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FRACTURED BRITANNIA

THE TWILIGHT OF ROMAN BRITAIN

Richard Henry

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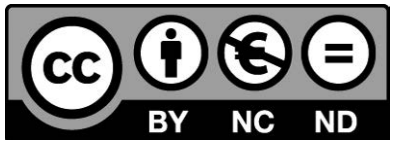

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Introduction

This book is an in-depth study of the distribution of coinage and elite items of dress in later and sub-Roman Britain. It builds on previous research on the end of Roman Britain by the author looking at a range of numismatic and artefactual evidence on a regional scale (Henry, 2018b; Henry, 2018a; Henry, 2020b; Henry, 2021a; Henry and Moorhead, 2022) or a national scale (Henry, 2022b; Crummy and Henry, 2024; Henry, 2024c)

The Later Roman world was markedly different from the Principate, as the distinct categories of legionaries and auxilia, and military and civilian, had long since dissolved. Troops were now divided into frontier troops (*limitanei*) and a mobile field army (the *comitatenses*), but identifying them in the archaeological record is notoriously difficult.

Division between military and civilian are problematic too. The military and bureaucracy were merged. Both groups ranked as soldiers and used the same objects to denote their status. Similarly, the local elite, responsible for much of the day-to-day administration of the diocese of Britain, begin to adopt military fashions, leading to an evolution of dress accessories throughout the fourth century.

This book aims to collate and explore the extensive datasets now available, extracting patterns within various forms of material culture associated with soldiers, officials, or high-status local elites, as well as coinage, which reflected the tax system, economic control and engagement with the state. Different denominations performed different roles with gold and silver used for pay and taxation. Base metal coins were used by the rural population as part of the process of converting agricultural surplus into tax. While many of these datasets have been studied in isolation, this study seeks to examine them systematically in combination and make the datasets publicly accessible. It will highlight the value of utilising big data and the opportunities it provides that enables us to engage with the material from a new perspective.

The objects examined serve as key markers of late Roman status and identity. Many remained in use for decades, even when damaged, highlighting their enduring influence. This longevity offers valuable insights into the social and political shifts of the fifth century. The evidence suggests regional variation: while some areas maintained Roman material culture well into the fifth century, others abandoned it as early as AD 375.

These patterns can be better understood through the lens of "ethnic boundary change." This term was first coined in 1969 by Fredrik Barth and is better described as the changing boundaries which relate to the wider concept of identity. Crucially, ethnic boundary change does not solely concern the ethnicity of an individual; rather, it refers to the broader, often fluid, processes by which group identities are maintained, negotiated, or transformed over time

In some cases, an endogenous shift occurred, where communities gradually moved away from Roman identities, either by choice or necessity, as imperial structures weakened. In contrast, in other regions, exogenous drift introduced new cultural influences, with communities selectively adopting external practices, whether through contact with incoming groups or evolving local power dynamics. A systematic evaluation of these processes, alongside an analysis of late Roman power structures, provides fresh perspectives on Britain's transformation from an integrated Roman diocese to smaller post-Roman polities. Rather than a sudden rupture, the evidence points to a complex, regionally varied transition shaped by both internal decisions and external pressures.

This study consists of four sections:

Chapters 1-2 introduces the period and the ways in which it has been interpreted. It provides a brief outline of the history of Roman Britain and the key events of the later fourth and fifth centuries. It then evaluates various historical and archaeological interpretations, focusing on the conceptual frameworks used to understand the transition from Roman rule.

A key theoretical approach in this study is ethnic boundary change, which has been viewed as a flexible concept that must be tailored to specific social and historical contexts (Wimmer, 2013). Applying this to late Roman Britain allows for a broader discussion of how different groups navigated the fragmentation of imperial authority, the collapse of the coin using economy and developed new identities (or modified them), political structures. These shifts were not uniform—some regions experienced endogenous change, where communities redefined their identities from within, while others underwent exogenous drift, adopting new strategies and influences from external sources potentially as early as the 370s.

To ground this theoretical framework, Chapter 3 briefly introduces the structures of the late Roman state in the Diocese of Britain. It explores key aspects such as taxation, major urban centres, and rural economies, identifying the principal actors involved in governance and economic administration. This is followed by a critical assessment of how previous studies have utilised similar datasets to interpret the dissolution of Roman power and the emergence of post-Roman polities.

This study seeks to address four key research questions: Can we establish a connection between particular objects and the Roman state? Can we identify different officials? Was Britain fully integrated into the empire at the turn of the fifth century? And how did different regions disengage from the empire?

Chapters 4-6 focus in on material culture, the aims and objects of this study and the methodology. It considers how those linked with the later Roman state used material culture and specific forms of clothing to highlight their status. While textiles survive poorly in Britain, we have an increasing corpus of objects such as crossbow brooches, fittings from the military belt, spurs and penannular brooches which have all been linked with state officials or the military. The concept of identity is crucial to this study as these objects were used by different individuals to project status and various avowed and ascribed identities within the context of the later Roman world.

The core analysis of these later Roman dress accessories occurs in Chapters 7-12. It commences with an evaluation of the methodologies which have been employed to assess a diverse array of artefacts and currency from Roman Britain, and questions about how issues of chronology running into the fifth century have been tackled. The subsequent chapters then deal with each type of material culture in turn: crossbow brooches (Chapter 7), The *cingulum militare* and associated fittings (Chapter 8), spurs (Chapter 9), penannular brooches (Chapter 10) and then coinage (Chapters 11-12). The structure of each is similar, reviewing existing typologies and revising them if necessary; detailing how each of the individual corpora has been collated (each of which represents a considerable enlargements of the datasets currently available); and then a detailed analysis of geographic and site category distributions of each form of material, pulling out key patterning in the data.

Finally, Chapters 13-15 provides the synthesis and the conclusion. The first chapter in this section (Chapter 13) provides an overview, drawing together all the individual analyses of different types of material culture and coinage to provide a chronological and geographic framework for making this mass of data manageable. The second chapter (Chapter 14) delves into the differential use of material on different types of sites (forts, towns, rural etc.) to consider whether material can be associated with specific different roles in Later Roman society, and how this compared to patterns on the continent. The third chapter (Chapter 15) then focuses on the fifth century and how Roman Britain was transformed into the sub-Roman early-medieval world. This considers Roman and fifth century material linked with various incoming Germanic groups, which while problematic is described here in its broadest sense as Anglo-Saxon to enable comparison (Louviot, 2020). The final conclusions summarises some of the key results and also points to various future avenues of research.

The datasets studied in detail will be made freely available on ADS - https://doi.org/10.5284/1106784, https://doi.org/10.5284/1090416 and an interactive map developed by Maploom - https://romanfinds.maploom.com/info

1. A Brief Outline of the History of Late Roman Britain

The diocese of Britain occupied a peripheral position in the vast expanse of the Roman Empire, resulting in a scarcity of historical evidence available for reconstructing events. Despite the limited nature of this evidence, scholars have crafted a historical narrative that often frames the general perception of a diocese under threat. However, given the paucity of the available evidence, it is unsurprising that many pivotal events in Britain remain contentious.

The fragments of evidence that survive about events in Britain highlights its relative insignificance to many of the events preoccupying the heartland of the empire. As this study looks to undertake a unified study of artefactual and numismatic analysis much of the heated debates about the reliability and validity of the various sources and their reliability falls outside the scope of this research. The events will briefly be detailed here as previous research has used these ancient sources to frame archaeological evidence such as linking archaeological evidence with the Barbarian conspiracy of AD 367 (Table 1.1).

The recorded events have been used to create a narrative that highlights fear, insecurity, threats, and turmoil starting from the mid-fourth century which is dominated by Emperors and battles (such as: Faulkner, 2000; Mattingly, 2007) - leaving much else in the darkness. Some of the most recent archaeological syntheses have contested these narratives, suggesting that they should not be unquestioningly accepted (such as: Esmonde Cleary, 1989; Gerrard, 2013). Instead they have tended to focus on the social and political transformations that took place, rather than relying solely on historical evidence. In the following section, we will explore the three main narrative approaches which have been developed to analyse the chronology of the end of Roman Britain.

Date	Event	Primary sources and recent debates
AD 354	After defeating the usurper Magnentius Constantius II dispatched Paulus Catena (Paul the Chain), to Britain to eliminate the remaining supporters of Magnentius. The envoy's extreme methods ultimately provoked the *vicarius* of Britain to attempt to assassinate Paulus before ultimately taking his own life.	(Amm. Marc. Res Gestae XIV.V; Lenski, 2002).
AD 355-360	In AD 355 Constantius II appointed his orphaned cousin, Julian, to take charge of Gaul as a Caesar of the West. After several years of campaigning along the Rhine, in the winter of 360, Julian dispatched his *magister equitum*, Lupicinus (a stanch supporter of Constantius II), to Britain in response to an attack by the Picts and Scots. While Lupicinus was in Britain, Julian was proclaimed as Augustus by his troops in Paris.	(Amm. Marc. Res Gestae XX.I; Esmonde Cleary, 1989, 44; Gerrard, 2013, 21).
AD 367	After the death of Julian in AD 363 and Jovian in AD 364 control of the Empire then passed to Valentinian I and his brother Valens. Their father Gratian had served as *comes* in Britain. In AD 367, while launching a raid against the Alamanni, Valentinian was distracted by a coordinated assault on Britain which was orchestrated by warbands consisting of Picts, Attacotti, Scotti, and Saxons. After two years the diocese was successfully restored by Count Theodosius.	(Amm. Marc. Res Gestae XXVII.VIII and XXVII.VIII; Tomlin, 1973; Frere, 1978; Southern and Dixon, 1996; Birley, 2005; Mattingly, 2007; Gerrard, 2013; Collins and Breeze, 2014).
AD 382	The *comes* Magnus Maximus achieved a significant victory over the Picts, the following year he rebelled against Gratian and was proclaimed emperor by his troops. Gratian responded by marching towards Paris to deal with the usurper, but his army deserted him, and he was later murdered.	(G.C.452; Zosi. Hist. Nov. IV.XXXV.II-VI ; Curran, 1997; Collins and Breeze, 2014).
390s	The Imperial Court poet Claudian offers some hints that further campaigns in Britain might have occurred in the 390s based on references within his panegyrics.	(Claud. De. Con. Stil; Gerrard, 2013).

Date	Event	Primary sources and recent debates
AD 405	On the last day of either AD 405 or 406, a large group of barbarians crossed the Rhine leading to the collapse of the frontier and significant transformations on the continent. Around AD 407, Trier was captured, and the Praetorian Prefect relocated to Arles.	(Zosi. Hist. Nov. VI.III.I; Blockley, 1997; Esmonde Cleary, 2013; Collins and Breeze, 2014)
	The collapse of the Rhine frontier combined with the Italy-centred policy led to the military and provincial aristocracy in Britain supporting three consecutive contenders for the imperial throne in rapid succession: Marcus, Gratian, and Constantine III. Constantine III withdrew troops from Britain to launch an expedition to the continent. While he initially achieved some success, even being acknowledged as co-emperor by Honorius, by AD 411 he found himself besieged at Arles, where he was ultimately captured and executed.	(Zosi. Hist. Nov. VI.III; Proc. De Bellis 3.II.31-38; Esmonde Cleary, 1989; Blockley, 1997).
AD 409	The people of Britain rose up, armed themselves, and liberated the cities from the threat of barbarians, expelling Roman officials in the process – presumably the officials of Constantine III.	(Zosi. Hist. Nov. VI.V; Eagles, 2018, 13).
AD 410-411	Saxon raids devastated the diocese.	(G.C. 452; Zosi. Hist. Nov. VI.V.III).
AD 410	The emperor Honorius sends a rescript to the cities of Britain instructing them to defend themselves.	(Zosi. Hist. Nov. VI.V.III; Godefroy, 1665; Matthews, 1975; Thompson, 1977; Bartholomew, 1982; Thompson, 1982; Esmonde Cleary, 1989, 169; Blockley, 1997; Knight, 2014).
AD 418	The Romans collected all their treasures in Britain and hid some in the earth.	(Bland, 2018; Bland *et al.*, 2020)
AD 429	St Germanus of Auxerre visited Britain to combat the Pelagian conspiracy.	(Cons. Vit. Ger.)
AD 441/442	Britain finally fell to Saxon rule.	(G. C. 452; Muhlberger, 1983; Jones and Casey, 1988; Muhlberger, 1990, 179; Muhlberger, 1992, 34).

2. Varying Lenses: Academic Reflections on the End of Roman Britain

The Decline and Fall of the Roman Empire by Edward Gibbon has had a lasting impact on our interpretation of the later Roman Empire and the collapse of Roman Britain. Gibbon's aim was to unravel the reasons behind the sudden collapse of a once-powerful state, tracing the trajectory from the Golden Age of the second-century Principate to the downfall of the Western Roman Empire. He emphasised factors such as civil war, oppressive governance, the rise of Christianity, and barbarian invasions. Such historical narrative continues to resonate in popular culture and shapes our approach to periods of societal transformation (Pop, 1995; Rogers, 2011).

While the concept of decline and fall was present in ancient literature, Gibbon's portrayal of ancient Rome is informed by retrospective analysis. His perspective was shaped by his own world view, framed by the contemporary threats to the 'First British Empire' (Simms, 2008). His interpretation ultimately reflects his preconceived notions and concept of civilisation (Rogers, 2011, 18).

The concept of decline and fall, which has been prevalent in many popular publications regarding the Late Antique world, has undergone significant re-evaluation since the mid-twentieth century. Scholars such as A.H.M. Jones, in *The Later Roman Empire*, and Peter Brown, with *The World of Late Antiquity*, have played a crucial role in reshaping our understanding of this period. Instead of concentrating on political-military history, they refocused their narratives on governance and social aspects.

In Britain, a key development which accelerated the gathering of new archaeological data was the implementation of Planning Policy Guidance 16 (PPG16) in 1990 which created opportunities for extensive excavation and research. This influx of fresh data has provided researchers with unprecedented insights into various aspects of Roman Britain, including its settlements, infrastructure, material culture, and socio-economic dynamics (Mattingly, 2007; Taylor, 2007; Smith *et al.*, 2016; Allen *et al.*, 2017; Smith *et al.*, 2018).

The wealth of data recorded by Historic Environment Records across Britain, the introduction of PPG16 in 1990, the Treasure Act in 1996, and the establishment of the Portable Antiquities Scheme (PAS) in 1997 to document the extensive material recovered through metal detecting have led to a significant increase in the volume of data available to researchers. This, in turn, has facilitated a range of national research projects and syntheses include those looking at material culture (Such as: Walton, 2012, for coins; Bland *et al.*, 2020, for coin hoards), the landscape (Rippon *et al.*, 2015; Godsen *et al.*, 2021) and settlement (Taylor, 2007; Smith *et al.*, 2016; Allen *et al.*, 2017; Smith *et al.*, 2018).

The increase in available data has undoubtedly brought significant advancements for archaeology, yet certain issues continue to pose challenges for the later fourth and fifth centuries. The cessation of coinage supply and the absence of Romano-British material culture production, particularly pottery, in the fifth century have had a profound impact on how the end of Roman Britain is understood and presented (Gerrard, 2014, 89; Moorhead and Walton, 2014, 103ff). Stratigraphic sequences containing late Roman material culture have been utilised to argue for the prolonged use of urban centres well into the fifth century. However, the absence of material culture that can be reliably dated to the fifth century has sparked intense debates regarding the duration of these sequences.

This scarcity of evidence has enabled the development of diverse, contrasting interpretations and lively debate. Some narratives envision a sense of continuity, suggesting that life persisted with the continued use of existing objects for an extended period. On the other hand, alternative narratives propose a dramatic and sudden collapse, portraying a scenario where everything came to an abrupt end. Others prefer to project onto the evidence the idea of a gradual transition into the sub-Roman and Anglo-Saxon world. In the following sections, the three main narrative themes will be considered in turn.

Narrative approach 1: Continuity of *Romanitas*

The term 'continuity' is a complex and multifaceted concept that requires careful consideration when used in the context of studying the fourth and fifth centuries. Its usage can lead to ambiguity. In this context, continuity goes beyond the ongoing occupation of a site, the crucial element is the continuation of Roman socio-economic and institutional patterns – *Romanitas*

(Burnham and Wacher, 1990; Dark, 1994; Burnham, 1995).

The exploration of the question of continuity has undergone significant evolution over time. At the start of the fifth century at first glance we see a chronological gap where material culture linked with the Roman period ends c. AD 400 and Anglo-Saxon England beginning c. AD 450. Simon Esmonde Cleary (2014, 2-6) and Gerrard (2013, 1) has argued that until the 1970s, discussion centred on seeking evidence of overlap, searching for indications of an Anglo-Saxon presence in late Roman Britain, or pointing to evidence of the persistence of *Romanitas* into the sixth or seventh century. Arguments supporting continuity, especially in the West and South-west of Britain, have generally relied on a combination of archaeological evidence and the examination of surviving post-Roman historical sources (Dark, 1994; Dark, 2000; White, 2007).

Archaeological sequences at several Roman centres have been examined as potential evidence for the continuation of 'urban' life well into the fifth century. In the South-east, Verulamium was one of the earliest cases where this was argued. Frere's excavations of a house in Insula XXVII pointed to the presence of fresh mains water supply as evidence that the town's aqueduct and water fountains remained in use well into the fifth century (Frere, 1978, 420-21). The importance of this house has long been debated. Of the 13 houses excavated in the insula it is the only example with a well-defined long chronology. Consequently, it has been viewed as the exception rather than the rule and therefore not representative of the site as a whole (Reece, 1980; Esmonde Cleary, 1989, 149; Faulkner, 2000, 175; Faulkner and Reece, 2002; Neal, 2003). The long chronology of the building has also been questioned (Faulkner and Reece, 2002; Neal, 2003; Cosh and Neal, 2015), which was later challenged and rebutted (Frere and Witts, 2011).

Further archaeological sequences with long chronologies have been identified at Binchester, Housesteads and Birdoswald which it has been argued demonstrates Roman construction techniques extended well into the fifth century (Ferris and Jones, 2000, 2; Wilmott, 2000, 13-14; Fleming, 2021, 101). While such sequences have been used to argue the case for continued activity into the fifth century, the evidence remains equivocal.

In the West of England, archaeological sequences at Wroxeter suggested that certain buildings, including the basilica, were still in use until the sixth or seventh century based on an archaeomagnetic date (Barker *et al.*, 1997; Ellis, 2000). This date was shown to be unreliable by Lane (2014, 508) and a recent program of extensive radio carbon dating suggests a mid-fourth century date for this activity (R. White pers. comm). White (2014, 161) viewed these sequences as indicative of a continuation of earlier urban forms at the site. This contrasts with the arguments put forth by Gerrard (2013, 77) who argued that this does not represent 'urbanism'.

Away from urban and military sites, Dark (1994; 2000, 15; 2014, 32) has presented arguments for evidence of continuity of the Late Antique world in some regions of sub-Roman Britain, particularly in the South-west. He argued that Britain was different from the continent as *more* of its Roman heritage survived in specific regions such as *Dumnonia* (covering Cornwall and parts of Devon). A major strand of this argument is based on material culture from high status sites such as Tintagel, Cornwall that indicates strong trade links between Britain and the Mediterranean world through the Atlantic seaways (Bowman, 1996; Campbell, 1996; Dark, 2000; Dark, 2014). The limited distribution of such artefacts has led some to view this as sporadic contact, smaller in scale, and indirect in nature (Millett, 2014, 218; Petts, 2014, 73). David Petts, examining the distribution of material culture and the influence of the church in Gaul, argued that the southern coast of Britain and northern France maintained cross-channel networks into the fifth century, representing a significant aspect of continuity with Roman trade networks and potentially indicating a shared cultural identity (Petts, 2014, 81-83).

Historical evidence from post-Roman Britain has also served as a basis for arguments supporting the idea of the continuity of *Romanitas* (Salway, 1981, 457-469; Dark, 1994; Dark, 2000). Constantius of Lyon's *Vita Germani* recounts St. Germanus' visit to Britain in AD 429 to combat Pelagianism (Cons. Vit. Ger.). Within the account the elite are described as 'conspicuous riches and brilliant in dress' which has been used to argue for continued power structures (Salway, 1981, 465). However, the absence of detailed information such as *civitates*, place names, or rivers in the Life of Germanus has been used to emphasise that the Roman administrative system had collapsed by AD 429 (Thompson, 1984, 9). Furthermore, the passage may be a literary device rather than strong evidence of a wealthy elite as within the hagiographical tradition, opponents of a saint muster wealth against sanctity (Barrett, 2009, 205).

St. Patrick's *Confessio* is also used to emphasise continuity. St. Patrick describes a villa estate near a small town and formal Roman-style administration in the fifth century (St Patrick Confessio. I). Dark (1994, 50) argued that Patrick's use of '*Britanniae*' instead of 'Britannia' suggests the survival of the late Roman diocesan structure.

James Gerrard (2013, 159-60), challenged views that highlight the continuity of Romano-British life based on historical sources, arguing that they rested on shaky foundations. He suggested that while some members of the elite continued to value Roman power structures, the decline of *Romanitas* likely occurred unevenly over time.

Discourses on the continuity of Romanitas in sub-Roman Britain have evolved significantly over time. Initially, discussions focused on finding evidence of overlap between the Roman and Anglo-Saxon periods. Arguments have shifted towards a more nuanced understanding of continuity, emphasising the persistence of Roman socio-economic and institutional patterns rather than just occupation. Despite advancements, debates often recur due to the lack of firm dating evidence in the archaeological record for many sites which have evidence of activity in the early fifth century.

An Anglo-Saxon presence in the fourth century

Incoming settlers and other groups who came to Britain as part of the *adventus Saxonum* would have included Angles, Saxons and Jutes. These incoming populations would have formed smaller political configurations in the post-Roman period rather than the centralised political power which we start to see in the sixth and seventh centuries (Scull, 2001). Until the 1970s the second aspect of continuity was looking for evidence of an Anglo-Saxon (or other incoming groups) presence before the end of Roman Britain and the coming of the Saxons in c. AD 449 (Scull, 2023). Such analysis has taken a number of different strands based on grave goods deposited as part of burial rites at the earliest cremation cemeteries, material culture or linguistic evidence.

The terms Anglo-Saxon and 'Germanic' are both problematic and have in the past been misappropriated (see Louviot, 2020; Friedrich and Harland, 2021; Harland, 2021). As Harland (2021, 21) has argued we cannot and do not know the names by which the diverse groups of newcomers who came to Britain called themselves. Consequently although it is recognised there remain issues with the term, Anglo-Saxon will be used in this study when distinguishing Roman material (both continental and insular forms) with new forms of fifth century metalwork. Issues relating to discussions of a 'Germanic' ethnicity or identity will be considered in greater detail later.

The work of J. N. L. Myres (1969; 1970; 1973) looked to identify the various chronological phases which occurred along with attempts demonstrate that it was possible to make ethnic attributions of the population based on pottery fabrics and forms of cremation urns. He identified five chronological phases based on the pottery, three of which are significant here: overlap of Roman authority and incoming settlers (AD 360-410), transition from a Roman diocese (AD 410-450) and Saxon invasion and destruction (AD 450-500). Pottery was used as a proxy for political history, for example at Caistor-by-Norwich he suggested the cemetery began in the middle of the fourth century and suggested migrants from Schleswig and Funen (Myres and Green, 1973, 13-14).

Similarly the case was made to link specific forms of material culture to incoming groups of *foederati* (federate troops) such as late Roman belt fittings or decorative styles such as Quoit Brooch Style (Hawkes and Dunning, 1961; Frere, 1978, 399; Laycock, 2008). Links have also been made between weapon burials and migrants (Böhme, 1977). The distributions of these objects has expanded significantly in recent decades yet we have scant evidence of Germannic federate troops in the fourth century in Britain with reference to Alamanii (Amm. Marc. Res Gestae XXIX. IV.VII), a *comitatenses* unit of Taifals (Not. Dig. Occ VI) and Esmonde Cleary (2020, 23) citing Zosimus suggests some Alan deserters were transferred to Britain (Zos. Hist. Nov. IV.XXXV)

The size of the corpora of early and mid-fifth century metalwork is increasing (Swift, 2019). Specific forms of material culture from the fifth century will be considered as part of a wider discussion of the overview of the evidence that will form the bulk of this study including cruciform brooches, supporting arm brooches and Quoit Brooch Style.

Martin (2015, 128) suggested the earliest cruciform brooch type (sub-group 1.1) was limited to the first half of the fifth century and are considered to be one of the first signs of Germanic influence in Britain in contrast to later forms which have an insular style (Martin, 2015, 174). In contrast, the supporting arm brooch is rooted in the evolution of Roman brooches. It was considered

a rarity in Britain, with only 50 recorded by MacGregor and Bolick (1993); metal detecting in particular has led to an increase in the corpus (Gerrard, In press). The final fifth century introduction considered here is Quoit Brooch Style. It has significant elements of both insular and continental craftsmanship and is considered to be partly British origin (Evison, 1968; Evison, 1978; Inker, 2000; Swift, 2019). The non-Germanic elements seen on this decorative style derive from exposure to late Roman forms of decoration (Eagles, 2018, 18).

Attempting to use material culture to identify different ethnic or political groups in the archaeological record is problematic. The evidence seems to suggest that if large mass folk movements did occur it was not coherent groups (Anglian for example) and occurred predominantly in areas such as parts of East Anglia and Lincolnshire (Hills and Lucy, 2013; Martin, 2015, 174). We often under estimate the level of mobility and the diversity of the population in the past which can be gleaned from scientific analysis, epigraphic sources as well as written sources (Esmonde Cleary, 2013, 393; Eckardt *et al.*, 2014; Fleming, 2021). Similarly, when material culture is analysed in detail we can see the picture is much more complex than some of the most simplistic assertions made in the past (for a discussion on weapon burials see Esmonde Cleary, 2013, 79-89; for a discussion on Quoit Brooch Style see Swift, 2019).

While linking this material to specific groups in the past has been demonstrated to be problematic, there is growing evidence that at a number of cemeteries such as Spong Hill, Germanic burial traditions begin from c. AD 400/420-470/490 (Hills and Lucy, 2013). At Spong Hill we see transitional objects such as a double sided antler comb that sits at the junction of the late Roman and early Anglo-Saxon forms (Crummy and Henry, 2024, 22-23).

Linguistic, toponymic and historical evidence has been used to make the case for Irish federates (the Attacotti) in Wales by Rance (2001) by the end of the fourth century. By this time units of Attacotti in the Roman army are listed in the Notitia Dignitatum in Gaul, Italy and Illyricum (Not. Dig. Or. IX.XXIX).

Scull's (2023) review of the *adventus Saxonum* and the archaeological evidence noted a paradigm shift that began in the 1970s, moving away from migrationist perspectives despite compelling evidence of population movements. This shift de-emphasised the focus on identifying specific ethnic groups. Nonetheless, the importance of material culture remains significant, with recent studies highlighting the complexity and mobility of the population, suggesting a blend of influences rather than coherent mass migrations of distinct ethnic groups.

Narrative approach 2: Catastrophic change or rupture

In contrast to continuity, an alternative view is that there was a major structural collapse in the years after AD 410. Esmonde Cleary, in *The ending of Roman Britain,* was a major proponent of this thesis. His work was largely in reaction to the idea of continuity into the seventh or eighth centuries presented in the 1970s and 1980s (Esmonde Cleary, 2014). This perspective is sometimes called 'the short chronology', arguing against continuity of *Romanitas.* It has been favoured by authors such as Neil Faulkner (2000), Michael Jones (1996) and Stuart Laycock (2007; 2008; 2010). In such models a rupture caused by the collapse of the Roman state led to a rapid emergence of a different society and structure. The framework for what led to this and when this occurs varies.

Faulkner (2000, 10; 2014, 41) combined selective historical and archaeological evidence with a Marxist ideological approach and 'historical imagination' to frame catastrophic change in late Roman Britain. Through an analysis of the number of rooms in use in town houses and villas, he argued that the material repertoire of *Romanitas* had disappeared by the mid-fifth century at the latest. However, Rogers (2011, 31) believed that restricting the criteria to the presence of stone houses was overtly narrow and simplistic. Faulkner drawing on the work of Thompson (1977; 1984, 35) presented the late Roman period as a time of class struggle which culminated with *bagaudae* peasants revolt in AD 409 resulting in cataclysmic change (Faulkner, 2000, 177; 2014, 41). But the suggestion of a *bagaudae* revolt in Britain has been regularly questioned in the literature (for example: Jones, 1964, 812; Esmonde Cleary, 1989, 29; Millett, 1990, 228; Jones, 1996, 171; Dark, 2000, 30).

Jones (1996, 195ff) argued the climate was a major factor in the sudden catastrophic collapse of Roman Britain. The climate of the Roman period was generally warmer and superior to the climate of the present day which conditions would have benefitted upland areas allowing agricultural expansion (Lodwick *et al.*, 2020; Shi *et al.*, 2022). Isotopic analysis, weed species and a move to spelt wheat all point to extensification as the chosen method of increasing crop production, rather than the intensification of production through manuring (Allen and Lodwick, 2017; Lodwick, 2017;

Lodwick *et al.*, 2020). Around AD 400 there was a sudden return to wetter, colder conditions which had a devastating impact that would have impacted upland areas disproportionately. However, the date that this occurs remains debated and our understanding the social and economic impact of climatic changes is far from straightforward (Gerrard, 2013, 80; Helama *et al.*, 2017; Shi *et al.*, 2022). Rather than a decline in the amount of land which remained in cultivation it has been argued that a greater emphasis should be placed on a change in land use in the fourth and fifth centuries (Esmonde Cleary, 1989, 158; Gerrard, 2013). This reduction in the level of production could have been linked to the removal of the tax burden and the decline of urban centres (Gerrard, 2013).

Laycock (2007, 256ff; 2008; 2010) made the case for tribal militias fighting over the spoils after the collapse of Roman Britain. Based on the decorative elements on belt fittings and their distribution he argued links between these objects and militias based on *civitates* such as the Dobunni in the West and the Catuvellauni in the East Midlands. However, these conclusions have been viewed as speculative (Swift, 2010; Gerrard, 2013, 153; Cool, 2014, 17; Esmonde Cleary, 2017, 199). The idea poses huge questions over whether supposed Iron Age tribal identities existed in this period (or at all - see Moore, 2011), as well as issues of dating and distribution of the belt fittings themselves.

