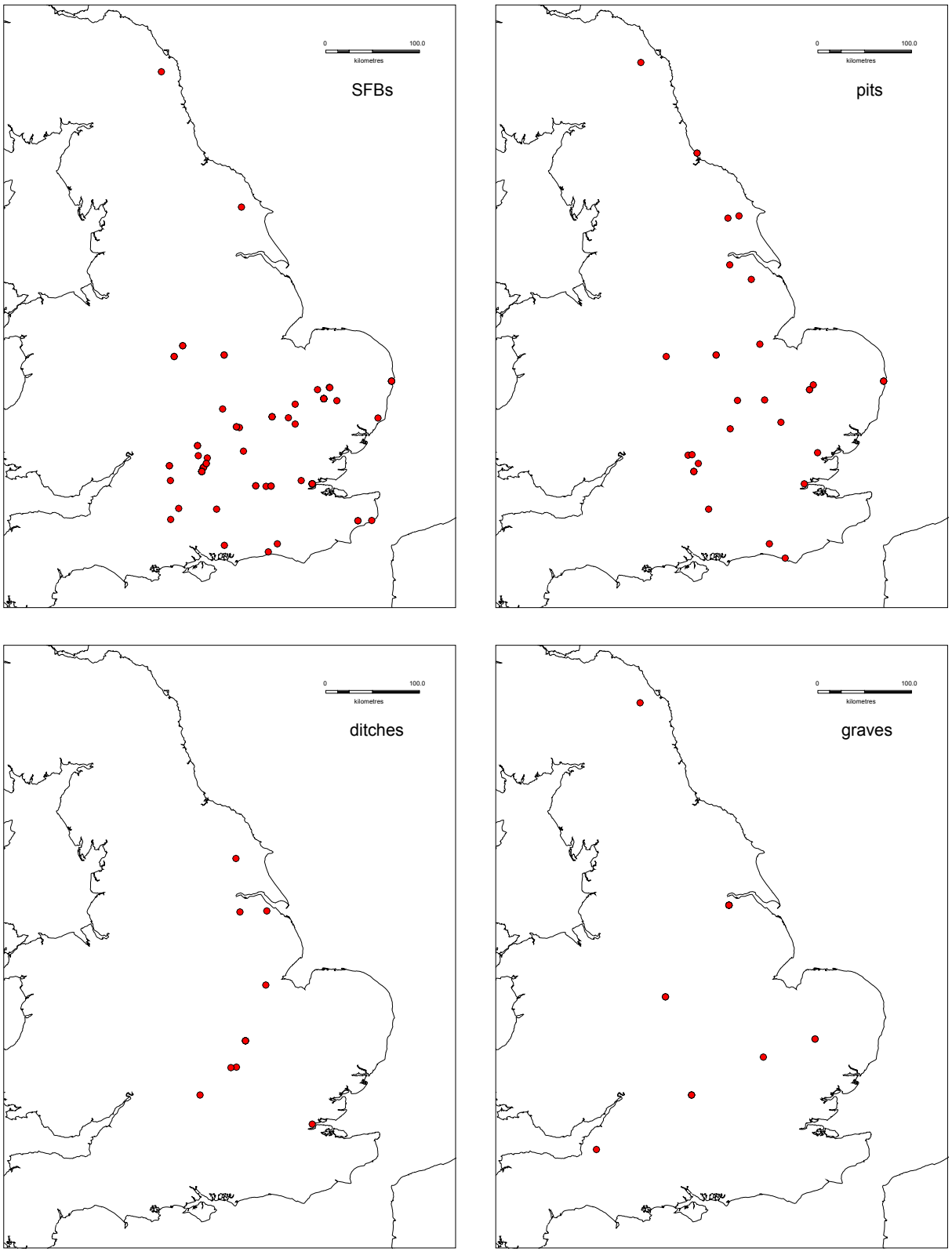


Figure 5.9: Geographical distribution of placed deposits by context type.

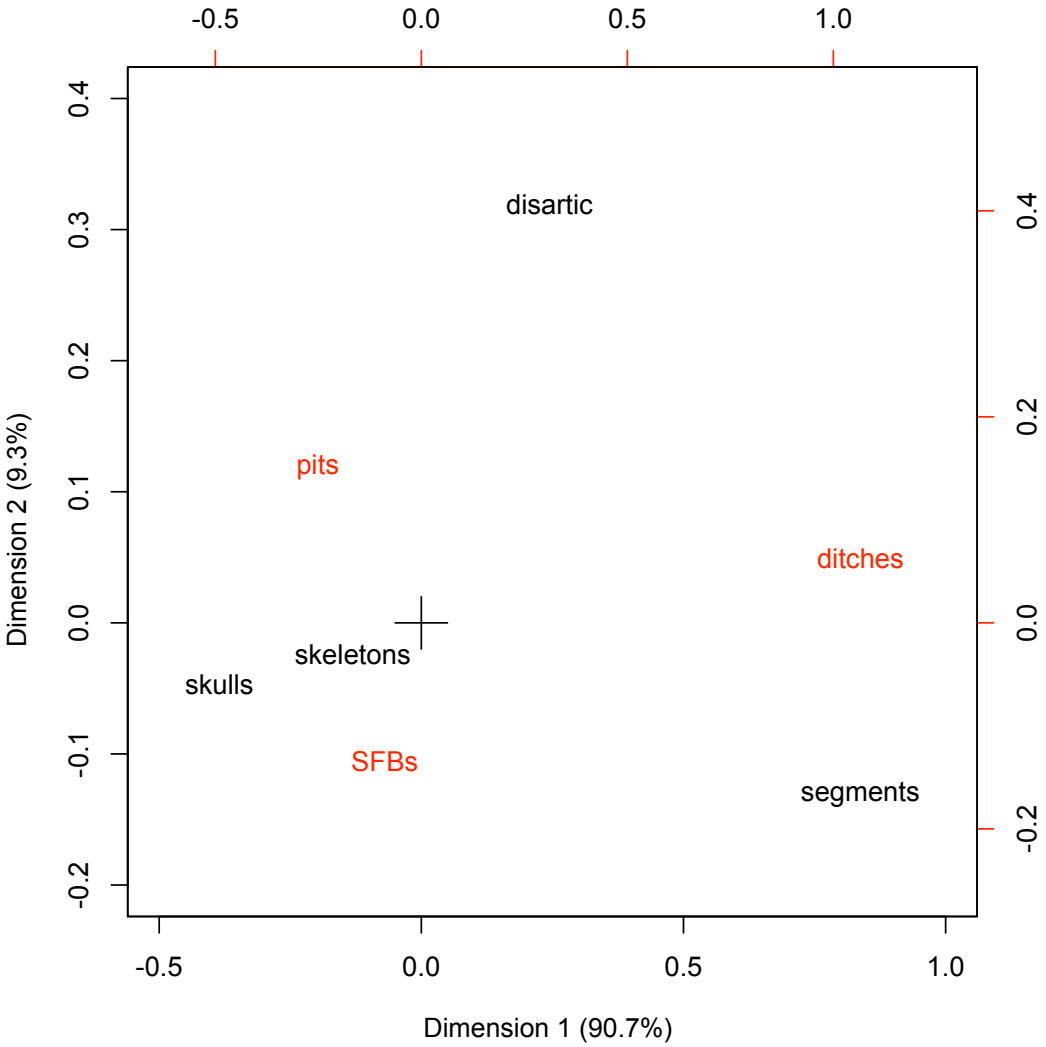


Figure 5.10: Biplot produced by correspondence analysis of Tab. 5.2, showing correspondences between object types (black) and context types (red).

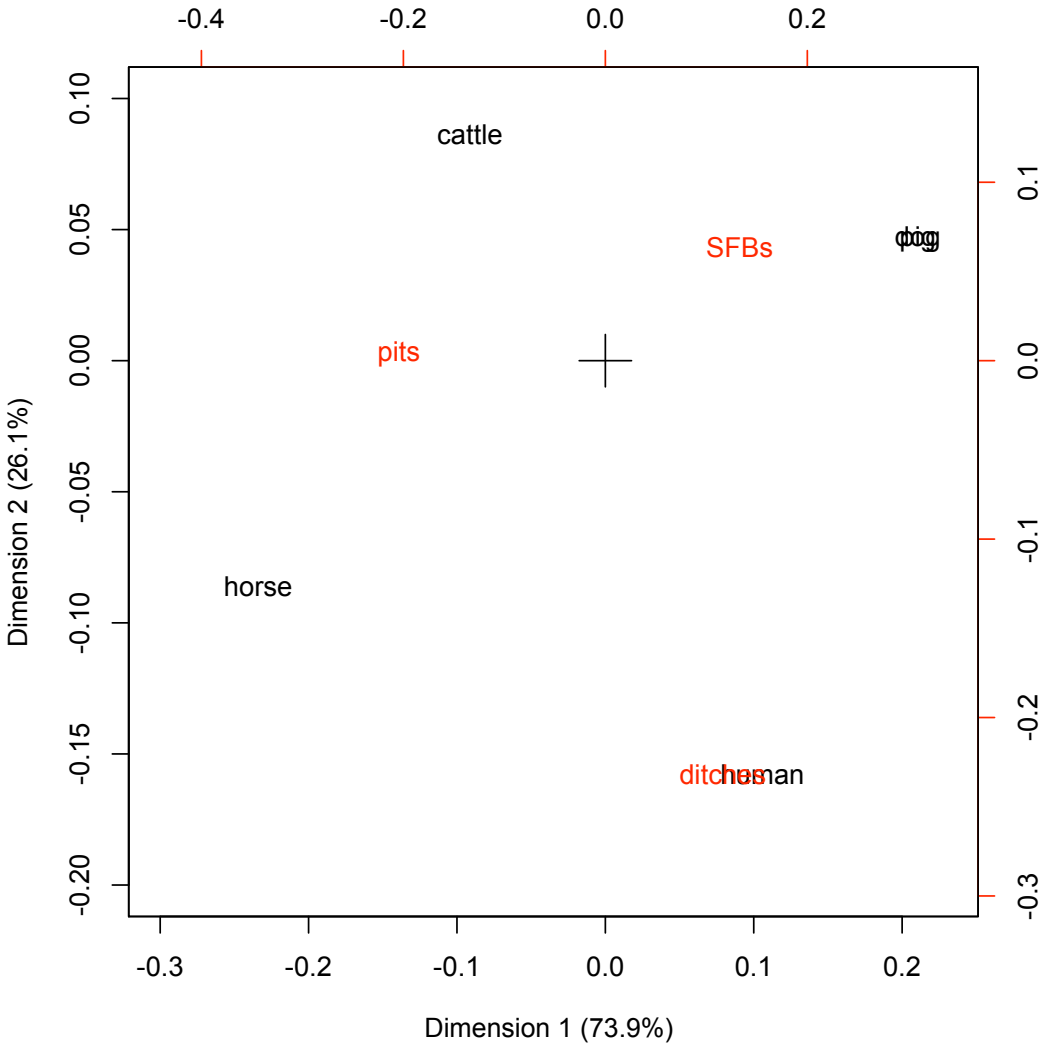


Figure 5.11: Biplot produced by correspondence analysis of Tab. 5.3, showing correspondences between species (black) and context types (red). Dog and pig completely overlap in the top right quadrant; human and ditches partially overlap in the bottom right.

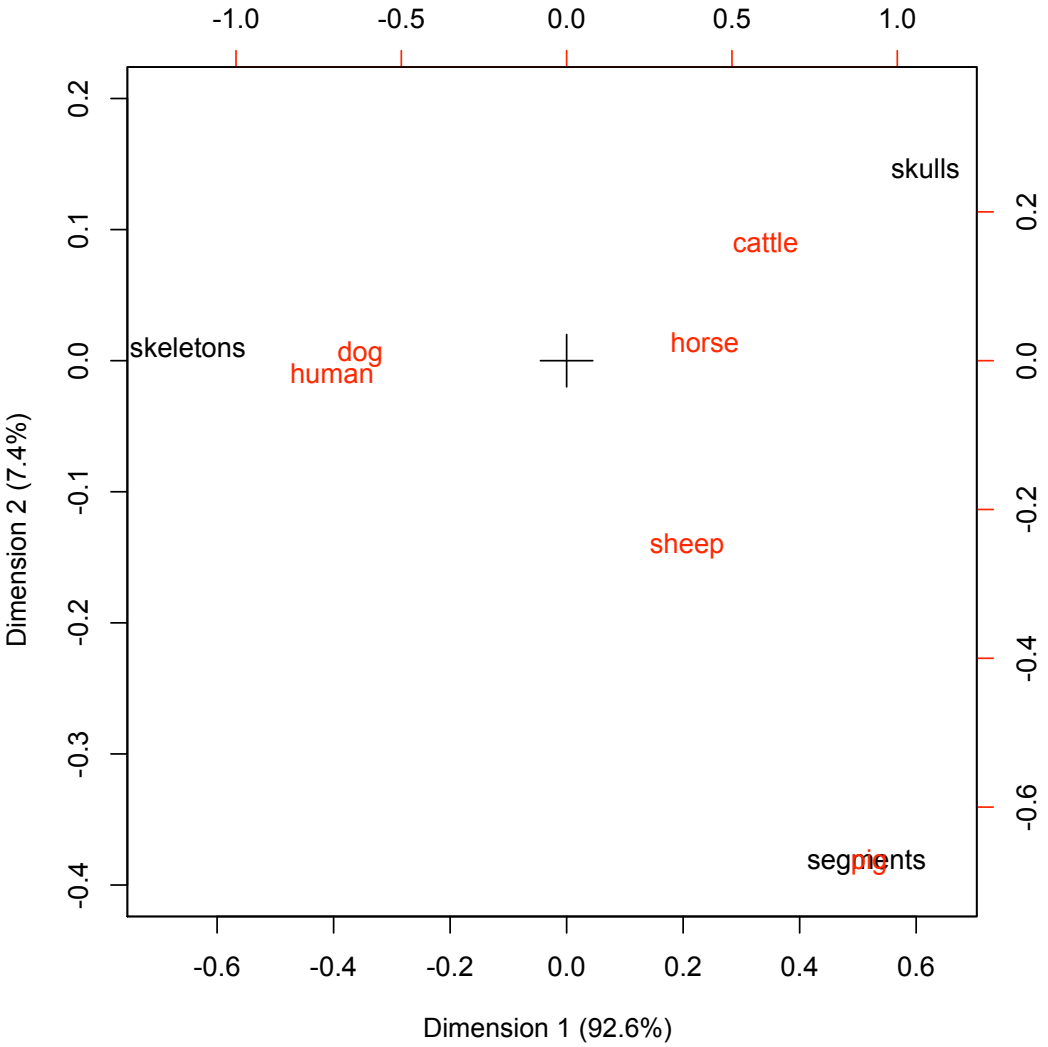


Figure 5.12: Biplot produced by correspondence analysis of Tab. 5.4, showing correspondences between species (red) and degree of articulation (black) in placed deposits. Pig and articulated segments overlap in the bottom right quadrant.

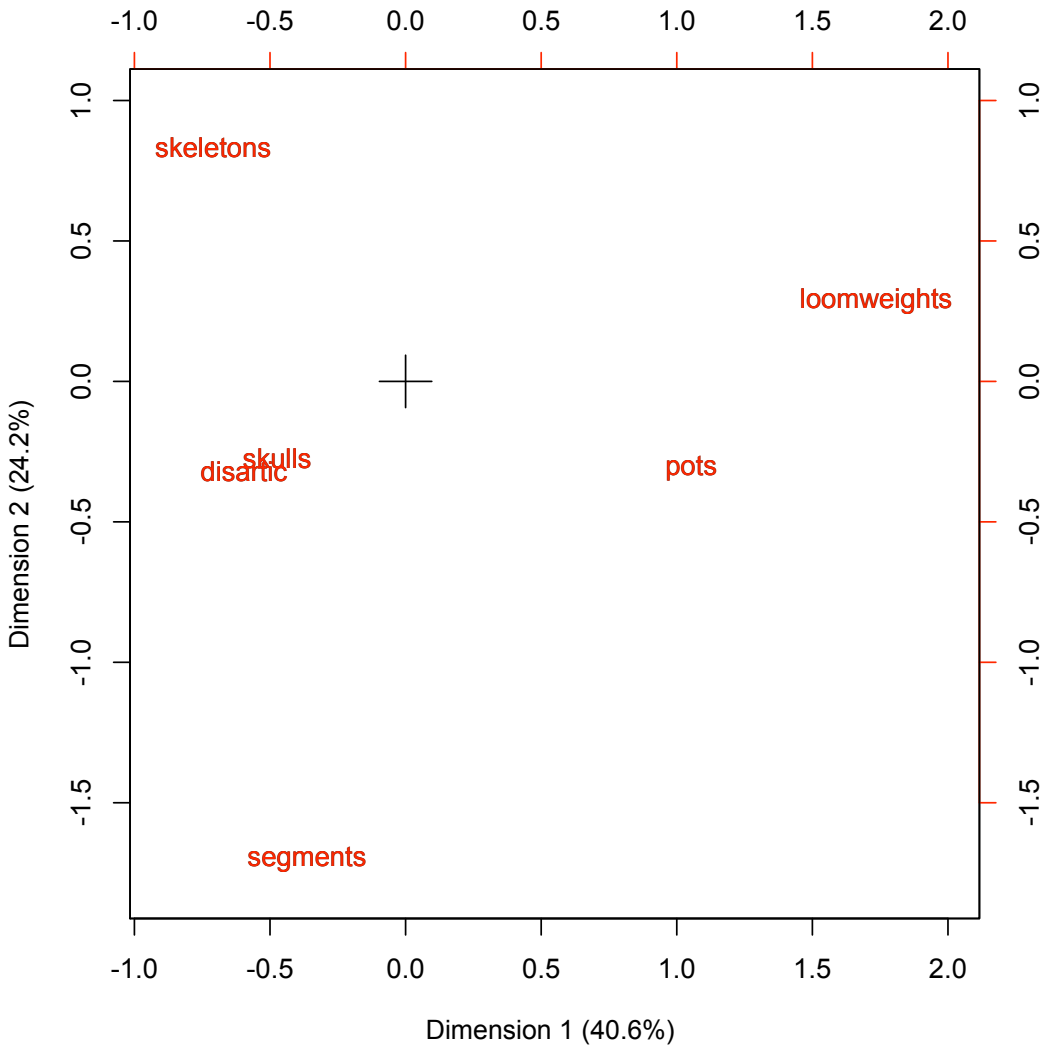


Figure 5.13: Biplot produced by correspondence analysis of Tab. 5.6, showing correspondences between object types found together in the same placed deposits. The red and black letters overlap because every object type is found in the same deposit as itself.

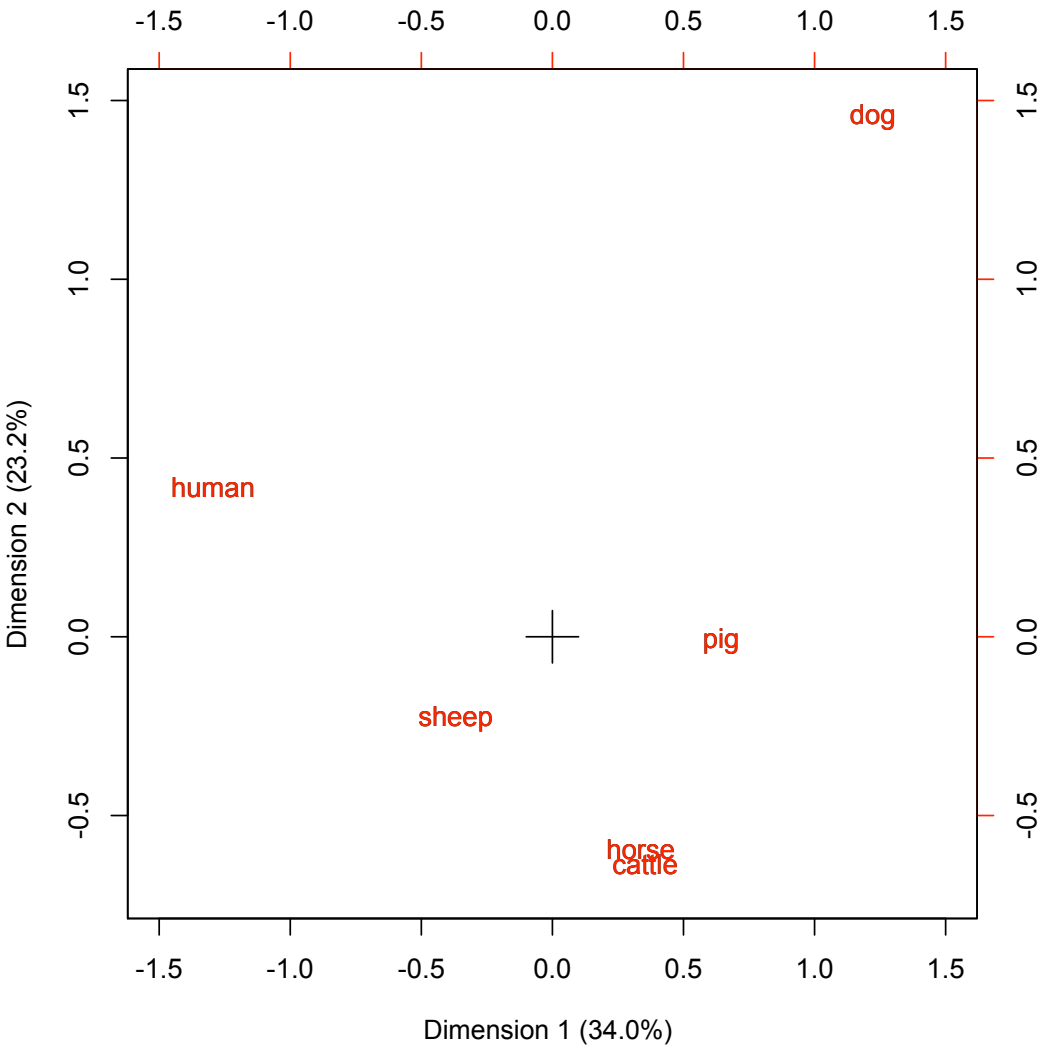


Figure 5.14: Biplot produced by correspondence analysis of Tab. 5.7, showing correspondences between species found together in the same placed deposits. The red and black letters overlap because every species is found in the same deposit as itself.