The perspective of a major structural collapse post-AD 410 is the counterpoint to the idea of continuity. Proponents have presented varied arguments, ranging from class struggle and climatic shifts to tribal militia conflicts. Despite their diverse methodologies and focal points, these scholars contribute interesting aspects to the debate, drawing on quantitative evidence from the number of stone buildings and environmental evidence from climate and agricultural production.

Narrative approach 3: Transformation

The final approach is to look at the longue durée, seeing this not as a collapse, or a survival, but as a much longer process of transition in a series of stages from the Roman to early-medieval world, with the roots of that transition starting much earlier in the late third or fourth century.

These transformations trace the changing expression of power in the fourth and fifth centuries often using elite display and villas to underline key concepts in elite identity. In the fourth century the key to power was social position and patronage, which was all persuasive in Roman society with the emperor at the apex (Braund, 1989; Esmonde Cleary, 1989, 14). Social position was emphasised through displaying their classical knowledge (*paideia*) and leisure time (*otium*). We can identify this archaeological through depictions of classical scenes on mosaics and wall paintings (Cosh and Neal, 2006; Esmonde Cleary, 2013; Gerrard, 2013, 141; Neal and Cosh, 2024).

Villas were not simply agricultural centres, they were the nexus of power and used to control the social and physical landscape (Ellis, 1991; Petts, 1998; Eagles, 2018). Through the fourth century we can trace a militarisation of the elite through changing fashions and methods of display and new forms of patronage. Protection (*patrocinium*) emerged with an emphasis of the provision of armed retinues as the gap between rich and poor widened (Marcone, 1997; Brown, 2012, 398-399; Esmonde Cleary, 2013; Eagles, 2018, 12). Over time this 'protection racket' evolved into warlordism (Garnsey and Woolf, 1989; Hopwood, 1989; Whittaker and Garnsey, 1997).

As part of the transformations seen in the fifth century we can see a rejection of the Roman ideology based on *paideia* and a new emphasis on warlordism and armed retinues (Wilmott, 2000, 19; Collins, 2012; Gerrard, 2013, 207; Carr, 2019). The transformations of lifeways after the cessation of Roman control led to a scrabble to maintain, reinforce and acquire position and economic control by the elite (Gerrard, 2013). Fleming (2021) evaluated these changes through case studies on material culture, foodstuffs, burials and building materials. She emphasised that a new material reality was created by both incoming populations in the fifth century and the indigenous population of Roman Britain. This approach highlights the substantial transformations in all walks of life. For example, changes in traditional cooking methods such as stewing – new pottery types necessitated new preparation strategies (Evans *et al.*, 2017; Fleming, 2021, 71-72).

A key advantage of the transformation model is that it emphasises the diverging trajectories highlighted in the spatial distributions of a range of material culture and other archaeological datasets. Transformative research by Swift (2000; 2012; 2019) and Cool (2000; 2002; 2016) has demonstrated the value of undertaking systematic analysis of large datasets of late Roman material spatially. Cool argued that fifth century was not a point of disruption, instead it follows a trajectory which began in the fourth or perhaps even the third century.

The 'transformation narrative' underscores the gradual transition from the Roman to the early-medieval world, emphasising regional variations and shifts in power dynamics, material culture, and social structures. However, this model also underscores the complexities and nuances of this period, necessitating a multifaceted approach to fully capture the dynamic changes that occurred over several centuries.

There remains a tendency perhaps to place too great a reliance on the historical sources given that all we can glean is small snippets (Halsall, 2007; Gerrard, 2013, 17). The review has highlighted a greater utilisation of the archaeological record over time which has challenged the scant pieces of historical evidence. This review of the top-level synthesis of the period highlights the diversity in how the same body of evidence has been interpreted and how the chronology for the end of Roman Britain remains contested.

Several points become evident. First, there is a clear need to adopt a *longue durée* perspective, examining material from the fourth to the fifth century to track patterns of change. Secondly, it is essential to study a wide range of material culture, seeking both regional variations and chronological shifts, rather than focusing solely on items like belt fittings. By employing extensive corpora of material, analysed through diverse methodologies and considered in combination, archaeological evidence offers substantial potential to deepen our understanding of this complex period. This evidence can be used to test various hypotheses about the social and political transformations that occurred during the later fourth and fifth centuries. To advance this debate, a holistic approach is essential.

3. The Diocese of Britain

To unpack the end of Roman Britain and consider the evidence for endogenous shift or exogenous drift it is crucial to understand the power structure and power dynamics which sustained the system through an intricate web of patronage, with the emperor at its apex. The fourth century witnessed significant changes in Roman society, where elite groups increasingly relied on the patronage and *largitio* of the Emperor for economic advancement, along with notable reforms in administration, the military, and coinage. The local elite played a central role in the smooth operation of the diocese of Britain, gaining significant wealth and status, which they displayed through their material culture.

In this section, we will dissect the governing institutions of the diocese, considering the interplay between the state-run bureaucracy and the local administration. We will examine the army's structure, noting the variations between military units along the frontiers and the field army, as well as the physical evidence of these groups, from material culture to stone-built forts.

For the empire to survive, it needed to pay those who served it, particularly the military, and then recoup elements of this pay through taxation. While coinage, which survives in significant quantities in the archaeological record, was a crucial aspect of taxation, a substantial portion of taxes was collected in kind (such as grain). This does not have the same archaeological visibility. The towns of Roman Britain were central to late Roman administration and key forms of taxation. The fortunes of these urban centres changed in the fourth century, with new smaller defended sites appearing, likely linked to the collection of tax in kind.

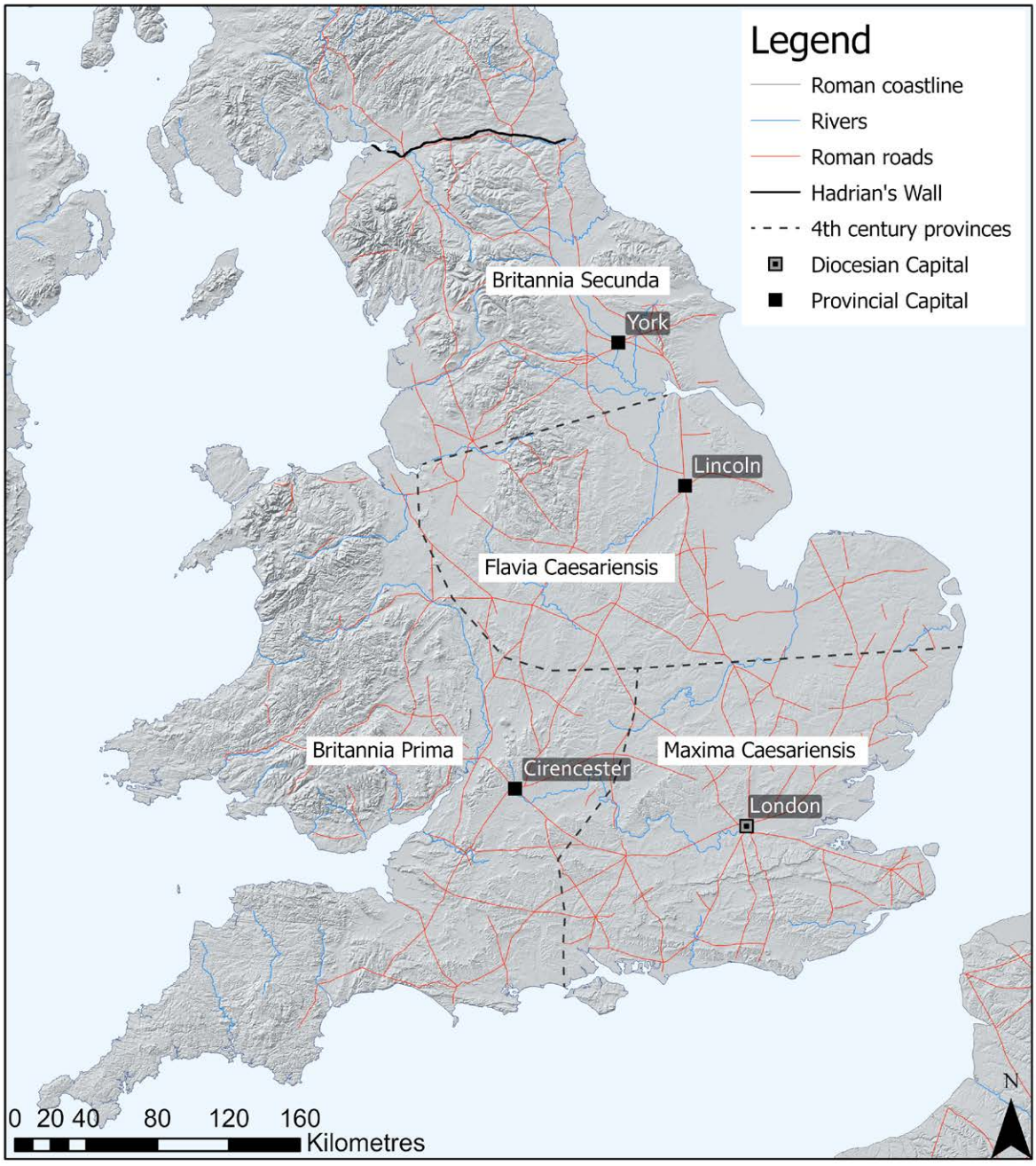
While the majority of the population of Britain would have lived in the countryside, for this study the focus is on the elite groups who would have been responsible for administration at a local level and how they used Roman norms to cement and emphasise their status and significance.

Major political changes occurred in the fifth century, the last section of this chapter will evaluate how previous research has presented evidence of these institutional changes both for the army and the administration.

The reforms of Diocletian and Constantine I meant local pre-eminence was now gained through imperial service, rather than through euergetism and the construction of civic buildings which had a significant impact on local aristocracies (Heather, 1997b, 197; Heather, 2017, 16). The elites were now dependent on imperial exemplars for means of cultural advancement as much as the dependency on the imperial system for economic advancement (Esmonde Cleary, 2013, 437; Heather, 2017, 23). This is visible through concepts such as *paideia*, patronage and through *largitio* where the emperor and other high-ranking officials made gifts through reciprocity (Esmonde Cleary, 2013; 330, Gerrard, 2013). These major socio-political changes coincide with a period of militarisation of elite dress, as high society mores aligned with the exemplars set by imperial dynasties and usurpers (Esmonde Cleary, 2013, 89 ; Henry, 2022).

These institutional changes led to alterations in the motivation and aspirations of the local elites in Britain as the theatre of power politics moved away from the curia of *civitates*. The new imperial game was probably enacted in chambers in their glorified rural estates in the 'golden age' of Romano-British villas. These elite groups in Britain may have been considered small fry on an international scale as no high ranking official or senator is recorded as from being from the diocese of Britain in the fourth century (Birley, 2005, Mattingly, 2007, 301). On the other hand, as Woudhuysen (2021, 71) has pointed out, perhaps being in Britain did provide rich pickings for the aristocracy as late Roman surpluses were central to supplying the army on the Rhine.

The military, bureaucracy, and the local elite responsible for administration at a local level, were all linked through an intertwined web of patronage. Many of the usurpations of the later fourth and fifth centuries can be traced to discontent in these groups after the patronage of the emperor slowly dissipated from the northern provinces from AD 381 onwards



Ancient World Mapping Center "Background 16", "Coastline" , "Rivers". http://awmc.unc.edu/wordpress/mapfiles.
Roman road network based on Margary (1973).

Figure 3.1 - The provinces of the fourth century diocese. The boundaries of the provinces are unknown, the provinces of Britannia Secunda and Flavia Caesariensis have been inverted by some authors. A further fifth province of Valentia might have been created after AD 368 or it could be a rebranding of one of the four provinces. (Map by Richard Henry)

when Gratian withdrew from Trier to Milan (Barnwell, 1992, 62; Lendon, 1997; Heather, 2005; Halsall, 2007, 187; Heather, 2017, 28; Woudhuysen, 2021, 68). The interplay between the state and these three groups will be a recurring theme.

The Governance of Late Roman Britain

The accession of Diocletian in AD 284 marked a turning point from the third century crisis. He reformed to the civil service, administration, law, the army, coinage and introduced a new taxation system (Jones, 1964). He also divided the empire into four which was ruled by two senior emperors (Augusti) and two junior emperors (Caesars) in a system now known as the Tetrarchy. The Caesar for the west, Constantius I, was based in Trier.

Around AD 293 the provinces of the empire were subdivided to reduce the powerbase of provincial governors and enhance centralised control (Bowman, 2005, 74; Lo Cascio, 2005, 131-135). The subdivided provinces increased from 48 to over 100, they were grouped for administrative purposes into fiscal districts called diocese (Jones, 1964; Lo Cascio, 2005, 179; Esmonde Cleary, 2013).

By AD 314 the diocese of Britain was formed of four provinces (Figure 3.1): *Maxima Caesariensis*, *Britannia Prima*, *Flavia Caesariensis* and *Britannia Secunda* (Birley, 2005, 397). The boundaries of these provinces and their capitals are uncertain. It has been suggested that the capital of *Maxima Caesariensis* was London, *Britannia Prima* was Cirencester, *Flavia Caesariensis* was Lincoln and *Britannia Secunda* was York (Millett, 1990; Birley, 2005, 399; Mattingly, 2007, 227; White, 2007; Gerrard, 2013, 130). A fifth province called *Valentia* was created after the restoration of the diocese by Count Theodosius (Amm. Marc. Res Gestae XXVIII.III). The location of this province is unknown, it could be that an existing province was rebranded as *Valentia* (Esmonde Cleary, 1989, 48) or that *Britannia Secunda* was subdivided some-time in the fourth century (Rivet and Smith, 1979; Hunt, 1997b; Birley, 2005, 399).

Within each of the provinces were smaller administrative subdivisions known as *civitates.* At least 16 are known from Britain from Ptolemy, but our knowledge is imperfect. New *civitates* were probably occasionally formed by subdividing earlier ones – it has also been suggested that Carlisle, Ilchester, Corbridge and Water Newton might have become the capitals of new fourth century additions (Burnham and Wacher, 1990; Mattingly, 2007).

The political structure

The late Roman state has been characterised as totalitarian and bureaucratic with a greatly increased civil service in contrast to the Principate (Jones, 1964; Faulkner, 2000, 110). Compared with modern standards the empire wide bureaucracy was tiny with perhaps 6,000 high ranking officials and a and a civil service totalling 18,000-30,000 (Heather, 1997b, 190; Carrié, 2005; Heather, 2005, 28). The successful administration of the tax-pay cycle relied on the local elite *civitas* based administrations.

Civil servants were legally ranked and paid as soldiers, wore uniforms and the military belt – the *cingulum militare* (Jones, 1964; Hunt, 1997a). Civil service pay was poor and supplemented by fees and perquisites. These fees were not underhand dealings, an inscription dating to AD 361-363 from Timgad, Algeria defines the costs for the state to enforce judgements (Kelly, 1997, 178).

Reforms by Constantine I in AD 325 led to two arms of the bureaucracy: The officials who reported to the head of the financial administration the *Comes Sacrarum Largitionum* (the Count of the Sacred Largesses), and those who reported to the *Praetorian Prefect* (Corbier, 2005a, 380). Our main source for the structure of the late Roman administration is derived from the *Notitia Dignitatum* which gives us a good snap shot of the higher tiers of the political structure in Britain c. AD 390 (see Figure 3.2).

The *Comes Sacrarum Largitionum* was one of the senior fiscal officers in the Empire who was responsible for a number of forms of tax and custom duties, mines and the state-run factories known as *fabricae* (Barnwell, 1992, 29; Lo Cascio, 2005). In Britain he supervised two *rationales* — the financial secretary for revenues (*Rationalis Summarum Britanniarum*) and the imperial estates (*Rationalis Rei Privatae Per Britannias*). The treasury in London was managed by a *praepositus.* Finally, a *procurator* was responsible for the state *fabrica* which was located in *Venta.* Either Winchester (*Venta Belgarum*), Caistor-by-Norwich (*Venta Icenorum*) or Caerwent (*Venta Silurum).* Wild (1967) suggested Winchester (*Venta Belgarum*) on thin evidence.

The *Praetorian Prefect* of 'the Gauls' was based in Trier and was responsible for the administration of the dioceses of Gaul, Germany, Spain, and Britain. They were responsible for recruitment of troops, provisions for the army, and the *cursus publicus* – described as a postal service but also a key network of fresh equids

The Emperor

Praetorian Prefect of the Gauls
praefectura praetorio Galliarum
Responsible for:

- Governor of the diocese
  vicarius
- Governor of Maxima Caesariensis
  consularis
- Governor of *Valentia*
  consularis
- Governor of *Britannia Prima*
  praeses
- Governor of *Britannia Secunda*
  praeses
- Governor of *Flavia Caesariensis*
  praeses

Count of the Sacred Largesses
comes sacrarum largitionum
Responsible for:

- Financial secretary for revenues
  rationalis summarum Britanniarum
- Financial secetary for the imperial estates
  rationalis rei privatae per Britannias
- Secretary for the Treasury
  praepostius
- Supervisor of Fabricae
  procurator

- Local administration
  Decurions

Figure 3.2 - The strands of the civilian bureaucracy responsible to the Praetorian Prefect and the Count of the Sacred Largesses (including elements from the Notitia Dignitatum © Bodleian Library).

for officials (Jones, 1964, 371; Black, 1995; Laurence, 2024). The role of the *Praetorian Prefect* changed after the creation of the *Magistri Militum* in AD 312 who took command of the army. From this point their role encompassed a variety of civilian functions and they have been viewed as the most powerful civil officials (Kelly, 1997, 167; Campbell, 2005, 129).

The *Praetorian Prefect* supervised a *vicarius* in Britain who was responsible for the administration of the diocese. Originally each province was governed by a *praeses*. Subsequently, a higher ranking *consularis* governed *Maxima Caesariensis* and *Valentia* (Birley, 2005, 399). The *consulares* and *praesides* were responsible for the administration and good order of their province and held judicial functions. They also had important roles in the taxation cycle and systems of supply for the army.

Diocesan or local administration?

Given the small size of the state bureaucracy, the co-operation of the local elite to perform a range of local roles was essential. At a local level, administration was carried out by the *ordo* of *decurions.* These men were the council of the *civitas* formed by the local landowners known as the *curiales*. For a region to be granted *civitas* status there needed to be a sufficiently large ruling class able to manage local affairs and to implement the administrative decisions imposed by both strands of central government (Frere, 1978, 235; Carrié, 2005, 295; Mattingly, 2007, 293).

On paper, therefore, we might expect to find evidence for civil servants operating in the Provincial and *civitas* capitals in the diocese of *Britannia*. But what is left out of the literary sources is any idea of how the lower tiers of settlement fitted in to the structure of power, the small towns and roadside settlements. Coin profiles suggest that there was a shift in economic activity from the larger urban centres to small towns in the later Roman period (Brindle, 2017, 251-252). Urban and nucleated settlements will have held administrative functions that are likely to have evolved over time. We should envisage a fluid bureaucratic system which may have focussed on different locations over time as

the prosperity of different economic centres ebbed and flowed.

One of the key questions this study will try to address is if we can map the geography of the agents involved in the civil service and tax administration though the distribution of material culture. It may be that crossbow brooches and belt fittings are key to refining our understanding of roles in the provinces. Was the burden placed on local administration and is this reflected in the proliferation of insular late Roman belt fittings, and are these agents confined to the major urban centres or spread around the diocese?

However, if the clothing of the civil servants was military in style and nature, we also need to consider the Late Roman army, its role and deployment in Later Roman Britain. This is where attention turns to in the next section.

The army in Late Roman Britain

The army was central to the survival of the state, providing defence of its borders and internal security. Meeting its needs in terms of pay, supply and arguably manpower was the largest element of state expenditure. It has been suggested this cost between half and two thirds of state revenues (Lee, 1997, 211; Heather, 2017, 13).

The *Notitia Dignitatum* lists three commands in Britain under the command of the *Magister Peditum Praesentalis* (Master of the Soldiers): The *Comes Litoris Saxonici* who commanded the units along the south and east coasts, the *Dux Britanniarum* who commanded the units along the northern frontier and the *Comes Britanniarum* who commanded the field army. The geographical commands of the *Dux Britanniarum* and *Comes Litoris Saxonici* ran across a number of provinces in the diocese (Birley, 2005, 401).

Military reforms, which were likely concluded by Constantine I, led to two different types of army units that served very different purposes. The *limitanei* were frontier troops, in Britain they were under the command of the *Comes Litoris Saxonici* and the *Dux Britanniarum* whose commands are illustrated in Figure 3.3. The *comitatenses* formed the regional field armies, in Britain they served under the *Comes Britanniarum*.

The *limitanei* have been viewed in negative terms compared to the *comitatenses*. This is primarily based on lower pay and status leading them to be dismissed as low grade troops (Faulkner, 2000 , 167) or nothing more than a frontier militia of soldier farmers who became progressively local (Millett, 1990, 214; Christie, 2011, 55). Such conclusions stem from a misinterpretation of late Roman laws (Jones, 1964; Esmonde Cleary, 1989, 6). *Limitanei* were supplied and paid by the state, their status remained high, most privileges were equal to the *comitatenses* and they could serve in the field army (Southern and Dixon, 1996, 37; Lee, 1997, 214; Wilmott, 2000, 17; Campbell, 2005, 129; Collins and Breeze, 2014, 62; Heather, 2017, 50).

Soldiers were paid in food and a nominal stipend in cash which was supplemented with regular donatives including the accession of emperors (Southern and Dixon, 1996, 77; Lee, 1997 220; Campbell, 2005, 127). Upon the accession of Julian for example, soldiers were paid five *solidi* and a pound of silver (Amm. Mar. Res Gestae XX.IV.VIII). Quinquennial donatives consisted of five *solidi* (Southern and Dixon, 1996, 77).

One significant change occurs as a consequence of the catastrophic defeat at Adrianople in AD 378 (Heather, 1991). From this point the empire struggled to recruit troops in the numbers required from in its borders leading to an increase in the number of barbarian troops (Zos. Hist. Nov. IX 31 1). Prior to this only defeated groups classed as *laeti* were allowed to settle in the Empire, these groups had a hereditary obligation to serve in the military under Roman command (Southern and Dixon, 1996, 47-48; Roymans, 2017, 67). After Adrianople there is an influx of new units formed of *Foederati*, these troops were bound by treaty to serve in the military under their own leaders (Heather, 1997a, 59). By the early fifth century over 25 per cent of the army consisted of barbarian troops (Salway, 1981, 406; Blockley, 1997; Collins and Breeze, 2014, 62). While they may have been barbarians, these troops still reliably fought for Rome, such as the Franks defending the *limes* after the crossing of the Rhine in AD 405/406 (Roymans, 2017).

For Britain we have no firm evidence that the diocese was reinforced by Germanic units such as *laeti* or *foederati*. Rance (2001) has argued Irish federates might have settled in South-west Wales. Specific forms of material culture and gold coinage have been used to suggest the presence of *foederati* or groups with Germanic ethnicity on the continent (Mattingly, 2007, 241; reviewed by Esmonde Cleary, 2013 80-88; Roymans, 2017). Heeren (2017, 167) argued that the absence of military units in the *Notitia Dignitatum* for Germania Secunda and Belgica Secunda is an indicator that *foederati* garrisoned these regions as the *Notitia* only lists regular Roman troops.

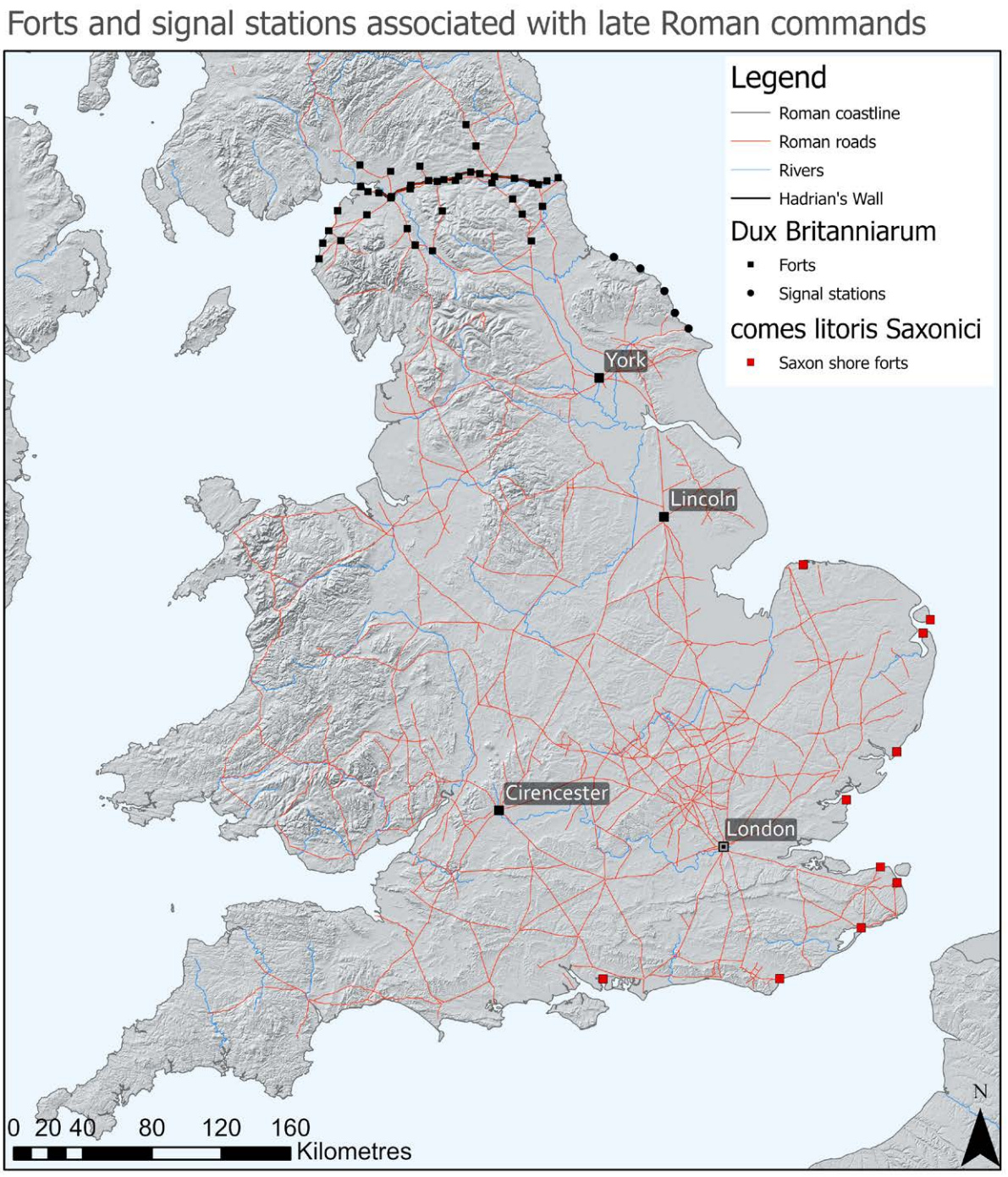


Figure 3.3 - The commands of the comes litoris Saxonici and the dux Britanniarum.

The northern frontier – the Dux Britanniarum

The *Dux Britanniarum* who perhaps was based at York commanded the garrisons on Hadrian's Wall and the Pennines and would have been viewed as the ultimate imperial authority in the region. Archaeological evidence demonstrates that 20 forts and smaller institutions on the frontier remained occupied in the later fourth century (Collins, 2013, 29).

In the final decades of the fourth century signal stations were constructed along the eastern coastline which were potentially linked with the harbour at Whitby (Esmonde Cleary, 1989, 51; Mattingly, 2007;

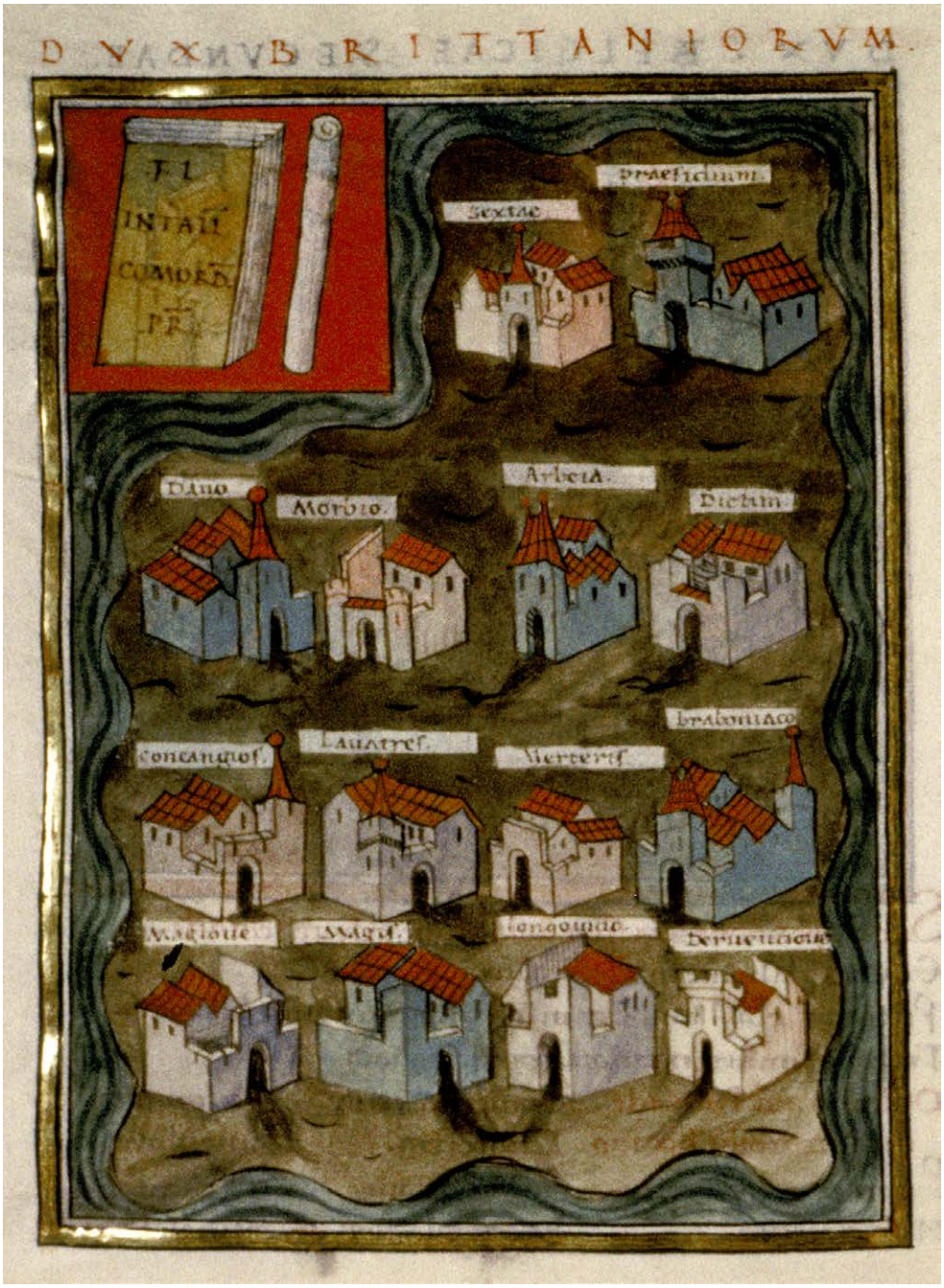


Figure 3.4 - Depiction of the forts listed in the Notitia Dignitatum commanded by the dux Britanniarum (© Bodleian library).