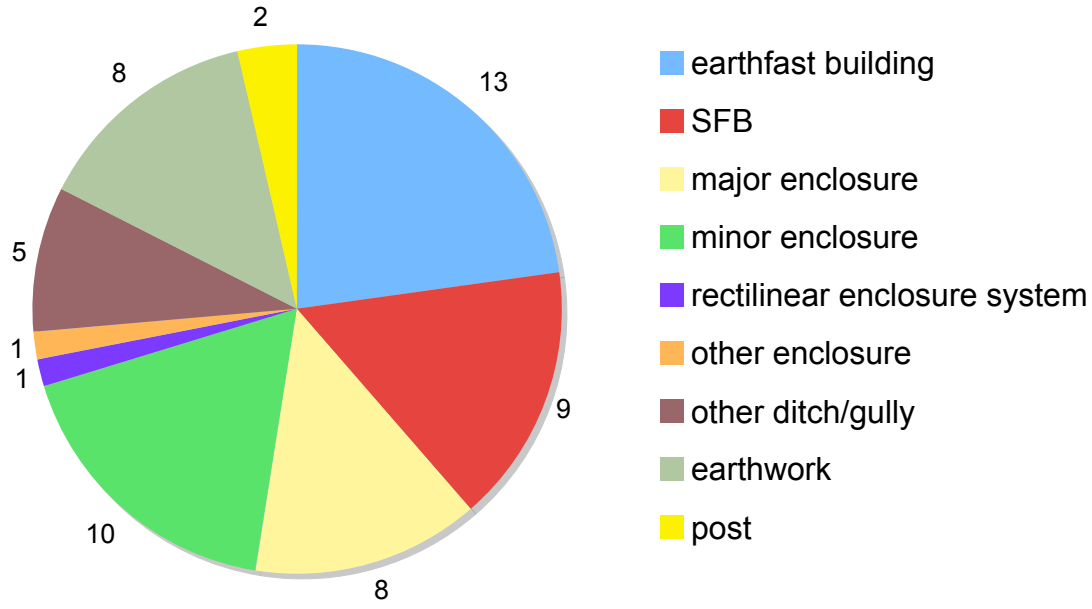


Figure 6.1: Types of features associated with placed deposits. The numbers of placed deposits associated with each feature type are included around the perimeter of the graph.

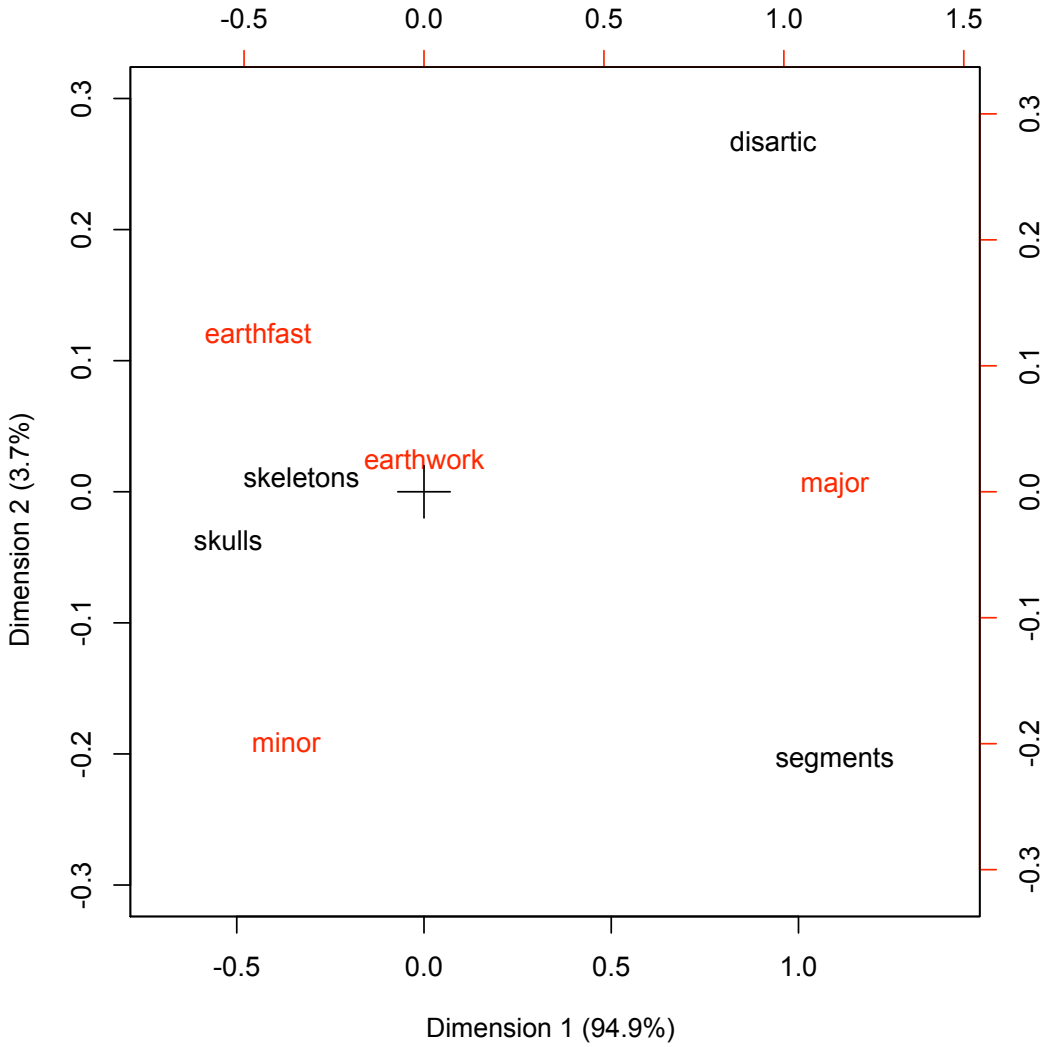


Figure 6.2: Biplot produced by correspondence analysis of Tab. 6.1, showing correspondences between object types in placed deposits (black) and the types of settlement features with which the placed deposits were associated (red). Abbreviations were used for feature types: 'earthfast'=earthfast building; 'major'=major enclosure'; 'minor'=minor enclosure.

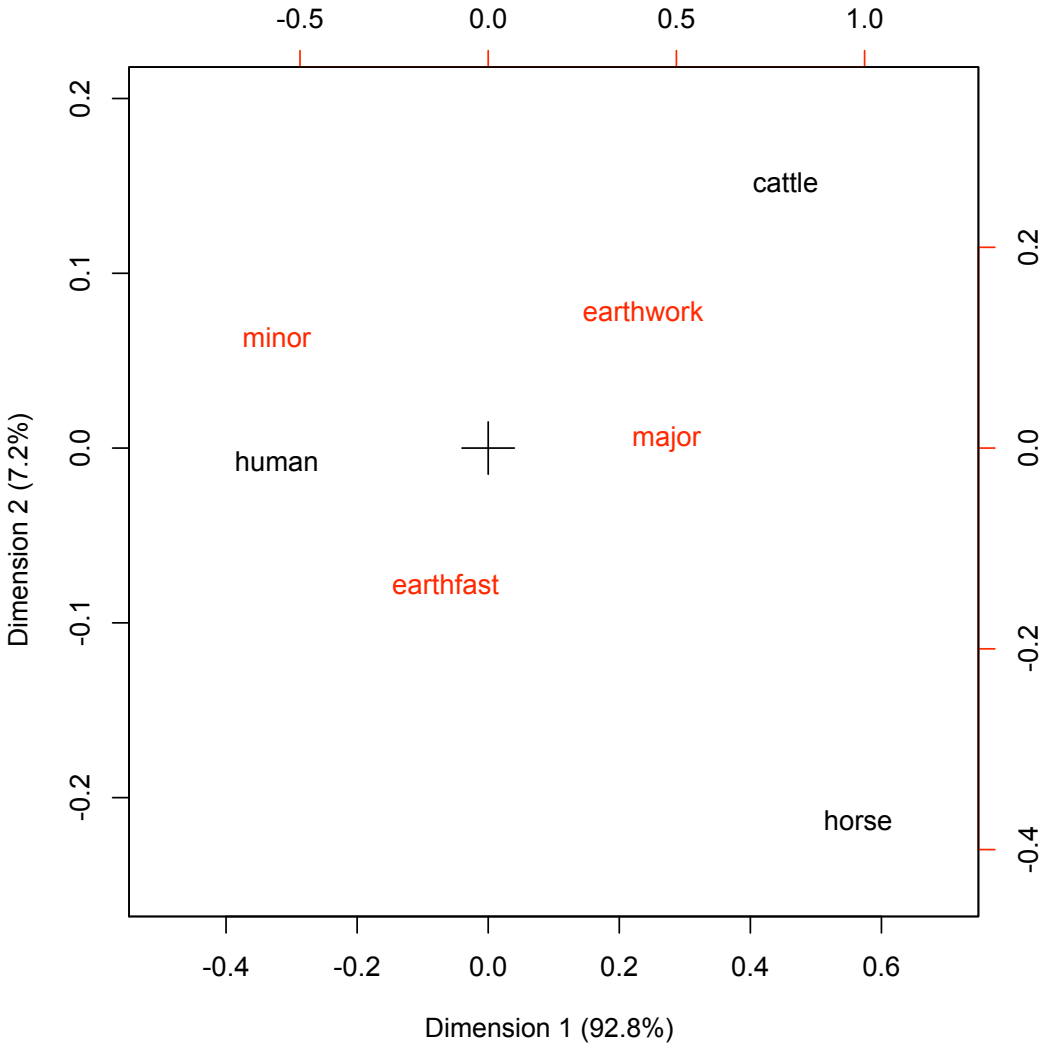


Figure 6.3: Biplot produced by correspondence analysis of Tab. 6.2, showing correspondences between species in placed deposits (black) and the types of settlement features with which the placed deposits were associated (red). Abbreviations were used for feature types: 'earthfast'=earthfast building; 'major'=major enclosure'; 'minor'=minor enclosure.

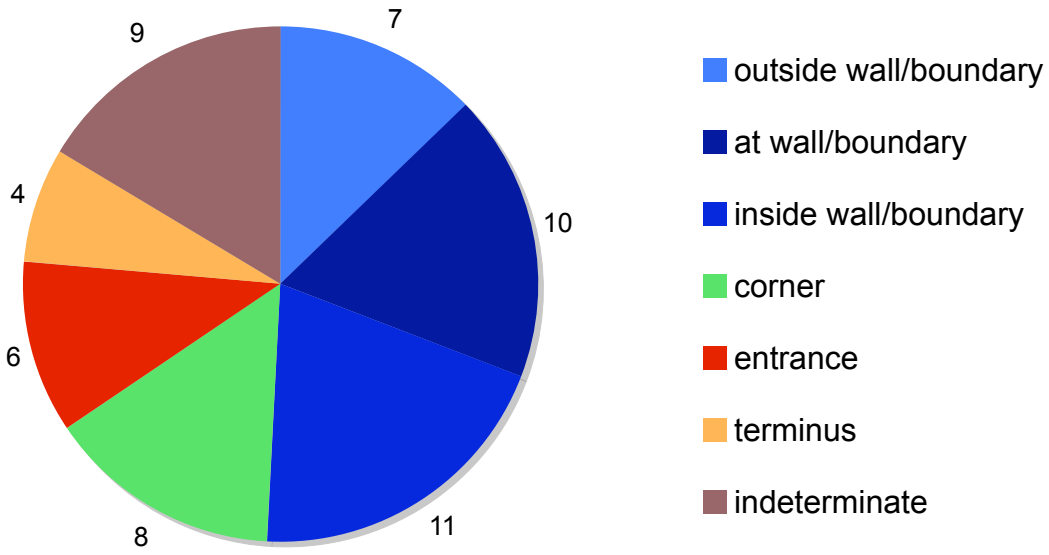


Figure 6.4: Elements of features associated with placed deposits. The numbers of placed deposits associated with each feature type are included around the perimeter of the graph. Placed deposits associated with a wall or boundary, but not located at a corner, entrance, or terminus, are in shades of blue.

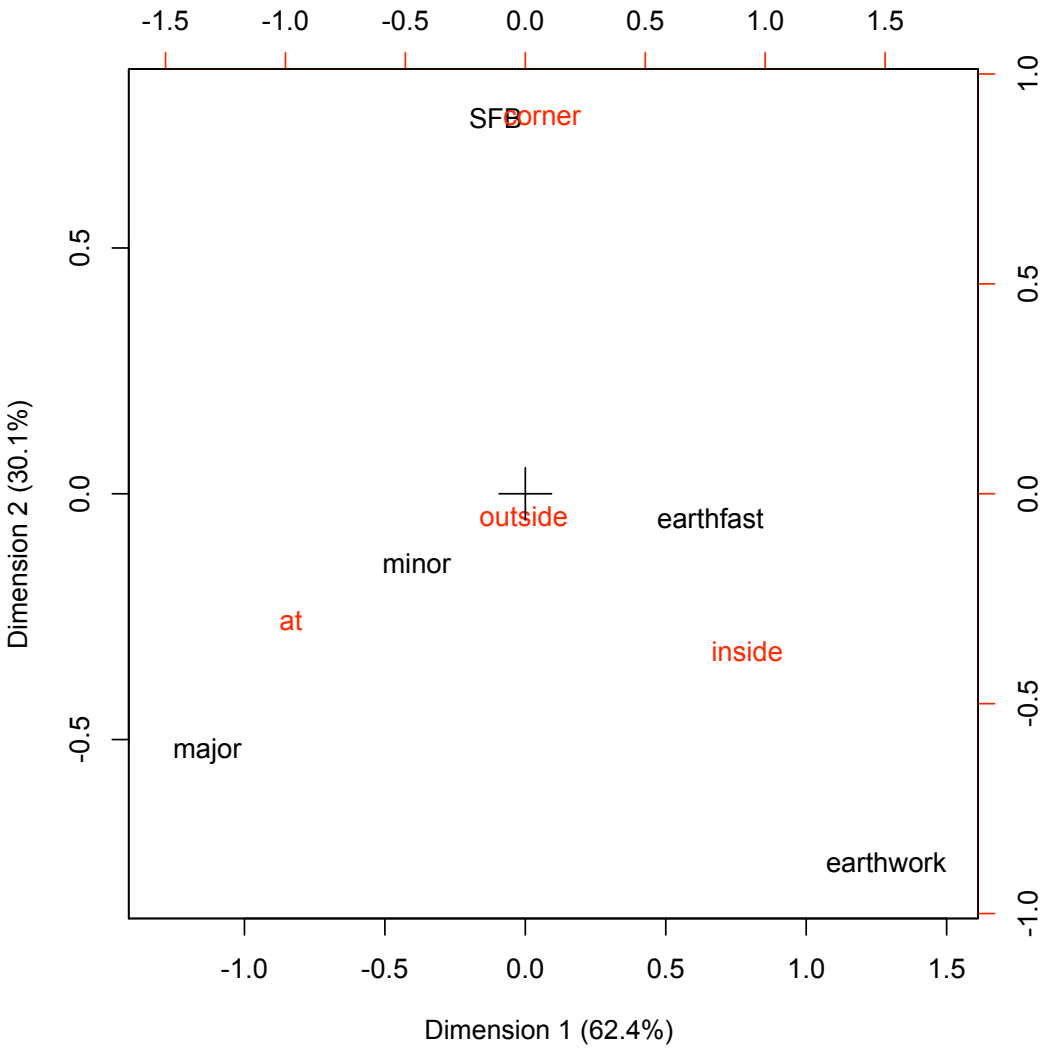


Figure 6.5: Biplot produced by correspondence analysis of Tab. 6.3, showing correspondences between the types (black) and elements (red) of settlement features with which placed deposits were associated. Abbreviations were used for feature types: 'earthfast'=earthfast building; 'major'=major enclosure'; 'minor'=minor enclosure; and for feature elements: 'outside'=outside wall/ boundary; 'at'=at wall/boundary; 'inside'=inside wall/boundary. 'SFB' overlaps 'corner' at the top of the graph.

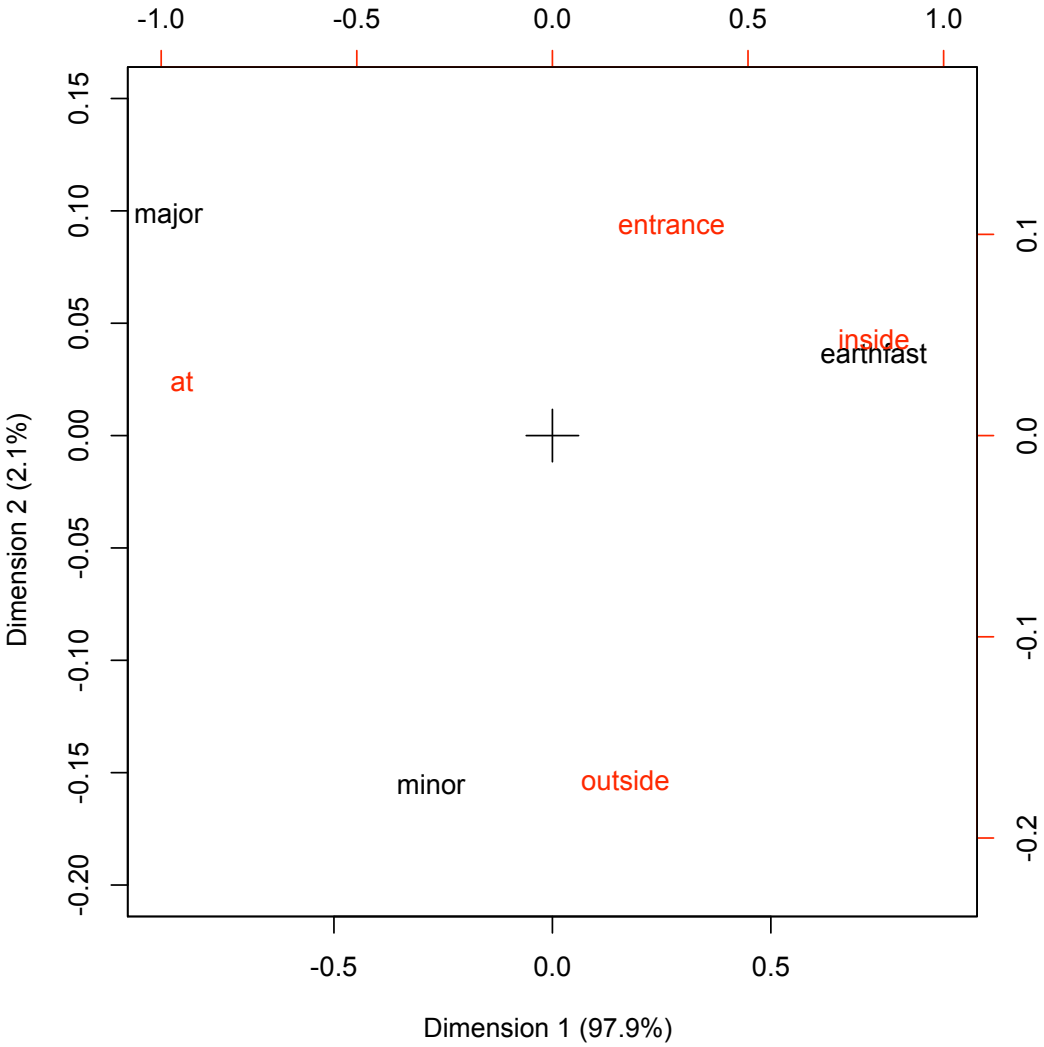


Figure 6.6: As Fig. 6.5, biplot produced by correspondence analysis of Tab. 6.3, showing correspondences between the types (black) and elements (red) of settlement features with which placed deposits were associated; but with entrances included and earthworks and SFBs excluded. Abbreviations were used for feature types: 'earthfast'=earthfast building; 'major'=major enclosure'; 'minor'=minor enclosure; and for feature elements: 'outside'=outside wall/ boundary; 'at'=at wall/boundary; 'inside'=inside wall/boundary.