Gerrard, 2013, 41). The role these signal stations remains debated, they have been presented as a means of physically defining the empire (Gerrard, 2013, 41) or are linked to increased raiding (Symonds, 2015, 46).

Archaeological and documentary evidence has been used to highlight the northern frontier was old fashioned due to the retention of old unit titles, had outmoded architecture and did not conform to standard military practices (Frere, 1978, 262; Gerrard, 2013, 35). The retention of first century unit names might not simply suggest an old fashioned frontier, it may be a consequence of the general stability of the region in the third century when compared to that seen on the continent (Esmonde Cleary, 1989, 5; Collins and Breeze, 2014, 68; Hunter and Painter, 2017).

The defensive architecture has been viewed as outmoded as projecting towers are only recorded at Lancaster (Gerrard, 2013, 37). These towers are known at a wide range of sites in Britain including the Saxon shore forts, signal stations and urban centres (Pearson, 2002; Rogers, 2011; Gerrard, 2013). The variation in the architectural modifications to inland forts on Hadrian's Wall suggests a greater freedom to mould local and standard military practices (Bidwell and Speak, 1994, 44-45; Wilmott, 2000, 17; Gardner, 2007, 182; Birley, 2014). This contrasts with the fort and supply base of South Shields (Bidwell and Speak, 1994; Gardner, 2007, 184).

While there is evidence of outmoded defensive architecture, the presence of courtyard houses at Binchester and South Shields underscores links with the wider late Roman elite across the empire (Ferris and Jones, 2000, 1; Fleming, 2021, 29). Courtyard houses are rare in Britain but were favoured by elite groups in North Africa, Italy and the Levant suggesting shared cosmopolitan tastes continued (Bidwell and Speak, 1994, 35; Fleming, 2021, 31). They have been interpreted as the residences of a late Roman *Patronus*, the archaeological evidence suggests they were maintained for a considerable period into the fifth century (Esmonde Cleary, 2000, 90; Wilmott, 2010; Fleming, 2021, 101).

A general paucity of late Roman material culture linked to the military as well as coinage has also been used to argue that there was little state interest in the region (Leahy, 2007; Esmonde Cleary, 2017, 196). Cool (2010, 8) analysing a suite of material culture including spurs argued that by the end of the fourth century we should question if Hadrian's Wall was the key frontier we often perceive it to be given major incursions tend to be once in a generation events. The frontier seems to have been under no greater threat in the fourth century than it was in the second and there is an emphasis on silver rather than gold in the region - gold was the usual method used to pay off barbarians (Esmonde Cleary, 1989, 5; Collins and Breeze, 2014, 68; Hunter and Painter, 2017).

The Saxon shore – Comes Litoris Saxonici

Along the south and eastern coast of Britain and the coast of Gaul ran a network of defences called the Saxon shore forts (Figure 3.5). These forts grew piecemeal with the earliest examples constructed in the late second or early third century, sites with projecting towers date to after AD 260 (Johnson, 1976; Pearson, 2002, 21; Breeze *et al.*, 2022; Drinkwater, 2023). A number of these forts are listed in the *Notitia Dignitatum* and their garrisons were commanded by the *Comes Litoris Saxonici* who is often presumed to have been based at Richborough, a key site in the later fourth and early fifth centuries.

These forts tend to be viewed as a unified system based on the *Notitia Dignitatum,* yet a number seem to have been abandoned before the creation of the *Notitia* and not all forts are listed – see Table 3.1 (Pearson, 2002, 109; Drinkwater, 2023). Reece (2011) considering a number of coin assemblages from the Saxon shore forts has argued that if there was a single unified command existed it would have ceased by AD 320. Although the *Notitia Dignitatum* lists Saxon shore forts in southern and eastern Britain, other areas also had strengthened coastal defences in this period. This includes new forts at Lancaster as well as Cardiff and a fortlet at Caer Gybi, Holyhead in Wales (Wilkes, 2005; Mattingly, 2007; Gerrard, 2013, 35).

Contra to the idea that the construction of Saxon shore forts was a consequence of a growing Saxon menace (e.g Frere, 1978, 211), Pearson (2002, 137ff) has emphasised the role of the forts as transit points and secure compounds – perhaps for taxes-in-kind destined for the Rhineland or Gaul (Gerrard, 2013, 32). In East Anglia, Brancaster and the dual forts of Caistor-on-Sea and Burgh Castle controlled some of the most convenient links for heavy transport between the agricultural regions and major urban centres (Salway, 1981, 258; Pearson, 2002).

There are challenges in interpreting the lives of those who lived in these forts. In Britain the only large scale excavations of the interior of Saxon shore forts have occurred at Richborough and Portchester (Figure 3.6) (Bushe-Fox, 1928; 1932; 1949; Cunliffe, 1975).

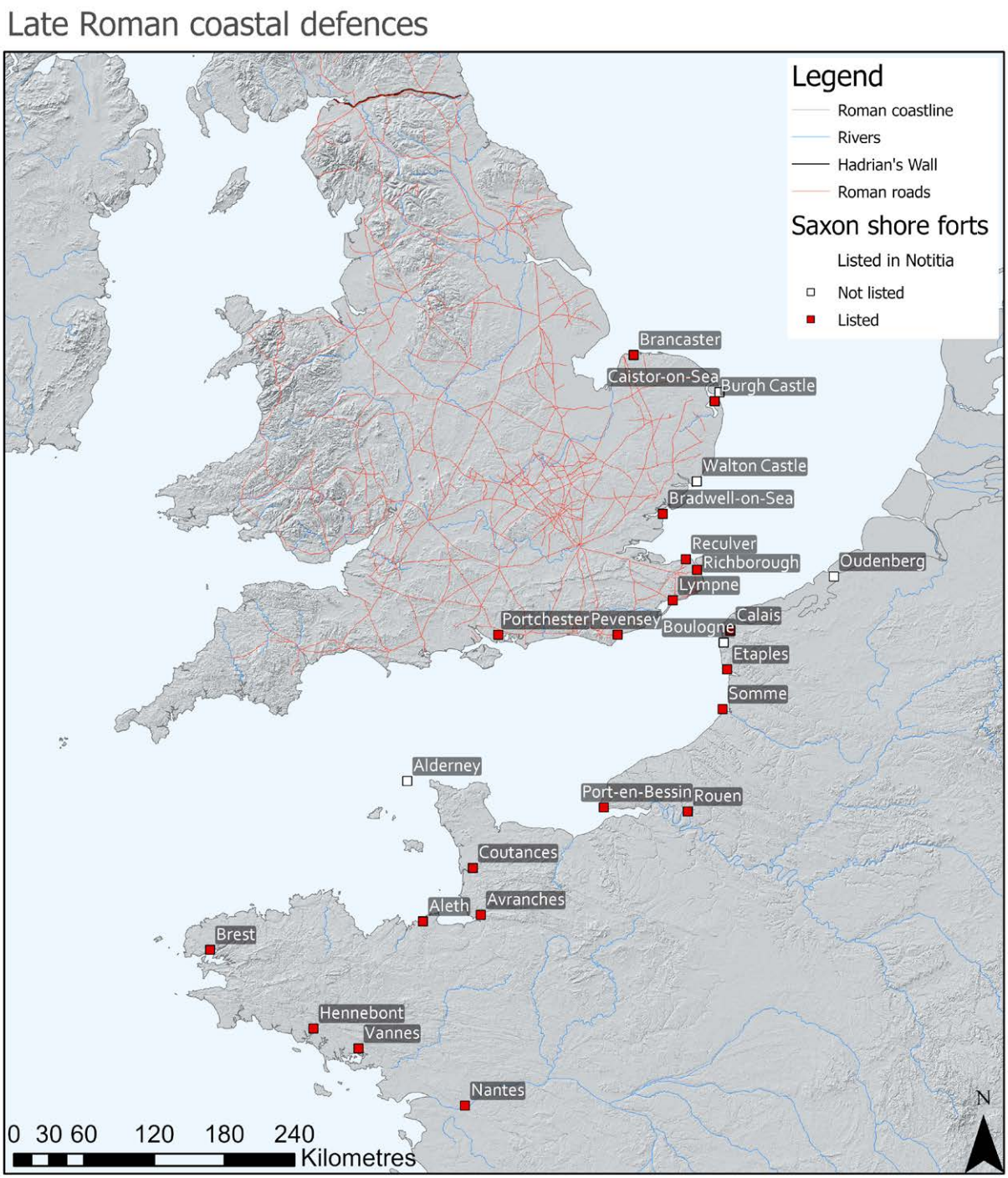


Figure 3.5 - The defences of the Saxon shore in Britain and on the continent. In Britain, Walton Castle and Caistor-on-Sea are not listed in the Notitia Dignitatum.

Figure 3.6 - The Saxon shore fort at Richborough (© Richard Henry).

At Portchester, only the bare outlines of structures were noted, these were surrounded by pock marked landscapes of rubbish pits which Cunliffe (1975) linked to civilian use. Contra to Cunliffe (1975), Gardner (2007, 181) interpreted the spatial patterns of rubbish disposal as fluctuating local priorities rather than as reflecting a civilian/military division. Similar less intensive use of space has been identified at Oudenburg which Vanhoutte (2015) linked to a reduction in the size of the garrison. The lived experience in the Saxon shore forts was different to that of the forts on the northern frontier (Gardner, 2007, 104).

Wales

The omission of Welsh fortifications in the *Notitia Dignitatum* has led to debate about the status of those which continued to be occupied, such as Caernarfon and Caerhun. Whether this represents military activity or civilian reuse of the sites remains uncertain (Wilkes, 2005; Gardner, 2007, 82; Collins and Breeze, 2014, 67; Collins and Weber, 2015; Whately, 2015).

White (2007) postulated that a separate command for Wales with its headquarters at Chester was omitted from the *Notitia*; this has been viewed as speculative (Collins and Breeze, 2014 67). The absence of any formal troops could be a consequence of declining deployment. As few as five forts were occupied in Wales at the start of the fourth century, and the last troops could have been withdrawn in the 380s under Magnus Maximus or the 390s under Eugenius (Faulkner, 2000, 169; Breeze and Guest, 2022, 80-81).

In other regions of the North-western provinces an argument has been made that the exclusion of forts from the *Notitia* in Germania Secunda and Belgica Secunda is due to their garrisons being *foederati* (Heeren, 2017, 167). It is possible that the garrisons in the late Welsh forts (if the activity was military) could have been *foederati* (Rance, 2001).

***The field army* - Comes Britanniarum**

Late Roman field armies often consisted of the highest grade troops and are viewed as highly mobile with an emphasis on smaller cavalry units (Heather, 2005; Collins and Breeze, 2014, 64). The *Comes Britanniarum* commanded the late Roman field army in Britain. It has been viewed as a late introduction attributed to a reorganisation by Stilicho in the 390s as it is not mentioned in the account of the Barbarian Conspiracy by Ammianus Marcellinus (Mann, 1976; Collins and Breeze, 2014, 66). When this field army was removed is also debated, possibly before the end of the fourth century (such as: Jones, 1996; Faulkner, 2000, 169) or by AD 409 at the latest (Birley, 2005).

No permanent forts linked with the *comes Britanniarum* are known in Britain. After Constantine I, field armies

Table 3.1 - The Saxon shore forts of Britain and the latest activity identified through archaeological excavation (Gerrard, 2013, 33; Collins and Breeze, 2014; Drinkwater, 2023). Walton Castle is recorded from antiquarian research but has been lost due to coastal erosion. Clausentum (Bitterne Manor, Southampton) has been previously suggested as a shore fort by Johnson (1976) and Cunliffe (1975), this has been recently questioned (Henry and Russel, 2024)

Site	Notitia Dignitatum	Latest activity
Brancaster	Branoduno	fifth century
Caistor-on-Sea	-	c. 380
Burgh Castle	Garianno	c. 380
Walton Castle	-	n/a
Bradwell	Othonae	fifth century
Reculver	Regulbio	c. 360
Richborough	Rutupis	fifth century
Dover	Dubris	Late fourth/fifth century
Lympne	Lemannis	c. 350
Pevensey	Anderidos	fifth century
Portchester	Portus Adurni	c. 380

were generally billeted in cities, this practice became more prevalent in the fourth century both in frontier and interior regions and is suggested in Winchester due to arguments about the military nature of some of the burials in the Lankhills cemetery (Southern and Dixon, 1996, 83; Sarantis, 2013, 17; Brulet, 2017, 43; Morris and Biddle, 2023, 81). Garrisons in towns may have formed of *limitanei*, *comitatenses*, *laeti, foederati* and other local militias (Brulet, 2017, 51). We know next to nothing about late Roman militias yet they are often ascribed to defence (Appels and Laycock, 2007, 213ff; Laycock, 2008; Laycock, 2010; Brulet, 2017, 51).

The Roman army was not a single entity, it was a series of regional armies with some commonality and a shared identity (Gardner, 2007, 31; Esmonde Cleary, 2013, 44; Collins and Breeze, 2014, 71). The commands of the *dux Britanniarum* and the *comes litoris Saxonici* both appear to follow different trajectories.

The changing patterns of material culture between the second and fourth centuries have created assumptions of the appearance of mixed 'military' and 'civilian' assemblages in some forts. This perhaps has been overemphasised but does highlight that life in the forts and the Roman military had changed. The focus on local practices in the northern frontier also risks masking the continental connections the influential commanders of these garrisons would have with the wider Roman world.

A key question for this study is whether we can use material culture to identify particular units or elements of either the military or bureaucracy. Military service and social status would have affected the way in which soldiers interacted with civilians (Mattingly, 2007, 167). In this regard, their dress would have identified them as being linked with the state even if there was regional variation between specific object types.

Taxation and the economy

Having introduced the various agents of the state in Britain, the civil service administrators, local officials and the various armies, it is time to switch attention to how the needs of the Empire were met. The evidence emphasises the degree to which the Roman state was interwoven into daily life through taxation and late Roman supply networks.

Given the threat of usurpation was ever present, the emperor had to pay the army and the bureaucracy. Coinage was central to this and a range of denominations each with a specific role to play were struck in gold, silver and bronze. Gold and silver was a crucial cog in the payment-taxation cycle. Bronze

Figure 3.7 - The solidus, miliarensis, siliqua and nummus. (Copyright the Portable Antiquities Scheme)

played a different role and was produced to enable the subjects of the empire to raise the required funds to pay tax in coin (Reece, 1987).

There were two principal forms of taxation in the late Roman period. The *jugatio-capitatio* system consisted of a land tax (*jugatio*) and a poll tax (*capitatio*). These were levied both in kind and in coin. A tax for services (the *collatio lustralis*) was paid in coin. To calculate the land tax each *civitas* was surveyed and allocated a specific number of tax units of notional production based on estimated surplus (Jones, 1964; Heather, 2017, 12). The tax was collected by the local administration in their jurisdiction. As land was the main source of wealth, the burden of taxation fell on the rural population and corruption was rife (Jones, 1964, 465; Esmonde Cleary, 1989, 8; Whittaker and Garnsey, 1997, 271).

We know custom duties, ad hoc levies and forced purchases also occurred in the fourth century. In AD 357, Florentius (the *Praetorian Prefect* of the Gauls) attempted to raise special levies which was opposed by Julian (Amm. Mar. Res. Gest. XVII.3; Hunt, 1997a). Bang (2008, 156) citing evidence from Egypt argues that forced purchases were a regular feature of the fourth and fifth century.

Ultimately, needs of the state dominated the whole economy: it needed to ensure the supplies it required were available, and that it met its financial obligations – particularly to the army (Corbier, 2005b; Mattingly, 2007; Esmonde Cleary, 2013, 309-310). Well-developed supply networks were essential distributing goods within and beyond individual provinces.

Tax in coin

Coinage was central to the fiscal system and denominations were produced to fulfil specific functions (Figure 3.7). After the reforms of Diocletian, the denominations of the fourth century were uniform with standardised reverse types produced at mints across the empire at the same point in time (Reece, 2002; Wigg-Wolf, 2016). From AD 337 the coinage in circulation consisted of the gold *solidus*, the silver *miliarensis*, the silver *siliqua* and copper-alloy coinage the name of which is unknown but is conventionally called the nummus (Corbier, 2005a, 337-338; Moorhead and Walton, 2014, 102). After AD 364 the *solidus*, *miliarensis* and *siliqua* were now produced by the Comitatesian mint (Lenski, 2002, 302). The *comitatus* was a migratory body – a group of ministries which were attached to the emperor.

Gold and silver was primarily used as pay (such as the military, civil service or *foederati*) or to barbarian groups outside the frontier (Roymans, 2017, 75). Taxes in gold or silver coin were attempts to retrieve these resources. The state's success is visible in the archaeological record as gold is rare in hoards and site finds whereas silver is more common but still in restricted general use (Reece, 1999, 139; Esmonde Cleary, 2013, 300).

There had to be a mechanism for the rural population to convert surplus into high value coinage. This was the primary role of the lower value bronze coinage (nummi) which would need to be exchanged through a money changer (*nummularii*) to acquire the gold required to pay taxes (Reece, 2002; Corbier, 2005b, 427; Esmonde Cleary, 2013). After its use in the tax cycle it was little interest to the state and they had no means to retrieve it and it was used for commercial transactions (Esmonde Cleary, 2013, 332).

Although production was uniform with standardised reverse types, output at mints varied and supply to the diocese of Britain ebbed and flowed. In the

fourth century we see gaps in production and supply, this led to contemporary copies being produced – particularly in the years AD 330-341, 347-348 and 353-361 (Boon, 1988; Reece, 2002; Brindle, 2017, 261). This spate of copying has been viewed as fulfilling a need. It was either produced by the civilian population for commercial and economic needs (Esmonde Cleary, 1989, 95-96; Mattingly, 2007, 531), or the bureaucracy for taxation (Millett, 1990, 180).

Reece (1991; 1995) demonstrated differences is the make up of numismatic assemblages between urban, military and rural sites in Britain. Urban sites have higher proportions of coins from AD 260-296 compared with AD 330-402, the opposite is seen at rural sites. Divergences were also noted at sites in the east and west of Britain, with greater concentrations of later coins occurring to the west (Reece, 1991; Reece, 1995). His work has been further developed by Philippa Walton (2012) evaluating data from the Portable Antiquities Scheme (PAS) and comparative sites throughout Britain as well as the Roman Rural Settlement roject (RRS) project and studies looking at England and Wales (Smith *et al.*, 2016; Brindle, 2017; Henry, 2024a).

Coin supply and use contracted Britain when the mid-fourth and late fourth century are compared (Walton, 2012; Esmonde Cleary, 2017, 189; Henry, 2024b). By AD 388, a third of coin hoards and stray finds of nummi come from urban or military centres. In contrast, silver becomes rare on military sites but is better represented within assemblages at rural sites (Reece, 1972; Bland *et al.*, 2013, 133).

At face value, the flooding of the archaeological record with hundreds of thousands of bronze coins gives an impression of a market economy utilising small change. This, in part, is an artefact of the Roman state's method of clawing back precious metals through taxation in coin. This questions the degree of free market activity in the economy of Roman Britain, consequently we need to assess the scale of state taxation in kind and how these goods were distributed.

Taxation in kind and the distribution of goods by the state

Taxation in kind is a system where a proportion of surplus was provided to the state by the local administration which was then distributed through the *anona militaris* which was developed by Diocletian (Lo Cascio, 2005, 161; Esmonde Cleary, 2013; Bland *et al.*, 2020, 290). Taxation in kind has been viewed as a burden which stifled the economy as goods only flowed in a single direction (Esmonde Cleary, 1989, 10; Black, 1995; Fleming, 2021, 12-15). Similarly it is considered to have had a depressing effect on the volume of coinage in circulation (Casey, 1980; Hopkins, 1980, 124; Millett, 1990, 150).

The absence of detail records for Britain has led to variation on the amount of surplus might have been taken as tax. Surveys generally tend to suggest a range between a quarter to two thirds of net surplus (Esmonde Cleary, 1989, 9; Jones, 1996, 215; Faulkner, 2000, 112; Gerrard, 2013, 97).

Agricultural surplus would not be the only commodity in the taxation in kind system. Britain has a range of resources that would have been exploited by the state, this includes mineral resources, agricultural products (arable products, livestock and goods such as wool) as well as the exploitation of people through taxation, labour and enslavement (Mattingly, 2007; Todd, 2007; Smith, 2017).

We are reliant on archaeological evidence to trace this form of taxation which is primarily based on the presence of granaries, corn dryers and evidence of processing waste at rural sites including farmsteads, villas and at nucleated settlements. Chaff rich deposits have been interpreted with large scale processing and surplus production (Van der Veen, 2022, 144), yet we have limited evidence of large granaries in the larger rural settlements. Consequently it is argued that the bulk of the goods would have been transported away from rural locations reasonably quickly (Lodwick, 2017, 71; Allen, 2018, 83). Environmental evidence indicates the northward movement of produce through insects which are confined to the south-east of Britain found in hay in York (Allen and Lodwick, 2017, 174).

Similarly, the movement of older cattle to military sites has been viewed as evidence of taxation in kind (Stallibrass, 2000, 73-74; Huntley and Stallibrass, 2010; Allen 2017). Allen (2017) analysing the animal bone evidence recorded as part of the RRS noted the increased size of the cattle and increased frequencies of cattle bones in the Upper Thames, Severn, and Avon valleys leading to the argument that their presence at military sites on the northern frontier is evidence that these cattle were driven from the south of the diocese (Allen 2017, 140).

Archaeological evidence has been used to construct a narrative of changing sea and land based supply networks over time primarily based on pottery distributions. In the first and second centuries

Figure 3.8 - The granaries at Birdoswald fort (© Pete Savin)

inter-provincial trade is evident through imported foodstuffs and manufactured goods such as Samian ware, amphora and manufactured goods which 'piggy-backed' on supply networks (Mattingly, 2007; Allen and Lodwick, 2017; Lodwick, 2017, 20). In contrast fourth century inter-provincial trade is less visible archaeologically. Given the importance of tax in kind, this indicates that manufactured goods such as Mayen ware, Argonne Ware and Black Burnished ware (BB1 and BB2) which are recorded either side of the channel did not 'piggy-back' the *anona militaris* on any significant scale (Esmonde Cleary, 1989, 83; Millett, 1990, 161; Esmonde Cleary, 2013, 320; Fleming, 2021).

The northern frontier is a good example of how these patterns changed in the later fourth century. While transport by sea along the east or west coast might be the most cost-effective method, the archaeological evidence indicates that this declines with decreasing BB1 on the west coast (from AD 370) and Nene Valley colour coated ware and BB2 on the east coast (Evans, 2000, 40-41; Bidwell and Croom, 2010, 26-30; Bidwell, 2017, 292).

This decline in coastal trade coincides with a major shift in land based supply routes from AD 350 where Crambeck pottery and other Yorkshire wares dominate assemblages (Evans, 2000, 41; Bidwell, 2017, 303). Crambeck ware was transported for up to 180km including over the Pennines which is viewed as evidence of a military contract (Evans, 2000, 40). The changes seen in pottery supply have been interpreted as evidence of a decline in the size of garrisons leading to a lower demand for foodstuffs by Bidwell (2017, 303). This coincides chronologically with the modifications of granaries at sites such as Birdoswald, Vindolanda and Housesteads (Wilmott, 2010, 13; Collins, 2015). (Figure 3.8)

In contrast to the over land supply routes in northern Britain, the pattern of supply to the Saxon shore forts was typical to other contemporary sites in the region of that fort (Pearson, 2002). 75 per cent of the greywares from Portchester were produced at kilns within 16km of the fort and similar patterns between coin loss at a shore fort and its closest town/nucleated settlement have been noted (Esmonde Cleary, 1989, 86).

The needs of the state including manpower, taxation, production, and supply are heavily interwoven in the wider economy of the fourth century. The state exploited the resources available from the diocese

whether minerals, agricultural or the population of the provinces. While there was a reduction of goods 'piggy-backing' late Roman continental trade routes, the review highlights the continued links with the continent through the supply of coinage, manufactured goods and also the exportation of grain to the frontier. A comparison of the evidence from the northern frontier and the Saxon shore fort indicates the methods used to supply of the *Annona militaris* varies both geographically and temporally.

Key questions relating to the processes involved and how this might be visible within the archaeological record are raised. Tax was collected by the local administration. Therefore, could elements such as the insular belt fittings allow us to consider areas of interest to the state relating to taxation in kind? Similarly, the distribution of coinage highlights areas which had access to circulating coin, suggesting not simply areas which used coinage as part of exchange but also areas which would have been of greatest interest to the state. The absence of peaks in coin loss in the late Roman period on the northern frontier is significant and requires further exploration.

Urban centres – a decline or a change in function?

The previous sections have evaluated how others have considered and presented the structure of governance, the military, as well as production and distribution. Britain under the Dominate was very different to the earlier Principate. The world was now more authoritarian and bureaucratic; much had changed, not least, life in the towns.

Public buildings were symbolic features of Roman townscapes and a key strand of the concept of 'Romanisation'. By the fourth century the importance and roles of towns were changing leading to arguments that they were declining or that 'Romanisation' was simply a veneer (Reece, 1980; Faulkner, 2000, 171). In contrast others have emphasised that towns were simply changing and there is a growing period of prosperity for some key centres, particularly 'small towns' (Burnham and Wacher, 1990; Millett, 1990; Burnham, 1995; Booth *et al.*, 2010, 523; Rogers, 2011).

The urban landscape of Britain varied. It had a diocesan capital (London), three provincial capitals (Cirencester, Lincoln and York), *municipium,* (the only evidenced example being *Verulamium*), *coloniae* (such as Gloucester) and at least 16 *civitas* capitals (Burnham and Wacher, 1990; Mattingly, 2007, 261). In addition we know of over 200 smaller nucleated settlements, many of which have been described as small towns in the past (Burnham and Wacher, 1990). This term is problematic as small towns are regularly defined in this group in negative terms because of what they were not (Burnham and Wacher, 1990; Mattingly, 2007, 290; Fitzpatrick-Matthews, 2014, 43). As part of this study nucleated settlements are defined as either 'undefended nucleated settlements' or as 'defended *vici*' (Smith and Fulford, 2019). The density of urban centres and nucleated settlements is greatest in the south of the diocese (Figure 3.9).

Major urban centres in the fourth century

Towns have been used to consider the extent of the impact of Rome's values on the diocese. Changes in the late Roman period have been taken by some as an indicator of the end of these values (Faulkner, 2000, 121-127) while others simply argue that the requirements of the state and the citizens they created had been modified (Esmonde Cleary, 2013, 104). The role, importance and vitality of towns in the fourth century has been debated; towns have been presented as fossilised (Allen *et al.*, 2017, 3), failed (Faulkner, 2000, 126), or nothing more than administrative villages (Reece, 1980). Approaches taken to inform this discussion have included: urban defences, considering towns through the changing use of municipal buildings; tracking the reduction in the number of town houses; and a consideration of the role that the state required of these towns.

Britain had a large number of earthwork defences constructed before AD 200, many of which were later replaced with stone defences. Unlike Gaul, where the late Roman walled defences were small strongpoints, Britain's walled towns enclosed generous areas and living communities (Frere, 1978, 284; Christie, 2011, 106-107; Esmonde Cleary, 2013, 135). The impetus for this activity and under whose incitive is debated. Fortifications have been interpreted as evidence of declining security (Mattingly, 2007, 531) or evidence of militarisation of the state (Faulkner, 2000, 121). Salway (1981, 265) argued that defensive walls show that town life did not decline, clearly something they considered worth defending.

The forum/basilica is considered to be the living heart of the Roman town in the first and second centuries with space for assembly, public justice and administration (Frere, 1978, 235; Mattingly, 2007, 281; Rogers, 2011). By the third century the use of fora was changing (Esmonde Cleary, 1989, 72; Rogers, 2011; Esmonde Cleary, 2013, 114). Partitioning of the

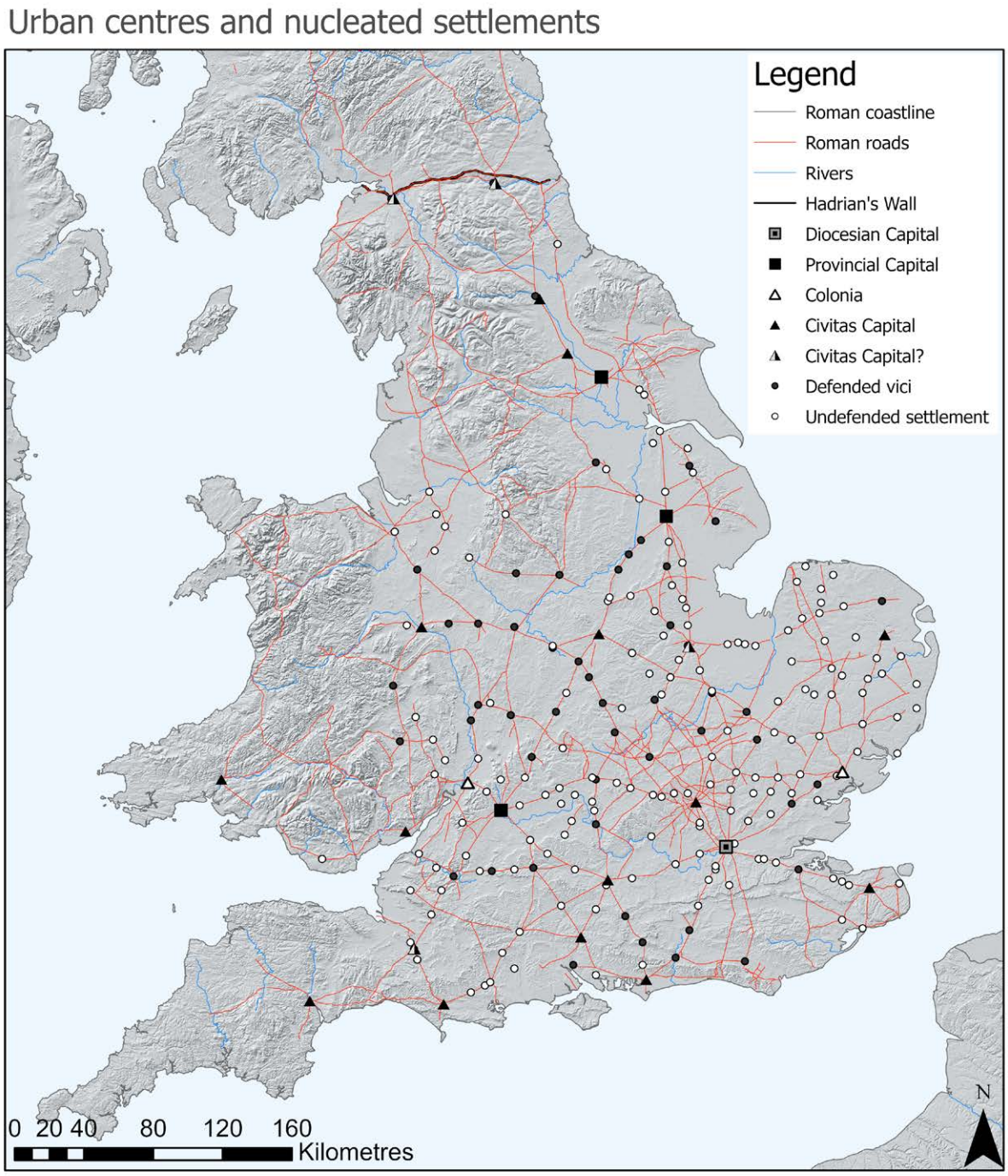


Figure 3.9 - The urban centres and nucleated settlements in Roman Britain based on unpublished data on nucleated settlements provided by Paul Booth

buildings has been identified at Caerwent, York and Cirencester which has been interpreted as evidence that the public building was no longer the focal point or an essential element of a town (Millett, 1990, 137), or that they created exclusiveness of authority (Gardner, 2007, 168).

New features including aisled buildings and gravelled areas appear at a number of sites appear to have some form of public function. The large aisled rectangular buildings have been interpreted as either churches or agricultural storage buildings are recorded from sites including Silchester, Colchester, Lincoln, London, Droitwich and Godmanchester (Esmonde Cleary, 1989; Burnham and Wacher, 1990; Rogers, 2011, 124). Large gravelled areas are laid down in a number of urban centres and defended *vici* in the late Roman period including Cirencester, Exeter, Dorchester-on-Thames and London (See Rogers, 2011, Table 6.1). Faulkner (2000, 121) interpreted these changes as evidence that some declining towns subsequently became military establishments. Contra to Faulkner, Rogers (2011, 129) argued they symbolise a reshaping and continuation of central spaces to meet need. Changes at Cirencester and the modifications at sites in its environs such as Cunetio have also been linked to the *Annona militaris* (Corney, 1997; Fleming, 2021, 25).

Town houses reflect the British aristocracy's ties to imperial service through display and self-representation and active engagement in town life (Mattingly, 2007, 285; Esmonde Cleary, 2013, 257). Faulkner (2000, 30) quantified their number to demonstrate a decline in numbers in the fourth century. His analysis counted the number of rooms in use over time and their construction techniques noting the number of houses in use had declined by 90 per cent by the end of the fourth century.

While the trend is clear, the methodology is too simplistic (Rogers 2011, 31). Furthermore, Faulkner failed to account for damage to late Roman and post-Roman levels caused by ploughing (White, 2007, 180). The methodological approach is also problematic given the challenges of identifying ephemeral buildings in late and post-Roman contexts and the challenges of dating fifth century contexts. Excavations in Winchester for example have shown occupation actually increased in the northern suburb demonstrated by timber buildings (Morris and Biddle, 2023, 80-81).

What we are witnessing is a change in the role of towns when the Principate and late Antique world are compared which coincide with wider social and political changes (Salway, 1981; Dark, 1994, 19). Whether this is viewed in negative terms in dependant on the perspective of the author. By the 360s the major towns appear to have been weakened by changes to their income, the administrative processes and potentially a recession (Mattingly, 2007, 518) but the archaeological evidence (such as coins) does emphasise they play a changing role at the turn of the fifth century (Walton, 2012).

Other nucleated settlements

Archaeological evidence such as artisanal structures in urban centres does support the argument of a shift in the economic basis of large towns and *civitas* capitals in the fourth century (Millett, 1990, 135). The transformation from an economic role to a political one coincides with an increase in the prosperity of 'small towns' (Millett, 1990; Mattingly, 2007, 334). The majority of these nucleated settlements are situated on key nodes of the communication network and had domestic or artisanal functions (Burnham and Wacher, 1990; Burnham, 1995, 10; Mattingly, 2007, 287).

While we do see a trend emphasising the prosperity of nucleated settlement in the fourth century, it is far from uniform. In regions such as Wiltshire and the East of Britain we see patterns of economic decline (Plouviez, 1995, 75; Brindle, 2017, 267; Smith and Henry, 2020). Millett's analysis of small towns included both undefended nucleated settlements and defended *vici.* This makes interpretation complex as they facilitated different economic and administrative roles in the fourth century (Smith and Fulford, 2019).

In contrast to Gaul, an unusually high number of these nucleated settlements were provided with walls in the third and fourth centuries. Defended *vici* were often located on the main arterial routes. Where excavation or surveys have been undertaken a number are devoid of clear evidence of internal structures, others such as Godmanchester have structures considered to have some form of public function (Burnham and Wacher, 1990; Burnham, 1995, 10; Rogers, 2011, 124; Esmonde Cleary, 2013, 136; Esmonde Cleary, 2017, 198).

It has been argued that these fortified centres facilitated the movement (and storage) of substantial quantities of goods, albeit with limited archaeological evidence for granaries at the small number of sites which have been excavated (Wacher, 1995, 207; Fleming, 2021, 19-23).

The absence of contemporary internal masonry buildings at sites such as Wall, Mancetter and

Horncastle has led to the suggestion that defended *vici* provided safe storage for grain transported in wagon trains along the road network (Black, 1995; Liddle, 1995, 93; Allen and Lodwick, 2017, 153).

A significant transformation occurred at urban centres and nucleated settlements in the fourth century. The major urban centres retained administrative roles, yet they may not have remained significant economic centres. Instead, we see an increase in the economic prosperity of nucleated settlements. As Millett (1990) highlights many prosper, yet there is significant regional variation. Rather than viewing the changing nature of towns and other settlements as evidence of decline, the key argument should be regarding their function. Peaks in late fourth century coin loss, a growing increase in exclusivity of authority and new forms of public building emphasise the administrative importance of these centres.

A key question to evaluate is how material from undefended nucleated sites and defended *vici* compare. The creation of a national corpus of site finds by social category used in conjunction with corpuses of late Roman material present an opportunity to consider the changing roles of these sites in the fourth century. Do profiles of material culture from these sites correlate with military, urban on rural sites and can this offer insights into the functions of this complex form of settlement. The notion of decline or prosperity is complex with distinctive cultural patterns and change.

The countryside

The countryside of Roman Britain consisted of an extensive patchwork of diverse forms of settlements which range from modest farmsteads to palatial villas. Over the past few decades, our understanding of these settlements has undergone a profound transformation, owing to intensified surveying efforts and the advent of developer-funded archaeological projects since the 1990s, notably following the introduction of PPG16 regulations.

Prior to these developments, scholarly attention predominantly fixated on villas, often scrutinising their economic activities and architectural features to illuminate social hierarchies and power dynamics (Scott, 1990; Ellis, 1991; Black, 1994; Purcell, 1995; Scott, 2004). However, recent decades have witnessed a paradigm shift in our comprehension of rural Britain. For example, Taylor (2007) utilised data from Historic Environment Records (HER) in England, documenting over 27,000 rural settlements, most of which are identified through earthworks or cropmarks, with limited excavated archaeological evidence. The RRS (Smith *et al.*, 2016; Allen *et al.*, 2017; Smith *et al.*, 2018) compiled data on over 3,700 published rural settlements (including 337 villas) incorporating plans, quantified finds information, and chronologies to characterise and synthesise the Roman countryside.

There was significant diversity in the forms of settlement with many regional forms across rural and nucleated sites (Mattingly, 2007; Taylor, 2007; Smith *et al.*, 2016; Allen *et al.*, 2017; Smith *et al.*, 2018). However, this study primarily delves into the examination of high-status material culture to elucidate the social and political landscape of the fourth and fifth centuries necessitating a focus on the elite who at most would have formed only 10-15 per cent of the population. The local elite wielded considerable influence through their private estates which would encompass a diverse range of settlements such as villages and farmsteads as well as their residences which in many parts of Britain would be villas.

The term "villa" refers to elaborate stone vernacular structures that served as a combination of elite residences and economic units (Millett, 1990). Villas are considered a vital aspect of late Roman elite culture, showcasing aspects of *paideia* and patronage (Esmonde Cleary, 2013, 257; Gerrard, 2013, 141). This might be evident through elements like literacy, as indicated by the RRS findings (Brindle, 2018a, 71-72).

The number of villas experienced a notable surge from the second century onwards, with approximately half of those assessed emerging from pre-existing settlement forms (Esmonde Cleary, 1989; Esmonde Cleary, 2013; Smith *et al.*, 2016). There is also significant variation in the scale and opulence of villas ranging from a handful of rooms including the "cottage" villa at Park Street in Hertfordshire to palatial villas such as Woodchester with over 60 rooms as well as Chedworth in Gloucestershire or North Leigh in Oxfordshire (Clarke *et al.*, 1982; Neal, 1989; Gerrard, 2013; Smith *et al.*, 2016; Esmonde Cleary *et al.*, 2022). Many of the palatial villas expanded significantly in the fourth century, some at late as the final quarter of the fourth century such as Stanwick, Northamptonshire (Esmonde Cleary, 1989; Mattingly, 2007; Crosby and Lyons, 2011; Esmonde Cleary, 2013; Smith *et al.*, 2016; Henry, 2023).

Determining the extent of lands associated with these estates and their boundaries, poses significant challenges (Millett, 1990, 92; Mattingly, 2007). Esmonde Cleary (1989, 114) observes that only a few villas appear to have provisions for housing a labour force. While this suggests potential dependency of local farmsteads

on the villa, it may also reflect a historical bias towards excavating villas over their associated ancillary buildings, rather than conducting comprehensive excavations across wider landscapes, as evidenced by sites such as Stanwick in Northamptonshire, Lyde Road villa in South Gloucestershire, and Maddle Farm in Berkshire (Gaffney and Tingle, 1989; Neal, 1989; Crosby and Lyons, 2011; Hobson and Newman, 2021; Henry, 2023).

Villas are most densely concentrated in the environs around the Cotswolds, the South-West, and the East Midlands in the region referred to as the 'central belt' by the RRS (Taylor, 2007; Smith *et al.*, 2016). They tend to cluster in the environs of the road network and around certain urban and nucleated settlements (Esmonde Cleary, 1989). Villas represent only a small fraction of the overall settlement pattern in the countryside. Scott (1993) documented 1,948 sites, though the evidence supporting this varies significantly with a number solely based on a single roof tile. While caution is warranted when interpreting this gazetteer, it appears that villas constitute, at most five to ten percent of the known Roman settlement in the countryside when nucleated sites are excluded (Taylor, 2007, Figure 4.9; Smith *et al.*, 2016).

In regions with concentration of villas such as the Upper Thames Valley we also see evidence of major reorganisation of the landscape in the later Roman period with a notable shift from enclosed to complex farmsteads accompanied by the development of an intricate network of interlinking trackways (Smith *et al.*, 2016). Analysis of faunal and floral remains at Gill Mill, Claydon Pike and Farmoor in the Upper Thames Valley indicates activities such as corralling and the organisation of herds of cattle, as well as the production of hay and barley, suggesting a focus on maintaining mature cattle for traction (Allen and Lodwick, 2017; Booth and Simmonds, 2018). Moreover, the RRS has observed an increase in the size of cattle bones at military sites during the late Roman period, speculating that these animals may have been driven from regions like the Upper Thames Valley, facilitating tax in kind (Allen and Lodwick, 2017, 140).

Villas did not dominate all parts of the countryside. Instead, enclosed settlements, such as enclosed farmsteads or complex farmsteads, are more prevalent in regions such as the South-West, West and North of Britain (Taylor, 2007, Figure 4.2; Smith *et al.*, 2016, Figure 2.6 and 2.8). Similarly, regions with higher numbers of enclosed settlements tend to have more round houses than rectilinear ones (Taylor, 2007, Figures 4.7 and 4.8; Smith *et al.*, 2016, Figure 3.5). These variations underscore the broad and possibly deep-rooted divisions between different regions of Britain. Each of these regions exhibits culturally distinctive traits, some of which may have eroded over time during the Roman period (Mattingly, 2007; Taylor, 2007; Smith *et al.*, 2018, 351).

In the rural regions of the North and the South-West, evidence of elite status, as inferred from the fourth-century metalwork examined in this study, is notably scarce. These areas appear relatively impoverished in terms of material culture and coinage (Mattingly, 2007, 421; Brindle, 2017, 238; Brindle, 2018b). This may indicate the continuation of traditional pastoral regimes in these regions (Allen, 2018, 89-90), and traditional dress might have persisted as well (Smith and Fulford, 2018). Additionally, the number of rural settlements is lower in these areas, when coupled with the general lack of material culture, low quantities of coinage, and limited pottery finds, this suggests a culturally conservative outlook and a preference for a more traditional way of life, where goods were acquired through customary methods such as reciprocal exchange.

Reciprocity and the exchange of high-status goods to construct or strengthen social bonds were crucial elements of patronage and the prestige economy (Esmonde Cleary, 2013, 308). While socially embedded exchange is exemplified through objects like silver tableware, reciprocity could have been significant at all levels of society (Brindle, 2017, 247). Although towns and nucleated settlements served as marketplaces, it is important not to presume that the entire economy was solely based on these principles. Instead, the trade and exchange of certain goods were likely embedded in social relationships (Rippon, 2017, 341). Within the diocese, a mixed pattern of distribution, trade, and exchange is likely, with not all transactions relying on market-based coinage (Brindle, 2017, 279; Brindle, 2018b).

The landscape was far more varied and complex than earlier syntheses predominantly focussing on villas suggested. Over the past few decades, archaeological investigations, particularly intensified surveying and developer-funded projects, have significantly expanded our knowledge of rural settlements.

The elite class, albeit forming a minority in the countryside, exerted substantial influence through their extensive estates. Although villas served as their primary residences in many regions, these large landed

estates often encompassed a spectrum of settlements, including villages and smaller communities. Villas, characterised by elaborate stone structures, emerged as pivotal symbols of late Roman elite culture, embodying aspects of education and patronage.

While villas clustered prominently in certain regions, not all parts of the countryside were dominated by them. Enclosed settlements, such as farmsteads, exhibited higher frequencies in some areas, indicating diverse regional patterns. The north and South-west, characterised by limited evidence of elite status, suggest the continuation of traditional pastoral regimes and a preference for conservative lifestyles (Mattingly, 2007, 476). In these regions, late Roman material culture and coinage are not as prevalent. Instead, status seems to be represented through other means, especially in regions where pastoral economies were dominant. In these areas, the recovery of objects like crossbow brooches or belt fittings raises questions about their association with either the military or the bureaucracy.

Ceasing to be Roman – Evidence of the state in fifth century Britain

This brief discussion on an entire diocese has provided an introduction to the fourth century diocese of Britain. The focus now shifts to exploring how various authors have evaluated the significant changes that occurred in the fifth century and the implications for constructing narratives about the end of Roman Britain with a particular focus on the late Roman administration and the military.

Archaeological evidence indicates that varying regional trajectories began to emerge from the mid-fourth century onwards, accelerating in the fifth century, ultimately leading to a profound transformation sometime after AD 400 (Mattingly, 2007; Fleming, 2021). The timing and pace of these transformations are subjects of heated debate, and the complexity of the issue is compounded by the loss of two primary forms of dating evidence for this period – coinage and pottery.

In the fourth century bronze coinage is a regular feature in archaeological assemblages, enabling close dating and providing a *terminus post quem* for archaeological features. However, after AD 395 the arrival of coinage significantly diminishes. This coincides with a decline in a number of the key pottery production centres from AD 355 or 370 in the north and AD 390 in the south (Evans, 2000, 40-41; Bidwell, 2017, 302). Nevertheless, there is a growing body of evidence suggesting the continued use and production of Romano-British pottery on a small, limited, local scale after AD 400 (Gerrard, 2013; Gerrard, 2014).

This dating conundrum has led to divergent views, allowing for the formulation of various chronologies for the continuance of 'Roman life' into the fifth century. Consequently, scholars have proposed different perspectives on the trajectory of events during this pivotal period in Roman Britain's history.

The administration and the end of the tax cycle

In AD 409, Zosimus recorded a significant event where the people of Britain liberated cities from threatening barbarians and expelled Roman officials. This has been considered a turning point for the departure of the Roman administration from Britain (Frere, 1978, 428; Halsall, 2007, 202). However, relying solely on this problematic historical account to date the end of the administration presents challenges, as regional patterns visible in the archaeological evidence indicate that governance structures may have ceased to function before AD 400 in certain regions and after 410 in others (Gerrard, 2013, 157).

Given the limited documentary evidence for the fifth-century administration, coinage serves as a proxy due to its role in the taxation cycle and the functioning of the late Roman administration. It has been argued that the collapse of the state in Britain can be indicated by the scarce amounts of bronze, gold, or silver coinage reaching the diocese after AD 402 (Kent, 1994; Moorhead, 2006, 105; Moorhead and Walton, 2014, 101). However, this coincides with a significant production shift, marked by the closure of the last mints in Northern Europe in AD 395, the cessation of production at Milan in AD 402 and only sporadic issue of *solidi* at Ravenna from AD 408 (Esmonde Cleary, 2013, 349).

Bronze coinage was crucial for the Late Roman taxation cycle, without new bronze coinage supply to Britain, questions arise about how tax collection was managed. Previously in the mid-fourth century, large numbers of copies of nummi were produced when the supply of coinage ebbed. In the early fifth century, copies of the last issues of the House of Theodosius are not widespread when coinage availability declines. This absence of copying after AD 395 has been interpreted as the absence of need (Reece, 1973) either as a consequence of the end of commercial transactions

using coins (Esmonde Cleary, 1989; Mattingly, 2007) or the cessation of the tax system (Millett, 1990, 227).

A decline of the quantities of fresh coinage supplied to Britain raises questions about how long coinage remained in circulation during the fifth century. In Britain the phenomenon of clipping of silver *siliquae* appears to coincide with the decline in supply. Fraudulent light clipping may have begun as early as the 380s and continued until the start of the fifth century. After AD 407/409, Constantine III or local authorities continued to raise funds using similar methods (Guest, 2005; Abdy, 2013; Abdy, 2020).

Ascertaining the terminus post quem for clipped hoards is challenging due to the fifth-century watershed and the rarity of Constantine III's *siliquae* (Moorhead and Walton, 2014, 101). Clipped *siliquae* potentially remained in circulation for decades, making definite conclusions difficult. The work of Peter Guest (1997; 2005) demonstrated that through a consideration of the structure of a hoard and the proportions of different coinage within we can discern hoards that was deposited later than their *terminus post quem*. An example of this is the Bishops Canning hoard from Wiltshire which also contained significant quantities of nummi (Guest, 1997; Henry and Moorhead, 2022).

Considering the complexities of coinage in the early fifth century, simplistic models relying solely on declines in coin numbers as evidence of a catastrophic collapse may be inadequate (such as Faulkner, 2000). A more nuanced approach, especially concerning regional variations, suggests that bronze coinage, if still in use, implies continued exchange or adherence to Roman norms and taxation, possibly until c. AD 425 or as argued by some, even later (Dark, 1994; 2000a). However, reaching definite conclusions remains problematic as questions remain as to who clipped silver coinage and when. Its distribution will offer one of the firmest insights into the early fifth century.

The military

The military's dominance in state expenditure is well-documented. Scholars have often argued that the presence of troops in Britain diminished owing to their deployment to support Stilicho, or as a result of the usurpations of Magnus Maximus, Eugenius, or Constantine III, which depleted the British garrison's strength (Blockley, 1997; Faulkner, 2000, 169; Mattingly, 2007, 237; Collins and Breeze, 2014, 65). By the early fifth century, many of the garrisons in Britain had deep local roots, and there is no clear pattern of collapse observed at forts along the northern frontier (Collins, 2013, 29; Gerrard, 2013, 250). Excavations at South Shields and Birdoswald have uncovered evidence of ongoing activity and structural modifications during the post-Roman period which have been interpreted as representing a shift from traditional military units to warbands stationed along Hadrian's Wall (Wilmott, 2000, 16-18; Collins, 2013, 39; Gerrard, 2013, 162-163). Warlordism and the reliance on local strongmen have been seen as natural consequences of the weakened central government and the undesirable aspects of patronage (Hopwood, 1989, 181; Whittaker and Garnsey, 1997, 311).

In contrast, the Saxon shore forts do not exhibit similar signs of usage during the fifth and sixth centuries (Dark, 2000b, 85). Collins and Breeze (2014, 68) argue that approximately half of the Saxon shore forts were abandoned by the end of the fourth century, with significant evidence of fifth-century occupation found at Richborough. They propose a model suggesting that Constantine III's actions led to a reduction in garrisons along the Saxon shore, creating a void in the fifth century.

The historical narrative regarding the disappearance of the army, administration, and coinage, as well as the taxation cycles on a national scale, necessitates further examination, as these events took place at varying times and in different locations. The trajectories of the units under the command of the *comes litoris Saxonici* and the *dux Britanniarum* diverged, potentially due to the removal of troops from the Saxon shore by Constantine III, leading to a dearth of military elite in these regions during the fifth century (Collins and Breeze, 2014, 70). Conversely, evidence points to continuity at several forts along the northern frontier.

The collapse of coinage has been widely assumed to have occurred, possibly catastrophically, after AD 409. However, a closer look reveals regional patterns and efforts towards continuity. Moreover, phenomena like coin clipping have been interpreted as evidence of the population behaving in an 'un-Roman' manner (Guest, 2014, 124) the transition from Roman Britain to the post-Roman period was a result of a complex interplay of diocesan, regional, and sub-regional changes, with various groups responding in different ways.

Conclusions

The brief review of studies on late Roman Britain in the fourth and fifth centuries highlights a diverse array of regional trajectories evident in the archaeological

evidence. While some areas show signs of collapse in the structures of the Roman state, others display potential continuity of *Romanitas* when comparing east and west, north and south. The archaeological findings indicate that certain regions in Britain experienced changes before and after AD 410, cautioning against simplistic grand narratives of either continuity or rupture.

The examination of urban centres, defended *vici*, and nucleated settlements underscores their changing roles. These changes can be partly linked to shifts in the late Roman administration, the development of taxation in kind, and the *Annona militaris*. The comparison between urban and rural areas reveals complex notions of decline or prosperity, characterised by distinct regional patterns. A systematic consideration of coinage and material culture may unveil new patterns amidst this variation.

Although the national-scale administration of the diocese remains shrouded in uncertainty, we know that various roles, including tax collection, were undertaken at the local level, possibly supervised by the state. The re-analysis of objects like insular belt fittings could shed light on their significance beyond local militias and defence, especially considering evidence of corruption and abuse of power. The importance of the administration should be reconsidered, taking into account the role of supply in the functions of the Praetorian Prefect and the proportion of taxation and in-kind payments by the late Roman state.

Understanding state consumption and supply reveals how deeply interwoven the state was with all aspects of life, and it highlights continental links involving the supply of coinage and material culture. Cross-channel connections persisted even in the post-Roman period through continued movement of people. It appears taxation in kind played a crucial role in shaping artefactual distributions and fortifications in Britain, considering agriculture's central role in the economy. Surprisingly, the areas of greatest interest to the state, as suggested by coinage and material culture evidence, do not always align with conventional expectations.

The northern frontier, a backwater in the fourth century, exhibits indications of outdated dress and defensive architecture. Patterns of supply also suggest that coinage did not circulate widely. However, the claim of a single supply base following on from the decline in coastal routes remains inconclusive.

After the first quarter of the fifth century continuity of use is evident in several forts on Hadrian's Wall, while the Saxon shore forts present a different trajectory with evidence of change in material culture, coin profiles, and an absence of continuity. Comparing these regions numismatically and through material culture presents significant research opportunities, given the wealth of archaeological data available.

Major administrative centres in the diocese experienced economic changes, but it should not be assumed that an administrative centre must also be an important economic hub. Instead, nucleated settlements, emerged as vital economic centres playing roles in the taxation cycle for tax in kind or goods in transit. A systematic consideration of the social analysis of material culture could offer new insights in this regard.

The interplay between town and country has been revaluated since 1990, with a wealth of new evidence highlighting the number and density of rural settlements. Instead of simplistically attributing decline, the fourth century should be viewed as a fluid period with fluctuating importance of different urban centres.

The review underscores that significant changes occurred in the fourth century, which must be evaluated to understand the fifth century. These changes encompass shifts in the repertoire of material culture, coin supply, administrative systems, and the army. A holistic approach is essential in comprehending this complex period, as material culture was not used in isolation.

Roman Britain was not a single entity. Comparing the regional trajectories with evidence of continuity or transformation should allow us to provide a new insight into this critical period of British history.

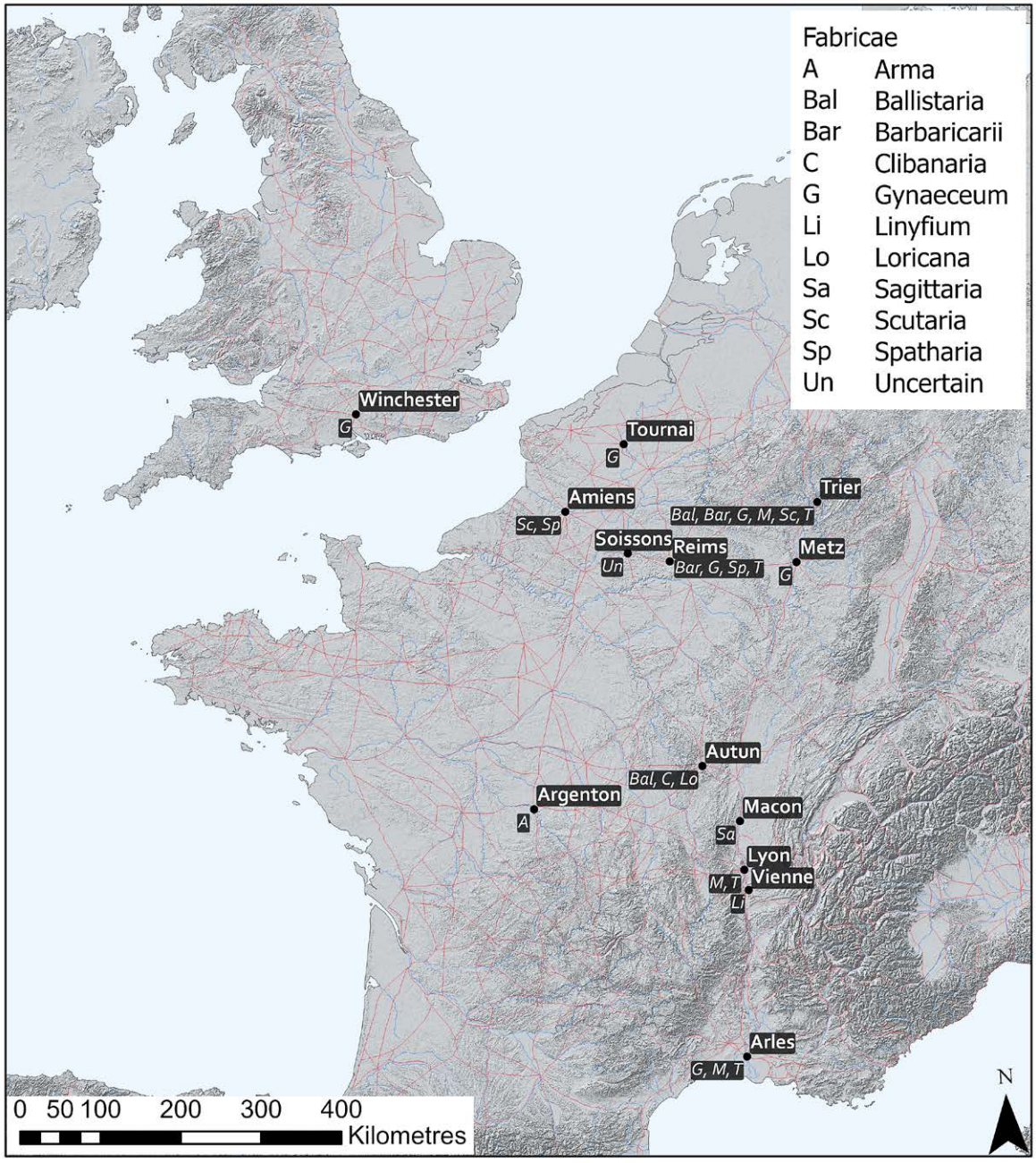
4. Recognising a Soldier or Official

This study evaluates a range of artefacts associated with state officials, it is important to therefore review what we know of this subject from our broader knowledge of high status dress in the later Roman world, from artistic representations, archaeological evidence and literary sources.