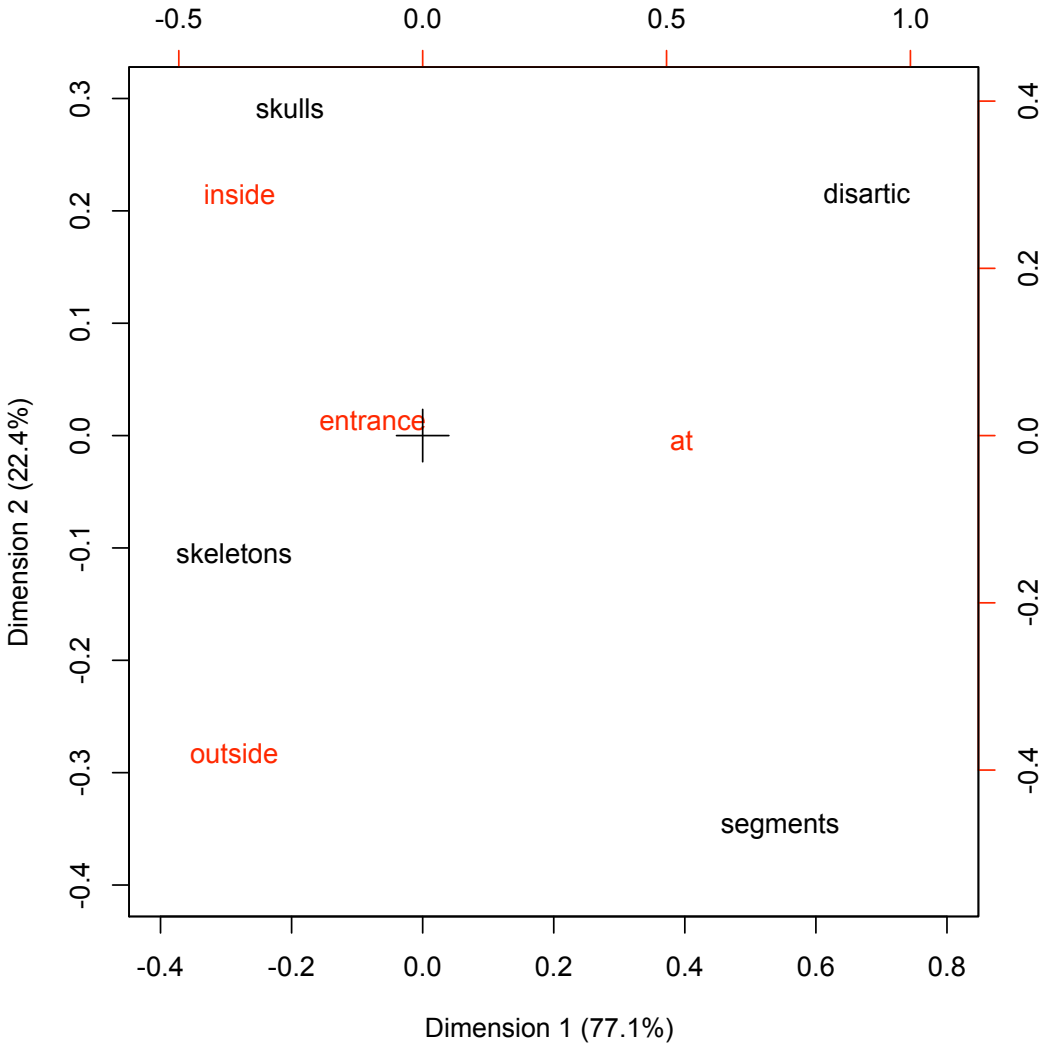


Figure 6.7: Biplot produced by correspondence analysis of Tab. 6.4, showing correspondences between the object types in placed deposits (black) and the elements of settlement features with which the placed deposits were associated (red). Abbreviations were used for feature elements: 'outside'=outside wall/ boundary; 'at'=at wall/boundary; 'inside'=inside wall/boundary.

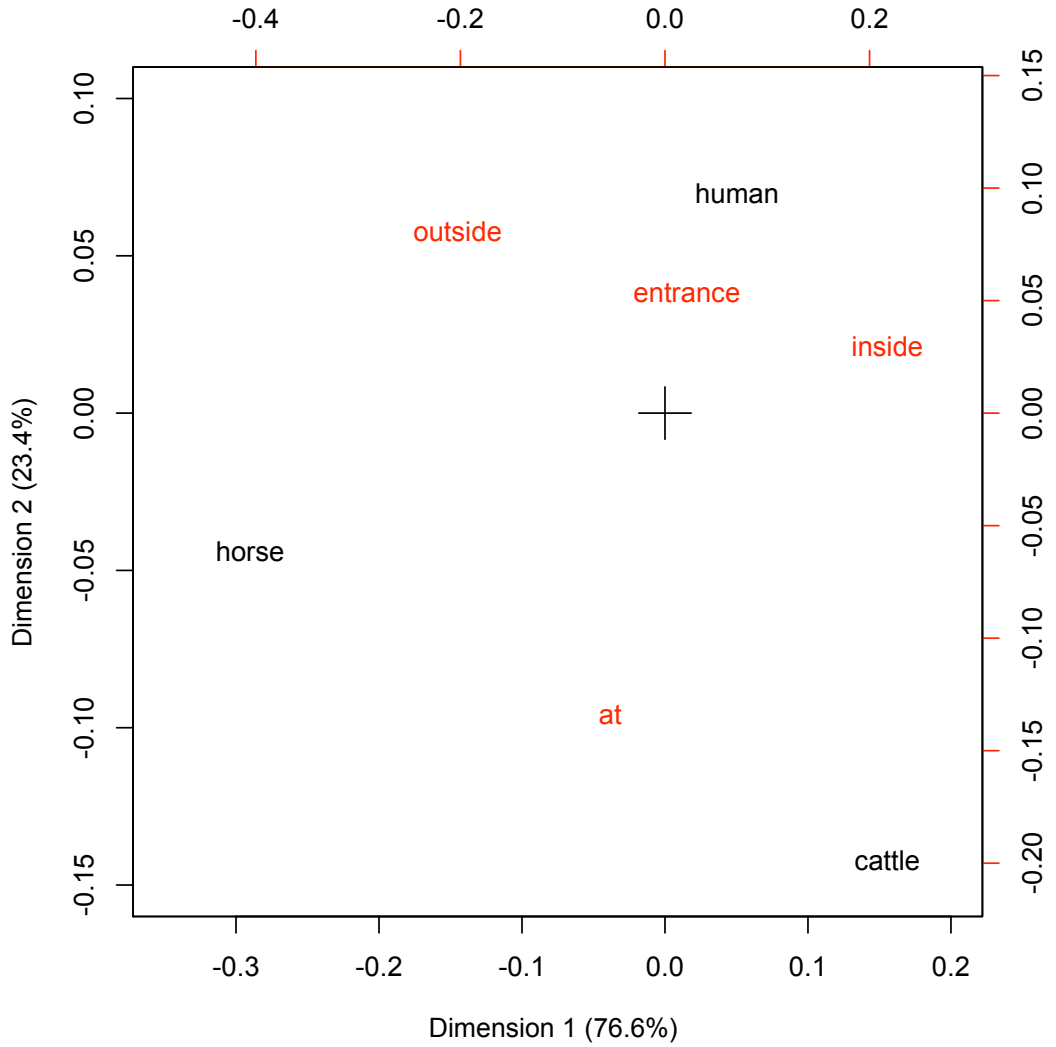


Figure 6.8: Biplot produced by correspondence analysis of Tab. 6.5, showing correspondences between the species in placed deposits (black) and the elements of settlement features with which the placed deposits were associated (red). Abbreviations were used for feature elements: 'outside'=outside wall/boundary; 'at'=at wall/boundary; 'inside'=inside wall/boundary.

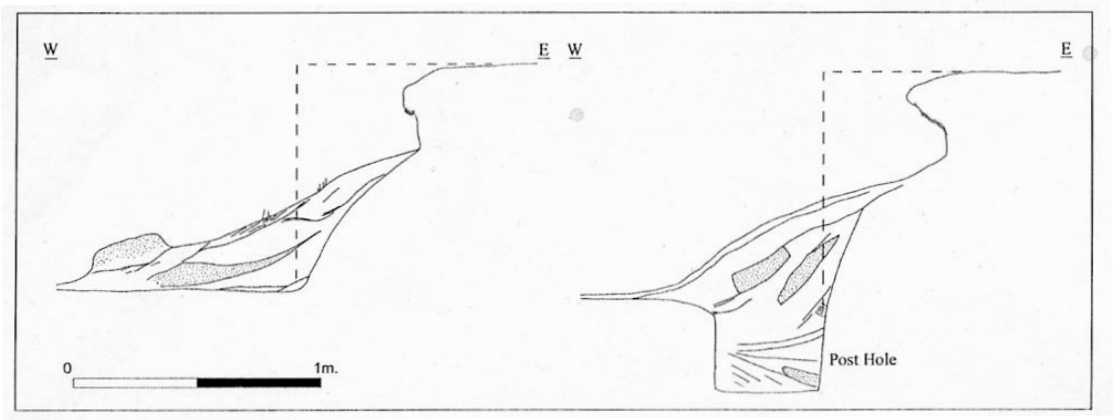


Figure 7.1: Section of experimental SFB at West Stow (Tipper 2004: fig. 34). *Illustration © Jess Tipper and the Landscape Research Centre.*

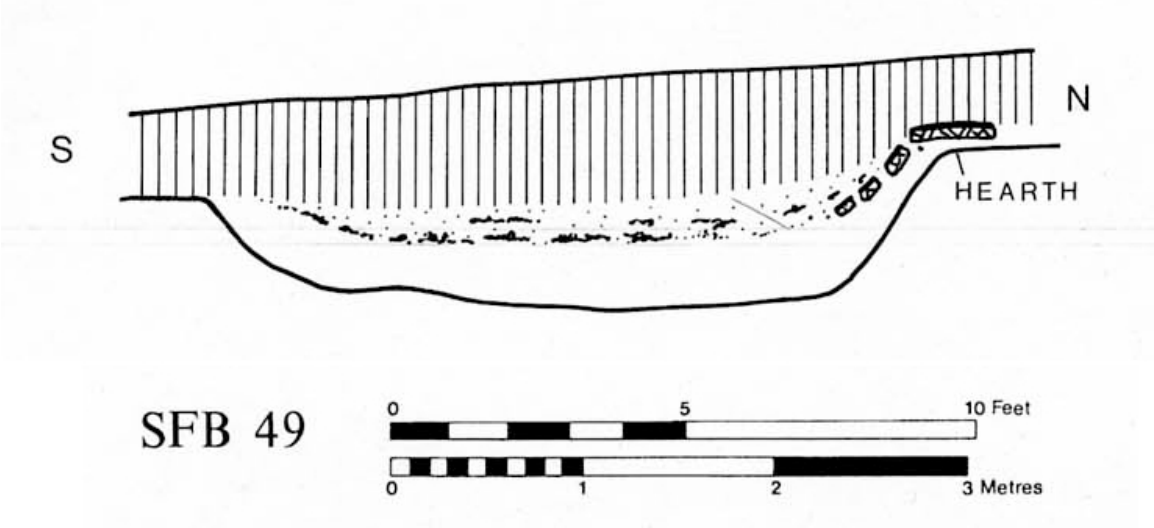


Figure 7.2: Section of SFB 49 at West Stow (after West 1985: fig. 166). *Illustration © Suffolk County Council.*

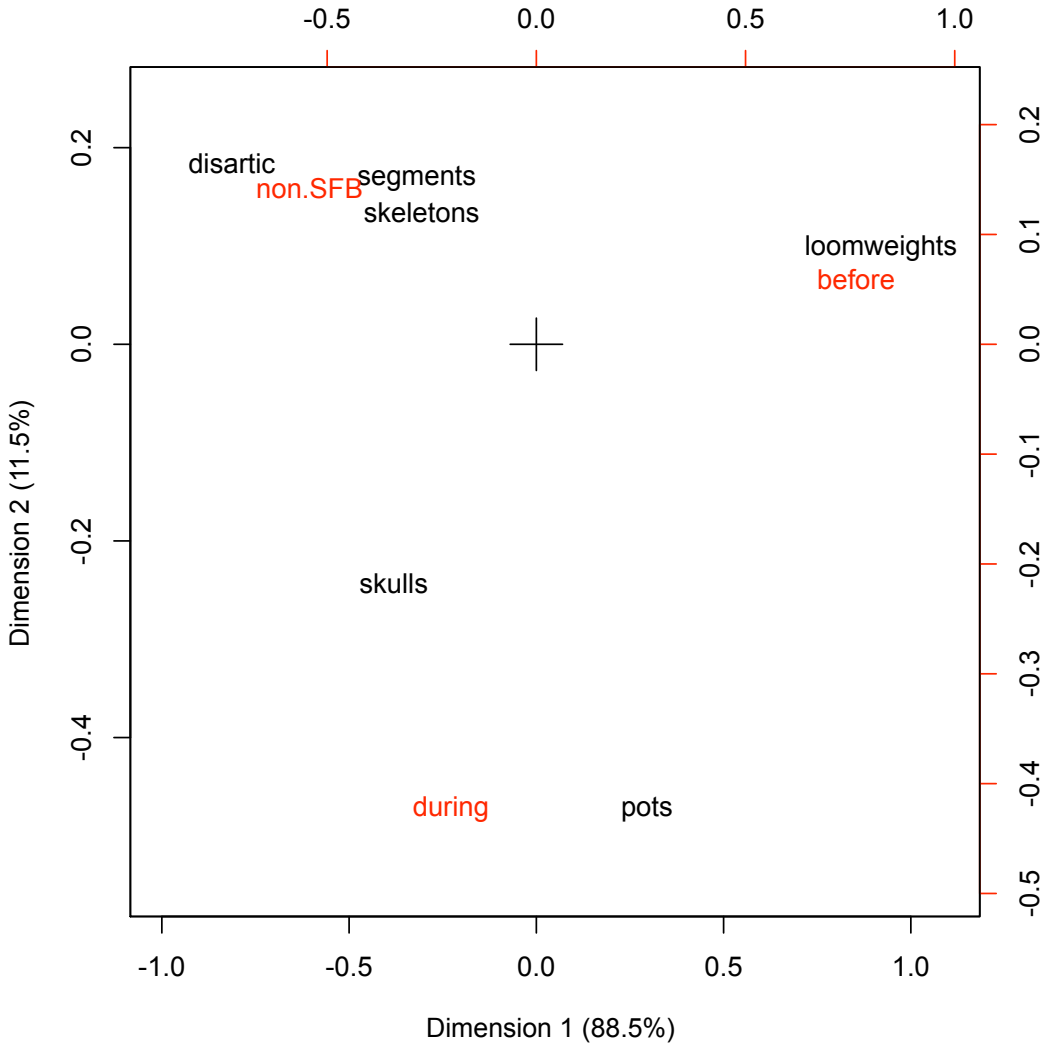


Figure 7.3: Biplot produced by correspondence analysis of Tab. 7.1, showing correspondences between object types (black) and timing of deposition in SFBs (red). Abbreviations were used for the latter: 'before'=before backfilling; 'during'=during backfilling; 'non.SFB' indicates a context type other than SFB or grave.

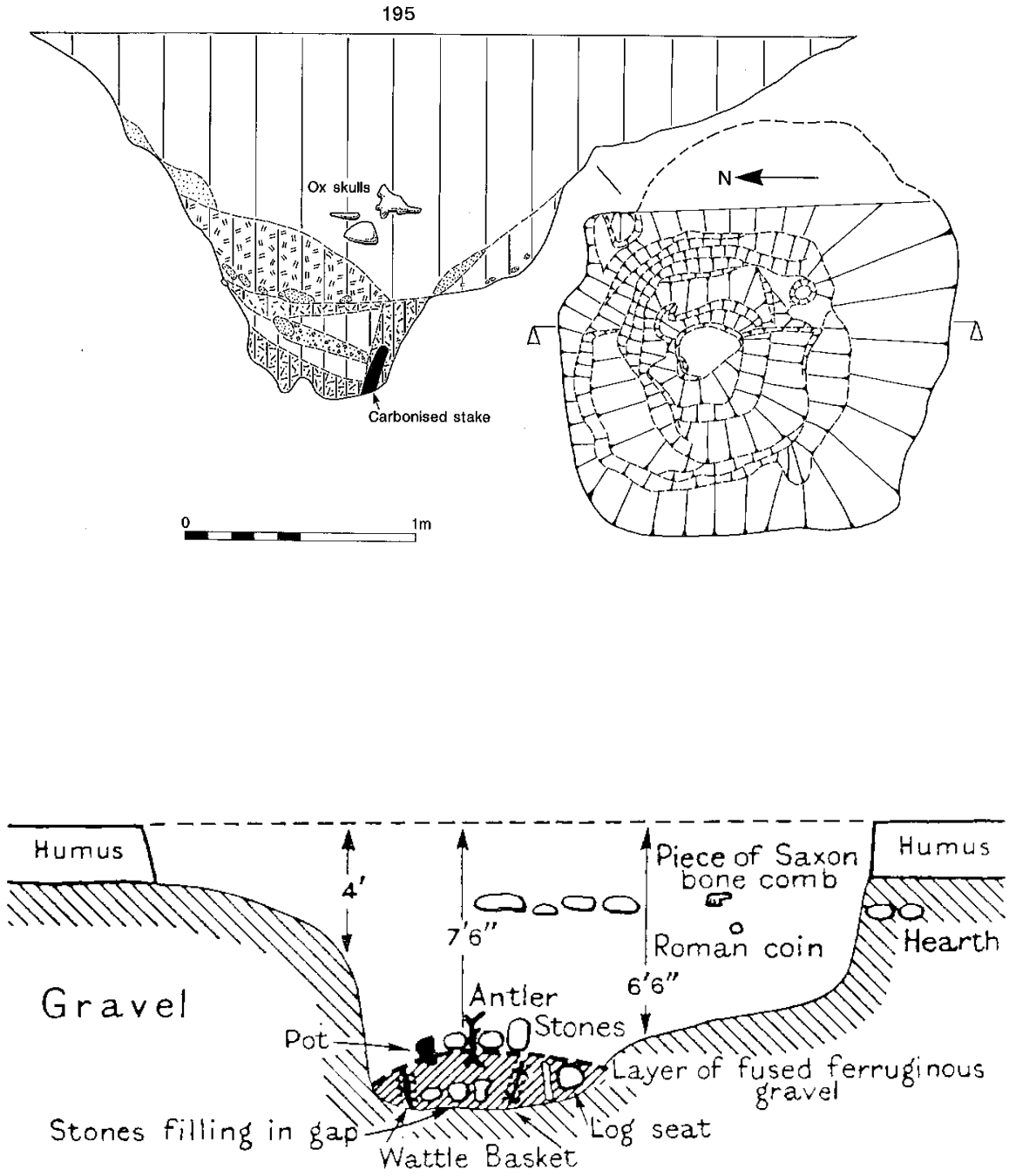


Figure 7.4: Sections of pit 195 at Hartigans (above; after Williams 1993: fig. 81) and the watering hole (House XXI) at Sutton Courtenay (Leeds 1947: fig. 2). *Top illustration reproduced with the permission of the Buckinghamshire Archaeological Society. Bottom illustration reproduced by kind permission of the Society of Antiquaries of London and Cambridge University Press from Leeds 1947, © reserved.*



Figure 7.5: Cattle skulls in pit 195 at Hartigans (Williams 1993: pl. 20). *Photograph reproduced with the permission of the Buckinghamshire Archaeological Society.*



Figure 7.6: Loomweights in posthole 2991 at Spong Hill (Rickett 1995: pl. 8). *Photograph © Norfolk Museums and Archaeology Service.*

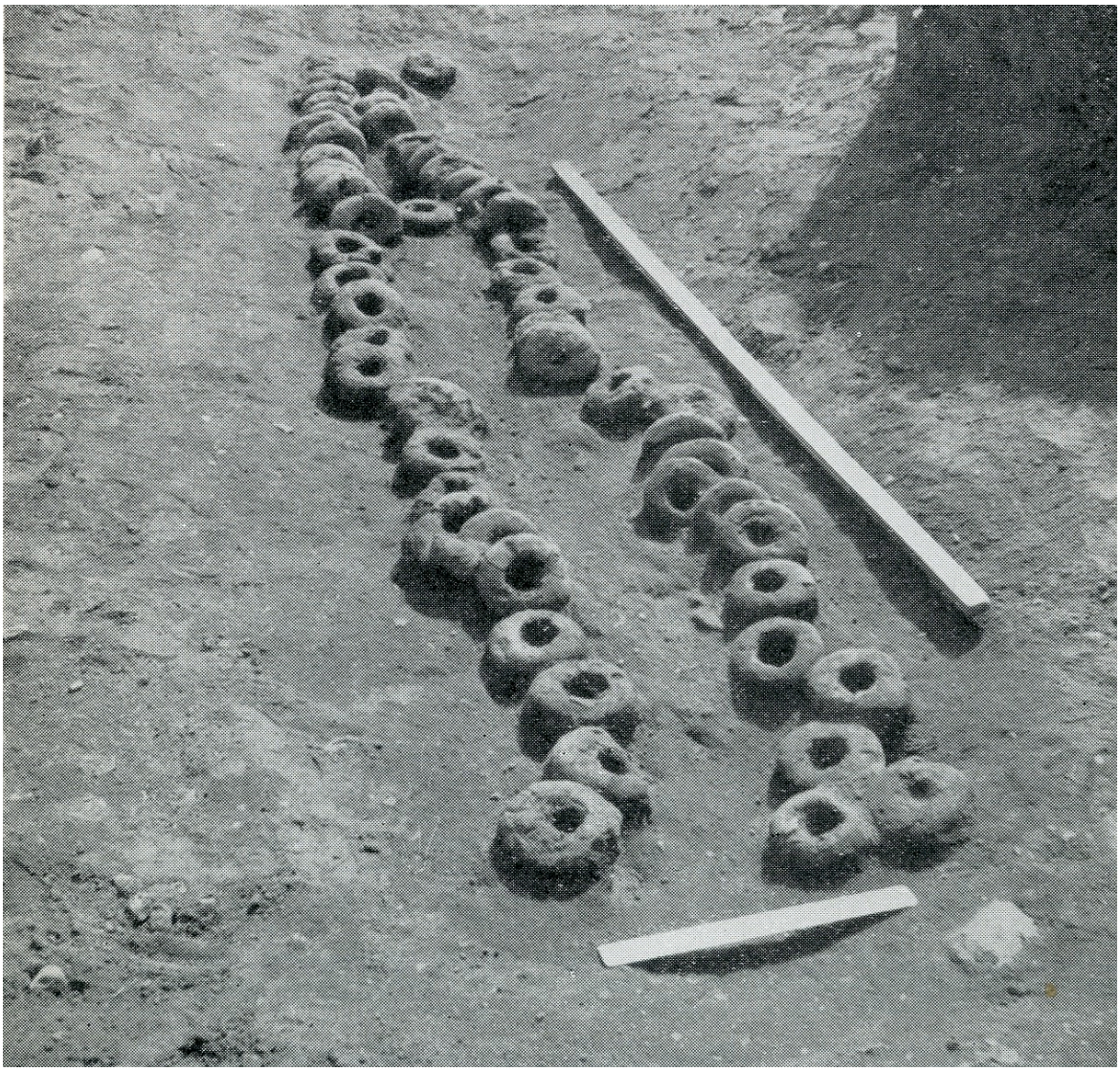


Figure 7.7: Lines of loomweights at Grimstone End, Pakenham (Brown *et al.* 1955: pl. 24). *Photograph reproduced with the permission of the Suffolk Institute of Archaeology and History.*

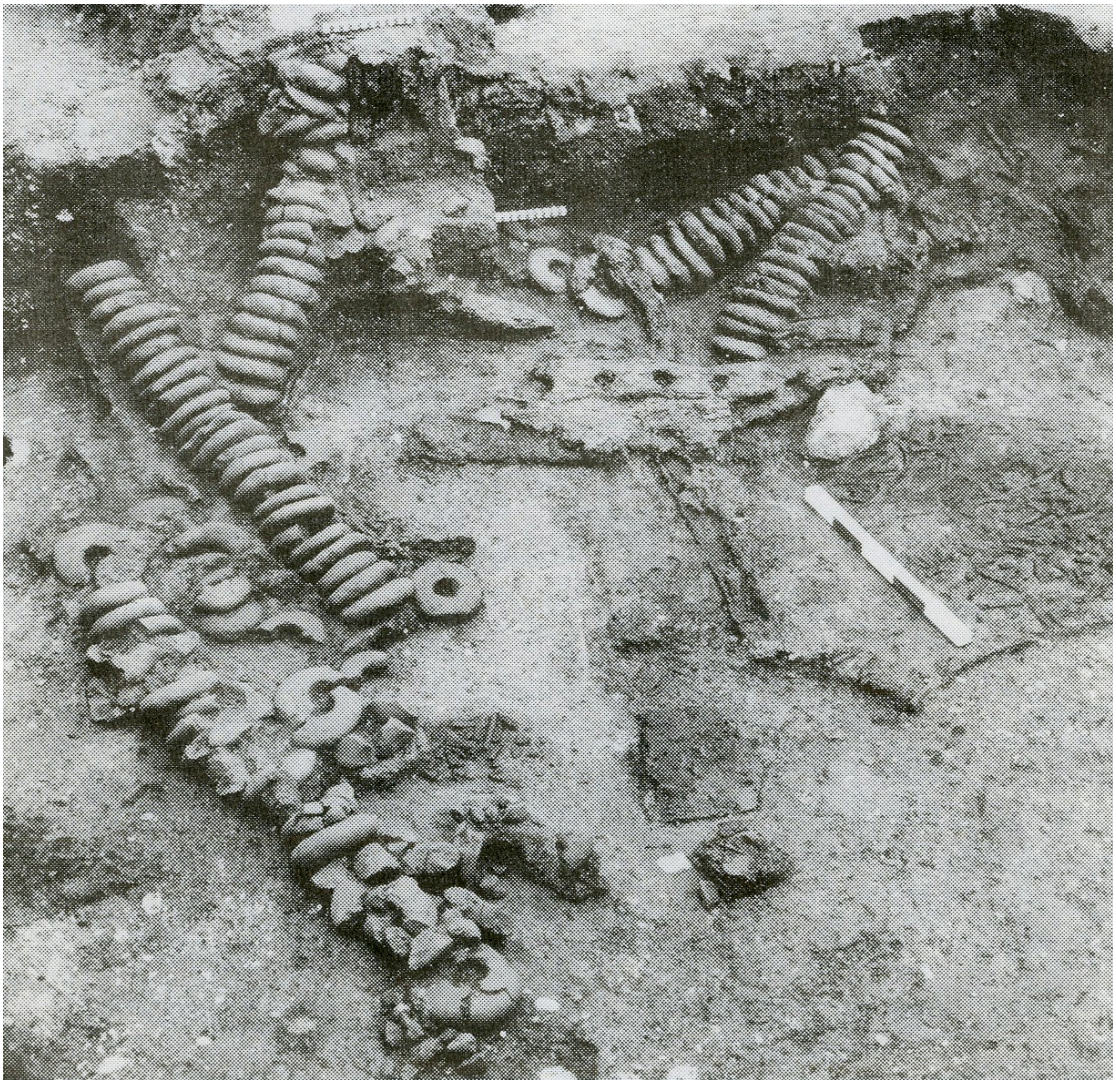


Figure 7.8: Lines of loomweights on the base of an SFB at Dover (Philp 1976: fig. 4). *Photograph reproduced with the permission of the Council for Kentish Archaeology.*

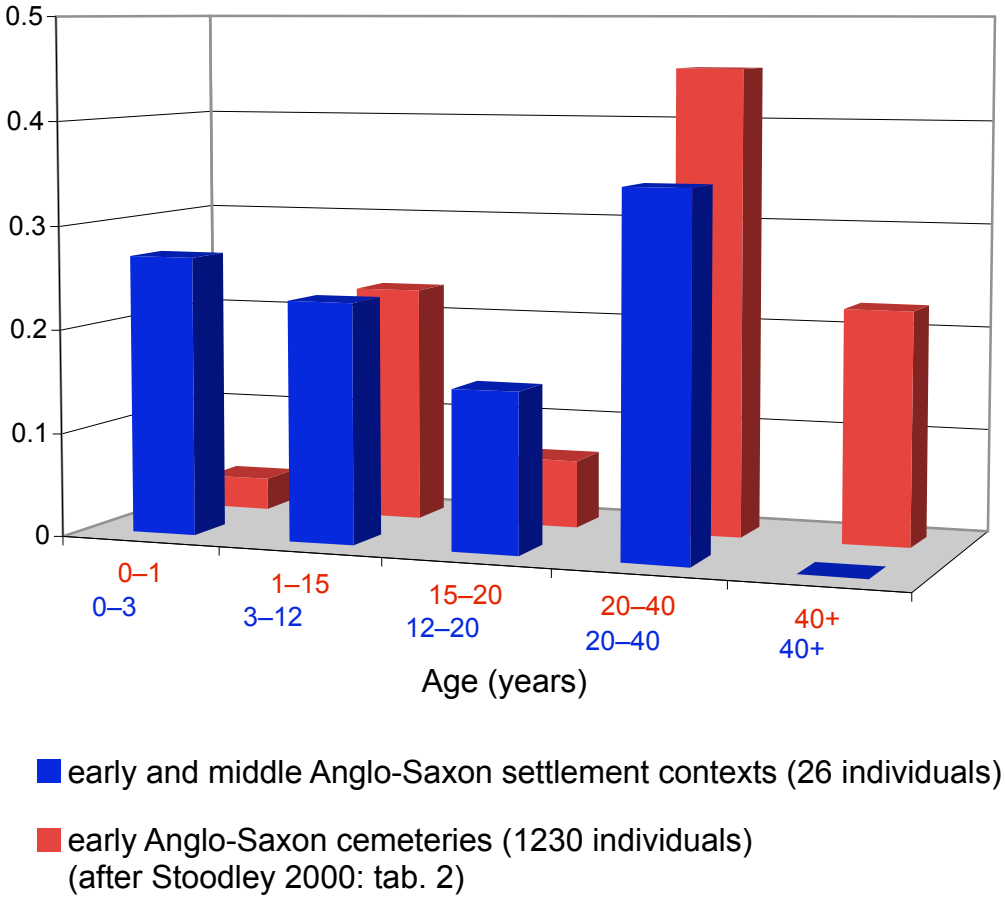


Figure 8.1: The age demographics of individuals buried in settlement contexts compared to the same for cemeteries (Stoodley 2000: tab. 2). Only the 26 individuals that could be aged precisely enough to fit into the age ranges were included. Note that the age ranges (given in years) differ slightly between the two analyses.

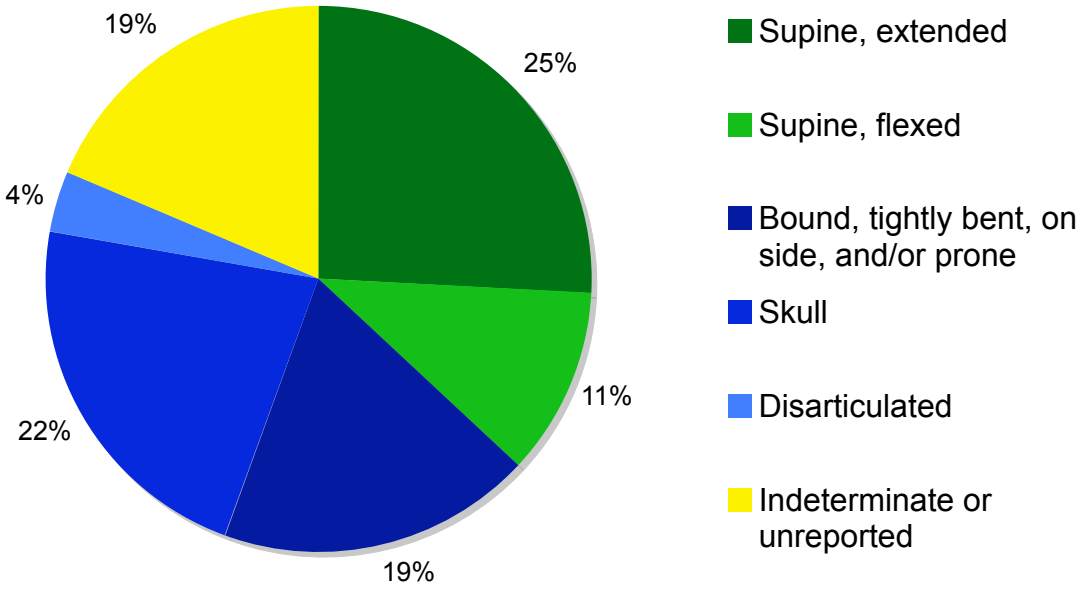


Figure 8.2: The treatment of individuals buried in settlement contexts. Infants have been excluded. Shades of green represent normative treatment and shades of blue represent deviant treatment (see text).



Figure 8.3: Geographical distribution of placed deposits by treatment of human remains (top), and of placed deposits containing infants (bottom).

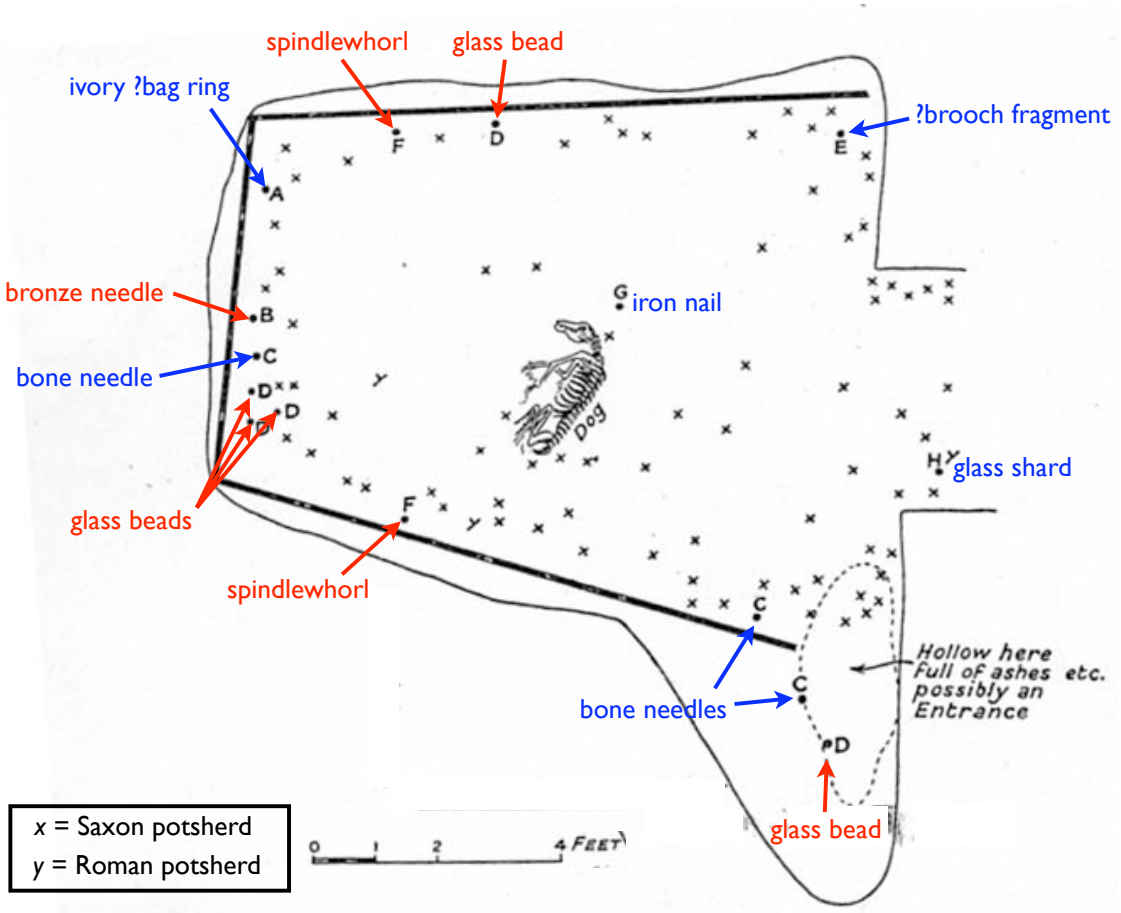


Figure 9.1: The SFB at Car Dyke, Waterbeach (after Lethbridge 1927: fig. 2). *Original illustration reproduced by kind permission of the Society of Antiquaries of London and Cambridge University Press from Lethbridge 1927, © reserved.*



Figure 10.1: Cattle skulls lying on the primary fill of SFB 7395 at Cresswell Field, Yarnton (Hey 2004: pl. 9.1). *Photograph reproduced with the permission of Oxford Archaeology.*

References

Documentary sources

BEDE, *HISTORIA ECCLESIASTICA* (*HE*), tr. B. Colgrave, in J. McClure and R. Collins, eds, *The Ecclesiastical History of the English People; The Greater Chronicle; Bede's Letter to Egbert* (Oxford: Oxford University Press), 1–298.

BEOWULF, tr. H. D. Chickering, Jr. (1977), *Beowulf: a dual-language edition* (New York: Anchor Books).

'DEOR', tr. Kevin Crossley-Holland (1999), *The Anglo-Saxon World: an anthology*, Oxford World's Classics (Oxford: Oxford University Press), 7–8.

'FOR A SUDDEN STITCH', in Bill Griffiths (1996), *Aspects of Anglo-Saxon Magic* (Frithgarth: Anglo-Saxon Books), 189–191.

THE FORTUNES OF MEN, tr. Kevin Crossley-Holland (1999), *The Anglo-Saxon World: an anthology*, Oxford World's Classics (Oxford: Oxford University Press), 304–306.

'THE RUIN', Bruce Mitchell and Fred C. Robinson, eds, (2001), *A Guide to Old English*, sixth edition (Oxford: Blackwell Publishing), 254–255; tr. Kevin Crossley-Holland (1999), *The Anglo-Saxon World: an anthology*, Oxford World's Classics (Oxford: Oxford University Press), 59–60.

'THE SEAFARER', tr. Kevin Crossley-Holland (1999), *The Anglo-Saxon World: an anthology*, Oxford World's Classics (Oxford: Oxford University Press), 53–56.

'THE WANDERER', Bruce Mitchell and Fred C. Robinson, eds, (2001), *A Guide to Old English*, sixth edition (Oxford: Blackwell Publishing), 271–275; tr. Kevin Crossley-Holland (1999), *The Anglo-Saxon World: an anthology*, Oxford World's Classics (Oxford: Oxford University Press), 50–53.

References

ABINGDON AND DISTRICT ARCHAEOLOGICAL SOCIETY (1973), 'Corporation Farm (A)', *Council for British Archaeology, Group 9 Newsletter* 3, 40.

ADDYMAN, P. V. (1964), 'A dark-age settlement at Maxey, Northants.', *Medieval Archaeology* 8, 20–73.

ADDYMAN, P. V., AND LEIGH, D. (1973), 'The Anglo-Saxon village at Chalton, Hampshire: second interim report', *Medieval Archaeology* 17, 1–25. <www.maneypublishing.com/journals/med> or <www.ingentaconnect.com/content/maney/med>.

ADDYMAN, P.V., LEIGH, D., AND HUGHES, M. J. (1972), 'Anglo-Saxon houses at Chalton, Hampshire', *Medieval Archaeology* 16, 13–31.

AINSLEY, C. (2008), 'The animal bone [at Hammersmith]', in COWIE AND BLACKMORE 2008, 46.

ALLEN, T. (1990*a*), 'Abingdon', *Current Archaeology* 121, 24–27.

—— (1990*b*), 'Abingdon Vineyard redevelopment', *South Midlands Archaeology* 20, 73–78.

ANDERSON, T. W. (1984), *An Introduction to Multivariate Statistical Analysis*, 2nd edition (New York: Wiley).

ANDREWS, P. (1995), *Excavations at Redcastle Furze, Thetford, 1988–9*, East Anglian Archaeology Report 72 (Gressenhall: Field Archaeology Division, Norfolk Museum Services).

—— (1996), 'Prospect Park, Harmondsworth, London Borough of Hillingdon: settlement and burial from the Neolithic to the early Saxon periods', in ANDREWS AND CROCKETT 1996, 1–50.

ANDREWS, P., AND CROCKETT, A. (1996), *Three Excavations Along the Thames and its Tributaries, 1994: Neolithic to Saxon settlement and burial in the Thames, Colne,*

and Kennet valleys, Wessex Archaeology Report 10 (Salisbury: Wessex Archaeology).

ARCHAEOLOGICAL SOLUTIONS, n.d., 'A Saxon settlement at the Old Bell, Marham, Norfolk', web article, accessed 4 May 2010 <http://www.archaeologicalsolutions.co.uk/index.php?option=com_content&view=article&id=8:a-saxon-settlement-at-the-old-bell-marham-norfolk&catid=1:projects&Itemid=21>.

ASHFORD, B. E., KREINER, G. E., AND FUGATE, M. (2000), 'All in a day's work: boundaries and micro role transitions', *Academy of Management Review* 25/3, 472–491.

ASTILL, G. (2011), 'Overview: trade, exchange, and urbanization', in H. Hamerow, D. A. Hinton, and S. Crawford, eds, *The Oxford Handbook of Anglo-Saxon Archaeology* (Oxford: Oxford University Press), 503–514.

ATKINS, R., AND CONNOR, A. (2010), *Farmers and Ironsmiths: prehistoric, Roman and Anglo-Saxon settlement beside Brandon Road, Thetford, Norfolk*, East Anglian Archaeology 134 (Bar Hill: Oxford Archaeology East).

AUDOUY, M., AND CHAPMAN, A. (2009), *Raunds: the origin and growth of a midland village AD 450–1500: excavations in north Raunds, Northamptonshire 1977–87: Raunds Area Project* (Oxford: Oxbow Books).

BAILEY, D. W. (1990), 'The living house: signifying continuity', in R. Samson, ed., *The Social Archaeology of Houses* (Edinburgh: Edinburgh University Press), 19–48.

BAKER, P. (2005), 'Animal bone [at Gosberton Third Drove, Gosberton]', in CROWSON *ET AL.* 2005, 32–33.

BARBER, A., AND WATTS, M. (2008), 'Excavations at Saxon's Lode Farm, Ripple, 2001–2: Iron Age, Romano-British and Anglo-Saxon rural settlement in the Severn Valley', *Transactions of the Worcestershire Archaeological Society*, third series 21, 1–90.

BARCLAY, K., BIDDLE, M., AND ORTON, C. (1990), 'The chronological and spatial distribution of the objects [at medieval Winchester]', in Biddle 1990, i.42–73.

BARNWELL, P. S. (2005), 'Anglian Yeavering: a Continental perspective', in P. Frodsham and C. O'Brien, eds, *Yeavering: people, power & place* (Stroud: Tempus), 174–184.

BARRETT, J. C. (1989), 'Time and tradition: the rituals of everyday life', in H.-Å. Nortström and A. Knape, eds, *Bronze Age Studies: transactions of the British-Scandinavian colloquium in Stockholm, May 10–11, 1985*, Museum of National Antiquities, Stockholm, Studies 6 (Stockholm: Statens Historiska Museum), 113–126.

BARTON, K. J. (1962), 'Settlements of the Iron Age and pagan Saxon periods at Linford, Essex', *Transactions of the Essex Archaeological Society*, third series 1/2, 57–104.

BATEMAN, C., ENRIGHT, D., AND OAKLEY, N. (2003), 'Prehistoric and Anglo-Saxon settlements to the rear of Sherborne House, Lechlade: excavations in 1997', *Transactions of the Bristol and Gloucestershire Archaeological Society* 121, 23–96.

BAXTER, I. L. (2003), 'Animal bone [at Godmanchester]', in GIBSON WITH MURRAY 2003, 190–197.

BAXTER, M. J. (1994), *Exploratory Multivariate Analysis in Archaeology* (Edinburgh University Press).

BAYLISS, A., AND HEY, G. (2004), 'Scientific dating [at Yarnton]', in HEY 2004, 255–266.

BELL, CATHERINE (1992), *Ritual Theory, Ritual Practice* (Oxford: Oxford University Press).

BELL, CHRISTOPHER (2004), 'Cresswell Field: Saxon settlement', in HEY 2004, 177–187.

BELL, M. (1977), 'Excavations at Bishopstone', *Sussex Archaeological Collections* 115, 1–291.

BERESFORD, G. (1987), *Goltho: the development of an early medieval manor c.850–1150* (London: Historic Buildings & Monuments Commission for England).

BERG, D. (1993), 'Animal bones from Anglo-Saxon deposits [at Nettleton Top]', in FIELD AND LEAHY 1993, 30–34.

BERISFORD, F., 1973, 'The early Anglo-Saxon settlement sites in the Upper Thames Basin, with special reference to the area around Cassington and Eynsham', B.Litt. thesis, University of Oxford.