Many of these objects could have been worn by individuals fulfilling various roles for the state as well as the local elite (Swift, 2000; Esmonde Cleary, 2013; Esmonde Cleary, 2017; Fleming, 2021). The term 'the State' is used as a general catch-all term representing people in either the military or the administration, who had power over large segments of the population. The purpose of this chapter is to introduce the clothing and material culture associated with these roles to emphasise how individuals in such positions would have been easily recognisable to the general population.

On the continent, examples such as the Great Hunt mosaic from the Villa de Romana del Casale in Sicily (Figure 4.1) or the Silistra tomb in Bulgaria (Figure 4.3, 4.4 and 4.6) underscore that individuals associated

Figure 4.1 - A late Roman official and two soldiers from the Villa de Romana del Casale villa in Sicily (© José Luiz Bernardes Ribeiro).



Ancient World Mapping Center "Background 16", "Coastline" , "Rivers". http://awmc.unc.edu/wordpress/mapfiles.
Roman road network based on Margary (1973).

Figure 4.2 - State fabricae derived from the Notitia Dignitatum after Jones (Jones, 1964) and Esmonde Cleary (2013)

with the state would wear distinctive attire. This typically consisted of tight trousers, akin to leggings, paired with a tunic and a cloak known as the chlamys, adorned with vibrant patches (Kelly, 1997, Halsall, 2007, 104). Additionally, they would have worn a military belt called the *cingulum militare* around their waist (Hoss, 2017b; Hoss, 2017a).

In the archaeological record, we mostly find surviving metalwork associated with such clothing, including crossbow brooches and belt fittings from the *cingulum*. Many of these objects would have been produced at state run manufacturing centres called *fabricae.* The *Notitia Dignitatum* lists their locations across the empire and the specific products they manufactured

Figure 4.3 - A servant holding their master's cloak on which a crossbow brooch is attached from the Silistra Tomb, Bulgaria (Illustration by Nick Griffiths).

Figure 4.4 - A servant holding their master's cingulum militare from the Silistra tomb, Bulgaria (Illustration by Nick Griffiths).

for the army and the civil service including clothing, arms, armour and dress accessories (Figure 4.2). These items have been suggested as indicators of affiliation with the state. Furthermore, certain objects like spurs and specific forms of penannular brooches have also been linked to these groups (Collins, 2010; Cool, 2010a).

Crossbow brooches

Crossbow brooches are a distinctive type of late Roman brooch characterised by their large bow, designed to securely hold a significant amount of textile. Generally, they were manufactured in state-run *fabricae*, although some of the more unique forms found in the diocese of Britain may have been locally produced (Swift, 2000; Cool, 2010b; Mackreth, 2011). Unlike other brooches that were regularly removed and reattached, crossbow brooches appear to have been permanently affixed to the cloak (Figure 4.3).

They were crafted in various alloys, with later types typically made from sheet metal rather than being cast, suggesting that these later types were designed to be worn with fine fabrics such as linen or silk (Mackreth, 2011).

The *cingulum militare*

The *cingulum militare* was the military belt which held significant symbolic importance as a badge of rank (Hoss, 2017a). It is commonly believed to have been made from leather with a buckle and a variety of fittings, depending on the specific type. The late Roman examples found in Britain generally date from

around AD 350 onwards, although few well-dated archaeological contexts have yielded such artefacts (Henry, 2022b).

It has been argued belts were generally not part of civilian dress in the Roman world, as they were typically reserved for individuals of high rank (Leahy, 2007, 134; Booth *et al.*, 2010, 492). Esmonde Cleary (2013, 12) suggests that the elite chose to represent themselves in ways inspired by military power, using these accessories as a means to express their status. Interestingly, the presence of these belt fittings is not limited to the elite, and their distribution indicates a broader adoption of military-style dress and equipment (Ager, 2007; Esmonde Cleary, 2017, 199; Carr, 2019).

In Britain, both continental and insular examples of a range of belt fittings are recorded. Continental belt fittings were most likely produced in state-run *fabricae*. The insular forms were produced at a range of manufacturing centres based on their distribution (Swift, 2000; Leahy, 2007). These insular examples have been linked to a local form of the *cingulum* (Hawkes and Dunning, 1961; Hawkes, 1974; Leahy, 2007). Unfortunately few non secular artistic representations survive depicting individuals in fourth century Britain but include a recently discovered mosaic in Rutland and a heavily reconstructed wall painting from a mausoleum in Poundbury cemetery, Dorset (Davey and Ling, 1982, 106-110; Neal and Cosh, 2024; Shoemark and Henry, In press). The latter depicted four distinctively dressed individuals, three of which are holding sceptres. These individuals have been interpreted as men who hold civil office which provides an insight into the manner such groups presented their wealth and status in the region (Figure 4.5).

Importantly, the variations in the forms of these fittings suggest that they were not exclusively used as waist belts (Henry, 2022b). Additionally, the Silistra tomb

Figure 4.5 - The four male figures depicted on the wall paintings from Mausoleum R8 in Poundbury which have been interpreted as individuals who hold office (© Richard Henry)

Figure 4.6 - A servant carrying their masters trousers over their shoulder and shoes in their right hand from the Silistra tomb, Bulgaria. Note the belt with a buckle and a strap end. (Illustration by Nick Griffiths).

highlights that not all these fittings would necessarily have been visible, as illustrated by a belt set depicted on trousers covered by a cloak (see Figure 4.6).

Spurs

Spurs were not considered essential components of cavalry equipment until the late Roman period. While evidence for their production in state-run fabricae is not entirely clear, the observed typological variations strongly suggest that this may have been the case for some types (Giesler, 1978; Cool, 2010a; Henry, 2022b). However, the status and significance of these objects remain somewhat ambiguous, as they have been associated with both high-status elites, particularly those engaged in activities like hunting, and with the state itself.

Their status as objects of prestige and their potential connection to high-status elites is supported by their link to hunting, an activity often associated with the aristocracy in the late Roman period. However, their presence among other military accoutrements and their potential use by state officials also imply a connection to the state and its symbols of authority.

Penannular brooches

Penannular brooches are a simple form of brooch with long chronologies and little variation in some types over a span of a millennium. These brooches are typically associated with tunics rather than thick, heavy-duty cloaks, suggesting that they might not have been as visibly conspicuous as other types of brooches, such as the crossbow brooch, in signalling social status (Booth, 2015; Henry, 2022b). Their peak deposition occurred in the fourth century, by which time they were predominantly a British phenomenon. Some specific types, such as Booth's Type M found on Hadrian's Wall, have been suggested as potentially linked to the late Roman military (Collins, 2010).

While individual in-depth analyses of the spatial distribution of each of these artefact types has been conducted previously, the social distribution of these forms is a critical aspect that this research will consider. By combining the multiple spatial and social analyses, we aim to link better specific forms of material culture with different groups or regions during the late Roman period. This is essential because the evidence indicates that the status of certain types, such as belt fittings, and the users of these objects changed over time. By discerning when such shifts occurred and understanding their wider implications, we can gain a more comprehensive understanding of the complexities of late Roman society.

5. Identity and Material Culture

This section aims to delve further into the discussion of the key players associated with the late Roman state in the diocese of Britain and their diverse range of identities. It primarily focuses on the military, the bureaucracy, and the civilian elite responsible for local administration as much of this high status material culture would have been used by these groups. In this respect material culture and clothing played a significant role in how the identities (and status) of these different groups were presented.

While Martin Millett's publication, *The Romanization of Roman Britain* served as a significant catalyst for the study of Roman Britain, it also became a focal point for sustained criticism regarding varying concepts of Romanization (see Millett, 2004; Millett, 2025, xix-xxxvi). Millett (1990) undertook a comparative analysis of the archaeological record and material culture in Britain, contextualising it in the broader scope of the Roman Empire and historiography. In contrast to Haverfield (1915) and Frere (1978) who viewed Romanization as a top down process, his approach underscored the influence and agency of the local elites in the process of emulation that contributed to Romanization of the province.

The publication spurred academic debate with new concepts challenging he Roman versus native narrative. These innovative approaches facilitated a more nuanced understanding of diverse and marginalised groups often overlooked in historical records (Pitts, 2007, 693). Noteworthy among these concepts are 'discrepant' identities (Mattingly, 2007), creolization (Webster, 2001), and globalization (Gardner, 2013; Pitts and Versluys, 2015), which emerged as influential perspectives in Roman archaeology.

Identity, being central to human self-perception and social relationships, is not fixed or static but fluid and multifaceted. It comprises various individual and group identities influenced by social variables that evolve over time and may even be contradictory (Hill, 2001; Díaz-Andreu *et al.*, 2005; Eckardt, 2014, 2-8; Revell, 2016, IX). Understanding identity goes beyond merely considering ethnicity and gender in the late Roman period. It encompasses various aspects, including social position, wealth, employment, origin, proximity to imperial government, language, literacy, kinship, age, and gender (Gardner, 2007; Mattingly, 2007, 18). Occupational roles, particularly in the military, play a crucial role in shaping identity, as the military also shared broader ideological and cultural links (Collins, 2017b; 43).

This review will delve deeper into the concept of agency, the facets of identity, focusing on the link between material culture and social status. While much of the material discussed as part of this study may not directly relate to the wider population, it is still important to explore how individuals outside these privileged groups might have expressed various forms of identity. Subsequently ethnic boundary change will be introduced, the tenets of this concept will serve as a key framework for analysing the substantial corpuses considered in this study.

Material culture and agency

The population of Roman Britain expressed a diverse range of identities through their clothing, lifestyle, and diet. Dress accessories, in particular, played a crucial role in communicating social and cultural messages, as they presented the body in specific ways and conveyed particular identities or images (Swift, 2011; Gerrard, 2013). Material culture, including artefacts, is far from passive; it actively shapes identity as well as the societies which use them and influences behaviours and actions through its use and consumption (Díaz-Andreu *et al.*, 2005, 139; Eckardt, 2005; Eckardt, 2017; Harland and Friedrich, 2021, 10).

Throughout the Roman period vast quantities of mass-produced and relatively low-value material culture, such as pottery and metalwork, were accessible to and used by, a large part of the population in the diocese. Analysis of this material culture over time has shown that there was a decline in the range of material available in the fourth century and that life had undergone changes prior to AD 410 (Cool, 2000, 54; Gerrard, 2013, 90). The range of material may have reduced but the quantity produced remained substantial. Around the middle of the fourth century there was a transition in how objects were used and a new suite of material begins to emerge including belt fittings and spurs (Hawkes and Dunning, 1961; Cool, 2010a). Changes can also be identified in female fashion with the introduction of antler combs, an increase in the number of bangles and also a decline in

the number of hairpins (Cool, 1990; Cool, 2000; Swift, 2000, 118ff; Crummy and Henry, 2024).

This material can offer a broad range of insights that inform us about how different social or political groups used objects to present their identity and status. Specialists have developed a range of methodologies to evaluate such changes which can be undertaken at a range of levels from national or regional analyses, consideration of a site or sites to in-depth object biographies.

Crummy (1983) organise material culture from Colchester into different functional categories. Cool (2000; 2002; 2010b), on the other hand, explored the relative proportions of these functional categories, allowing nuanced comparisons between sites with varying assemblage sizes. This approach is particularly effective for the early Roman period. However, defining functional categories can be complex, as an object of personal adornment might be associated with high-status local elites or the military (e.g., late Roman belt sets or crossbow brooches), and objects can serve multiple functions beyond their primary use (Swift, 2000; Allason-Jones, 2011, 9).

Eckardt (2000; 2005, 139; 2014, 17) emphasised the need for a greater focus on the social distribution of artefacts, driven by the development of more complex models of production and identity and the vast increase in available data. While this approach has been critiqued (such as Van Oyen and Pitts, 2017), considering a specific form of material culture across the settlement hierarchy, along with its spatial distribution, establishes "normal" patterns of consumption.

Analysis of the biographies of these objects can inform us about changes associated with this evolution of material available. This can include including repairs or repurposing, providing insights into recycling practices and how populations used material culture to present status and identity in the immediate years after the collapse of Roman Britain (Joy, 2009; Swift, 2012, 185; Swift, 2014; Swift, 2017). While Roman material culture might have remained in use, the manner of its use varied, indicating broader cultural changes (Leahy, 2007; Swift, 2012, 189ff; Fleming, 2021).

By placing material culture in wider frameworks we can explore how objects relate to various elements of identity, such as social status and gender. However, linking specific object types to aspects of identities can be problematic, given the complex interplay of these different aspects that highlight the fluidity of identity and status in the late Roman period (Díaz-Andreu *et al.*, 2005; Esmonde Cleary, 2013, 89; Gerrard, 2013; Eckardt, 2014, 6). As new objects are introduced or adapted, they can challenge existing boundaries and practices, leading to fresh perspectives and questions or, conversely, reinforcing traditional norms (Eckardt, 2017; Versluys, 2017).

When exploring aspects of identity such as age and gender, our knowledge often relies heavily on the burial record or artistic representations. Grave goods can provide insights into changing practices and gendered associations with objects, but they might not always accurately reflect the broader social reality, as cemeteries are sites of public performance (Díaz-Andreu *et al.*, 2005; Cool, 2011; Swift, 2011; Revell, 2016, 110). Additionally, gender boundaries can become blurred, as exemplified by the late Roman belt fittings found in fifth-century female burials, contradicting patterns seen in the fourth century (Leahy, 1984; Leahy, 2007). Despite these limitations, grave goods offer valuable insights into variations in material culture usage based on factors like age and gender.

The agency of objects

Identities are complex and dynamic constructs that are shaped and modified through human interaction with the physical and social world. Material culture, such as objects and artefacts, plays a crucial role in this process. Objects not only communicate the identity that the wearer wishes to present but also have the power to shape both the wearer and the observer (Eckardt, 2014, 8).

In Giddens' theory of structuration, identity is considered a key medium through which agency and structure interrelate (Giddens, 1984; Dornan, 2002; Gardner, 2007, 18). Agency refers to an individual's capacity for action, which develops through their ongoing relationship with the broader world. Structure encompasses both the physical and social aspects of the world, including its rules and resources. In this structure, systems are continuously created and maintained through human interaction. Identity is an integral element of structuration theory as it contributes to the formation of social groups and influences how agents perceive and present themselves (Gardner, 2007, 199).

Bourdieu's (1977) concept of habitus suggests that identity is rooted in the material conditions of everyday life. It is learned or acquired through

interactive practices in a given order of the world. Objects play a significant role in this process, as they are vital in shaping and expressing identity (Versluys, 2017). Habitus explains how identities are developed from the bottom up, influenced by an individual's lived experiences. However, the concept of habitus may not easily account for changes in identity that occur during a person's lifetime, as such changes are influenced by an individual's position in the broader social hierarchy, and there are constraints on how one can express their identity (Pitts, 2007, 701).

Facets of identity

Identity is a multifaceted concept encompassing various dimensions. "Being Roman" has often been perceived as a shared culture based on common assumptions rather than solely defined by material culture (Revell, 2016, 30). However, within this overarching identity, there exists a series of nested identities that might have been more significant and influential than the broader concept of "Roman-ness," as argued by Gerrard (2013, 119). These nested identities interacted and evolved based on factors such as age, gender, social role, and status. Any shared concept of Roman-ness was changing in the fourth and fifth centuries and the picture is further complicated by incoming groups, especially in the fifth century where there has been an assumption that a broader shared concept of being 'Germanic' existed. The different facets of identity beginning with ethnicity will be explored and examined to consider how they can be interpreted and evaluated based on the archaeological record.

Ethnicity

We have seen how particular terms such as 'Germanic' and 'Anglo-Saxon' can be loaded and potentially dangerous, primarily as a consequence of eighteenth to twentieth century scholarship in which the Germanic *gentes* of antiquity were incorporated into patriotic writings (Donecker, 2021, 68; Ţăranu, 2021, 91). These terms as well as discussions of ethnicity have become entangled with philology and racial theory (Halsall, 2007, 35; Kulikowski, 2021, 19). Ethnicity refers to membership in a particular group of people. In contemporary understanding, ethnicity is recognised as a socially constructed and dynamic identity, shaped by historical and cultural contingencies rather than an inherent trait at birth (Díaz-Andreu *et al.*, 2005; Lucy, 2005b; Eckardt, 2014, 26; Revell, 2016). Ethnic groups are defined by culturally ascribed identities based on real or assumed shared culture or common descent, as well as a common present culture (Eckardt, 2014, 26; Revell, 2016, 21; Harland, 2019, 2).

Revell (2016, 50) proposed a layered understanding of ethnicity that extends beyond the boundaries of the largest political institutions. She suggests that communal identities can exist at different scales, encompassing groups of sites or regions. In the context of social changes and shifting political horizons, considering communal identities at multiple scales becomes crucial. Epigraphic evidence demonstrates supra-local identities in Britain where individuals are defined on tombstones by their *civitas* such as RIB 621 (Dobunni) RIB 1065 (Catuvellauni) and RIB 189 (Dumnonii) and material culture has been used to argue that local identities based on kinship and social bonds became more prominent on the northern frontier (Collins, 2010, 73; Mattingly, 2007, 335).

Arguably, ethnicity is a crucial strand to the identity of an individual but numerous pit falls exist in our attempts to evaluate ethnicity using either the archaeological record or from primary sources. In the past, interpretations of grave goods in the North-western provinces often led to assumptions about the ethnicity of the deceased. For example from a Roman perspective, Clarke (1979, 382-383; 2023) suggested that specific grave goods at Lankhills, Winchester, indicated a connection with Pannonia and Sarmatia. However, such fixed notions of ethnicity have been challenged through the analysis of material culture and scientific methods like isotopic analysis, which have revealed the diversity and mobility in Roman Britain and the wider empire (Booth *et al.*, 2010; Esmonde Cleary, 2013, 393; Eckardt *et al.*, 2014; Fleming, 2021; Clarke, 2023). In the fifth century a central tenet of much archaeological research on material culture has looked to ascribe ethnic links to particular objects based on their distribution enabling material culture to be read as the migration of people (Harland, 2021b, 168; Kulikowski, 2021, 22). While distributions can highlight significant spatial patterning, Harland (2021b) argued that ultimately, it is impossible to demonstrate the presence of ethnic sentiment purely through the archaeological record.

Roman and post-Roman sources have been used to reconstruct the nature of the different societies that play a pivotal role in the fourth and fifth centuries such as those who migrated to Britain during the *adventus Saxonum.* Roman texts are shaped by the biases, agendas and cultural frameworks of their authors. Ethnographic classifications that are found in Roman texts are best described as etic (outsider defined) rather than emic (self-defined) perspectives on a particular group (Pinto, 2021, 113). As a consequence the external labels imposed by Roman authors based on their prejudices and stereotypes may not necessarily align

with the self-perceptions on the groups they defined (Egetenmeyer, 2021, 149). While this is particularly important to consider with barbarian groups outside the empire, this may also be the case for populations in the empire as well, especially in a peripheral diocese such as Britain.

A Roman identity?

Being Roman represented one aspect of an individual's collective identity and was intricately tied to their position within the complex power structures of Roman society (Woolf, 1998; Pitts, 2007, 709). However, the term "Roman" is used in an ambiguous manner, encompassing both cultural identification and citizenship (Revell, 2016, 25). While there is limited evidence of a distinct collective name, the Romans lacked a specific term to describe their shared culture (Woolf, 2021). Instead, Revell (2016, 27) argues that a sense of shared history was the primary defining element of Roman identity. Additionally, concepts such as *paideia* and *humanitas*, along with characteristics highly valued by the Romans such as the legal distinctions between the *honestiores* and *humiliores*, were integral parts of the broader Roman identity, although with a particular emphasis on the elite (Woolf, 1995; Esmonde Cleary, 2013, 437; Gerrard, 2013; Revell, 2016). We shall see in the discussion of ethnic boundary change that these distinctions are crucial aspects.

A further challenge in discussing any shared concept of Roman identity is its potential evolution over time (Harland, 2021a, 24). This becomes particularly problematic in the fourth and fifth centuries, as traditional distinctions began to blur—most notably with the militarisation of the elite and shifting perceptions of what it meant to be Roman amid increasing Barbarian, particularly Germanic, influences (Egetenmeyer, 2021). While the roots of this transformation can be traced back to the later third and fourth centuries, the collapse of Roman Britain disrupts this trajectory, obscuring its ultimate outcome.

A Germanic identity?

Identity is a key issue when considering the *adventus Saxonum* and how modern scholarship has viewed the identity and ethnicity of various incoming groups in the fifth century. 'Germanic' is often viewed interchangeably with the term Anglo-Saxon in Britain (Walker, 2021, 189). It has been argued that the concept of a shared 'Germanic' identity is a modern construct which owes its origins to the rediscovery of Tacitus' *Germania* (Harland, 2021a; Harland and Friedrich, 2021, 1). The Franks, Burgundians, Goths, Vandals and other tribes were presented as a larger collective united by blood and regarded as branches of the same genealogical tree – *omnes Germani sunt* (Donecker, 2021, 67).

The challenge is that the tribes and individuals used to create a 'Germanic' identity are from Roman sources which contain their own bias. Consequently 'Germanic' ethnicity and identity have both been created from the lens of Roman erudition. Different peoples have been described primarily as part of a geographical discussion placing the population in descriptions of lands outside the Empire as a way to enable the author and the reader to comprehend the world. As Pinto (2021, 122) has rightly highlighted the Roman empire exerted its cultural power to create, narrate and enforce barbarian (in this case 'Germanic') identities. As a consequence of the power of the empire, even after the imperial state collapsed the ideological frameworks of power in Britain still operated by its association with Roman power, while its power had waned it still dominated the symbolic and ideological realm (Harland, 2021b, 181).

Ţăranu (2021, 98) noted that one of the strengths of the term 'Germanic' is its ability to encompass a wide range of elements simultaneously. However, this versatility is also a potential weakness, as the term carries an inherent vagueness—similar to concepts like Romanisation, *Romanitas,* and the notion of a singular Roman identity. These terms can be so broadly applied that they risk becoming vague catch-alls, rendering them unhelpful unless clearly defined.

Gender and age

The study of material culture reveals that specific objects often carry strong gendered associations, such as bracelets being traditionally linked to women or crossbow brooches and belt fittings to men (Swift, 2000). In some cases, even materials themselves have been associated with particular genders, as observed in the connection of jet to women (Allason-Jones, 1996). However, these gendered associations are not rigid and can undergo changes, particularly during times of significant social and political transformation. For instance, during the late Roman period, Hawkes and Dunning Type I buckles are linked to men based on grave goods but in the post-Roman period, roughly half of known examples occur in female burials (Leahy, 1984; Leahy, 2007).

Age identities are dynamic and evolve over a person's lifetime. Scholars have traditionally studied age

through two main lenses: the life course and the rituals marking transitions, predominantly relying on historical sources, or the examination of age identities in specific cultural contexts, especially material culture associated with them (Clarke, 1979; Revell, 2016). It is crucial to consider age as part of defining gender categories, as perceptions and roles would differ based on age (Díaz-Andreu *et al.*, 2005; Lucy, 2005a). Cultural constructs shape age categorisations, leading to variations in the treatment and burial practices for different age groups. This is apparent when comparing how infants, adolescents and adults are buried and the grave goods deposited with them (Clarke, 1979; Díaz-Andreu *et al.*, 2005; Fleming, 2021; Crummy and Henry, 2024). Material culture plays a role in developing and reinforcing these age categories (Lucy, 2005a).

Status

Status plays a significant role in shaping interpersonal interactions (Babić, 2005; Díaz-Andreu, 2005; Díaz-Andreu *et al.*, 2005). During the late Roman period, the use of objects varied in the social hierarchy and across regions. A comprehensive social analysis is essential to understanding this period, as there was a notable militarisation of elite dress (Swift, 2000, 2-5; Esmonde Cleary, 2013, 89). Investigating the groups associated with these objects and exploring changes over time provides valuable insights into a period marked by profound social, economic, and political transformations. This section will examine status through the lens of professional identities of the state, the elite, and the wider population.

The exercise of power permeated everyday social interactions (Babić, 2005; Díaz-Andreu *et al.*, 2005; Lucy, 2005b). An individual's clothing and material culture were immediate indicators of their association with the state and its power structures, whether in the military or civil bureaucracy (Halsall, 2007, 31; Esmonde Cleary, 2013, 89). This emphasis on occupational identity likely overshadowed considerations of geographical origin or ethnicity (Eckardt *et al.*, 2015; Collins, 2017b; 43).

The late Roman period saw a profound role of the military and administration in shaping identity, leading to the militarisation of elite dress (Esmonde Cleary, 2013, 89; Esmonde Cleary, 2017). Appearance seemed to be less determined by previous cultural traditions and more influenced by strict social hierarchies and individual choices. Swift (2000) argued that the military significantly influenced the distribution of material culture during this period, even extending to civilian female objects like bracelets and beads. Interestingly, akin to concepts such as creolisation, James (2001) argued that Rome conceptualised its military organization from the bottom up. Soldiers were regarded as a class of men rather than just an institution, leading to significant diversification in the identities of the provincial garrisons (James, 2001). Studies exploring the late Roman state through the archaeological record highlight the connection between belt fittings, crossbow brooches, and high-status burials at sites like Lankhills, Winchester, Scorton, Yorkshire, or based on continental examples (Clarke, 1979; Booth *et al.*, 2010; Collins, 2010, 68; Collins and Breeze, 2014; Eckardt *et al.*, 2015; Clarke, 2023). These objects served as markers of occupational identity, which took precedence over geographical origin or ethnicity.

In this context, the burial record along the northern frontier is particularly significant, exhibiting a scarcity of funerary evidence compared to the south. For instance, at sites like Birdoswald or South Shields, graves consist of stone cists or burials without grave goods (Wilmott, 1999). Collins (2017b) posited that if these burials represented officials or soldiers, differences might exist in how these identities were expressed in mortuary rituals compared to other regions. He suggested that in the south of the diocese, a greater emphasis on military identity might be found, influenced by pressures from other elite identities (Collins, 2017b, 45). Halsall (2007, 27-28) argued that the inclusion of grave goods, such as belt sets and brooches, could be symptomatic of social instability and competition for local power, as such objects were employed to maintain and enhance standing.

In general, elite status is often assumed to be straightforward, a notion that Revell (2016, 62) has questioned. Elite identities did not exist in isolation but were part of a complex social rank structure. Elite rank was tied to privileged access to specific forms of cultural knowledge (*paideia*) and behavioural norms which distinguished the elite from other societal levels (Halsall, 2007, 67; Esmonde Cleary, 2013). These distinctions were reinforced through elite self-definition, which encompassed aspects such as architecture, dress, and material culture.

The gradient of status was evident through high-status goods made from precious metals, symbolizing the pinnacle of social stratification, like the Hoxne or Thetford treasure (Johns and Potter, 1983; Johns, 2010). Late Roman hoards often emphasised female objects, reflecting the significance of jewellery as a store of female wealth (Gerrard, 2013, 146). While

acknowledging the physical value of these objects, we must not overlook their role as visual markers of female elites in presenting family status or discount the impact of women themselves in society (Hill, 2001; Fleming, 2021).

Visual displays of wealth and status extended beyond portable objects. The construction methods of different objects offer insights into the clothing with which they were used; for example, sheet metal brooches were often paired with delicate materials such as silk (Mackreth, 2011). Gerrard (2013, 155) suggested that, alongside dress accessories, cosmetics, perfumes, and hairstyling might have also served as means of defining status. Unfortunately, only a partial picture remains regarding material culture and the materials used for clothing construction.

Changes in dress were seen by Revell (2016) as part of a broader process of cultural change, forming part of a series of messages individuals conveyed to a wider audience about themselves. The distribution of Roman military equipment and military-style brooches in rural contexts suggested that elements of military dress were embraced by the elite (Swift, 2000, 2-5; Esmonde Cleary, 2013, 89). The shifting use and production of belt fittings, significant visual markers of a particular identity, were adopted by others seeking to embrace a similar identity (Esmonde Cleary, 2013; Esmonde Cleary, 2017). Millett (1990) and Woolf (1998) argued that the broader adoption of elite-linked material culture was driven by emulation. However, Revell (2016, 84) challenged this view, highlighting the need to contextualise the adoption of material culture in its social, political, and economic setting.

While this study primarily analyses material linked with elite groups, we must use caution when assuming that a lack of some high-status Roman goods indicates a scarcity of resources or a less sophisticated way of life (Díaz-Andreu *et al.*, 2005). In certain regions, Roman material culture and lifestyles may have been deliberately rejected. In these cases, status representation might have taken different forms that do not leave a clear trace in the archaeological record (Mattingly, 2007; Mould, 2011). The preservation of strong regional identities should not be mistaken for backwardness or a less sophisticated way of life; rather a deliberate choice (Lucy, 2005b, 104).

Avowed and ascribed identities

In the setting of the profound social, cultural and political changes of the late fourth and early fifth century in Britain we need to consider how the key groups considered as part of this study found their identities shifting in response to the changing political landscape through avowed and ascribed identities (Antony, 2016).

The military, civil service and elites all used specific forms of material culture to claim (avowed) different aspect of a Roman identity seeing themselves as part of the imperial system which structured their lives. Military units particularly in the northern frontier commanders may have continued to view themselves as Roman officers, responsible for provincial defence, while bureaucrats saw their roles as essential for maintaining governance and taxation. Local elites, particularly those who had benefitted from Rome's urban culture and administrative systems, likely still identified with the ideals of Roman *paideia* (Egetenmeyer, 2021). However, as central authority collapsed, the meaning of these roles became increasingly ambiguous.

The way that these individuals were perceived (ascribed) began to shift, which at times is likely to have clashed with their self-perceptions; for example military leaders transitioning to local warlords acting in their own interest rather than that of the empire (Wilmott, 2000). Local elites, once respected as representatives of Roman order, were forced to negotiate new identities, sometimes presenting themselves as community leaders. These changing avowed and ascribed identities are central evaluating the transformation of the fifth century through a consideration of ethnic boundary change.

Ethnic boundary change

The term ethnic boundary change refers to the shift in the social, cultural, and symbolic boundaries that define different groups. In this respect it relates to identity as a whole not simply the narrower tenet of ethnicity, consequently it will be described as boundary change.

This concept was first introduced by Barth (1969), who argued that ethnic identity is not simply based on shared culture or ancestry but is maintained through the boundaries that create social distinctions, differentiating one group from another. While Barth's original framework focused on ethnicity, following Wimmer (2013), this concept is applied here more broadly to examine how the population of Britain responded to significant political and social changes,

with a particular focus on material culture and coinage patterns.