BIDDLE, M. (1990), *Artefacts from Medieval Winchester*, part ii: *Object and economy in medieval Winchester*, 2 vols, Winchester Studies 7.ii (Oxford: Oxford University Press).

BINFORD, L. R. (1968), 'Archaeological perspectives', in S. R. Binford and L. R. Binford, eds, *New Perspectives in Archaeology* (Chicago: Aldine Pub. Co.), 5–32.

—— (1978), 'Dimensional analysis of behavior and site structure: learning from an Eskimo hunting stand', *American Antiquity* 43, 330–361.

BLACKMORE, L. (2008), 'The accessioned finds', in COWIE AND BLACKMORE 2008, 193–211.

BLACKMORE, L., AND RIDDLER, I. (2008), 'Double-sided comb with decorative end plates', in COWIE AND BLACKMORE 2008, 207–208.

BLAIR, J. (1995), 'Anglo-Saxon pagan shrines and their prototypes', *Anglo-Saxon Studies in Archaeology and History* 8, 1–28.

—— (2009), 'The dangerous dead in early medieval England', in S. Baxter *et al.*, eds, *Early Medieval Studies in Memory of Patrick Wormald* (Farnham: Ashgate), 539–559.

—— (2011), 'Overview: the archaeology of religion', in H. Hamerow, D. A. Hinton, and S. Crawford, eds, *The Oxford Handbook of Anglo-Saxon Archaeology* (Oxford: Oxford University Press), 727–741.

BLINKHORN, P. (1999), 'Of cabbages and kings: production, trade and consumption in middle Saxon England,' in M. Anderton, ed., *Anglo-Saxon Trading Centres: beyond the emporia* (Glasgow: Cruithne Press), 4–23.

—— (2001), 'Anglo-Saxon pottery [at Oxford Science Park, Littlemore]', in MOORE 2001, 189–197.

—— (2005), 'Saxon pottery [at Gosberton Third Drove, Gosberton]', in CROWSON *ET AL.* 2005, 30–32.

—— (2007), 'The pottery [at Fowlmere]', in SPOERRY AND HINMAN 2007, 139.

—— (2008), 'The Saxon pottery', in STANSBIE 2008, 44–47.

—— (2010), 'Anglo-Saxon and later pottery [from Brandon Road, Thetford]', in ATKINS AND CONNOR 2010, 70–79.

BLOCH, M. (1974), 'Symbols, song, dance and features of articulation: is religion an extreme form of traditional authority?', *Archives européennes de sociologie* 15, 55–81.

BODDINGTON, A. (1990), 'Models of burial, settlement and worship: the Final Phase reviewed', in E. Southworth, ed., *Anglo-Saxon Cemeteries: a reappraisal. Proceedings of a conference held at Liverpool Museum 1986* (Stroud: Alan Sutton), 177–199.

BOGUCKI, P. (2002), Review of J. Chapman, *Fragmentation in Archaeology* (London: Routledge), in *American Antiquity* 67/3, 583–585.

BØLVIKEN, E., *ET AL.* (1982), 'Correspondence analysis: an alternative to principal components', *World Archaeology* 14/1, 41–60.

BOND, J. M. (1994), 'The cremated animal bone [at Spong Hill]', in MCKINLEY 1994, 121–135.

—— (1995), 'Animal bone from early Saxon sunken-featured buildings and pits', in RICKETT 1995, 142–146.

—— (1996), 'Burnt offerings: animal bone in Anglo-Saxon cremations', *World Archaeology* 28/1, 76–88.

BOOTH, P., *ET AL.* (2007), *The Thames Through Time: the archaeology of the gravel terraces of the Upper and Middle Thames: the early historical period: AD 1–1000*, Thames Valley Landscapes Monograph 27 (Oxford: Oxford Archaeology).

BOSWORTH, J., AND TOLLER, T. N. (1898), *An Anglo-Saxon Dictionary based on the manuscript collections of the late Joseph Bosworth, D.D., F.R.S., edited and enlarged by T. Northcote Toller, M.A.* (London: Oxford University Press).

BOULTER, S. (2002*a*), 'Flixton, Flixton Park Quarry', *Proceedings of the Suffolk Institute of Archaeology and History* 40/2, 222–225.

—— (2002*b*), 'Flixton, Flixton Park Quarry', *Medieval Settlement Research Group* 17, 60–62.

—— 2006, 'Flixton Park Quarry: Assessment 2', internal report, Suffolk County Council Archaeological Service.

BOURDIEU, P. (1990 [1980]), *The Logic of Practice* [*Le sens pratique*], tr. Richard Nice (Cambridge: Polity Press).

BOWDEN, M., AND MCOMISH, D. (1987), 'The required barrier', *Scottish Archaeological Review* 4/2, 76–84.

BOYER, P., PROCTOR, J., AND TAYLOR-WILSON, R. (2009), *On the Boundaries of Occupation: excavations at Burringham Road, Scunthorpe and Baldwin Avenue, Bottesford, North Lincolnshire*, Pre-Construct Archaeology Limited Monograph 9 ([London]: Pre-Construct Archaeology Limited).

BOYLE, A., (2004), 'The human burials [at Yarnton]', in HEY 2004, 317–323.

BOYLE, A., BOSTON, C., AND WITKIN, A., 2005, 'The archaeological experience at St Luke's Church, Old Street, Islington', unpublished report, Oxford Archaeology.

BRADLEY, R. (1980), 'Anglo-Saxon cemeteries: some suggestions for research', in P. Rahtz, T. Dickinson and L. Watts, eds, *Anglo-Saxon Cemeteries, 1979: the fourth*

Anglo-Saxon symposium at Oxford, BAR British Series 82 (Oxford: B.A.R.), 171–178.

—— (2003), 'A life less ordinary: the ritualization of the domestic sphere in later prehistoric Europe', *Cambridge Archaeological Journal* 13/1, 5–23.

—— (2005), *Ritual and Domestic Life in Prehistoric Europe* (London: Routledge).

BRONK RAMSEY, C., AND ALLEN, M. J. (1995), 'Analysis of the radiocarbon dates and their archaeological significance', in CLEAL *ET AL.* 1995, 526–535.

BROWN, B. J. W., *ET AL.* (1955), 'Excavations at Grimstone End, Pakenham', *Proceedings of the Suffolk Institute of Archaeology* 26/3, 188–207.

BRÜCK, J. (1999*a*), 'Houses, lifecycles and deposition on middle Bronze Age settlements in southern England', *Proceedings of the Prehistoric Society* 65, 145–166.

—— (1999*b*), 'Ritual and rationality: some problems of interpretation in European archaeology', *European Journal of Archaeology* 2/3, 313–344.

BRUDENELL, M., AND COOPER, A. (2008), 'Post-middenism: depositional histories on later Bronze Age settlements at Broom, Bedfordshire', *Oxford Journal of Archaeology* 27/1, 15–36.

BRUGMANN, B. (2011), 'Migration and endogenous change', in H. Hamerow, D. A. Hinton, and S. Crawford, eds, *The Oxford Handbook of Anglo-Saxon Archaeology* (Oxford: Oxford University Press), 30–45.

BUTLER, C. (2000), *Saxon Settlement and Earlier Remains at Friars Oak, Hassocks, West Sussex*, BAR British Series 295 (Oxford: Archaeopress).

CANHAM, R. (1978), *2000 Years of Brentford* (London: Her Majesty's Stationery Office).

CANHAM, R., AND PHILLIPS, B. (1976), *The Archaeology of Old Swindon Hill*, Swindon Archaeological Society Report 1 (Swindon: Swindon Archaeological Society).

CARR, R. D., TESTER, A., AND MURPHY, P. (1988), 'The middle-Saxon settlement at Staunch Meadow, Brandon', *Antiquity* 62, 371–377.

CARTER, G. A. (1998), *Excavations at the Orsett 'Cock' Enclosure, Essex, 1976*, East Anglian Archaeology Report 86 (Chelmsford: Essex County Council Archaeology Section).

CARUTH, J. (1996), 'Ipswich, Hewlett Packard plc., Whitehouse Industrial Estate', in E. Martin, C. Pendleton, and J. Plouviez, eds, 'Archaeology in Suffolk 1995', *Proceedings of the Suffolk Institute of Archaeology and History* 38 (1996), 476–479.

—— (2002*a*), 'Lakenheath, Recycling Centre, RAF Lakenheath', *Medieval Settlement Research Group* 17 (2002), 62.

—— (2002*b*), 'Lakenheath, Wells Road, RAF Lakenheath', *Medieval Settlement Research Group* 17 (2002), 62–63.

—— (2002*c*), 'Eriswell, RAF Lakeneath', *Proceedings of the Suffolk Institute of Archaeology and History* 40 (2002), 219–221.

—— 2005, 'An assessment of the potential for analysis and publication for archaeological work carried out at RAF Lakenheath between 1987 and June 2005, volume 2: the late Iron Age, Roman and Saxon occupation' internal report, Suffolk County Council Archaeological Service.

—— 2006, 'Consolidated Support Complex, RAF Lakenheath, ERL 116 and Family Support Complex, RAF Lakenheath, ERL 139: archaeological excavation report', internal report, Suffolk County Council Archaeological Service.

CARVER, M. (2005), *Sutton Hoo: a seventh-century princely burial ground and its context* (London: British Museum Press).

CASE, H. J. (1982), 'Cassington, 1950–2: Late Neolithic pits and the Big Enclosure', in H. J. Case and A. W. R. Whittle, eds, *Settlement Patterns in the Oxford Region: excavations at the Abingdon causewayed enclosure and other sites*, CBA Research Report 44 (Oxford: Department of Antiquities, Ashmolean Museum; London: Council for British Archaeology), 118–151.

CATHERS, K., 2002, 'An examination of the horse in Anglo-Saxon England', Ph.D. thesis, University of Reading.

CECIRE, M. S. (2010), '*Ban Welondes*: Wayland Smith in popular culture', in D. Clark and N. Perkins, eds, *Anglo-Saxon Culture and the Modern Imagination* (Cambridge: D.S. Brewer), 201–217.

CHAMBERS, R., AND MCADAM, E. (2007), *Excavations at Barrow Hills, Radley, Oxfordshire, 1983–5*, ii: *The Romano-British Cemetery and Anglo-Saxon Settlement*, Thames Valley Landscapes Monograph 25 (Oxford: Oxford Archaeology).

CHAMPION, T. (1977), 'Chalton', *Current Archaeology* 59, 364–369.

CHAPMAN, J. (2000*a*), *Fragmentation in Archaeology: people, places and broken objects in the prehistory of south-eastern Europe* (London: Routledge).

—— (2000*b*), 'Pit-digging and structured deposition in the Neolithic and Copper Age', *Proceedings of the Prehistoric Society* 66, 61–87.

CLARK, A. (1993), *Excavations at Mucking*, i: *The site atlas* (London: English Heritage in association with the British Museum Press).

CLARK, E. A., *ET AL.* (1992), 'Miscellaneous small finds of stone, clay, jet, amber, and glass [from sites 39, 94, and 95 at Wharram Percy]', in MILNE AND RICHARDS 1992, 41–49.

CLARKE, S. (1997), 'Abandonment, rubbish disposal and "special" deposits at Newstead', in K. Meadows, C. Lemke and J. Heron, eds, *TRAC 96: Proceedings of the Sixth Annual Theoretical Roman Archaeology Conference* (Oxford: Oxbow Books), 73–81.

CLEAL, R. M. J., WALKER, K. E., AND MONTAGUE, R. (1995), *Stonehenge in its Landscape: twentieth-century excavations*, English Heritage Archaeological Report 10 (London: English Heritage).

COLLIS, J. (1978), *Winchester Excavations*, ii: *1949–1960: Excavations in the suburbs and the western part of the town* (Winchester: Winchester City Museum).

—— (1996), 'Hill-forts, enclosures and boundaries', in T. C. Champion and J. R. Collis, eds, *The Iron Age in Britain and Ireland: recent trends* (Sheffield: Sheffield Academic), 87–94.

CONNELLER, C. (2011), ed., *An Archaeology of Materials: substantial transformations in early prehistoric Europe*, Routledge Studies in Archaeology 1 (Abingdon: Routledge).

CONNOR, A. (2009), 'A curious object from Firs Farm, Caxton', *Proceedings of the Cambridge Antiquarian Society* 98, 89–90.

COPLEY, G. J. (1958), *An Archaeology of South-East England: a study in continuity* (London: Phoenix House Ltd).

CORSÍN JIMÉNEZ, A. (2003), 'On space as a capacity', *Journal of the Royal Anthropological Institute* 9/1, 137–153.

COWGILL, J. (1994), 'The lead vessel [at Riby Cross Roads]', in STEEDMAN 1994, 267–271.

—— (2009*a*), 'Discussion of the lead vessels [at Baldwin Avenue, Bottesford]', in BOYER *ET AL.* 2009, 84–89.

—— (2009*b*), 'Lead vessels [at Baldwin Avenue, Bottesford]', in BOYER *ET AL.* 2009, 73–79.

—— (2009*c*), 'The lead vessels housing the Flixborough hoard', in EVANS AND LOVELUCK 2009, 267–277.

COWIE, R., AND BLACKMORE, L. (2008), *Early and Middle Saxon Rural Settlement in the London Region*, MoLAS Monograph 41 (London: Museum of London).

COWIE, R., AND WHYTEHEAD, R. L., WITH BLACKMORE, L. (1988), 'Two middle Saxon occupation sites: excavations at Jubilee Hall and 21–22 Maiden Lane', *Transactions of the London and Middlesex Archaeological Society* 39, 47–164.

CRABTREE, P. (1989), *West Stow, Suffolk: early Anglo-Saxon animal husbandry*, East Anglian Archaeology Report 47 (Ipswich: Suffolk County Planning Dept).

—— (1995), ‘The symbolic role of animals in Anglo-Saxon England: evidence from burials and cremations’, in K. Ryan and P. J. Crabtree, eds, *The Symbolic Role of Animals in Archaeology*, MASCA Research Papers in Science and Archaeology 12 (Philadelphia: MASCA, University of Pennsylvania Museum of Archaeology and Anthropology), 20–26.

—— (1996), ‘Production and consumption in an early complex society: animal use in Middle Saxon East Anglia’, *World Archaeology* 28, 58–75.

—— (2007), ‘Animals as material culture in middle Saxon England: the zooarchaeological evidence for wool production at Brandon’, in A. Pluskowski, ed., *Breaking and Shaping Beastly Bodies: Animals as Material Culture in the Middle Ages* (Oxford: Oxbow Books), 161–169.

CRAMP, R. (2005), *Wearmouth and Jarrow Monastic Sites: volume 1* (Swindon: English Heritage).

—— (2006), *Wearmouth and Jarrow Monastic Sites: volume 2* (Swindon: English Heritage).

CRAWFORD, S. (1993), ‘Children, death and the afterlife in Anglo-Saxon England’, *Anglo-Saxon Studies in Archaeology and History* 6, 83–91.

—— (1999), *Childhood in Anglo-Saxon England* (Stroud: Sutton Publishing).

—— (2007), ‘Companions, co-incidences or chattels? Children in the early Anglo-Saxon multiple burial ritual’, in S. Crawford and G. Shepherd, eds, *Children, Childhood and Society*, BAR International Series 1696, IAA Interdisciplinary Series 1 (Oxford: Archaeopress), 83–92.

—— (2008), ‘Special burials, special buildings? An Anglo-Saxon perspective on the interpretation of infant burials in association with rural settlement structures’, in K. Bacvarov, ed., *Babies Reborn: infant/child burials in pre- and protohistory*, International Union for Prehistoric and Protohistoric Sciences Proceedings of the XV World Congress (Lisbon, 4–9 September 2006) 24, BAR International Series 1832 (Oxford: Archaeopress), 197–204.

—— (2009), *Daily Life in Anglo-Saxon England* (Oxford: Greenwood World Publishing).

—— 2010, 'Women's ritual spaces in early Anglo-Saxon settlements', unpublished paper presented at the 17th International Medieval Congress, Institute for Medieval Studies, University of Leeds, 12 July.

CREWE, V. (2008), 'The appropriation of prehistoric monuments in early to middle Anglo-Saxon settlements' *Medieval Settlement Research Group* 23, 1–8.

CROWSON, A., *ET AL.* (2005), *Anglo-Saxon Settlement on the Siltland of Eastern England*, Lincolnshire Archaeology and Heritage Reports Series 7 (Heckington, Sleaford: Heritage Trust of Lincolnshire).

CRUMMY, N. (2005), 'Objects of copper alloy, lead, iron, bone/antler, clay and stone [from Gamlingay]', in MURRAY WITH MCDONALD 2005, 224–240.

—— (2008), 'Appendix 5: Small finds report', in FLETCHER 2008, 75–78.

—— (2010), 'Metalwork [from Brandon Road, Thetford]', in ATKINS AND CONNOR 2010, 42–60.

CUNLIFFE, B. (1984), *Danebury: an Iron Age hillfort in Hampshire,* ii: *The excavations, 1969–1978: the finds*, CBA Research Report 52, (London: Council for British Archaeology).

—— (1992), 'Pits, preconceptions and propitiation in the British Iron Age', *Oxford Journal of Archaeology* 11, 69–83.

—— (1995), *Danebury: an Iron Age hillfort in Hampshire,* vi: *A hillfort community in perspective*, CBA Research Report 102 (York: Council for British Archaeology).

CUNLIFFE, B., AND POOLE, C. (1995), 'Pits and propitiation [at Danebury]', in CUNLIFFE 1995, 80–86.

DALLAS, C. (1993), *Excavations in Thetford by B. K. Davison between 1964 and 1970*, East Anglian Archaeology Report 62 (Gressenhall: Field Archaeology Division, Norfolk Museums Service).

DANIELS, R. (1988), 'The Anglo-Saxon monastery at Church Close, Hartlepool, Cleveland', *Archaeological Journal* 145, 158–210.

—— (2007), *Anglo-Saxon Hartlepool and the Foundations of English Christianity: an archaeology of the Anglo-Saxon monastery*, Tees Archaeology Monograph Series 3 (Hartlepool: Tees Archaeology).

DARVILL, T. (2008), *The Concise Oxford Dictionary of Archaeology*, 2nd edition (Oxford: Oxford University Press).

DEAN, S., HOOKE, D., AND JONES, A. (2010), 'The "Staffordshire Hoard": the fieldwork', *Antiquaries Journal* 90, 139–152.

DICKINSON, T. M. (1976), 'The Anglo-Saxon burial sites of the upper Thames region, and their bearing on the history of Wessex, *c.* AD 400–700', 3 vols, D.Phil. thesis, University of Oxford.

—— (1993), 'An Anglo-Saxon "cunning woman" from Bidford-on-Avon', in M. Carver, ed., *In Search of Cult: archaeological investigations in honour of Philip Rahtz* (Woodbridge: The Boydell Press), 45–54.

—— (2005), 'Symbols of protection: the significance of animal-ornamented shields in early Anglo-Saxon England', *Medieval Archaeology* 49, 109–163.

—— (2011), 'Overview: mortuary ritual', in H. Hamerow, D. A. Hinton, and S. Crawford, eds, *The Oxford Handbook of Anglo-Saxon Archaeology* (Oxford: Oxford University Press), 221–237.

DIVERS, D. (2008*a*), 'Site M: South Lane, Kingston (Surrey)', in COWIE AND BLACKMORE 2008, 59–61.

—— (2008*b*), 'Site V: Chelsea (Middlesex)', in COWIE AND BLACKMORE 2008, 100–101.

DOBNEY, K., JAQUES, D., AND BROTHWELL, D. (1999), 'Assessment of the bone assemblage from COT93 [Cottam]', in RICHARDS 1999, 84–86.

DOBNEY, K., *ET AL.* (2007), *Farmers, Monks and Aristocrats: the environmental archaeology of Anglo-Saxon Flixborough*, Excavations at Flixborough 3 (Oxford: Oxbow Books).

DODD, A. (2003*a*), ed., *Oxford Before the University: the late Saxon and Norman archaeology of the Thames crossing, the defences and the town*, Thames Valley Landscapes Monograph 17 (Oxford: Oxford Archaeology), 7–64.

—— (2003*b*), 'Survey of neighbouring 6th- to 8th-century settlements [near Eynsham]', in HARDY *ET AL.* 2003, 575–577.

DODD, A., AND HARDY, A. (2003), 'The Anglo-Saxon sequence [at Eynsham]', in HARDY *ET AL.* 2003, 463–492.

DONE, G. (1993), 'Animal bone from Anglo-Saxon contexts [at Mucking]', in HAMEROW 2003, 74–79.

DUNNING, G. C. (1932), 'Bronze Age settlements and a Saxon hut near Bourton-on-the-Water, Gloucestershire', *Antiquaries Journal* 12, 279–293.

DURKHEIM, É. (1995 [1912]), *The Elementary Forms of Religious Life* [*Formes élémentaires de la vie religieuse*], tr. K. E. Fields (London: Free Press).

EAGLES, B., AND BRISCOE, D. (1999), 'Animal and bird stamps on early Anglo-Saxon pottery in England', *Studien zur Sachsenforschung* 13, 99–112.

ELEY, T., AND FOSBERRY, R. (2010), 'Slag and associated materials [from Brandon Road, Thetford]', in ATKINS AND CONNOR 2010, 60.

ELIADE, M. (1989), *Shamanism: archaic techniques of ecstasy* (London: Arkana).

ENGLESTAD, E. (1988), 'Pit-houses in arctic Norway: an investigation of their typology using multiple correspondence analysis', in T. Madsen, ed., *Multivariate Archaeology: numerical approaches in Scandinavian archaeology*, Jutland Archaeological Society Publications 21 (Moesgård: Jutland Archaeological Society), 71–84.

ENRIGHT, M. J. (1990), 'The goddess who weaves', *Frühmittelalterliche Studien* 24, 54–70.

ESMONDE CLEARY, S. (2000), 'Putting the dead in their place: burial location in Roman Britain', in J. Pearce, M. Millett, and M. Struck, eds, *Burial, Society and Context in the Roman World* (Oxford: Oxbow Books), 127–142.

ESSEX COUNTY COUNCIL FIELD ARCHAEOLOGY UNIT (2003), 'Witham, Maltings Lane', in J. Bradley and M. Gaimster, eds, 'Medieval Britain and Ireland in 2002', *Medieval Archaeology* 47, 217–339, at 237.

EVANS, D. H., AND LOVELUCK, C. (2009), *Life and Economy at Early Medieval Flixborough, c. AD 600–1000: the artefact evidence*, Excavations at Flixborough 2 (Oxford: Oxbow Books).

EVANS, E.-J., WITH STRID, L. (2007), 'Animal bone [at Higham Ferrers]', in HARDY *ET AL.* 2007, 145–157.

EVISON, V. I. (1987), *Dover: Buckland Anglo-Saxon cemetery* (London: Historic Buildings and Monuments Commission for England).

FARWELL, D. E., ANDREWS, P., AND BROOK, R. (1999), *Prehistoric, Roman and early Saxon Settlement at Prospect Park, London Borough of Hillingdon: the archaeology and geology of a site in the lower Colne valley: evaluation, excavation and watching brief work 1993–5* (Salisbury: Wessex Archaeology).

FASHAM, P. J., AND WHINNEY, R. J. B. (1991), *Archaeology and the M3: the watching brief, the Anglo-Saxon settlement at Abbots Worthy and retrospective sections*, Hampshire Field Club and Archaeological Society Monograph 7 (Winchester: Hampshire Field Club in co-operation with the Trust for Wessex Archaeology).

FERN, C. (2005), 'The archaeological evidence for equestrianism in early Anglo-Saxon England', in A. Pluskowski, ed., *Just Skin and Bones? New perspectives on human–animal relations in the historical past*, BAR International Series 1410 (Oxford: Archaeopress), 43–71.

—— (2007), ‘Early Anglo-Saxon horse burial of the fifth to seventh centuries AD’, in S. Semple and H. Williams, eds, *Early Medieval Mortuary Practices*, Anglo-Saxon Studies in Archaeology and History 14 (Oxford: Oxford University School of Archaeology), 92–109.

FIELD, N., AND LEAHY, K. (1993), ‘Prehistoric and Anglo-Saxon remains at Nettleton Top, Nettleton’, *Lincolnshire History and Archaeology* 28, 9–38.

FITZPATRICK, A. P. (1994), ‘Outside in: the structure of an early Iron Age house at Dunston Park, Thatcham, Berkshire’, in A. P. Fitzpatrick and E. L. Morris, eds, *The Iron Age in Wessex: recent work* (Salisbury: Association Française d’Etude de l’Age du Fer), 68–72.

FLETCHER, M., AND LOCK, G. R. (2005), *Digging Numbers: Elementary statistics for archaeologists*, second edition (Oxford: Oxford University School of Archaeology).

FLETCHER, T. (2008), ‘Anglo-Saxon settlement and medieval pits at 1 High Street, Willingham, Cambridgeshire’, [unpublished] Report 1013, CAM ARC.

FOOT, S. (2006), *Monastic Life in Anglo-Saxon England* (Cambridge: Cambridge University Press).

FORD, S. (1995), ‘The excavation of a Saxon settlement and a Mesolithic flint scatter at Northampton Road, Brixworth, Northamptonshire, 1994’, *Northamptonshire Archaeology* 26, 79–108.

FORD, W. J. (2002), ‘The Romano-British and Anglo-Saxon settlement and cemeteries at Stretton-on-Fosse, Warwickshire’, *Transactions of the Birmingham and Warwickshire Archaeological Society* 106, 1–116.

FOREMAN, S., HILLER, J., AND PETTS, D. (2002), *Gathering the People, Settling the Land: the archaeology of a middle Thames landscape: Anglo-Saxon to post-medieval*, Thames Valley Landscapes Monograph 14 (Oxford: Oxford Archaeological Unit).

FULFORD, M. (2001), ‘Links with the past: pervasive “ritual” behaviour in Roman Britain’, *Britannia* 32, 199–218.

GARDINER, M. (1990), 'An Anglo-Saxon medieval settlement at Botolphs, Bramber, West Sussex', *Archaeological Journal* 147, 216–275.

GARDNER, A. (2007), 'Fluid frontiers: cultural interaction on the edge of empire', *Stanford Journal of Archaeology* 5, 43–60.

GARROW, D. (2007), 'Placing pits: landscape occupation and depositional practice during the Neolithic in East Anglia', *Proceedings of the Prehistoric Society* 73, 1–24.

GATES, T., AND O'BRIEN, C. (1988), 'Cropmarks at Milfield and New Bewick and the recognition of Grubenhäuser in Northumberland', *Archaeologia Aeliana*, fifth series 16, 1–9.

GEAKE, H. (1992), 'Burial practice in seventh- and eighth-century England', in M. O. H. Carver, ed., *The Age of Sutton Hoo: the seventh century in north-western Europe* (Woodbridge: The Boydell Press), 83–94.

—— (2003), 'The control of burial practice in Anglo-Saxon England', in M. Carver, ed., *The Cross Goes North: processes of conversion in northern Europe, AD 300–1300* (Woodbridge: York Medieval Press), 259–269.

—— (2007), 'The human burials [at Flixborough]', in LOVELUCK AND ATKINSON 2007, 113–119.

GELL, A. (1992), 'Technology of enchantment and enchantment of technology', in J. Coote and A. Shelton, eds, *Anthropology, Art and Aesthetics* (Oxford: Clarendon Press), 40–66.

—— (1998), *Art and Agency: an anthropological theory* (Oxford: Clarendon Press).

GENNEP, A. VAN (1960 [1909]), *The Rites of Passage* [*Les rites de passage*], tr. M. B. Vizedom and G. L. Caffee (Chicago: University of Chicago Press).

GERMANY, M., 2008, 'Monument 24858, south of Gilden Way, Harlow, Essex: archaeological evaluation', unpublished report, Essex County Council Field Archaeology Unit.

GERRITSEN, F. (1999*a*), 'To build and to abandon: the cultural biography of late prehistoric houses and farmsteads in the southern Netherlands', *Archaeological Dialogues* 6, 78–97.

—— (1999*b*) 'A house built on rock? A reply to Nevett, Sharples and Vellinga', *Archaeological Dialogues* 6, 107–114.

GIBSON, C., WITH MURRAY, J. (2003), 'An Anglo-Saxon settlement at Godmanchester, Cambridgeshire', *Anglo-Saxon Studies in Archaeology and History* 12, 137–217.

GILBERT, D. (2008), 'Excavations at St. Mary's Church, Black Bourton, Oxfordshire: early, middle, and late Saxon activity', *Oxoniensia* 73, 147–160.

GILL, D. (2002), 'Lakenheath, RAF Lakenheath (LKH 191)', *Proceedings of the Suffolk Institute of Archaeology and History* 40, 228–229.

GLOSECKI, S. O. (1989), *Shamanism and Old English Poetry* (New York: Garland Publishing, Inc.).

—— (2000), 'Movable beasts: the manifold implications of early Germanic animal imagery', in N. C. Flores, ed., *Animals in the Middle Ages: a book of essays* (New York: Garland Publishing, Inc.), 3–23.

GODDEN, D., *ET AL.* (2002), 'Excavation of Saxon pits at Tidworth, 1999', *Wiltshire Archaeological and Natural History Magazine* 95, 240–248.

GOSDEN, C. (2005), 'What do objects want?', *Journal of Archaeological Method and Theory* 12/3, 193–211.

—— (2011), 'Anthropology and archaeology', in H. Hamerow, D. A. Hinton, and S. Crawford, eds, *The Oxford Handbook of Anglo-Saxon Archaeology* (Oxford: Oxford University Press), 1003–1024.

GRAINGER, G. (1985), 'Fragments of human bone from Anglo-Saxon contexts [at West Stow]', in WEST 1985, 59.

GRANT, A. (1984), 'Ritual behaviour: the special bone deposits [at Danebury]', in CUNLIFFE 1984, 533–543.

GRAY, M. (1974), 'The Saxon settlement at New Wintles, Eynsham, Oxfordshire', in T. Rowley, ed., *Anglo-Saxon Settlement and Landscape: papers presented to a symposium, Oxford 1973*, BAR British Series 6 (Oxford: British Archaeological Reports), 51–55.

GREEN, H. J. M., WITH COWIE, R. (2008), 'Site U: Whitehall (Middlesex)', in COWIE AND BLACKMORE 2008, 90–100.

GREEN, H. S. (1993), 'The 1973 excavations (MK19) [Hartigans]', in WILLIAMS 1993, 179–188.

GREENACRE, M., AND NENADIC, O. (2007), 'ca: Simple, Multiple and Joint Correspondence Analysis', R package version 0.21 <http://www.carme-n.org>.

GRIFFITHS, B. (1996), *Aspects of Anglo-Saxon Magic* (Frithgarth: Anglo-Saxon Books).

GROCOCK, C. (2011), '"To eat, to wear, to work": the place of sheep and cattle in the economy', in M. C. Hyer and G. R. Owen-Crocker, eds, *The Material Culture of Daily Living in the Anglo-Saxon World* (Exeter: University of Exeter Press), 73–92.

GUTTMANN, E. B. A., AND LAST, J. (2000), 'A late Bronze Age landscape at South Hornchurch, Essex', *Proceedings of the Prehistoric Society* 66, 319–359.

HAGEN, A. (2006), *Anglo-Saxon Food and Drink: production, processing, distribution and consumption* (Hockwold cum Wilton: Anglo-Saxon Books).

[HALL, N., *ET AL.*], 2010, 'Sutton Courtenay, Oxfordshire: archaeological excavation and assessment of results', unpublished report, Wessex Archaeology.

HALL, R. A., AND WHYMAN, Mark (1996), 'Settlement and monasticism at Ripon, North Yorkshire, from the 7th to 11th centuries A.D.', *Medieval Archaeology* 40, 62–150.

HALL-TORRANCE, M., AND WEAVER, S. D. G. (2003), 'The excavation of a Saxon settlement at Riverdene, Basingstoke, Hampshire, 1995', *Proceedings of the Hampshire Field Club and Archaeological Society* 59, 63–105.

HAMEROW, H. (1991), 'Settlement mobility and the "middle Saxon shift": rural settlements and settlement patterns in Anglo-Saxon England', *Anglo-Saxon England* 20, 1–17.

—— (1993), *Excavations at Mucking*, ii: *The Anglo-Saxon settlement*, English Heritage Archaeological Report 21 (London: English Heritage, in association with British Museum Press).

—— (1999), 'Anglo-Saxon timber buildings: the Continental connections', in H. Sarfatij, W. J. H. Verwers, and P. J. Woltering, eds, *In Discussion with the Past: archaeological studies presented to W.A. van Es* (Zwolle: Foundation for Promoting Archaeology), 119–128.

—— (2002), *Early Medieval Settlements: The archaeology of rural communities in Northwest Europe, 400–900* (Oxford: Oxford University Press).

—— (2006), '"Special deposits" in Anglo-Saxon settlements', *Medieval Archaeology* 50, 1–30.

—— (2007), 'The Anglo-Saxon occupation sequence at Sutton Courtenay/Drayton', in HAMEROW *ET AL.* 2007, 183–190.

—— (2010*a*), 'Communities of the living and the dead: the relationship between Anglo-Saxon settlements and cemeteries, c.450–c.850', in M. Henig, ed., *Intersections: the archaeology and history of Christianity in England, 400–1200: papers in honour of Martin Biddle and Birthe Kjølbye-Biddle* (Oxford: Archaeopress), 71–76.

—— (2010*b*), 'The development of Anglo-Saxon rural settlement forms', *Landscape History* 31, 5–22.

—— (2011), 'Anglo-Saxon timber buildings and their social context', in H. Hamerow, D. A. Hinton, and S. Crawford, eds, *The Oxford Handbook of Anglo-Saxon Archaeology* (Oxford: Oxford University Press), 128–155.

HAMEROW, H., HAYDEN, C., AND HEY, G. (2007), 'Anglo-Saxon and earlier settlement near Drayton Road, Sutton Courtenay, Berkshire', *Archaeological Journal* 164, 109–196.

HAMILTON-DYER, S. (2001), 'Animal bone [from Cadley Road, Collingbourne Ducis]', in PINE 2001, 102–109.

HARDY, A., CHARLES, B. M., AND WILLIAMS, R. J. (2007), *Death and Taxes: the archaeology of a Middle Saxon estate centre at Higham Ferrers, Northamptonshire*, Oxford Archaeology Monograph 4 (Oxford: Oxford Archaeological Unit Ltd.).

HARDY, A., DODD, A., AND KEEVILL, G. D. (2003), *Ælfric's Abbey: Excavations at Eynsham Abbey, Oxfordshire 1989–1992*, Oxford Archaeology Thames Valley Landscapes Monograph 16 (Oxford: Oxford Archaeological Unit).

HÄRKE, H. (1990), '"Warrior graves"? The background of the Anglo-Saxon weapon burial rite', *Past and Present* 126, 22–43.

—— (1992), 'Changing symbols in a changing society: the Anglo-Saxon weapon burial rite in the seventh century', in M. O. H. Carver, ed., *The Age of Sutton Hoo: the seventh century in north-western Europe* (Woodbridge: The Boydell Press), 149–165.

—— (1997), 'Early Anglo-Saxon social structure', in J. Hines, ed., *The Anglo-Saxons from the Migration Period to the Eighth Century: an ethnographic perspective* (Woodbridge: Boydell Press), 125–160.

HAUGHTON, C., AND POWLESLAND, D. (1999), *West Heslerton: the Anglian cemetery*, 2 vols (Yedingham: The Landscape Research Centre).

HAWKES, S. C. (1986), 'The early Saxon period', in G. Briggs, J. Cook, and T. Rowley, eds, *The Archaeology of the Oxford Region* (Oxford: Oxford University Department for External Studies), 64–108.

HAWKES, S. C., AND GRAY, M. (1970), 'Preliminary note on the early Anglo-Saxon settlement at New Wintles Farm, Eynsham', *Oxoniensia* 34, 1–4.

HEAWOOD, R., AND HOWARD-DAVIS, C. (2002), 'Two early medieval settlement sites in eastern Cumbria', *Transactions of the Cumberland and Westmorland Antiquarian and Archaeological Society*, third series 2, 145–169.

HEDEAGER, L. (2002), 'Scandinavian "central places" in a cosmological setting', in B. Hårdh and L. Larsson, eds, *Central Places in the Migration and Merovingian Periods : papers from the 52nd Sachsensymposium, Lund, August 2001*, Acta Archaeologica Lundensia 39 (Stockholm : Almqvist & Wiksell), 3–18.

HEDGES, J. (1978), 'The loomweights [at Back Street, St Cross, Winchester]', in COLLIS 1978, 33–39.

HEY, G. (2004), *Yarnton: Saxon and Medieval settlement and landscape. Results of excavations 1990–96*, Thames Valley Landscapes Monograph 20 (Oxford: Oxford Archaeology.

HIGBEE, L. (2009), 'Mammal and bird bone [from Bloodmoor Hill, Carlton Colville]', in LUCY *ET AL.* 2009, 279–304.

HIGGS, E. S. AND JARMAN, M. (1977), 'Yeavering: faunal report', in HOPE-TAYLOR 1977, 327–332.

HILL, D. (2011), 'Prelude: agriculture through the year', in M. C. Hyer and G. R. Owen-Crocker, eds, *The Material Culture of Daily Living in the Anglo-Saxon World* (Exeter: University of Exeter Press), 9–22.

HILL, J. D. (1995), *Ritual and Rubbish in the Iron Age of Wessex: a study on the formation of a specific archaeological record*, BAR British Series 242 (Oxford: Tempus Reparatum).

HILL, M. O. (1974), 'Correspondence analysis: a neglected multivariate method', *Applied Statistics* 23/3, 340–354.

HILLER, J., AND MORTIMER, S. (2002), 'The Anglo-Saxon archaeology [at Dorney]', in FOREMAN *ET AL.* 2002, 25–34.

HILLER, J., AND PETTS, D. (2002), 'Middle Saxon evidence [at Dorney]', in FOREMAN *ET AL.* 2002, 57–72.

HINCHLIFFE, J. (1986), 'An early medieval settlement at Cowage Farm, Foxley, near Malmesbury', *Archaeological Journal* 143, 240–259.

HINES, J. (1997), 'Religion: the limits of knowledge', in J. Hines, ed., *The Anglo-Saxons from the Migration Period to the Eighth Century: an ethnographic perspective* (Woodbridge: Boydell Press), 375–410.

HINGLEY, R. (1990), 'Boundaries surrounding Iron Age and Romano-British settlements', *Scottish Archaeological Review* 7, 96–103.

HINTON, D. (2011), 'Weland's work: metals and metalsmiths', in M. C. Hyer and G. R. Owen-Crocker, eds, *The Material Culture of Daily Living in the Anglo-Saxon World* (Exeter: University of Exeter Press), 185–200.

HIRST, S., AND CLARK, D. (2009), *Excavations at Mucking*, iii: *The Anglo-Saxon cemeteries*, 2 vols (London: Museum of London Archaeology).

HODDER, I. (1990), *The Domestication of Europe: structure and contingency in Neolithic societies* (Oxford: Basil Blackwell).

HOFFMANN, M. (1964), *The Warp-Weighted Loom: studies in the history and technology of an ancient implement*, Studia Norvegica 14 ([Oslo?]: Universitetsforlaget).

HOLBROOK, N., AND THOMAS, A. (1996), 'The Roman and early Anglo-Saxon settlement at Wantage, Oxfordshire: excavations at Mill Street, 1993–4', *Oxoniensia* 61, 109–179.

HOLDEN, E. W. (1976), 'Excavations at Old Erringham, Shoreham, West Sussex, part I, a Saxon weaving hut', *Sussex Archaeological Collections* 114, 306–321.

HOLDSWORTH, P., (1980), *Excavations at Melbourne Street, Southampton, 1971–76*, Southampton Archaeological Research Committee Report 1, CBA Research Report 33 (London: Council for British Archaeology).

HOLLEYMAN, G. (1937), 'Harrow Hill excavations 1936', *Sussex Archaeological Collections* 78, 230–251.

HOLMES, J. M. (1993), 'The animal bones [from Pennyland]', in WILLIAMS 1993, 133–154.

HOPE-TAYLOR, B. (1977), *Yeavering: an Anglo-British centre of early Northumbria*, Department of the Environment Archaeological Report 7 (London: Her Majesty's Stationery Office).

HORTON, M. (1994), 'Swahili architecture, space and social structure', in M. Parker Pearson and C. Richards, eds, *Architecture and Order: approaches to social space* (London: Routledge), 147–169.

HOWELL, I. J. (2008), 'Site X: Feltham (Middlesex), in COWIE AND BLACKMORE 2008, 105–108.

HUGHES, [T. McK.] (1880), 'March 17, 1879', Cambridge Antiquarian Society Report, [front matter to] *Cambridge Antiquarian Society* 4/3, xiv–xvi.

HUMPHREY, C., AND LAIDLAW, J. (1994), *The Archetypal Actions of Ritual: a theory of ritual illustrated by the Jain rite of worship* (Oxford: Clarendon Press).

HUNTLEY, J., AND RACKHAM, J. (2007), 'The environmental setting and provisioning of the Anglo-Saxon monastery [at Hartlepool]', in DANIELS 2007, 108–123.

HUTCHESON, N. (1999), 'Ceramic building material and fired clay [from Prospect Park, London Borough of Hillingdon]', in FARWELL *ET AL.* 1999, 43–44.

HYER, M. C., AND OWEN-CROCKER, G. R. (2011), 'Woven words: making and using textiles', in M. C. Hyer and G. R. Owen-Crocker, eds, *The Material Culture of Daily Living in the Anglo-Saxon World* (Exeter: University of Exeter Press), 157–184.

INGOLD, T. (1993), 'The temporality of the landscape', *World Archaeology* 25/2, 152–174.

—— (2008), 'Bindings against boundaries: entanglements of life in an open world', *Environment and Planning A* 40, 1796–1810.

INGREM, C. (2001), 'Animal bone [at Oxford Science Park, Littlemore]', in MOORE 2001, 202–212.

JACKMAN, T. A. (2001), 'Human bone [at Oxford Science Park, Littlemore]', in MOORE 2001, 202.

JACKSON, D. A., HARDING, D. W., AND MYRES, J. N. L. (1969), 'The Iron Age and Anglo-Saxon site at Upton, Northants', *Antiquaries Journal* 49, 202–221.

JAMES, R. (2002), 'The excavation of a Saxon *grubenhaus* [*sic*] at Itford Farm, Beddingham, East Sussex', *Sussex Archaeological Collections* 140, 41–47.

JAMES, S., MARSHALL, A., AND MILLETT, M. (1984), 'An early medieval building tradition', *Archaeological Journal* 141, 182–215.

JAMIESON, D. (2008), 'Site I: Hammersmith Embankment, Winslow Road, Hammersmith (Middlesex)', in COWIE AND BLACKMORE 2008, 49–50.

JARVIS, M. (1993), 'Baston, Hall Farm (TF 114138)', *Medieval Settlement Research Group* 8, 61.

JENSEN, C. K., AND HØILUND NIELSEN, K. (1997), 'Burial data and correspondence analysis', in C. K. Jensen and K. Høilund Nielsen, eds, *Burial & Society: the chronological and social analysis of archaeological burial data* (Aarhus: Aarhus University Press), 29–61.

JONES, A. (1998), 'Where eagles dare: landscape, animals and the Neolithic of Orkney', *Journal of Material Culture* 3, 301–324.