Wimmer (2013, 64-70) argued that we should move away from static models of ethnicity and boundary change, emphasising instead how institutions and power structures shape boundaries. His work highlighted that state institutions have the ability to make their preferred distinctions politically relevant and culturally legitimate, often through force. In this study, this idea is most clearly seen in the legal distinction between the *honestiores* and *humiliores*. This social divide created a boundary that was not easily crossed by the majority of the population while the Roman Empire's political and cultural framework persisted in Britain.

The transformations seen in the fourth and fifth centuries, as Roman control and influence in Britain waned, created opportunities for new boundaries to emerge. In this respect, the concepts of *boundary shift* and *boundary drift* are particularly important to this study.

Boundary shift is the first mechanism of change, occurring when a group actively redefines its identity *from within*, often in response to broader social and political transformations. In the context of the transition from a Roman diocese to post-Roman polities, this can be seen in the way local elites - who were responsible for much of the administration - adapted to the loss of centralised governance. These elites sought to continue asserting a Roman identity as long as possible, even as the political framework changed. In contrast, others may have deliberately distanced themselves from Roman affiliations. These endogenous shifts led to variations in how different regions approached the end of Roman Britain, depending on local choices and circumstances.

Boundary drift, in contrast, involves change driven by *outside influences*, which introduce new ways of thinking or acting. The presence of incoming groups, particularly in certain regions, could influence how other areas responded. For example, Walker (2021, 199) argued that the distribution of Anglo-Saxon cremation cemeteries and insular forms of penannular brooches in Lincolnshire reflects a fifth-century population embracing aspects of two culturally distinct groups to forge their own identity.

Wimmer (2013, 133-135), when discussing ethnic groups in Switzerland in the late twentieth century, observed that many individuals did not draw boundaries based on ethnicity. Instead, they categorised people according to a moral hierarchy, defining groups based on social structure. Those who were considered "decent and orderly" were distinguished from those who had not assimilated into cultural norms and were thus kept at arm's length. A similar analogy can be drawn for the later Roman Empire, where ethnicity, as we understand it, was less important than education and *paideia*. Sidonius Apollinaris, for example, valued education and proper behaviour over ethnicity and ancestry (Egetenmeyer, 2021).

As we have seen, specific forms of late Roman material culture were used to emphasise the status and identity of the wearer. The significance of these objects, particularly late Roman belt fittings, changed over time. While these fittings are primarily associated with men in the earlier part of the late Roman period, an analysis of examples deposited as grave goods reveals a shift in the fifth century, with over half of all recorded examples linked to women. This highlights the research potential of examining boundary shifts and cultural drift when considering different regions of Britain during this period of significant political and cultural transformation.

Conclusion

Identity is multifaceted, fluid, and subject to change. The interplay of different elements within the concept of identity is crucial to understanding the changes that occurred during the late Roman period. Material culture, although often viewed as passive, plays a significant role in constructing and maintaining social, cultural, and personal identity (Eckardt, 2007). Theoretical consideration of the relationship between material culture and identity can offer new insights into the use of, and changes to, material culture in the late Roman period.

Massive cultural and social changes create opportunities for actively changing and constructing identities (Eckardt, 2014, 4). Understanding identity is central to comprehending the changes that occurred in the late Roman and post-Roman periods, not only among the military but also among the entire populace of the diocese. The elite's use of material culture and architecture to display state-centred ideology played a vital role in shaping the landscape (Gerrard, 2013; Fleming, 2021). Material culture significantly impacted people's lives, and meaningful objects mediated power relationships in the deeply hierarchical fourth century. The changes observed in the immediate post-Roman period are particularly significant, and it is essential to

recognize that transformations in material culture are integral to political change and are intertwined with the overall processes (Woolf, 2017). By looking at the end of Roman Britain through the lens of boundary change we can evaluate evidence for the changing identities which were formed through the use of remnants from the Roman period and the transmission of new ideas (Fleming, 2021).

The approach to material culture and identity should be based on detailed datasets. A holistic approach, combining theoretical concepts and settlement hierarchy analysis, can help test previous assumptions and describe social categories through archaeological evidence, as advocated by Pitts (2007, 702) to create new narratives. Exploring aspects of identity also raises questions about how individuals perceived themselves both ideally and in reality. For my datasets, the focus lies on expressions of status and regionality, rather than ethnicity. Coin data provides insight into economic activity and deposition practices.

6. Aims, Objectives and Methodological Approaches

Having reviewed the state of research into Later Roman Britain, and how the key players considered used objects to emphasise their status and identity this study will focus on analysing a specific range of material culture and coinage from Later Roman Britain. Through a systematic analysis of high -status items of dress associated with officialdom and the local administration as well as coinage which will act as a baseline for these distributions what insights can we gain to aid in our understanding of the twilight of Roman Britain.

The central aim of this study is to evaluate four key research questions based on the competing narratives of the end of Roman Britain using the significant corpora collated here.

1 – Establishing the connection made between these objects and the state:

Analysis of high-status items of clothing and accessories aims to evaluate the evidence linking them to the state, especially considering the argument that there was a militarisation of elite dress in the fourth century. This will be undertaken through an assessment of the social and spatial context of this material to see if we can ascertain if certain forms were primarily worn by officials, military or the elite.

2 – Identifying Different Types of Officials:

Investigating the distribution of different sets of accessories might aid in identifying the presence of various types of officials or military units such as the *comitatenses* across late Roman Britain. Analysis of the sites from which these materials are found may offer insights into the specific roles and functions of officials in different regions.

3 – Assessing Britain's Integration into the Empire:

To consider how Roman Britain fell apart it is central to consider how integrated Britain was with the broader Roman Empire in the first place. The material culture and in particular coinage considered here have been used to support the argument that Roman practices were simply a thin veneer emphasised through the continued production of insular forms of object or that the diocese had a fully integrated elite who engaged with changing fashions.

4 – Understanding Regional Disengagement from the Empire:

By examining the chronological dimension and distribution patterns of the material culture and particularly silver *siliquae*, this research can shed light on the regional trajectory of disengagement from the Roman Empire across Britain.

For this to be achieved each object considered as part of this study has to be recorded systematically based on the typological studies used to enable detailed spatial and social analysis. By teasing apart the substantial corpora in this manner each dataset can be utilised through a broad range of artefactual and numismatic approaches. This baseline of a wide suite of material will enable further interrogation by other researchers and the datasets will be freely available online (Henry, 2022a; Henry, 2024b; Henry, 2024a).

Social and spatial analysis – the methodological approach

Each category of material will be analysed in turn, systematically in the same fashion. Every body of data considered here has its own idiosyncrasies, so in each case, first, the previous work on each will be reviewed: the various typologies which have been developed; which is the best model to follow, and which has been adopted for this study; what has been said about the production and distribution of these artefact types in the past; and what are the key research questions that the analysis needs to address. After the review, each section turns to the creation of the database for this study. A comprehensive corpus for each material type has been compiled, utilising the revised typology.

The analysis of the data is then undertaken. The primary forms of analysis comprise spatial, and social approaches.

The spatial analysis will focus on:

- The spatial distribution of the entire corpus
- Comparing the excavated material with material from the PAS
- Typological spatial variation
- Stylistic spatial variation, such as insular or continental material, or decorative features (where applicable).
- Correspondence analysis will be undertaken on each of the corpora (where applicable).

Where available the date of the context each find was recovered from is recorded. We face a number of challenges with unstratified and residual material within these corpora, the latter is an issue for the penannular brooch analysis in particular. Generally, the vast majority of the material is undated or recovered by metal detecting. When assessing the dated contexts, it was often found that these objects were central to the dating of particular layers.

The social analysis will focus on the types of sites from which the material originates. The data are presented as proportions to facilitate comparisons across differently sized corpora. This broad approach to social distributions examines the cultural contexts in which most of the material was deposited. While it may not allow for the identification of individual identities, combining this with spatial analysis reveals nuances in the data, providing deeper insights into the groups that utilised these objects in the past.

Social analysis across the settlement hierarchy presents challenges in site classification. A single site may have multiple and overlapping functions over time, complicating categorization. For instance, Richborough or York could have both military and urban functions (Wilmott and Smither, 2020; Breeze *et al.*, 2022; Henry, 2022b).

The methodology here includes five broad social categories: military, urban, nucleated settlements, rural and PAS rural. However, all of the sites have also been allocated to various sub-categories in order to examine in finer detail specific hypotheses and regional patterns.

Military - This category has been sub-divided into regional areas to test hypotheses presented by authors such as White (2007) about the existence of a late fourth century command in Wales and for comparisons between different regions. The sub-divisions are: Hadrian's Wall, the Saxon shore Forts, the Pennines, Wales and other military sites.

Urban - This category has been subdivided into large towns (diocesan and provincial capitals, and *coloniae*) and *civitas* capitals. Major urban centres played a crucial role in the administration of the Early Roman province, but in the later Roman period their status is contested. They have been described as 'fossilised' (Smith *et al.*, 2016), as being 'merely administrative villages (Reece, 1980) or as being victims to an increase in the prosperity of 'small towns' due to the latter's location on *civitas* boundaries (Millett, 1990).

Nucleated Settlements - In the Nucleated category are sites previously defined as 'small towns'. This problematic category is generally based on 'what they are not' rather than any particular similarities between the settlement forms and functions (Burnham, 1988; Burnham, 1995; Mattingly, 2007; Smith and Fulford, 2019). Small towns have been viewed as prosperous in the late Roman period, fulfilling a range of administrative and economic functions (Millett, 1990). It has also been suggested that defended *vici* will have fulfilled key military or administrative functions for the state. Nucleated settlements have been sub-divided between defended *vici* and undefended nucleated settlements based on Smith and Fulford (2019) to consider if these sites bear similarities to either the larger urban or military sites.

Rural - Rural sites have been sub-divided into: villas, enclosed farmsteads, farmsteads, caves, industrial sites and religious sites.

PAS Rural - 'PAS Rural' has been created as an additional nominal category, as we often know very little about the nature of the sites material came from. Much we may generally consider to have come from 'rural' sites, but it is a presumption. So when PAS datasets have been used supposedly from the countryside, the name PAS Rural has been used to highlight the potentially more diverse range of site types the group might encompass.

Other - There is a final category for other types of site location which has been used to categorise finds from oppida and hillforts.

At the end, key observations about each material group will be drawn out, which will then all be pulled together in the final discussion and conclusion.

7. Crossbow Brooches

In the late Iron Age and early Roman period brooch use was prolific in Britain with over 15,000 recorded from excavations and museums as well as over 35,000 recorded with the PAS. This proliferation has been described as the 'fibula event horizon' (Hill, 1995; Bailey and Butcher, 2004; Mackreth, 2011; Cool and Baxter, 2016). These brooches were used to fasten cloaks (bow brooches) as well as being decorative pieces (plate brooches). Various types were used throughout the social hierarchy, others seem to be military types such as the knee brooch (Snape, 1993; Eckardt, 2005; Mackreth, 2011; Cool and Baxter, 2016; Van der Veen, 2021). Significant changes in the use of brooches occurs in the third century caused by a change in fashion and dress notably the preference towards the wide sleeved tunic called the Gallic cloak (Wild, 1968). After this date the primary forms of brooch used to fasten cloaks or tunics seen in the archaeological record consist of the crossbow brooch or the penannular brooch.

The distinctive crossbow brooch was produced in copper-alloy, silver or gold and could be either cast or manufactured from sheet metal. Metallurgical analysis reveals the copper-alloy examples were produced from a limited range of alloys which suggests large scale manufacture (Bailey and Butcher, 2004, 183). Crossbow types 1-4 are interpreted as highlighting the status of members of the late Roman army and civil service (Swift, 2000, 4). Later sheet metal types 5-6 also appear to have links with high-status civilians due to their distributions (Swift, 2000, 88). The development of the crossbow brooch types was not straightforward, there was considerable overlap between types and regional variation (Pröttel, 1988; Swift, 2000).

Typological studies

The methodology used to define the crossbow typology is based on the method of manufacture, the length of the foot in contrast to the bow, decoration, the cross section of the arms and the form of the knobs.

Keller (1971) considering material from Pannonia suggested six types. This typology was further developed by Pröttel (1988) and Swift (2000) detailed in Table 7.1. Types 1-4 were cast and are solid, whereas Type 5 and 6 are hollow and produced from sheet metal. Keller's typology distinguished Type 3 and 4 by the width of the bow, in contrast Pröttel combined them and created sub-groups based on decorative styles.

Don Mackreth (2011) studying crossbow brooches from Britain created a typology which was based on Keller's work using an independent numbering system and sub-classes (Table 7.1, noted in Figure 7.1 as (M.)).

The corpus in this study will use the Keller/Pröttel/Swift typology. Such an approach allows for a continental comparison using the data compiled by Swift (2000). Although the typology presented by Mackreth focuses on material in Britain, it is less nuanced regarding analysis of Types 2, 5 and potentially 6.

Production

Citing the *Notitia Dignitatum,* it has often been suggested that these brooches were produced at state *fabricae*, principally in Pannonia (c.f. Riha, 1979). As part of her study considering regionality in the Late Roman West, Swift (2000, 73) has shown regional patterns in the distribution of the crossbow typology suggesting uniform production and supply in most provinces. She concludes that a major production centre was located in Pannonia where Types 3/4 are most prominent while other types were produced to the west of the Rhine, particularly Types 2, 5 and 6.

Metallurgical analysis of crossbow brooches emphasised a variety of alloys, leaded bronze was linked to regional production and gun metal to central production (Van Thienen and Lycke, 2017; Van Thienen, 2021). It has also been argued that increased lead levels could be linked to the production of dress accessories associated with the late Roman army (van der Meulen-van der Veen, 2023, 9).

The majority of crossbow brooches from the diocese of Britannia were produced on the continent. The idiosyncratic appearance of some Type 1 examples has led to the suggestion that they might have been produced in Britain, potentially corroborated by a failed casting from Wroxeter (Swift, 2000, 73; Cool, 2010b, 279). Collins (2017b) argued that this raises questions regarding their production and distribution, principally what were the mechanisms of control for who could produce brooches in Britain and were they still considered official.

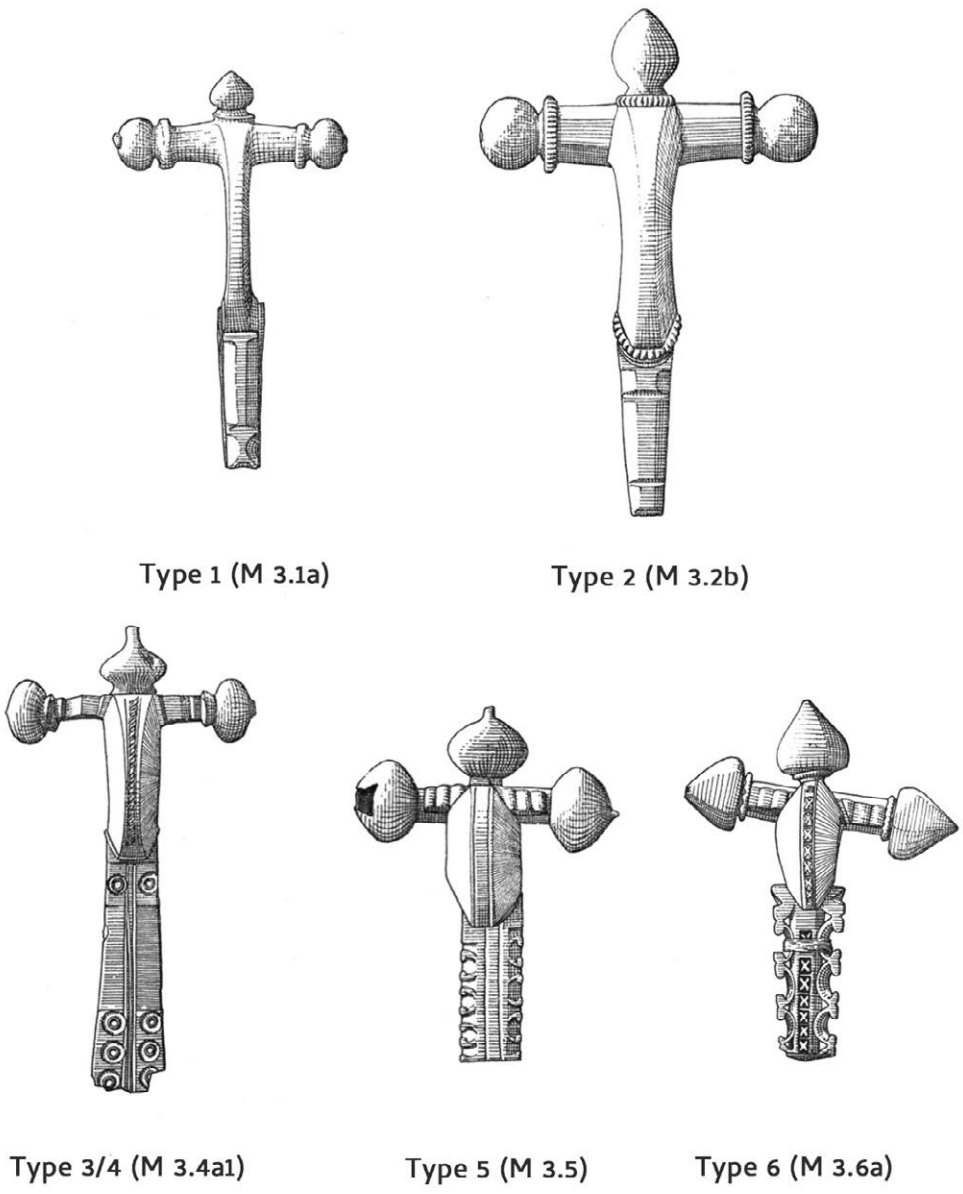


Figure 7.1 - Examples of Keller/Prottel types 1, 2i, 3/4b, 5i and 6ii from Lankhills cemetery, Winchester. Mackreth subtypes are provided within the brackets. (© Winchester Excavations Committee, Illustrations by Nick Griffiths).

Distribution

The distribution of crossbow brooches has been considered by authors such as Swift (2000), Collins (2010; 2017a), Mackreth (2011), Twort (2017) and Carr (2019). Generally, the material has been considered either spatially or the proportions of types compared at an inter-provincial, diocesan or regional level.

Swift undertook inter-provincial comparisons of the proportions of each Keller/Pröttel type based on a corpus of 1,083 crossbow brooches (including 108 from Britain). She highlighted that on the continent, Type 3/4 brooches formed the majority of the corpus from each province (ranging from 50-70 per cent). Few Type 5 or Type 6 brooches were recorded from the provinces of Noricum, Raetia and Pannonia (Figure

Table 7.1 - Revised Keller/Prottel typology (after Swift 2000) and Mackreth (2011). Two definitive type 3.2a are gold, one incomplete possible example of this type is constructed from copper-alloy

Revised Keller/Pröttel/Swift typology	Mackreth (2011)
Type 1 – Cast	
1 (AD 290-320)	3.1a (AD 290-310) – Double basal moulding 3.1b (AD 290-310) – Lack of regularity
Type 2 – Cast	
2i (AD 300-340)	3.2a (AD 310-350) – Primarily/all gold
2ii (AD 300-340) – Narrowed bow, knobs often faceted	3.2b (AD 310-350) – Foot shorter than the bow
2iii (AD 335-365) – Pronounced cuff	
Type 3/4 – Cast	
3/4A (AD 325-355) – Geometric decoration	3.3a (AD 340-360) – Foot is shorter than the bow
3/4B (AD 350-410) – Dot and circle decoration	3.3b (AD 340-360) – Three crosses across the foot
3/4C (AD 330-410) – Involuted decoration	3.4a1 (AD 350-380) – Dot and circle decoration
3/4D (AD 330-410) – Trapeze decoration	3.4a2 (AD 350-380) – Continuous dot and circle 3.4b (AD 350-380) – Involuted decoration 3.4c (AD 350-380) – Triangular perforations
Type 5 – Sheet metal	
5i (AD 350-415) – Involuted decoration and niello	3.5 (AD 370-400)
5ii (AD 350-415) – Trapeze decoration, no niello	
Type 6 – Sheet metal	
6i (AD 390-460)	3.6a (AD 400-c.450) – Derived from Type 5
6ii (AD 390-460) – Openwork involuted decoration	3.6b (AD 400-c.450) – Long and thin 3.6c (AD 400-c.450) – Screw terminals only

8.2). In contrast, there was a greater proportion of Type 1 (AD 280-320) and a lower proportion of Type 3/4 (AD 325-410) from Britain. Swift concluded Type 3/4 brooches were not brought to Britain in any great numbers (Swift, 2000, 49). The distribution of Type 6 brooches from the North-west provinces were away from frontier regions leading to the conclusion that their social and symbolic status had changed and this type was a marker of high status (Swift, 2000, 81).

Collins (2010) evaluated crossbow and penannular brooches from the northern frontier. When comparing his corpus (78 examples) against Swift's his results followed a broadly similar pattern. A higher proportion of Type 1 brooches occurred in his study area in contrast to Britain overall. He argued crossbow brooches occurred in greatest numbers at sites which were officially linked with the administration of the frontier such as the forts at South Shields and Vindolanda and the urban centres of Corbridge, Carlisle and York (Collins, 2010, 66). Type 5 was absent, he concluded this type was linked to certain officers of the *comitatenses* or a branch of the imperial service (Collins, 2010, 68).

Spatial distribution

Mackreth (2011, 240) linked the crossbow brooch to units of the late Roman army and the civil service. He considered his Types 3.1 (Type 1) and 3.2b (Type 2) were worn by the *limitanei* due to the northern distribution. Types 3.3 (Type 3) and 3.4 (Type 4) were linked with units of the *comitatenses*. No supporting distributions maps were included.

Collins (2017a, 209) collated a dataset of 286 crossbow brooches from Britain including 146 examples from the PAS. Collins notes that in PAS data there is a greater divergence from standard typological forms particularly Type 3/4 (Collins, 2017a). While acknowledging the widespread distribution he noted they most commonly occur at military sites or cemeteries such as Lankhills, Winchester or Scorton, near Catterick (Figure 7.2, left).

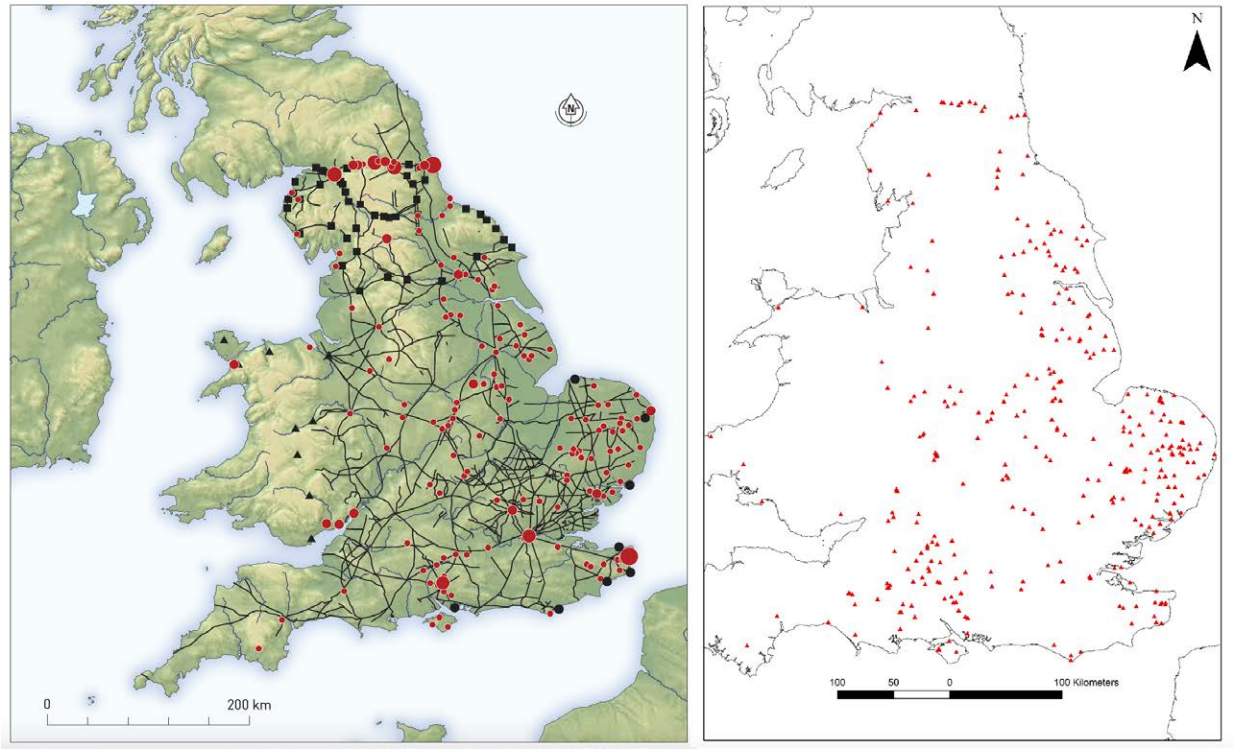


Figure 7.2 - The distribution of crossbow brooches collated by Collins (2017a) of 286 brooches and Carr (2019) of 488. The latter includes earlier light crossbow types resulting in a significantly different distribution particularly in the south of Britain

Carr (2019) compiled a corpus of 488 brooches albeit without a typological breakdown. Light crossbow brooches (a third century type) were also included in the corpus resulting in far higher numbers recorded from the PAS (322) in contrast to the study by Collins (146). The distribution of the corpus was not divided by type and graduating quantities were not presented (Figure 7.2, right). The distribution is widespread, such as in the South-west which is a result of the inclusion of earlier forms.

Social distribution

Carr's work also looked to evaluate the social hierarchy of where these brooches occurred, demonstrating clear variation. The greatest quantity of examples in his corpus were collated from military sites (c. 90), with c. 24 examples from urban sites and c. 26 from rural sites. The absence of typological breakdown prevents meaningful comparisons with the results from this study.

Social distribution was considered for data from the Low Countries by Van Thienen (2017, Figure 10.b). He divided the brooches by four chronological phases rather than specifically by type (Before AD 280 – light crossbow brooches; AD 280-320; AD 320-380; AD 380-425) and into four social categories - Rural, Urban, Fort and Unknown. The majority of all types when considered spatially were recorded from urban sites such as Tongeren, the Saxon shore fort at Oudenburg or along the *limes* particularly from Nijmegen. While finds from all four phases are predominantly from the unknown category, the proportion of brooches from urban sites declines and the proportion from military sites increases.

Continuation into the fifth century

Crossbow brooches could potentially have very long lives in Britain. The suggested date of production for Type 1 brooches is c. AD 290-320 whereas examples from Lankhills were deposited c. AD 350-390 (Clarke, 1979, Grave 373; Henry, 2022b, Tables 6.2-6.6 list dated examples for all crossbow types from Britain).

The evidence from examples deposited as grave goods offers further insights into the value of these objects

ascribed by particular communities. Broken and repaired examples indicate that crossbow brooches kept their power when not pristine and some examples have been repaired (Clarke, 1979; Cool, 2010b, 284; Mackreth, 2011; Eckardt *et al.*, 2015; Henry, 2022b). Examples deposited in the fifth century might have retained their power and status as heirlooms or they were continued markers of identity.

The long lives of these objects and repairs seen could be due to the limited supply of the Types 3/4 in Britain but also the importance placed on these objects by the wearer and the wider populace. Archaeological evidence also hints that earlier types may have remained in use.

Research questions

Swift (2000) demonstrated that the proportion of crossbow brooches by type differed in Britain to the continent. No national study has evaluated variation spatially or within the settlement hierarchy. Consequently, can we identify regions where specific types predominate and can this inform us about the individuals who wore these objects such as military or administrative personnel or the local elite?

Does the social distribution of these brooches from sites such as defended *vici* correlate with either military sites or urban settlements? If so, can this offer an insight into those who were located at these sites?

The absence of distribution maps means that Mackreth's conclusion linking the *comitatenses* and *limitanei* to specific types should be treated with caution. Crossbow brooches are one of the key object types which might be able to inform us about specific units or other groups present at sites across Britain in the fourth century such as the *comitatenses.*

The dataset

The brooch corpus (404 examples) used as part of this study builds on the corpora of Swift (2000), Bailey and Butcher (2004), Collins (2010) and Mackreth (2011). Much of the spatial data is based on the work undertaken by Cool and Baxter (2016) further developing the corpus by Mackreth (2011). Since the work of Swift we can note a drastic increase in the size of the corpus from Britain principally due to the advent of the PAS. Swift (2000) recorded 109 examples, Mackreth (2011) recorded 127, in contrast Collins (2017a, 209) collated a dataset of 286 brooches from Britain which included PAS data. The dataset has been added to ADS (https://doi.org/10.5284/1090416)

In these corpora for this project there is limited information on dimensions and weights which could possibly limit specific analyses. As the material was considered as part of a literature review, although some evidence of damage or repairs are visible the illustrations but not always noted in detail which is also problematic (Mackreth, 2011, Plate 141-42). This prevents detailed analysis of repairs and damage on a corpus wide scale.

The chronological dating of these objects follows the work of Keller, Pröttel and Swift defined in Table 7.1. where dates for crossbow brooches are recorded from Britain they have been included in Table 7.2.

Table 7.2 - Dated examples of crossbow brooches from Britain. As can be seen the vast majority are from a single site; Lankhills cemetery in Winchester. The example from Wroxeter is unlikely to be as late as the sixth century.