—— (2003), 'Technologies of remembrance', in H. Williams, ed., *Archaeologies of Remembrance: death and memories in past societies* (New York: Kluwer Academic / Plenum Publishers), 65–88.

JONES, E. (1996), 'The excavation of a Saxon *Grubenhaus* and other features at South Street, Oakham, Rutland', *Rutland Record* 16, 250–256.

KEEPAX, C. (1985), 'Grave 2 [at West Stow]', in WEST 1985, 59.

KEEVILL, G. D. (1993), 'An Anglo-Saxon site at Audlett Drive, Abingdon, Oxfordshire', *Oxoniensia* 57, 55–79.

KERNS, C. J. (2010), 'For the ferryman: the social and cosmological consequences of crossing the land-sea boundary during the Neolithic in Britain', *Archaeological Review from Cambridge* 25/2, 115–131.

KNOX, A., 2010, 'Ritual action from the home to the grave: an archaeological approach to the Anglo-Saxon worldview', unpublished paper presented at the 17th International Medieval Congress, Institute for Medieval Studies, University of Leeds, 15 July.

KNÜSEL, C. J., JANAWAY, R. C., AND KING, S. E. (1996), 'Death, decay, and ritual reconstruction: archaeological evidence of cadaveric spasm', *Oxford Journal of Archaeology* 15/2, 121–128.

KOOYMAN, B. (2006), 'Boundary theory as a means to understanding social space in archaeological sites', *Journal of Anthropological Archaeology* 25, 424–435.

LAMBERT, T. B., 2009, 'Protection, Feud and Royal Power: violence and its regulation in English law, *c*.850–*c*.1250', doctoral thesis, Durham University.

LAMOTTA, V. M., AND SCHIFFER, M. B. (1999), 'Formation processes of house floor assemblages', in P. M. Allison, ed., *The Archaeology of Household Activities* (London: Routledge), 19–29.

LAWSON, A. J. (2007), *Chalkland: an archaeology of Stonehenge and its region* (Salisbury: Hobnob Press).

LEACH, E. R. (1968), 'Ritual', in D. L. Sills, ed., *International Encyclopedia of the Social Sciences* (New York: Macmillan & Free Press), xiii.520–526.

—— (1970 [1954]), *Political Systems of Highland Burma: a study of Kachin social structure*, London School of Economics Monographs on Social Anthropology 44 (London: The Athlone Press, University of London).

—— (1977), 'A view from the bridge', in M. Spriggs, ed., *Archaeology and Anthropology: areas of mutual interest*, BAR Supplementary Series 19 (Oxford: British Archaeological Reports), 161–176.

LEAF, H. (2007), 'Medieval bone flutes in England', in A. Pluskowski, ed., *Breaking and Shaping Beastly Bodies: animals as material culture in the Middle Ages* (Oxford: Oxbow Books), 11–17.

LEAHY, K. (1993), 'The Anglo-Saxon pottery [at Nettleton Top]', in FIELD AND LEAHY 1993, 20–25.

—— (2003), *Anglo-Saxon Crafts* (Stroud: Tempus).

—— (2007), *Interrupting the Pots, the excavation of Cleatham Anglo-Saxon cemetery,* CBA Research Report 155 (York: Council for British Archaeology).

LEAHY, K., *ET AL.* (2011), 'The Staffordshire (Ogley Hay) hoard: recovery of a treasure' *Antiquity* 85, 202–220.

LEE, C. (2011), 'Earth's treasures: food and drink', in M. C. Hyer and G. R. Owen-Crocker, eds, *The Material Culture of Daily Living in the Anglo-Saxon World* (Exeter: University of Exeter Press), 142–156.

LEEDS, E. T. (1923), 'A Saxon village near Sutton Courtenay, Berkshire', *Archaeologia* 73, 147–192.

—— (1927), 'A Saxon village at Sutton Courtenay, Berkshire (second report)', *Archaeologia* 76, 59–80.

—— (1939) 'Anglo-Saxon remains', in L. F. Salzman, ed., *The Victoria History of the County of Oxford Volume 1*, Victoria History of the Counties of England (London: Oxford University Press), 346–372.

—— (1947), 'A Saxon village at Sutton Courtenay, Berkshire (third report)', *Archaeologia* 92, 79–93.

LEIGH, D. (1984), 'Ambiguity in Anglo-Saxon Style I art', *Antiquaries Journal* 44, 34–42.

LE PARD, G. (2008), 'An unusual cat burial from Charmouth', *Proceedings of the Dorset National History and Archaeological Society* 129, 181–182.

LETHBRIDGE, T. C. (1927), 'An Anglo-Saxon Hut on the Car Dyke, at Waterbeach', *Antiquaries Journal* 7/2, 141–146.

LEVITAN (1993), 'The animal bone [from Audlett Drive, Abingdon]', in KEEVILL 1993, 74–75.

LEWIS, R. B. (1986), 'The analysis of contingency tables in archaeology', *Advances in Archaeological Method and Theory* 9, 277–310.

LOSCO-BRADLEY, S., AND KINSLEY, G. (2002), *Catholme: an Anglo-Saxon settlement on the Trent gravels in Staffordshire*, Nottingham Studies in Archaeology 3 (Nottingham: Department of Archaeology, University of Nottingham).

LOVELUCK, C. (2001), 'Wealth, waste and conspicuous consumption: Flixborough and its importance for Middle and Late Saxon rural settlement studies', in H. Hamerow and A. MacGregor, eds, *Image and Power in the Archaeology of Early Medieval Britain: essays in honour of Rosemary Cramp* (Oxford: Oxbow Books), 78–130.

—— (2007*a*), 'The archaeological background [to Flixborough]', in DOBNEY *ET AL.* 2007, 5–18.

—— (2007*b*), *Rural Settlement, Lifestyles and Social Change in the Later First Millennium AD: Anglo-Saxon Flixborough in its wider context*, Excavations at Flixborough 4 (Oxford: Oxbow Books).

LOVELUCK, C., AND ATKINSON, D. (2007), *The Early Medieval Settlement Remains from Flixborough, Lincolnshire: the occupation sequence, c. AD 600–1000*, Excavations at Flixborough 1 (Oxford: Oxbow Books).

LOVELUCK, C., AND DOBNEY, K., (2007), 'Aspects of site formation processes and residuality [at Flixborough]', in DOBNEY *ET AL.* 2007, 20–29.

LOWE, C. (2006), *Excavations at Hoddom, Dumfriesshire: an early ecclesiastical site in south-west Scotland* (Edinburgh: Society of Antiquaries of Scotland).

LUCY, S. (1997), 'Housewives, warriors and slaves? Sex and gender in Anglo-Saxon burials', in J. Moore and E. Scott, eds, *Invisible People and Processes* (Leicester: Leicester University Press), 150–168.

—— (2000), *The Anglo-Saxon Way of Death: burial rites in early England* (Stroud: Sutton Publishing).

LUCY, S., TIPPER, J., AND DICKENS, A. (2009), *The Anglo-Saxon Settlement and Cemetery at Bloodmoor Hill, Carlton Colville, Suffolk*, East Anglian Archaeology Report 131 (Cambridge: Cambridge Archaeological Unit).

LUKE, M. (1999), 'An enclosed, pre-"Belgic" Iron Age farmstead with later occupation at Hinksley Road, Flitwick', *Bedfordshire Archaeology* 23, 43–87.

LUND, J. (2005), 'Thresholds and passages: the meanings of bridges and crossings in the Viking Age and early Middle Ages', *Viking and Medieval Scandinavia* 1, 109–135.

LYNE, M. (2003), 'Roman pottery [at Godmanchester]', in GIBSON WITH MURRAY 2003, 154–156.

MCADAM, E. (2007), 'Anglo-Saxon inhumations [at Barrow Hills, Radley]', in CHAMBERS AND MCADAM 2007, 201–202.

MCCLURE, J., AND COLLINS, R. (1999), eds, *The Ecclesiastical History of the English People; The Greater Chronicle; Bede's Letter to Egbert* (Oxford: Oxford University Press).

MCKINLEY, J. I. (1994), *The Anglo-Saxon Cemetery at Spong Hill, North Elmham,* part viii: *The cremations*, East Anglian Archaeology Report 69 (Gressenhall: Field Archaeology Division, Norfolk Museums Service).

MCOMISH, D. (1996), 'East Chisenbury: ritual and rubbish at the British Bronze Age-Iron Age transition', *Antiquity* 70, 68–76.

MADSEN, T. (1988), ed., *Multivariate Archaeology: numerical approaches in Scandinavian archaeology*, Jutland Archaeological Society Publications 21 (Moesgård: Jutland Archaeological Society).

MALONEY, C. (2000), ed., 'Fieldwork round-up 1999', *London Archaeologist* 9, supplement 2, 35–62.

—— (2002), ed., 'Fieldwork round-up 2001', *London Archaeologist* 10, supplement 1, 1–30.

—— (2003), ed., 'Fieldwork round-up 2002', *London Archaeologist* 10, supplement 2, 33–60.

MALTBY, M., (1983), 'The animal bone [from Cowdery's Down, Basingstoke]', in MILLETT WITH JAMES 1983, 258–259.

—— (2003), 'Animal bone [from Sherborne House, Lechlade]', in BATEMAN *ET AL.* 2003, 71–76.

MANNING, W. H. (1995), 'Ritual or refuse: the Harrow Hill enclosure reconsidered', in B. Raftery with V. Megaw and V. Rigby, eds, *Sites and Sights of the Iron Age: essays on fieldwork and museum research presented to Ian Mathieson Stead*, Oxbow Monograph 56 (Oxford: Oxbow Books), 133–138.

MARSHALL, A., AND MARSHALL, G. (1991), 'A survey and analysis of the buildings of early and middle Anglo-Saxon England', *Medieval Archaeology* 35, 29–43.

MASON, D. J. P. (1985), *Excavations at Chester: 26–42 Lower Bridge Street 1974–6: the Dark Age and Saxon periods*, Grosvenor Museum Archaeological Excavation and Survey Reports 3 (Chester: Chester City Council, Grosvenor Museum).

MATTHEWS, C. L., AND HAWKES, S. C., *ET AL.* (1985), 'Early Saxon settlements and burials on Puddlehill, near Dunstable, Bedfordshire', *Anglo-Saxon Studies in Archaeology and History* 4, 59–115.

MAYNARD, G. (1952), 'Recent archæological field work in Suffolk', *Proceedings of the Suffolk Institute of Archæology and Natural History* 25, 205–216.

MAYR-HARTING, H. (1972), *The Coming of Christianity to Anglo-Saxon England* (London: B. T. Batsford).

MAYS, S. (1992), 'The infant burial (95/2506) [from site 95 at Wharram Percy]', in MILNE AND RICHARDS 1992, 79.

—— (2007), ‘The osteology of the human burials [at Flixborough]’, in LOVELUCK AND ATKINSON 2007, 119–122.

MEANEY, A. L. (1981), *Anglo-Saxon Amulets and Curing Stones*, BAR British Series 96 (Oxford: B. A. R.)

—— (1989), ‘Women, witchcraft and magic in Anglo-Saxon England’, in D. G. Scragg, ed., *Superstition and Popular Magic in Anglo-Saxon England* (Manchester: Centre for Anglo-Saxon Studies, University of Manchester), 9–40.

—— (1995), ‘Pagan English sanctuaries, place-names and hundred meeting-places’, *Anglo-Saxon Studies in Archaeology and History* 8, 29–42.

MERCER, R. J. (1988), ‘Hambledon Hill, Dorset, England’, in C. Burgess *et al.*, eds, *Enclosures and Defences in the Neolithic of Western Europe*, part i, BAR International Series 403(i) (Oxford: B.A.R.), 89–106.

MEREDITH, J., (2002), ‘Carlton Colville, Carlton Colville Bypass (Phase 2)’, *Medieval Settlement Research Group* 17, 59.

MERRIFIELD, R. (1987), *The Archaeology of Ritual and Magic* (London: B. T. Batsford Ltd.).

MILES, D. (1986), *Archaeology at Barton Court Farm, Abingdon, Oxon*, Oxford Archaeological Unit Report 3, CBA Research Report 50 (Oxford: Oxford Archaeological Unit and the Council for British Archaeology).

MILLETT, M., WITH JAMES, S. (1983), ‘Excavations at Cowdery’s Down, Basingstoke, Hampshire, 1978–81’, *Archaeological Journal* 140, 151–279.

MILNE, G., AND RICHARDS, J. D. (1992), *Wharram: a study of settlement on the Yorkshire Wolds*, vii: *Two Anglo-Saxon Buildings and Associated Finds*, York University Archaeological Publications 9 (York: Department of Archaeology, University of York).

MOLLESON, T., AND PRICE, J. (1985), ‘Radiographic report [on grave 1 at West Stow]’, in WEST 1985, 59.

MOORE, J. (2001), 'Excavations at Oxford Science Park, Littlemore, Oxford', *Oxoniensia* 66, 163–219.

MORRIS, J., 2008, 'Re-examining associated bone groups from Southern England and Yorkshire, *c.* 4000 BC to AD 1550', Ph.D. thesis, Bournemouth University.

MORRIS, J., AND JERVIS, B. (2011), 'What's so special? A reinterpretation of Anglo-Saxon "special deposits"', *Medieval Archaeology* 55, 66–81.

MORTIMER, R. (2000), 'Village development and ceramic sequence: the middle to late Saxon village at Lordship Lane, Cottenham, Cambridgeshire', *Proceedings of the Cambridge Antiquarian Society* 89, 5–33.

MUDD, A. (2002), *Excavations at Melford Meadows, Brettenham, 1994: Romano-British and early Saxon occupations*, East Anglian Archaeology 99 (Oxford: Oxford Archaeological Unit).

MULVILLE, J. (2003), 'Phases 2a–2e: Anglo-Saxon occupation [at Eynsham: mammal, bird and fish remains]', in HARDY *ET AL.* 2003, 343–360.

MULVILLE, J., AND AYRES, K. (2004), 'Animal bone [at Yarnton]', in Hey 2004, 325–350.

MURRAY, J., WITH MCDONALD, T. (2005), 'Excavations at Station Road, Gamlingay, Cambridgeshire', *Anglo-Saxon Studies in Archaeology and History* 13, 173–330.

NEVETT, L. (1999), 'Abandoned but not forgotten: Gerritsen on the domestic lifecycle', [in dialogue with GERRITSEN 1999*a*], *Archaeological Dialogues* 6, 102–104.

NIBLETT, R. (2001), 'A Neolithic dugout from a multi-period site near St Albans, Herts, England' *International Journal of Nautical Archaeology* 30/2, 155–195.

NICHOLSON, R. (2008), 'Fish remains', in STANSBIE 2008, 75–76.

NORTH, R. (1997), *Heathen Gods in Old English Literature* (Cambridge: Cambridge University Press).

NORTON, A. (2006), 'Excavations at Ireland's Land, Northmoor, Oxfordshire', *Oxoniensia* 71, 175–196.

O'BRIEN, C., AND MIKET, R. (1991), 'The early medieval settlement of Thirlings, Northumberland', *Durham Archaeological Journal* 7, 57–91.

O'BRIEN, L., forthcoming, *A Bronze Age Barrow, Early to Middle Iron Age Settlement and Burials and Early Anglo-Saxon Settlement at Harston Mill, Harston, Cambridgeshire*, East Anglian Archaeology Report.

O'CONNOR, T. (2011), 'Animal husbandry', in H. Hamerow, D. A. Hinton, and S. Crawford, eds, *The Oxford Handbook of Anglo-Saxon Archaeology* (Oxford: Oxford University Press), 361–376.

OLIVER, T., HOWARD-DAVIS, C., AND NEWMAN, R. (1996), 'A post-Roman settlement at Fremington, near Brougham', in J. Lambert *et al.*, *Transect Through Time: the archaeological landscape of the Shell North Western Ethylene Pipeline (English section)*, Lancaster Imprints 1 (Lancaster: Lancaster University Archaeological Unit), 127–169.

ORTON, C. R. (1999), 'Plus ça change? – 25 years of statistics in archaeology', in L. Dingwall *et al.*, eds, *Archaeology in the Age of the Internet – CAA 97 – Computer Applications and Quantitative Methods in Archaeology: proceedings of the 25th anniversary conference, University of Birmingham, April 1997*, BAR International Series 750 (Oxford: Archaeopress), 25–34.

O'SULLIVAN, A., AND NICHOLL, T. (2010), 'Early medieval settlement enclosures in Ireland: dwellings, daily life and social identity', *Proceedings of the Royal Irish Academy* 111C, 59–90.

OTTAWAY, P. (2008), 'The hoard of iron objects [from Bishopstone]', in THOMAS 2008, 357–383.

—— (2009*a*), 'Agricultural tools [at Flixborough]', in EVANS AND LOVELUCK 2009, 245.

—— (2009*b*), 'The Flixborough tool hoard', in EVANS AND LOVELUCK 2009, 256–267.

OTTAWAY, P., *ET AL.* (2009), 'Iron domestic fixtures, fittings and implements [at Flixborough]', in EVANS AND LOVELUCK 2009, 166–187.

OWEN [= OWEN-CROCKER], G. R. (1981), *Rites and Religions of the Anglo-Saxons* (Newton Abbot: D. and Charles).

PARKER PEARSON, M. (1996), 'Food, fertility and front doors in the first millennium BC', in T. C. Champion and J. R. Collis, eds, *The Iron Age in Britain and Ireland: Recent Trends* (Sheffield: Sheffield Academic), 117–132.

—— (1999), 'Food, sex and death: cosmologies in the British Iron Age with particular reference to East Yorkshire', *Cambridge Archaeological Journal* 9/1, 43–69.

PARKER PEARSON, M., AND RICHARDS, C. (1994), 'Ordering the world: perceptions of architecture, space and time', in M. Parker Pearson and C. Richards, eds, *Architecture and Order: approaches to social space* (London: Routledge), 1–37.

PHILLIPS, M. (2005), 'Excavation of an early Saxon settlement at Pitstone', *Records of Buckinghamshire* 45, 1–32.

PHILP, B. (1973), *Excavations in West Kent 1960–1970: the discovery and excavation of prehistoric, Roman, Saxon and medieval sites, mainly in the Bromley area and in the Darent Valley*, Kent Series 2 (Dover Castle: Kent Archaeological Rescue Unit).

—— (1976), 'Excavations at Dover 1975', *Kent Archaeological Review* 45, 119–123.

PINE, J. (2001), 'The excavation of a Saxon settlement at Cadley Road, Collingbourne Ducis, Wiltshire', *Wiltshire Archaeological and Natural History Magazine* 94, 88–117.

PINE, J., AND FORD, S. (2001), 'Discussion [of Cadley Road, Collingbourne Ducis]', in PINE 2001, 114–115.

PINTER-BELLOWS, S. (1992), 'The vertebrate remains from sites 94 and 95 [at Wharram Percy]', in MILNE AND RICHARDS 1992, 69–79.

PLUSKOWSKI, A. (2011), 'The archaeology of paganism', in H. Hamerow, D. A. Hinton, and S. Crawford, eds, *The Oxford Handbook of Anglo-Saxon Archaeology* (Oxford: Oxford University Press), 764–778.

POLLARD, J. (1995), 'Inscribing space: formal deposition at the Later Neolithic monument of Woodhenge, Wiltshire', *Proceedings of the Prehistoric Society* 61, 137–156.

—— (2001), 'The aesthetics of depositional practice', *World Archaeology* 33/2, 315–333.

POLLINGTON, S. (2010), *The Meadhall: the feasting tradition in Anglo-Saxon England*, 2nd edition (Ely: Anglo-Saxon Books).

POOLE, C. (1995), 'Study 12: Pits and propitiation [at Danebury]', in CUNLIFFE 1995, 249–275.

POOLE, K. (2010*a*), 'Mammal and bird remains', in G. Thomas, *The Later Anglo-Saxon Settlement at Bishopstone: a downland manor in the making*, CBA Research Report 163 (York: Council for British Archaeology), 142–156.

—— 2010*b*, 'The nature of society in England, *c.* AD 410–1066', Ph.D. thesis, University of Nottingham.

POPE, R. (2007), 'Ritual and the roundhouse: a critique of recent ideas on the use of domestic space in later British prehistory', in C. Haselgrove and R. Pope, eds, *The Earlier Iron Age in Britain and the Near Continent* (Oxford: Oxbow Books), 204–228.

POWELL, A., AND CLARK, K. (2002), 'Animal bone', in FOREMAN *ET AL.* 2002, CD-ROM.

POWERS, R. (1979), 'Human bones [from Cheddar]', in RAHTZ 1979, 353.

—— (1985), 'Grave 1 [at West Stow]', in WEST 1985, 58–59.

POWLESLAND, D. (1990), 'Archaeological excavations 1987–1990: an interim report on the Anglo-Saxon village at West Heslerton, North Yorkshire', *Medieval Settlement Research Group* 5, 36–40.

—— (1997), 'Early Anglo-Saxon settlements, structures, form and layout', in J. Hines, ed., *The Anglo-Saxons from the Migration Period to the Eighth Century: an ethnographic perspective* (Woodbridge: Boydell Press), 101–124.

—— (1998), 'The West Heslerton Assessment', *Internet Archaeology* 5 [online journal] <http://intarch.ac.uk/journal/issue5/westhes_index.html>, accessed 21 March 2010.

POWLESLAND, D., *ET AL.*, forthcoming, *West Heslerton: the Anglian settlement* (Yedingham: Landscape Research Centre).

PRESTON, S. (2007), 'Bronze Age occupation and Saxon features at the Wolverton Turn Enclosure, near Stony Stratford, Milton Keynes: investigations by Tim Schadla-Hall, Philip Carstairs, Jo Lawson, Hugh Beamish, Andrew Hunn, Ben Ford and Tess Durden, 1972 to 1994', *Records of Buckinghamshire* 47/1, 81–117.

PRICE, E. (2000), *Frocester: a Romano-British settlement, its antecedents and successors,* i: *The sites* (Stonehouse: Gloucester and District Archaeological Research Group).

PRICE, N. S. (2002), *The Viking Way: religion and war in late Iron Age Scandinavia*, Aun 31 (Uppsala: Department of Archaeology and Ancient History).

PROCTOR, J. (2002), 'Late Bronze Age / Early Iron Age placed deposits from Westcroft Road, Carshalton: their meaning and interpretation', *Surrey Archaeological Collections* 89, 65–103.

PRYOR, F. (1987), 'Etton 1986: Neolithic metamorphoses', *Antiquity* 61, 78–80.

—— (1988), 'Etton, near Maxey, Cambridgeshire: a causewayed enclosure on the Fen-edge', in C. Burgess, *et al.*, eds, *Enclosures and Defences in the Neolithic of Western Europe*, part i, BAR International Series 403(i) (Oxford: B.A.R.), 107–126.

—— (1998), *Etton: excavations at a Neolithic causewayed enclosure near Maxey, Cambridgeshire, 1982–7*, English Heritage Archaeological Report 18 (London: English Heritage).

PRYOR, F., FRENCH, C., AND TAYLOR, M. (1985), 'An interim report on excavations at Etton, Maxey, Cambridgeshire, 1982–1984, *Antiquaries Journal* 65, 275–311.

R DEVELOPMENT CORE TEAM (2009), *R: a language and environment for statistical computing* (Vienna: R Foundation for Statistical Computing) <http://www.R-project.org>.

RACKHAM, J. (1988), 'Animal bones [at Church Close, Hartlepool]', in DANIELS 1988, 197–199.

RAHTZ, P. (1976), 'Gazetteer of Anglo-Saxon domestic settlement sites', in D. M. Wilson, ed., *The Archaeology of Anglo-Saxon England* (London: Methuen & Co Ltd), 405–452.

—— (1979), *The Saxon and Medieval Palaces at Cheddar: excavations 1960–62*, BAR British Series 65 (Oxford: B.A.R.).

RAHTZ, P., AND WATTS, L. (2004), *Wharram: a study of settlement on the Yorkshire Wolds*, ix: *The North Manor Area and North-west Enclosure*, York University Archaeological Publications 11 (York: York University).

RAVN M. (1999), 'Theoretical and methodological approaches to Migration Period burials', in M. Rundkvist, ed., *Grave Matters: eight studies of first millennium AD burials in Crimea, England and southern Scandinavia: papers from a session held at the European Association of Archaeologists Fourth Annual Meeting in Göteborg 1998*, BAR International Series 781 (Oxford: Archaeopress), 41–57.

REYNOLDS, A. (2003), 'Boundaries and settlements in later sixth to eleventh-century England', *Boundaries in Early Medieval Britain: Anglo-Saxon Studies in Archaeology and History* 12, 98–136.

—— (2006), 'The early medieval period', in N. Holbrook and J. Juřica, eds, *Twenty-five Years of Archaeology in Gloucestershire: a review of new discoveries and new thinking in Gloucestershire, South Gloucestershire and Bristol, 1979–2004*, Bristol and Gloucestershire Archaeological Report 3 (Cirencester: Cotswold Archaeology), 133–160.

—— (2009), *Anglo-Saxon Deviant Burial Customs*, Medieval History and Archaeology (Oxford: Oxford University Press).

RICHARDS, C., AND THOMAS, J. (1984), 'Ritual activity and structured deposition in Later Neolithic Wessex', in R. Bradley and J. Gardiner, eds, *Neolithic Studies: A Review of Some Current Research*, BAR British Series 133 and Reading Studies in Archaeology 1 (Oxford: B.A.R.), 189–218.

RICHARDS, J. D. (1992), 'Sites 94 and 95 [at Wharram Percy]', in MILNE AND RICHARDS 1992, 82–85.

—— (1999), 'Cottam: an Anglian and Anglo-Scandinavian settlement on the Yorkshire Wolds', *Archaeological Journal* 156, 1–110.

RICHARDSON, J. E. (1997), 'Economy and ritual: the use of animal bone in the interpretation of the Iron Age to Roman cultural transition', in K. Meadows, C. Lemke and J. Heron, eds, *TRAC 96: Proceedings of the Sixth Annual Theoretical Roman Archaeology Conference* (Oxford: Oxbow Books), 82–90.

RICKETT, R. (1995), *The Anglo-Saxon Cemetery at Spong Hill, North Elmham,* part vii: *The Iron Age, Roman and early Saxon settlement*, East Anglian Archaeology Report 73 (Gressenhall: Field Archaeology Division, Norfolk Museums Service).

RIDDLER, I., AND TRZASKA-NARTOWSKI, N. (2011), 'Chanting upon a dunghill: working skeletal materials', in M. C. Hyer and G. R. Owen-Crocker, eds, *The Material Culture of Daily Living in the Anglo-Saxon World* (Exeter: University of Exeter Press), 116–141.

ROBERTS, T. (2005), 'Animal bone [from Gamlingay]', in MURRAY WITH MCDONALD 2005, 246–248.

ROBERTSON, D. (2003), 'A Neolithic enclosure and early Saxon settlement: excavations at Yarmouth Road, Broome, 2001', *Norfolk Archaeology* 44/2, 222–250.

—— (2004), 'Neolithic, Bronze Age, Iron Age, early Saxon and medieval activity in the Norfolk Breckland: excavations at Grange Farm, Snetterton, 2002', *Norfolk Archaeology* 44/3, 482–521.

RODWELL, W. (2008), '2003 excavations', in RODWELL *ET AL.* 2008, 52–60.

RODWELL, W. *ET AL.* (2008), 'The Lichfield Angel: a spectacular Anglo-Saxon painted sculpture', *Antiquaries Journal* 88, 48–108.

ROYAL COMMISSION ON THE ANCIENT AND HISTORICAL MONUMENTS OF SCOTLAND (1997), *Eastern Dumfriesshire: an archaeological landscape* (Edinburgh: The Stationery Office).

ROYCROFT, N. (2008), 'Site J: Mortlake (Surrey)', in COWIE AND BLACKMORE 2008, 50–54.

RUMBLE, A. R. (1983), 'The historical and onomastic evidence [for Cowdery's Down, Basingstoke]', in MILLETT WITH JAMES 1983, 263–271.

SAPWELL, M., AND SPRY-MARQUÉS, V. P. (2010), 'Introduction', *Archaeological Review from Cambridge* 25/2, 1–7.

SCHIFFER, M. B. (1972), 'Archaeological context and systemic context', *American Antiquity* 37/2, 156–165.

—— (1976), *Behavioral Archeology* (New York: Academic Press).

—— (1987), *Formation Processes of the Archaeological Record* (Albuquerque: University of New Mexico Press).

SCULL, C. (1991), 'Post-Roman phase I at Yeavering: a re-consideration', *Medieval Archaeology* 35, 51–63.

—— (2009), 'The human burials [at Bloodmoor Hill, Carlton Colville]', in LUCY *ET AL.* 2009, 385–426.

SEETAH, K. (2005), 'Butchery as a tool for understanding the changing view of animals: cattle in Roman Britain', in A. Pluskowski, ed., *Just Skin and Bones? New perspectives on human–animal relations in the historical past*, BAR International Series 1410 (Oxford: Archaeopress), 1–8.

SEMPLE, S. (2011), 'Sacred spaces and places in pre-Christian and Conversion period Anglo-Saxon England', in H. Hamerow, D. A. Hinton, and S. Crawford, eds, *The Oxford Handbook of Anglo-Saxon Archaeology* (Oxford: Oxford University Press), 742–763.

SERJEANTSON, D., WITH GARDINER, J. (1995), 'Red deer antler implements and ox scapula shovels', in CLEAL *ET AL.* 1995, 414–430.

SERPELL, J. (1996), *In the Company of Animals: a study of human–animal relationships*, revised edition (Cambridge: Cambridge University Press).

SHARPLES, N. (1999), 'Place, house, person' [in dialogue with GERRITSEN 1999*a*], *Archaeological Dialogues* 6, 104–107.

SHEPPARD, T. (1939), 'Viking and other relics at Crayke, Yorkshire', *Yorkshire Archaeological Journal* 34, 273–281.

SINDBÆK, S. (2007), 'Trade and exchange, part 2: Northern Europe', in J. Graham-Campbell and M. Valor, eds, *The Archaeology of Medieval Europe*, i: *Eighth to Twelfth Centuries AD*, Acta Jutlandica 83/1, Humanities Series 79 (Aarhus: Aarhus University Press), 302–315.

SLOANE, B. (2008), 'Site D: Clerkenwell (Middlesex), in COWIE AND BLACKMORE 2008, 19–22.

SODEN, I. (1998), 'A story of urban regeneration: excavations in advance of development off St Peter's Walk, Northampton, 1994–7', *Northamptonshire Archaeology* 28, 61–127.

SPALL, C. A. AND TOOP, N. J. (2008), 'Before *Eoforwic*: new light on York in the 6th–7th centuries', *Medieval Archaeology* 52, 1–25.

SPAREY-GREEN, C. (1987), *Excavations at Poundbury, Dorchester, Dorset 1966–1982,* i: *The settlements*, Dorset Natural History and Archaeological Society Monograph Series 7 (Dorchester: Dorset Natural History and Archaeological Society).

SPOERRY, P., AND HINMAN, M. (2007), 'Early Saxon and medieval remains adjacent to the round moat, Fowlmere', *Proceedings of the Cambridge Antiquarian Society* 96, 135–142.

STAMPER, P. A., AND CROFT, R. A. (2000), *Wharram: a study of settlement on the Yorkshire Wolds*, viii: *The South Manor Area*, York University Archaeological Publications 10 (York: University of York).

STANSBIE, D., 2008, 'Brooklands, Milton Keynes: post-excavation assessment and updated project design', unpublished report, Oxford Archaeology.

STEEDMAN, K. (1994), 'Excavation of a Saxon site at Riby Cross Roads, Lincolnshire', *Archaeological Journal* 151, 212–306.

STOODLEY, N. (1999*a*), 'Burial rites, gender and the creation of kingdoms,' *Anglo-Saxon Studies* 10, 99–107.

—— (1999*b*), *The Spindle and the Spear: a critical enquiry into the construction and meaning of gender in the early Anglo-Saxon burial rite*, BAR British Series 288 (Oxford: John and Erica Hedges).

—— (2000), 'From the cradle to the grave: age organization and the early Anglo-Saxon burial rite', *World Archaeology* 31/3, 456–472.

STRID, L. (2008), 'Animal bone', in STANSBIE 2008, 71–75.

SUTTON, M. (1978), 'Animal bone [from Brentford]', in CANHAM 1978, 139–146.

SYKES, N. (2007), 'The animal bone [from Wolverton Turn Enclosure]', in PRESTON 2007, 103–109.

—— (2011), 'Woods and the wild', in H. Hamerow, D. A. Hinton, and S. Crawford, eds, *The Oxford Handbook of Anglo-Saxon Archaeology* (Oxford: Oxford University Press), 327–345.

TAYLOR, C. (1985), *Human Agency and Language* (Cambridge: Cambridge University Press).

TAYLOR, G. (2003*a*), 'An early to middle Saxon settlement at Quarrington, Lincolnshire', *Antiquaries Journal* 83, 231–280.

—— (2003*b*), 'Hall Farm, Baston, Lincolnshire: investigation of a late Saxon village and medieval manorial complex', *Lincolnshire History and Archaeology* 38, 5–33.

TESTER, A. (2002), 'Eriswell, RAF Lakenheath (ERL 116)', *Proceedings of the Suffolk Institute of Archaeology and History* 40, 221.

——, 2006, 'RAF Lakenheath, New Dental Clinic, ERL 101: a report on the archaeological excavations, 2001/2', internal report, Suffolk County Council Archaeological Service.

THOMAS, G. (2008), 'The symbolic lives of late Anglo-Saxon settlements: a cellared structure and iron hoard from Bishopstone, East Sussex', *Archaeological Journal* 165, 334–398.

—— (2010), *The Later Anglo-Saxon Settlement at Bishopstone: a downland manor in the making*, CBA Research Report 163 (York: Council for British Archaeology).

—— (2011), 'Bishopstone and Lyminge', *British Archaeology* 119 (July August 2011), 42–47.

TIMBY, J. (1996), 'The pottery [from Mill Street, Wantage]', in HOLBROOK AND THOMAS 1996, 131–147.

—— (2001), 'Pottery [from Cadley Road, Collingbourne Ducis]', in PINE 2001, 96–102.

TIPPER, J. (2004), *The Grubenhaus in Anglo-Saxon England: an analysis and interpretation of the evidence from a most distinctive building type*, Landscape Research Centre Archaeological Monograph Series 2 (Yedingham, North Yorkshire: The Landscape Research Centre).

—— (2009), 'Pottery [from Bloodmoor Hill, Carlton Colville]', in LUCY *ET AL.* 2009, 202–243.

TRIMBLE, G. (2004), 'An early Anglo-Saxon settlement at Bishee [*sic*] Barnabee Way, Bowthorpe: excavations 2001', *Norfolk Archaeology* 44/3, 525–535.

TURNER, V. (1980), 'Social dramas and stories about them', *Critical Inquiry* 7/1, 141–168.

—— (2008 [1969]), *The Ritual Process: structure and anti-structure* (London: Aldine Transaction).

TYMMS, S. (1853), 'Anglo-Saxon relics from West Stow Heath', *Proceedings of the Suffolk Institute of Archaeology* 1, 315–328.

UCKO, P. J. (1969), 'Ethnography and archaeological interpretation of funerary remains', *World Archaeology* 1/2, 262–280.

ULMSCHNEIDER, K. (2011), 'Settlement hierarchy', in H. Hamerow, D. A. Hinton, and S. Crawford, eds, *The Oxford Handbook of Anglo-Saxon Archaeology* (Oxford: Oxford University Press), 156–171.

UPEX, S. G., 2003, 'A Migration Period site at Polebrook, Northamptonshire: surveys and excavations up to 2002', unpublished report.

——, 2004, 'A Migration Period site at Polebrook, Northamptonshire: excavations during 2003', unpublished report.

——, 2005, 'A Migration Period site at Polebrook, Northamptonshire: excavations on Bronze Age and Migration Period features during 2004', unpublished report.

——, 2006, 'A Migration Period site at Polebrook, Northamptonshire: excavations on Bronze Age and Migration Period features during 2005', unpublished report.

VAN GENNEP: *see* GENNEP.

VELLINGA, M. (1999), 'Merits and limits of the biographic approach' [in dialogue with GERRITSEN 1999*a*], *Archaeological Dialogues* 6, 98–101.

VENABLES, W. N. AND RIPLEY, B. D. (2002), *Modern Applied Statistics with S*, fourth edition (New York: Springer).

WADE, K. (1980), 'A settlement site at Bonhunt Farm, Wicken Bonhunt, Essex', in D. G. Buckley, ed., *Archaeology in Essex to AD 1500*, Research Report 34 (London: Council for British Archaeology), 96–102.

WADE-MARTINS, P. (1980), *Excavations in North Elmham Park 1967–1972*, 2 vols, East Anglian Archaeology Report 9 (Gressenhall: Norfolk Archaeological Unit, Norfolk Museums Service).

WAIT, G. A. (1985), *Ritual and Religion in Iron Age Britain*, 2 vols, BAR British Series 149 (Oxford: B.A.R.).

WALDRON, T. (2005), 'Human bone [from Gamlingay]', in MURRAY WITH MCDONALD 2005, 242–245.

WALKER, L. (1984), 'The deposition of human remains [at Danebury]', in CUNLIFFE 1984, 442–463.

WEBLEY, L. (2007), 'Prehistoric, Roman and Saxon activity on the Fen hinterland at Parnwell, Peterborough', *Proceedings of the Cambridge Antiquarian Society* 96, 79–114.

WEBSTER, L. (2003), 'Encrypted visions: style and sense in the Anglo-Saxon minor arts', in C. E. Karkov and G. H. Brown, eds, *Anglo-Saxon Styles* (Albany: State University of New York), 11–30.

—— (2011), 'Style: influences, chronology, and meaning', in H. Hamerow, D. A. Hinton, and S. Crawford, eds, *The Oxford Handbook of Anglo-Saxon Archaeology* (Oxford: Oxford University Press), 460–500.

WEBSTER, L., AND CHERRY, J. (1972), 'Medieval Britain in 1971', *Medieval Archaeology* 16, 147–212.

—— (1977), 'Medieval Britain in 1976', *Medieval Archaeology* 21, 204–262.

WEBSTER, L., *ET AL.* (2011), 'The Staffordshire (Ogley Hay) hoard: problems of interpretation', *Antiquity* 85, 221–229.

WELCH, M. (2011), 'The mid Saxon "Final Phase"', in H. Hamerow, D. A. Hinton, and S. Crawford, eds, *The Oxford Handbook of Anglo-Saxon Archaeology* (Oxford: Oxford University Press), 266–287.

WELLS, J. (2005), 'The artefacts [from Pitstone]', in PHILLIPS 2005, 10–19.

WEST, S. (1985), *West Stow, the Anglo-Saxon Village*, 2 vols, East Anglian Archaeology 24 (Ipswich: Suffolk County Planning Department).

WESTERDAHL, C. (2005), 'Seal on land, elk at sea: notes on and applications of the ritual landscape at the seaboard', *International Journal of Nautical Archaeology* 34/1, 2–23.

WHEELER, H. (1979), 'Excavation at Willington, Derbyshire, 1970–1972', *Derbyshire Archaeological Journal* 99, 58–220.

WHIMSTER, R. (1981), *Burial Practices in Iron Age Britain: a discussion and gazetteer of the evidence c. 700 B.C.–A.D. 43*, 2 vols, BAR British Series 90(i–ii) (Oxford: B.A.R.).

WHITTLE, A. (1999), 'The Neolithic period', in J. Hunter and I. Ralston, eds, *The Archaeology of Britain: an introduction from the Upper Palaeolithic to the Industrial Revolution* (London: Routledge), 58–76.

WILKINSON, L. (1980), 'Problems of analysis and interpretation of skeletal remains', in P. Rahtz, T. Dickinson, and L. Watts, eds, *Anglo-Saxon Cemeteries 1979: the fourth Anglo-Saxon symposium at Oxford*, BAR British Series 82 (Oxford: B. A. R.), 221–231.

WILLIAMS, H. (1998), 'Monuments and the past in early Anglo-Saxon England', *World Archaeology* 30/1, 90–108.

—— (2001), 'An ideology of transformation: cremation rites and animal sacrifice in early Anglo-Saxon England', in N. Price, ed., *The Archaeology of Shamanism* (London: Routledge), 193–212.

—— (2004), 'Death warmed up: the agency of bodies and bones in early Anglo-Saxon cremation rites', *Journal of Material Culture* 9/3, 263–291.

—— (2005), 'Animals, ashes, and ancestors', in A. Pluskowski, ed., *Just Skin and Bones? New perspectives on human–animal relations in the historical past*, BAR International Series 1410 (Oxford: Archaeopress), 19–40.

WILLIAMS, R. J. (1993), *Pennyland and Hartigans: Two Iron Age and Saxon Sites in Milton Keynes*, Buckinghamshire Archaeology Society Monograph Series 4 (Aylesbury: Buckinghamshire Archaeological Society).

WILLIS, S. (1997), 'Samian: beyond dating', in K. Meadows, C. Lemke and J. Heron, eds, *TRAC 96: Proceedings of the Sixth Annual Theoretical Roman Archaeology Conference* (Oxford: Oxbow Books), 38–54.

WILSON, B. (1996), *Spatial Patterning among Animal Bones in Settlement Archaeology: an English regional exploration*, BAR British Series 251 (Oxford: Tempus Reparatum).

WILSON, C. E. (1981), 'Burials within settlements in southern Britain during the pre-Roman Iron Age', *Bulletin of the Institute of Archaeology, University of London* 18, 127–169).

WILSON, D. (1992), *Anglo-Saxon Paganism* (London: Routledge).

WILSON, P. R., *ET AL.* (1996), 'Early Anglo-Saxon Catterick and *Catraeth*', *Medieval Archaeology* 40, 1–61.

WITKIN, A. (2007), 'Human skeletal remains [at Higham Ferrers]', in HARDY *ET AL.* 2007, 140–145.

WOODWARD, A., AND HUGHES, G. (2007), 'Deposits and doorways: patterns within the Iron Age settlement at Crick Covert Farm, Northamptonshire', in C. Haselgrove and R. Pope, eds, *The Earlier Iron Age in Britain and the Near Continent* (Oxford: Oxbow Books), 185–203.

WRIGHT, J. (2004), 'Excavation of early Saxon settlement and Mesolithic activity at Goch Way, near Charlton, Andover', *Proceedings of the Hampshire Field Club and Archaeological Society* 59, 116–138.

YATES, F. (1934), 'Contingency tables involving small numbers and the χ^2 test', *Supplement to the Journal of the Royal Statistical Society* 1/2, 217–235.

YORKE, B. (1990), *Kings and Kingdoms of Early Anglo-Saxon England* (London: Seaby).

YOUNG, J. (2009), 'Overview of the Saxon and Saxo-Norman pottery (with characterisation studies) [at Baldwin Avenue, Bottesford]', in BOYER *ET AL.* 2009, 69–73.

ZERUBAVEL, E. (1991), *The Fine Line: making distinctions in everyday life* (New York: Free Press).

Personal communications

Atkinson, M., Manager, Essex County Council Field Archaeology Unit.

Hardy, A., formerly of Oxford Archaeology.

Laws, G., Project Officer, Oxford Archaeology.

Ljungkvist, J., Department of Archaeology and Ancient History, Uppsala University.

Mepham, L., Senior Manager, Wessex Archaeology.

Nicholls, G., Fellow and Tutor in Statistics, St Peter's College, Oxford.

O'Brien, L., Senior Cultural Heritage Consultant, URS Infrastructure & Environment UK.

Thomas, G., Lecturer in Archaeology, University of Reading.