Site	Type	Reference	Context date
Segontium	1	Mackreth (2011), 12033	c. AD 300-350
Lankhills	1	Clarke (1979), Grave 426, 532	c. AD 350-390
Richborough	1	Bailey and Butcher (2004), No. 299	c. AD 375-425
Segontium	1	Museum Wales 37.441/2	c. AD 375-425
Wincle	2	Mackreth(2011), 10469	c. AD 275-425
Cirencester	2	Mackreth (2011), 10505	c. AD 375-425
Lankhills	2i	Clarke (1979), Grave 106, 121	c. AD 340-390

Site	Type	Reference	Context date
Richborough	2iii	Mackreth (2011), 10468	c. AD 295-425
Lankhills	2iii	Clarke (1979), Grave 13, 13	c. AD 350-370
Lankhills	2iii	Clarke (1979), Grave 23, 24	c. AD 350-380
Segontium	3/4	Mackreth (2011), 11949	c. AD 300-350
Lankhills	3/4	Booth et al (2010), Grave 895, 1	c. AD 330-425
Lankhills	3/4	Clarke (1979), Grave 81, 74	c. AD 350-370
Lankhills	3/4	Booth et al (2010), Grave 745, 1	c. AD 350-425
Wroxeter	3/4	Mackreth (2011), 12575	c. AD 500-600*
Catterick	3/4a	Mackreth (2011), 10454	c. AD 250-380
Lankhills	3/4a	Booth et al (2010), Grave 3030, 1	c. AD 330-425
Lankhills	3/4c	Cool (2010), Grave 1846, 1	c. AD 370-425
Lankhills	3/4d	Booth et al (2010), Grave 1075, 1	c. AD 330-425
Lankhills	3/4d	Booth et al (2010), Grave 1925, 1	c. AD 330-425
Uley	3/4d	Woodward and Leach (1994), 125 1	c. AD 360-
Lankhills	5ii	Clarke (1979), Grave 234, 278	c. AD 350-390
Lankhills	6	Clarke (1979), Grave 322, 447	c. AD 370-390
Lankhills	6	Clarke (1979), Grave 373, 587	c. AD 390-400

Analysis and Results

Crossbow brooches have been recorded from a total of 229 sites (Figure 7.3). The greatest concentrations can be seen at sites along Hadrian's Wall and East Anglia, Kent and the South of Britain.

Three or more crossbow brooches have been recorded from 26 sites in Britain (Figure 7.4). The highest numbers are recorded from Richborough (22), Lankhills cemetery in Winchester (17), London (13), Wroxeter (13) and the fort at South Shields (12).

As noted, Swift's consideration of the proportions of type from each province highlighted that similar proportions of Type 1 and Type 3/4 occurred, proportions of Type 3/4 were significantly higher from the continent. When the proportions of each type in Swift's British corpus and this dataset are compared, significantly higher proportions of Type 3/4 brooches are now known (Figure 7.5).

This is due to the crossbow brooches from military sites forming the principal element of Swift's corpus whereas this study incorporates data from the RRS and Mackreth (2011). The proportions for Types 2, 5 and 6 vary slightly when compared with Swift's data but generally follow the same broad pattern. In total 47 examples of the sheet metal Type 5 and 6 are recorded demonstrating that the diocese had access to high-status goods in the final decades of the fourth or potentially the fifth century.

The higher proportions of Type 3/4 strongly indicate that there was greater uniformity of supply to the diocese than has previously been noted. Furthermore, the spatial distribution of these brooches is widespread, leading to questions regarding the roles

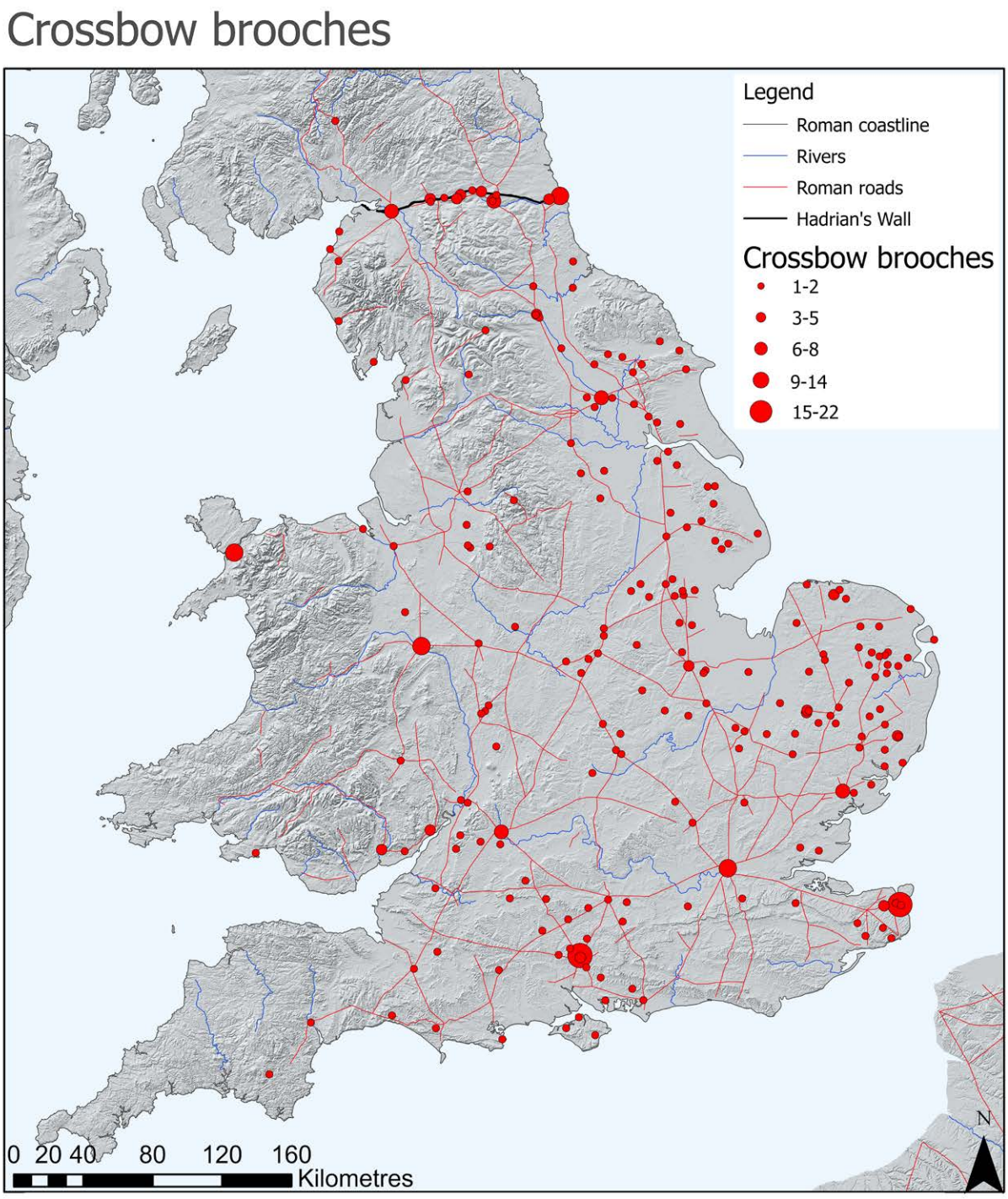


Figure 7.3 - The distribution of crossbow brooches in Britain (Total 404).

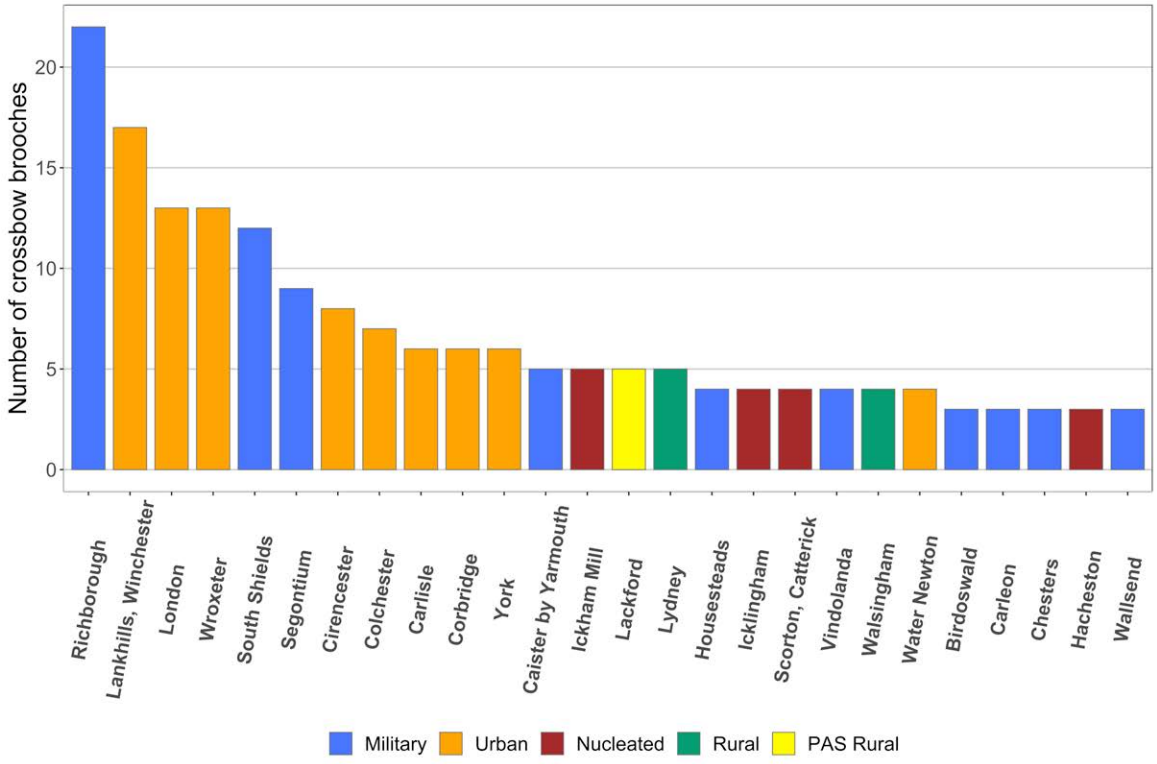


Figure 7.4 - The quantity of crossbow brooches recorded from individual sites (with a minimum of three examples).

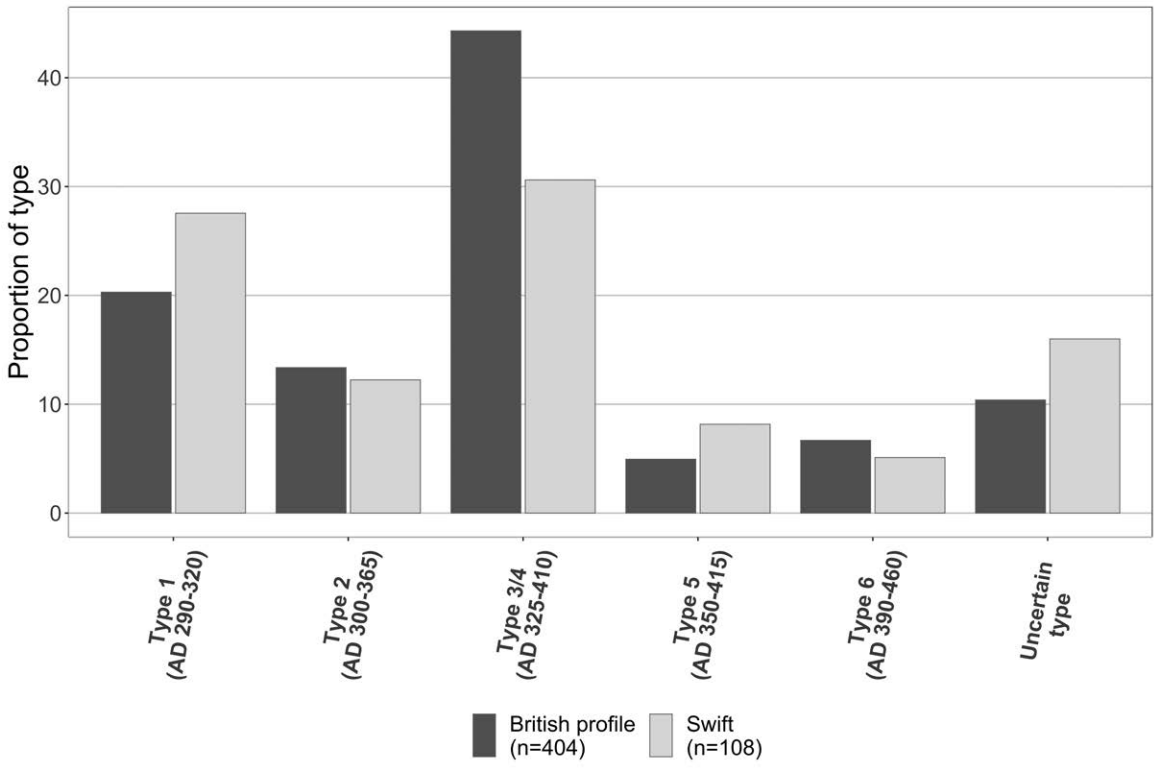


Figure 7.5 - Comparison of the dataset collated by Swift and this study divided by Keller/Pröttel/Swift type. There is a significant increase in the proportion of Type 3/4 brooches in Britain.

the wearers of these objects performed (Figure 7.4). To consider the implications of this, a range of analyses will be undertaken to evaluate the variations in the proportions of brooch types.

PAS Finds

134 crossbow brooches in the corpus have been recorded by the PAS. This material adds a significant contribution further expanding the distribution and filling in gaps between traditionally excavated sites, especially in East Anglia and in the environs of York (Figure 7.6). A combination of datasets forms a robust corpus which allows for the consideration of trends at diocesan and regional scales.

Generally, as it has been argued that PAS finds reflect rural regions of the diocese, these finds have been assigned a separate social category. When compared with the proportions from the nucleated and rural datasets similar proportions of Type 1 and Type 2 are recorded. The main variation occurs with Type 3/4, 5 and 6 (Figure 7.7). The Type 3/4 peak is significant as it further consolidates that this type penetrated a greater geographical area of the diocese than previously noted. There is variation with Types 5 and 6. In part this is due to the quantity of Type 5 and 6 from excavated high-status rural sites (principally villas) and also religious sites (primarily from Lydney). These two site subtypes account for half of the Type 5 and 6 brooches recorded from rural sites.

Within the PAS dataset the uncertain type category is principally formed from fragments of cast crossbow brooches (Types 1-4) rather than sheet metal (Types 5 and 6). It has been suggested that this could be a result of plough damage to these objects, or perhaps support the suggestion by Vince Van Thienen that they could be clippings from the recycling process (Vince Van Thienen pers. comm.).

Comparison by site type

In previous studies urban and military sites have dominated the corpus, but nucleated and rural sites (excluding PAS Rural) now form 30 per cent of this corpus which is a substantial increase (Figure 7.8).

Military sites have a substantially higher proportion of Type 1 brooches, the proportion for Type 2 examples is broadly comparable between the categories and a higher proportion of Type 3/4 occurs at urban, nucleated settlements and rural sites (Figurer 7.9). Lower proportions of Type 5 are recorded at military sites with only a single example from the northern frontier — a phenomenon previously noted by Collins (2010).

The higher proportion of Type 1 brooches at military sites appears to reflect limited supply, need, or access to later types when compared with the diocese as a whole. This pattern is not due to chronological changes as occupation continued at many sites to the end of the fourth or into the fifth century. In these patterns we can also discern the changing status of these brooches and the social and economic groups which used them (particularly with Types 5 and 6). Arguably what this might indicate is limited movement of troops in some areas of the diocese particularly the northern frontier or a change in the objects worn to emphasise status.

The use of these brooches (and their supply) changed over time in Britain. Consideration of subsets of the major social categories could elucidate further nuances within the pattern. Can we identify the evolution of the military supply network suggested from the mid-fourth century on the northern frontier (As suggested by authors such as: Evans, 2000, 40-41; Bidwell, 2017) or can these brooches aid in our understanding of the presence of the state in urban and rural contexts?

Military sites

From the mid-fourth century there was a change in supply networks to the frontiers of Britain based on ceramic evidence (Evans, 2000, 40-41; Bidwell, 2017). Gerrard (2013) suggested that the archaic architecture of the forts along Hadrian's Wall indicated it was a cultural backwater in this period.

Higher proportions of Type 1 brooches occur across all the military sub-categories, albeit the quantity from the Pennines is limited (Figure 7.10). The proportion of Type 3/4 brooches from Hadrian's Wall, the Saxon shore forts and Wales is significantly below the national average.

It is significant that there is an absence of Type 5 and Type 6 brooches on Hadrian's Wall and military sites in the Pennines (one Type 6 is recorded from the potential *civitas* capital of Corbridge). These types are recorded as part of the Saxon shore and Welsh datasets. The higher proportions of Type 6 recovered from Saxon shore forts is predominantly due to the substantial assemblage from the intensive excavations at Richborough (Bushe-Fox, 1928; Bushe-Fox, 1932; Bushe-Fox, 1949; Wilmott, 2017). Intensive excavation also occurred at Portchester and only a single crossbow

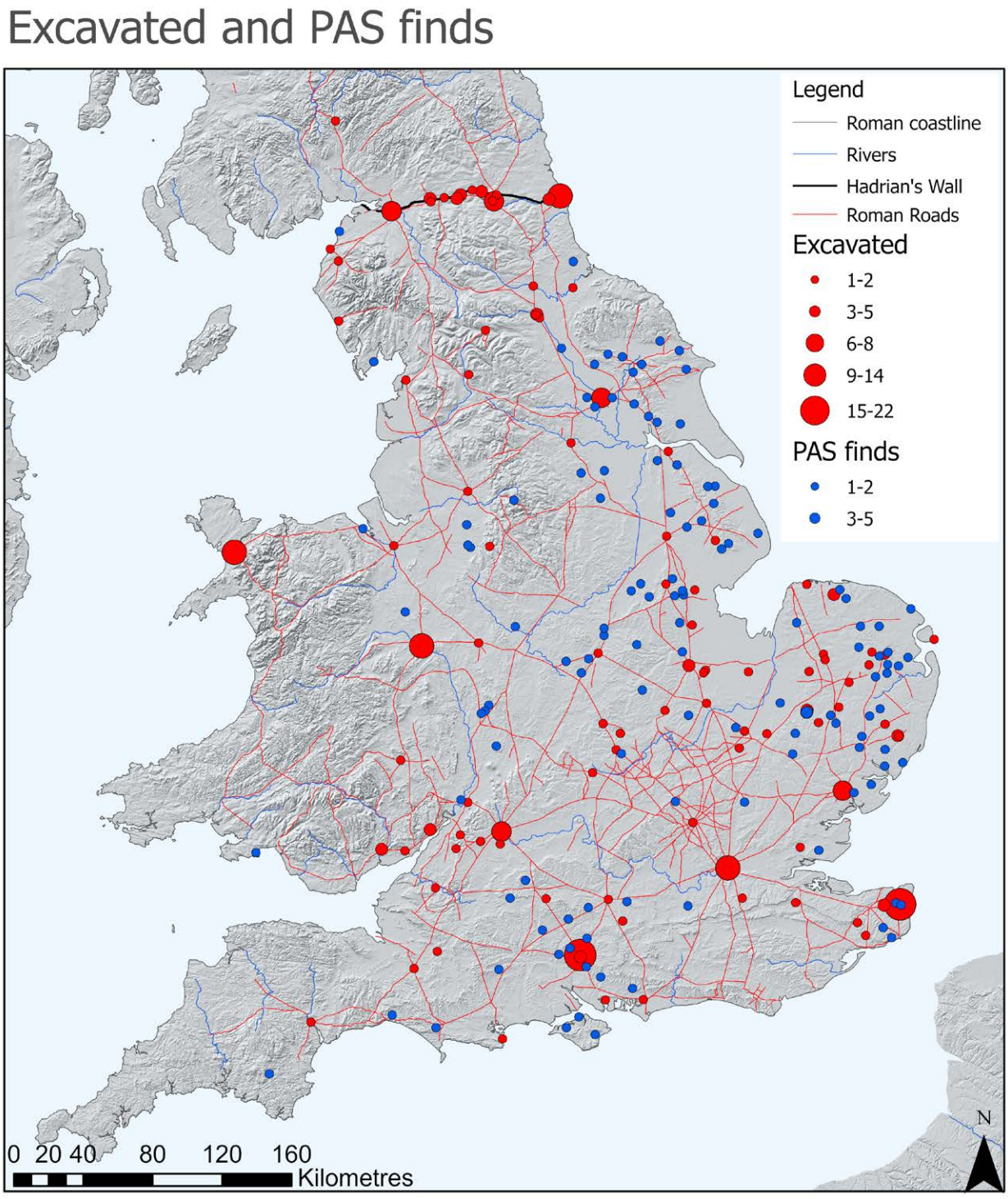


Figure 7.6 - Comparison of the corpus derived from the PAS (134) with site finds (271)

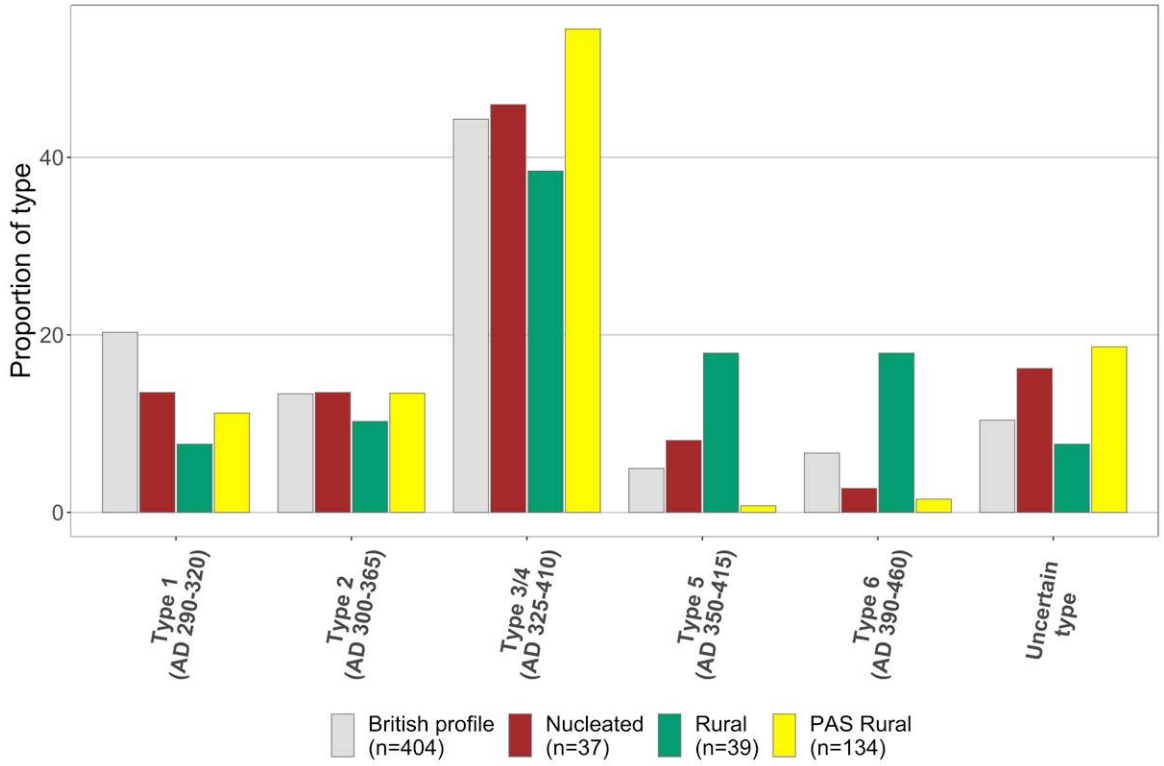


Figure 7.7 - Comparison of the proportion of brooch types between Nucleated sites, Rural sites and the PAS Rural datasets.

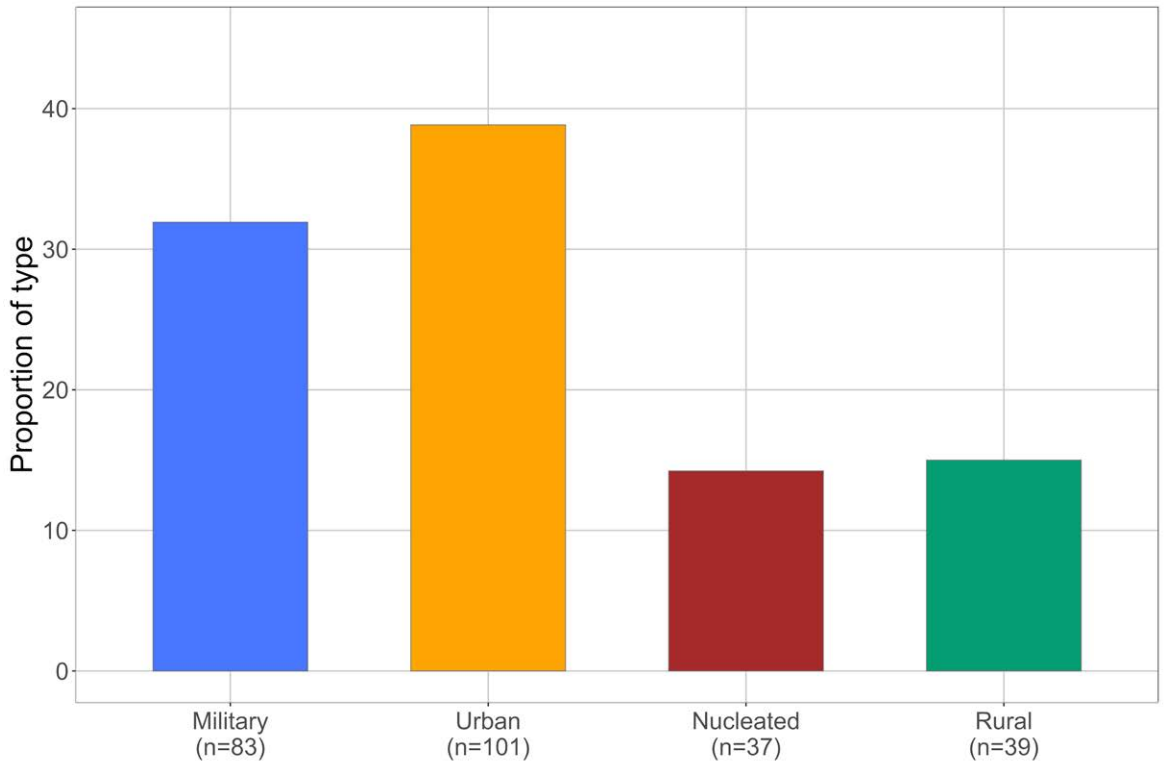


Figure 7.8 - The proportion of crossbow brooches from military, urban, nucleated and rural sites within the corpus.

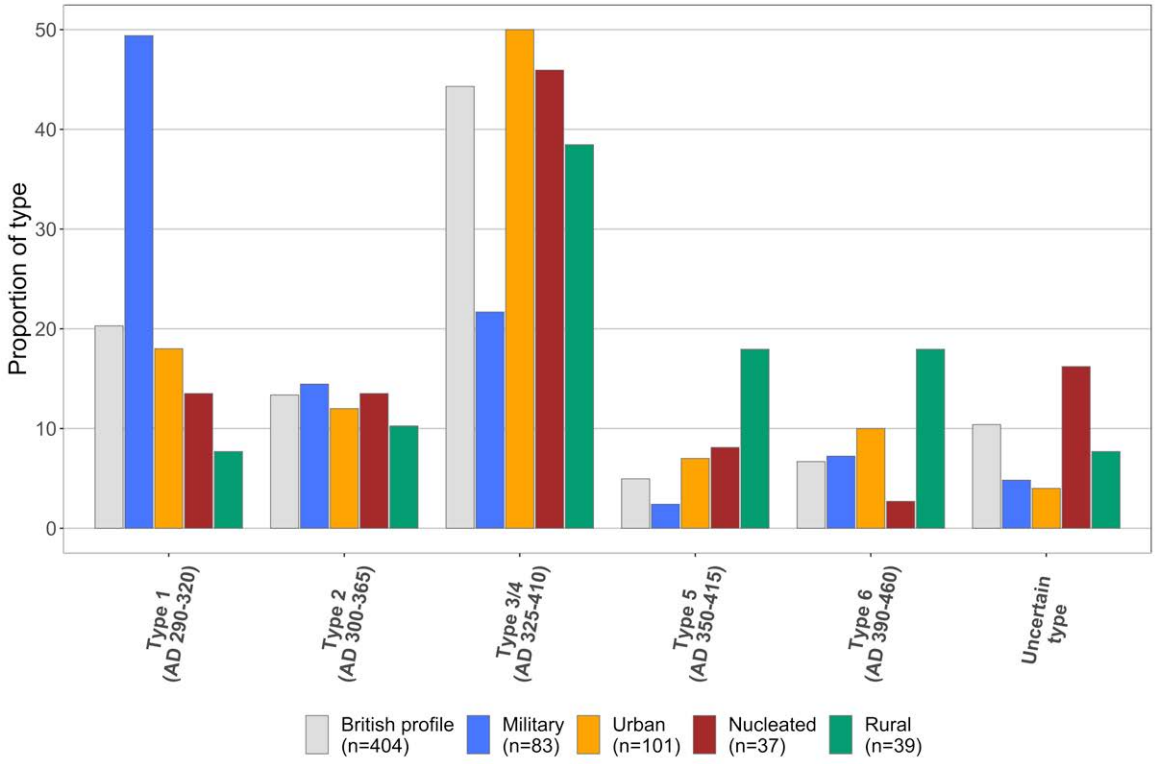


Figure 7.9 - Comparison of the proportions of Keller/Pröttel/Swift types from military, urban, nucleated and rural sites.

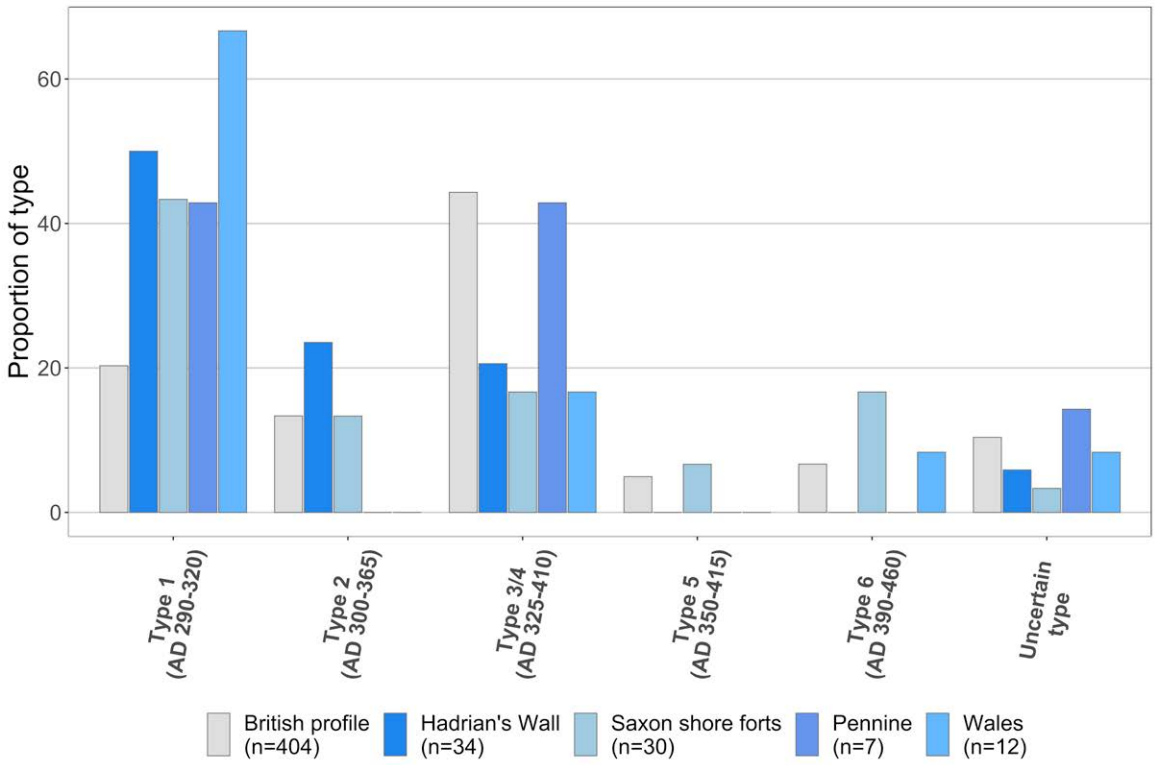


Figure 7.10 - Comparison of the Keller/Pröttel types from the military sites.

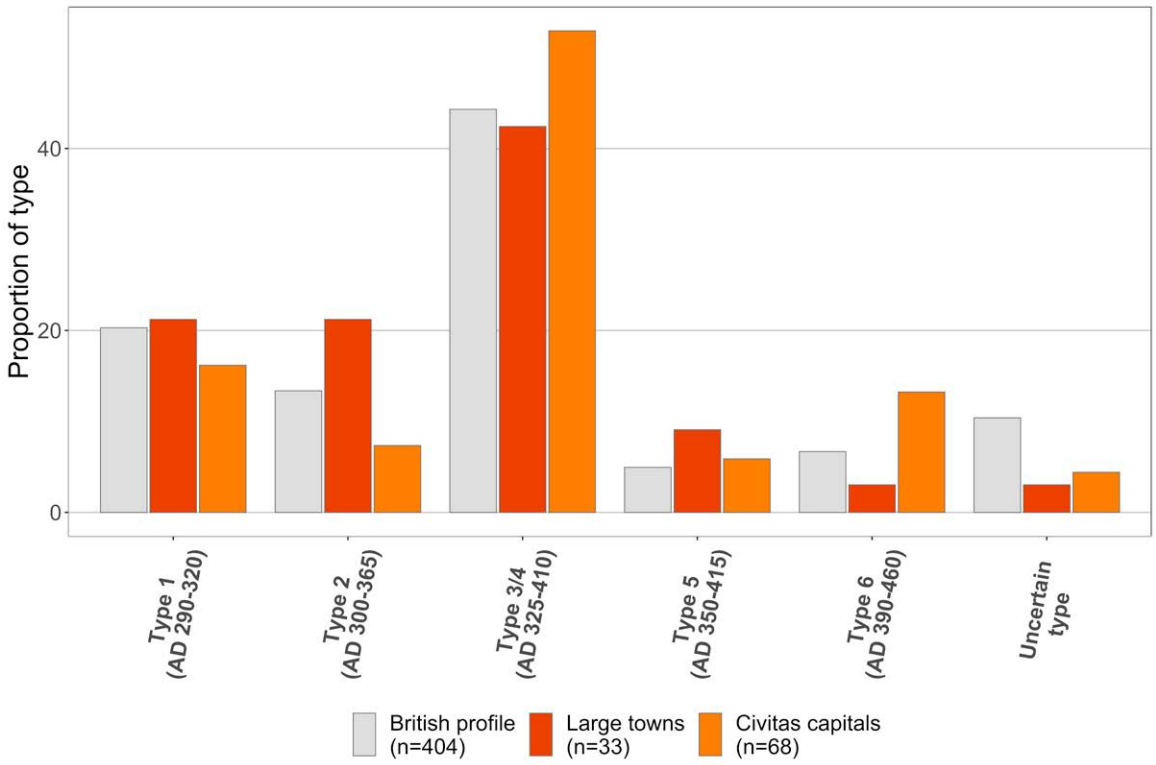


Figure 7.11 - Comparison of the quantities of brooches recovered from Large towns and civitas capitals.

brooch (a Type 6) was recovered (Cunliffe, 1975). The quantity at Richborough likely emphasises to the site's importance as the principal point of entry into the diocese and may not solely represent military activity.

The limited quantity of Type 3/4 brooches and absence of Types 5 and 6 recorded from military sites on Hadrian's Wall potentially appears to correlate with changes seen with military supply to the north of Britain c. AD 350. Interestingly, supply of Type 3/4 brooches to the north of York does continue at urban sites such as Corbridge and defended *vici* including Catterick. Four examples were also recorded from the cemetery at Scorton, Catterick. Does this suggest that in general Type 3/4 brooches were not worn by the garrisons stationed in in northern Britain?

Urban

Brooches from *civitas* capitals form two thirds of the urban dataset, primarily due to the large assemblages from Winchester (principally Lankhills cemetery) and Wroxeter. Broadly, the dataset for both urban subgroups is similar (Figure 7.11). If there was major variation in the administrative functions of the major urban centres, this is not immediately visible in the crossbow dataset. This indicates that major administrative centres remained similarly engaged with state representatives in some form.

Nucleated settlements

Only 24 crossbow brooches have been recorded from nucleated settlements. Consequently, the variation between defended *vici* and undefended nucleated settlements at a diocesan level appears to be due to the small sample size rather than distinct differences (Figure 7.12). When the profile for defended *vici* is compared to military and urban sites, the profile bears more similarities to the latter (See Figures 7.10 and 7.11). These defended sites are likely to be principally to defend the goods and people of interest to the state (Liddle, 1995; Allen and Lodwick, 2017). The analysis supports the argument that there was perhaps a greater emphasis on administrative functions at these sites such as taxation in kind.

Rural sites

While the sample size for the rural sub-groups is small, general trends can be highlighted (Figure 7.13). Low proportions of Type 1 appear to be a feature of

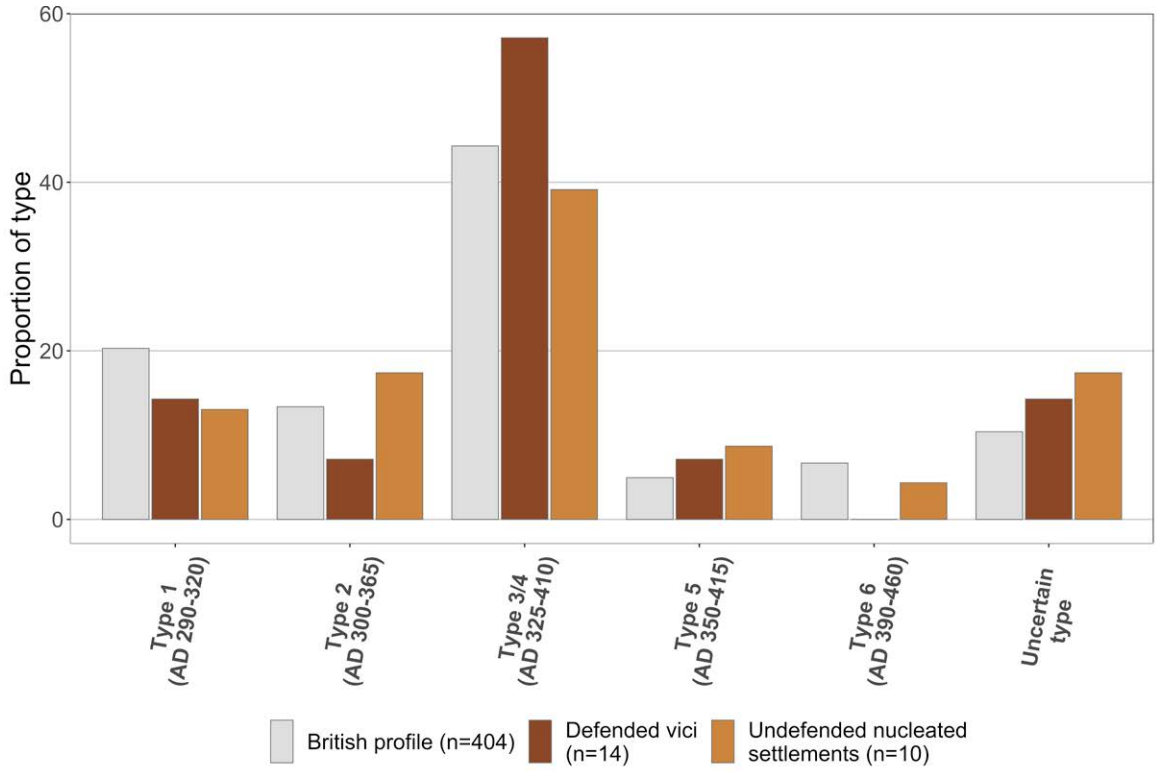


Figure 7.12 - Comparison of the proportions of crossbow brooches from defended vici and undefended nucleated settlements.

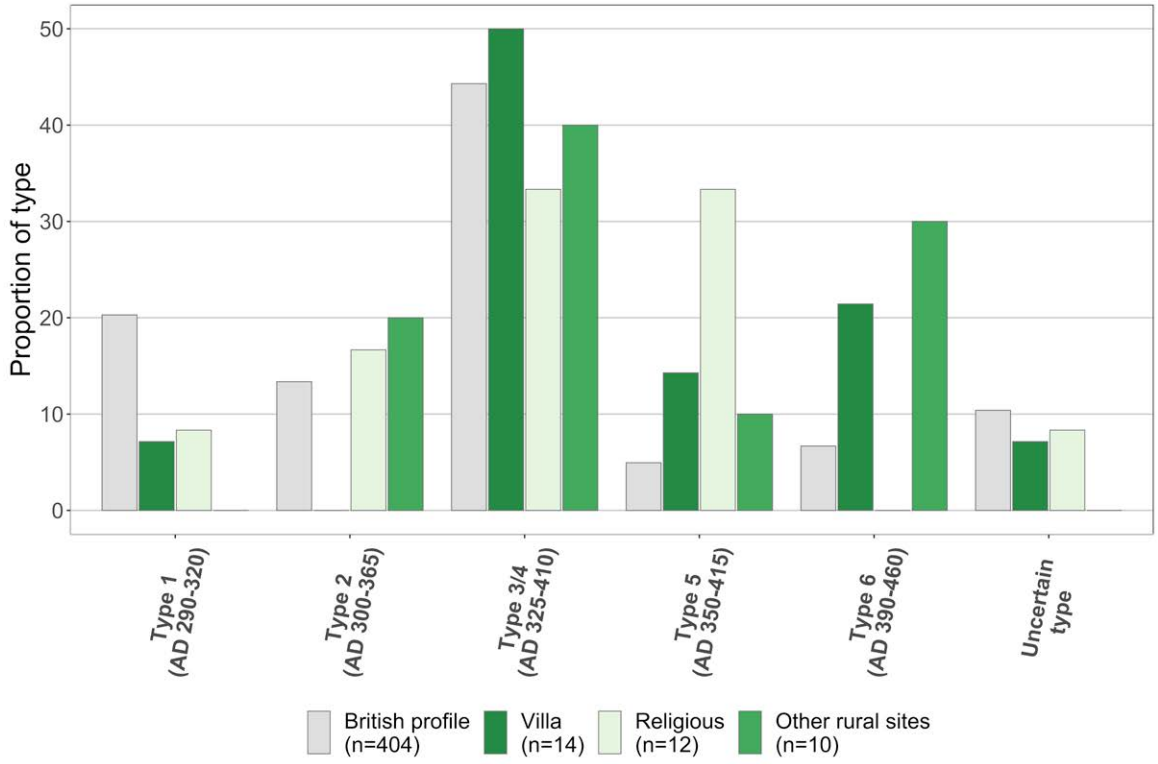


Figure 7.13 - The proportions of crossbow brooches recorded within different sub-categories of rural sites

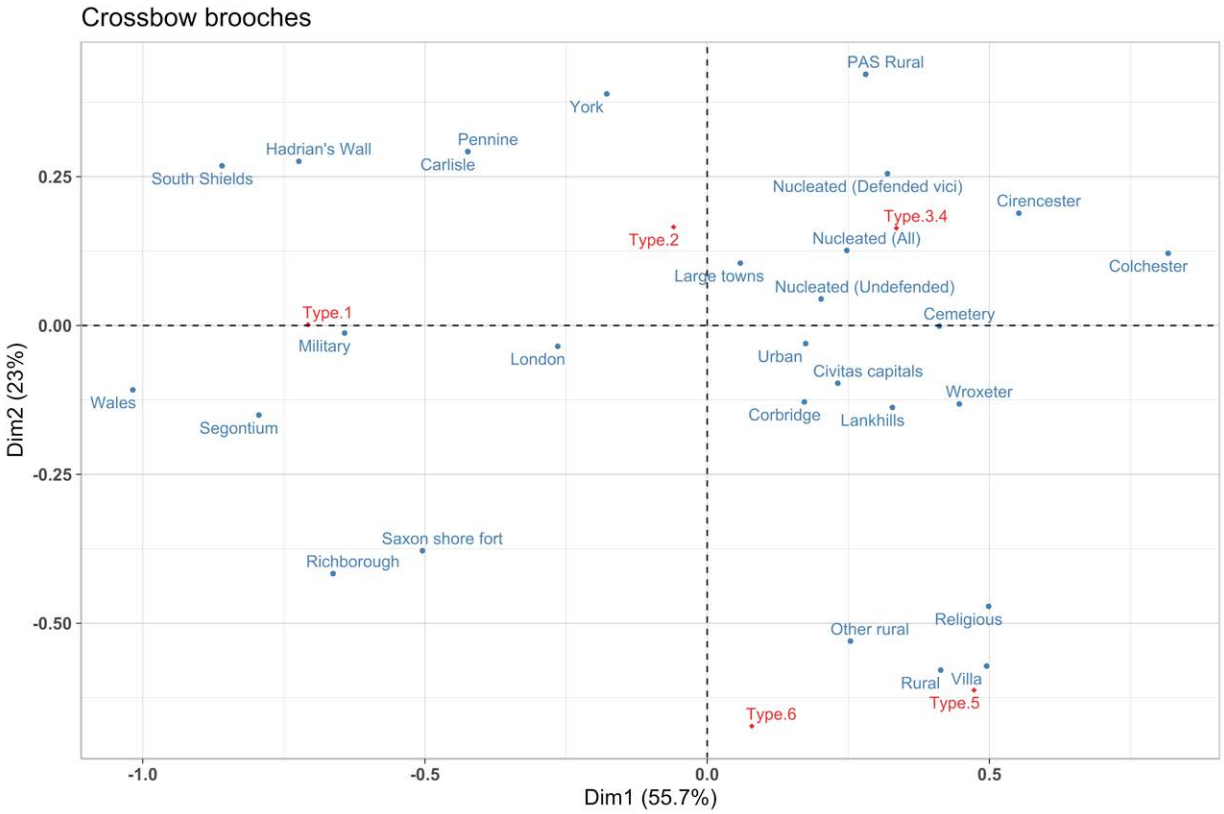


Figure 7.14 - Correspondence analysis of the crossbow corpus by site type, sub type, the three study areas and sites with six or more brooches against the main types. Sites with high proportions of Type 1 yet with no Types 5 or 6 are plotted in the top left, sites with high proportions of Type 1, 5 and 6 in the bottom left. Higher proportions of Type 2 in the centre and Type 3/4 are located to the right of the plot, those with lower proportions of Type 5 and 6 are located to the bottom and bottom right.

the rural profile across a range of rural subgroups. Type 3/4 forms at least a third of the proportion of brooches at all rural subgroups. The greatest variation appears to occur with the sheet metal Types 5 and 6 which generally are above the national average. Higher than average quantities of Type 5 are recorded from religious sites (due to Lydney) and higher proportions of Type 6 are recorded from villas.

The results implies that generally the groups who wore these brooches in the late Roman period circulated a range of settlement types throughout the diocese. If these objects generally are linked with those who served the state (either the army or the administration) they circulated throughout the diocese at locations linked to all levels of society.

Correspondence analysis

Social categories which divide the settlement hierarchy are modern arbitrary definitions. For example, some urban centres may have military elements such as York or Corbridge. Correspondence analysis has been used to consider such variations. The major social categories and their sub-types will be compared along with sites with a minimum of six brooches allowing detailed comparison of particular sites to consider their categorisation.

Correspondence analysis underlines the greater variation seen at military sites in Britain. A distinction occurs between the assemblage from the Saxon shore forts and other military sites in Hadrian's Wall, the Pennines, and Wales (Figure 7.14). This is likely to be due to the higher proportions Type 1 and the later sheet metal Types 5 and 6 at the Saxon shore forts.

There is little variation between urban centres and nucleated settlements, the analysis also indicates that the assemblages from York and London bear more similarities with the military assemblages than those from urban centres. Rural sites also generally cluster with higher quantities of the high-status sheet metal Type 5 and Type 6.

While it might be suggested that the distinctions between Type 1 (left) and 2 (centre), Type 3/4 (centre right) and Type 5 and 6 (bottom) in Figure 7.14 might represent the impact of PAS and civilian association, this pattern is also visible in Mackreth's dataset. This highlights that while we can make links between Type 5 and 6 with civilian groups, Type 3/4 are linked with the Roman state.

Spatial distribution

When considering the spatial distribution of crossbow brooches by type, the chronological change over time is striking (Figure 7.15). Type 1 brooches are recorded from the south coast to Hadrian's Wall but have a broadly eastern and northern distribution often at military sites, including Richborough and South Shields. A similar distribution occurs with Type 2.

In contrast the distribution of Type 3/4, although well represented on the eastern coast, has a stronger distribution in contrast to the earlier types to the west of Britain. This type has been recovered in significant quantities at Wroxeter, as well as in, and in the environs of, both Winchester and Cirencester.

Type 5 and 6 display a reduction in their distribution compared with Type 3/4; this in part reflects the high status of the objects and their late date. As has been highlighted Type 5 are rare on military sites and are found in greatest numbers in the environs of Cirencester. Type 6 has a distribution primarily focussed on the south and south-east although examples have been recorded from the northern frontier. The focus of these types from other site types, particularly urban and rural sites that was noted by Swift (2000, 88) who suggested that these forms were high-status civilian objects.

A number of absences of crossbow brooches within the wider distribution should be noted and explored alongside other datasets. These include the south coast between Chichester and Richborough and perhaps most strikingly, no crossbow brooches have been recorded from Oxfordshire. Given the quantity of late Roman belt fittings there, this is significant (Henry, 2022b).

Continuation into the fifth century

As has been highlighted, crossbow brooches could live particularly long lives, yet we have very few examples that have been dated past the first quarter of the fifth century. The only example in the corpus that was suggested as dating post AD 425 is from Wroxeter which has been a key site for those arguing continuity of *Romanitas* with examples dated to the sixth century from Phase Z (Barker *et al.*, 1997; Mackreth, 2011, 12575, 12580, 12582 and 12583). This date was shown to be unreliable by Lane (2014, 508) and a recent program of extensive radio carbon dating suggests a mid-fourth century date for this activity (R. White pers. comm).

No examples from Anglo-Saxon burials in the fifth and sixth centuries are recorded in the corpus. White (1988, Figure 21) records a single earlier light crossbow type as part of his corpus of Roman material in Anglo-Saxon burials.

This absence of dated examples after AD 425 is significant but also appears to be severely affected by the chronological challenges at the turn of the fifth century as 22 examples in the corpus from this study are dated to the first quarter of the fifth century. Type 5 and Type 6 in particular could also be fifth century types in Britain.

This general absence of examples demonstrably dating to after AD 425 might also be a factor of major watersheds that occur in production. This fall in large scale manufacture broadly ties in with the cessation of production of bronze coinage north of the Alps from AD 395 and a greater emphasis on recycling of metalwork due to a decrease in the availability of raw materials noted in the final decade of the fourth century onwards (Kent, 1994; Fleming, 2012; Swift, 2012; Esmonde Cleary, 2013, 349; Swift, 2014; Henry, 2020a; Henry, 2024c). These trends are important and suggest that the decline in quantities of crossbow brooches is not due to the cessation of their power and importance, but wider issues faced by the Roman Empire.

Key observations

The analysis of the corpus of crossbow brooches has demonstrated that higher proportions of mid- to late fourth century Type 3/4 occur in Britain than previously noted. Similarly, analysis by site type and geographic region demonstrates significant regional variation also occurs. This variation is principally influenced by military sites and a general reduction seen in the distribution of Type 5 and Type 6 which potentially go on into the fifth century. The occurrence of higher proportions of late third-early fourth century Type 1 brooches at military sites appears to be due to the lower proportions of later types. This suggests a

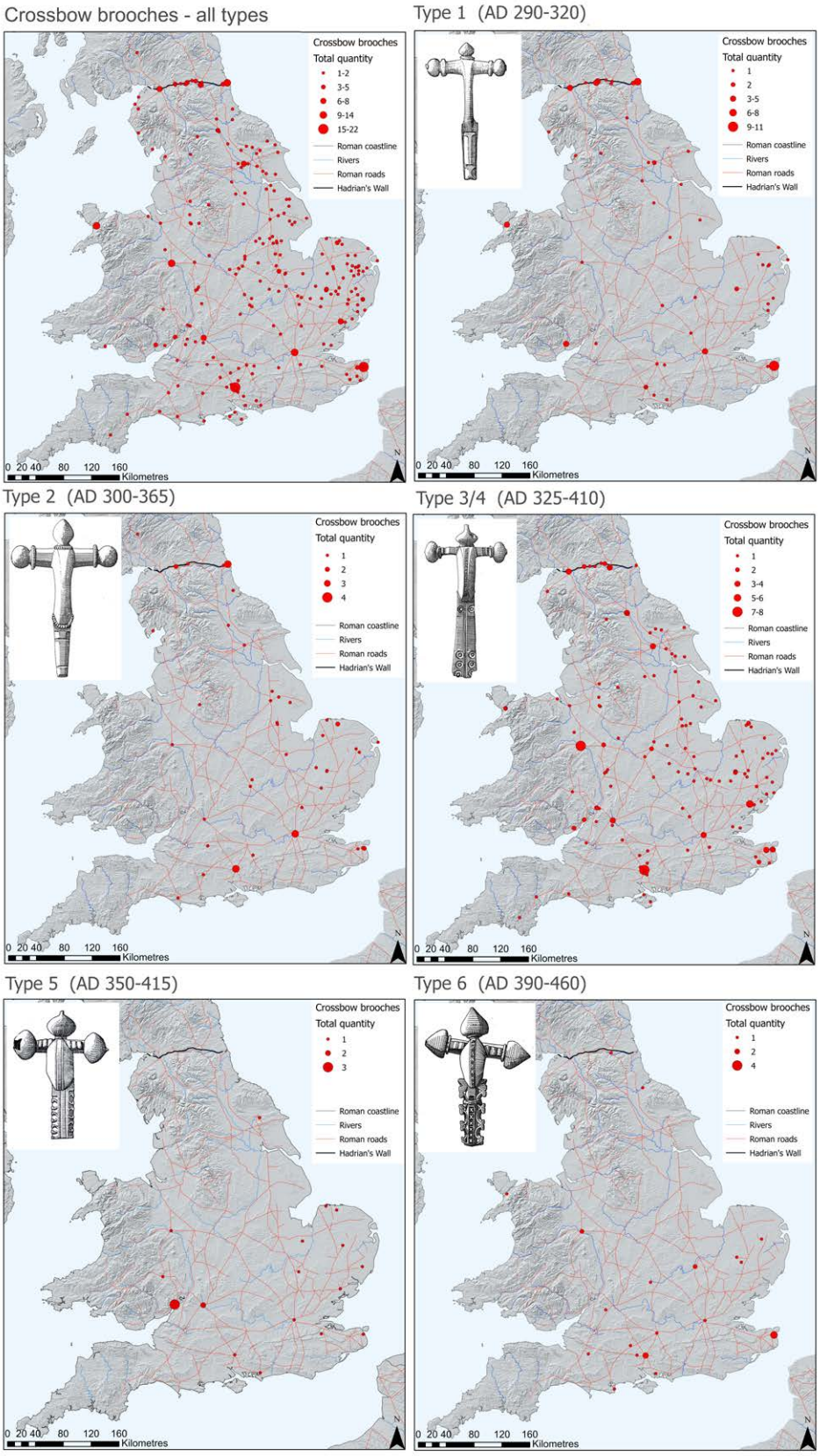


Figure 7.15 - Spatial distribution of the crossbow brooches types

changing pattern of supply occurring from the mid-fourth century.

- Crossbow brooches have in the past been linked to the state, either worn by the military (the *limitanei* or *comitatenses*) or the administration. The earliest Type 1 is more commonly found on military sites in the late third/early fourth century, but thereafter the distribution of later types across the diocese is widespread, particularly Type 3/4. The sheet metal Type 5 and 6 are seen as high-status elite objects and they occur across the settlement hierarchy, and quite commonly rural sites.
- Apart from the possible civitas capital at Corbridge, there are generally low proportions of Type 3/4 brooches in comparison to the continent. Does this suggest that in Britain, generally, this type was not used by the *limitanei*? If changes to the supply network for brooches to the *limitanei* did occur this would have been around the same time as the changing pottery supply.
- In general, analysis of the proportion of crossbow brooches at urban sites, defended *vici* and nucleated settlements by type is similar. This indicates that a range of settlement types fulfilled official functions for the state and activity intensified during the fourth century. Given the variation between these sites and military sites, it might suggest that this reflects the presence of state run administration due to the *Annona militaris.*
- Late fourth and into the fifth century Types 5 and 6 are predominantly found on rural sites in southern and eastern sides of the diocese.
- When the social distribution is compared with the work by Vince Van Thienen (2017, 114) on the continent it is clear that significantly higher numbers of brooches occur at rural sites in Britain.
- These brooches are not found continuing into Anglo-Saxon graves and previously the only examples from post-Roman contexts after AD 425 occurred from Phase Z at Wroxeter. This suggests that although they were important signifiers of late Roman status and power their power as a status symbol waned in the early fifth century.

8. The *Cingulum Militare* and Associated Belt Fittings

From the third century the Roman military belt was called the *cingulum militare*, it was a badge of rank and held symbolic importance (Hoss, 2017b, 85; Hoss, 2017a, 97). By the mid-second century the sword was not worn around the waist belt, instead it was worn on a baldric over the shoulder (Hoss, 2017a, 102). The proliferation of narrow buckles (often c. 20mm wide) with long buckle plates (up to 70mm in length) may have been more comfortable worn as a baldric/ shoulder belt rather than a waist belt.

Belt fittings have been interpreted as both military and high-status civilian pieces. Hawkes and Dunning (1961, 32) initially concluded there was little evidence of such buckles being worn by the civilian populace as they were never depicted in sculpture or found in civilian graves. This was subsequently revised by Hawkes (1974, 390) who thought they may have been worn by civilians as well.

In Britain insular types were produced which took inspiration from continental prototypes (Appels and Laycock, 2007, 169; Laycock, 2008; Esmonde Cleary, 2017, 191). These insular pieces have been viewed as material worn by *bucellarii* (escort troops or armed retainers), a militia or yeomanry force (Hawkes and Dunning, 1961, 41; Leahy, 2007, 140; Laycock, 2008).

The term militia provokes thoughts of a military force raised from the civil population used to supplement local defence but there was no universal late Roman militia (Elton, 1996). The militia interpretation fits well with those who argue for a catastrophic collapse in the late Roman period with the removal of troops from the diocese. Yet the threat of violence was a regular feature of the Roman world. The evidence remains debated at it is suggested that the insular form of cingulum was worn by armed militias or groups fulfilling local administrative functions (White, 2007, 71; Esmonde Cleary, 2013).

Typological studies

No single typology considers the entire suite of material adequately for Britain. Belt fittings have been classified in Britain by Hawkes and Dunning (1961) who considered 113 zoomorphic buckles and fittings, while Simpson (1976) looked at non-zoomorphic types and strap ends. There are other forms of late Roman belt fitting classification in use in mainland Europe developed by Böhme (1977; 1986) and Sommer (1984). Each classification has strengths and weaknesses; the major challenge we face with evaluating this material relates to classification and dating of British examples. In recent years corpora of British material have vastly increased.

The zoomorphic buckles were divided into types and sub types by Hawkes and Dunning (1961) and this remains the main typology used in Britain (Figure 8.1). Their typology incorporated examples produced both on the continent and in Britain. The continental material is standardised and assumed to have been produced in state run *fabricae.* In contrast the insular material is highly varied suggesting that it was produced at a range of workshops (Appels and Laycock, 2007, 171).

Types I-IV consisted of buckles of varying types which depict confronted animal heads based on the form of the loop or if the buckle and plate was cast in a single piece, Type V consisted of strap ends, Type VI disc attachments and Type VII attachment plates. There are limitations with this typology which was based on stylistic grounds, particularly given the dating evidence from subsequent excavations. This has led to a naming convention where Type IB buckles tend to have been produced after Type II buckles (see Henry, 2022, Tables 8.1 and 8.4). Hawkes and Dunning (1961) and subsequently Leahy (2007) and Carr (2017) only considered zoomorphic depictions which forms 48 per cent of this corpus.

Sommer (1984) divided types based on how the buckles are attached to the frame (Figure 8.2). He divides his typology into three varieties (Sorte) which have sub types (Form). Sorte 1 is a solid frame encased by the plate with a slot in the plate to hold the pin. Sorte 2 consist of separate tongues and plates held together with a pin. Sorte 3 are cast in one piece. A limitation of his work in Britain is a reliance on Hawkes and Dunning which results in major sites, such as Lankhills, not being incorporated into his corpus (Swift, 2000, 190).

Simpson (1976) considered a range of non-zoomorphic strap ends and buckles. This typology devised for buckles was based on the shape of the buckle rather than the plate (Figure 8.3). The major variations and

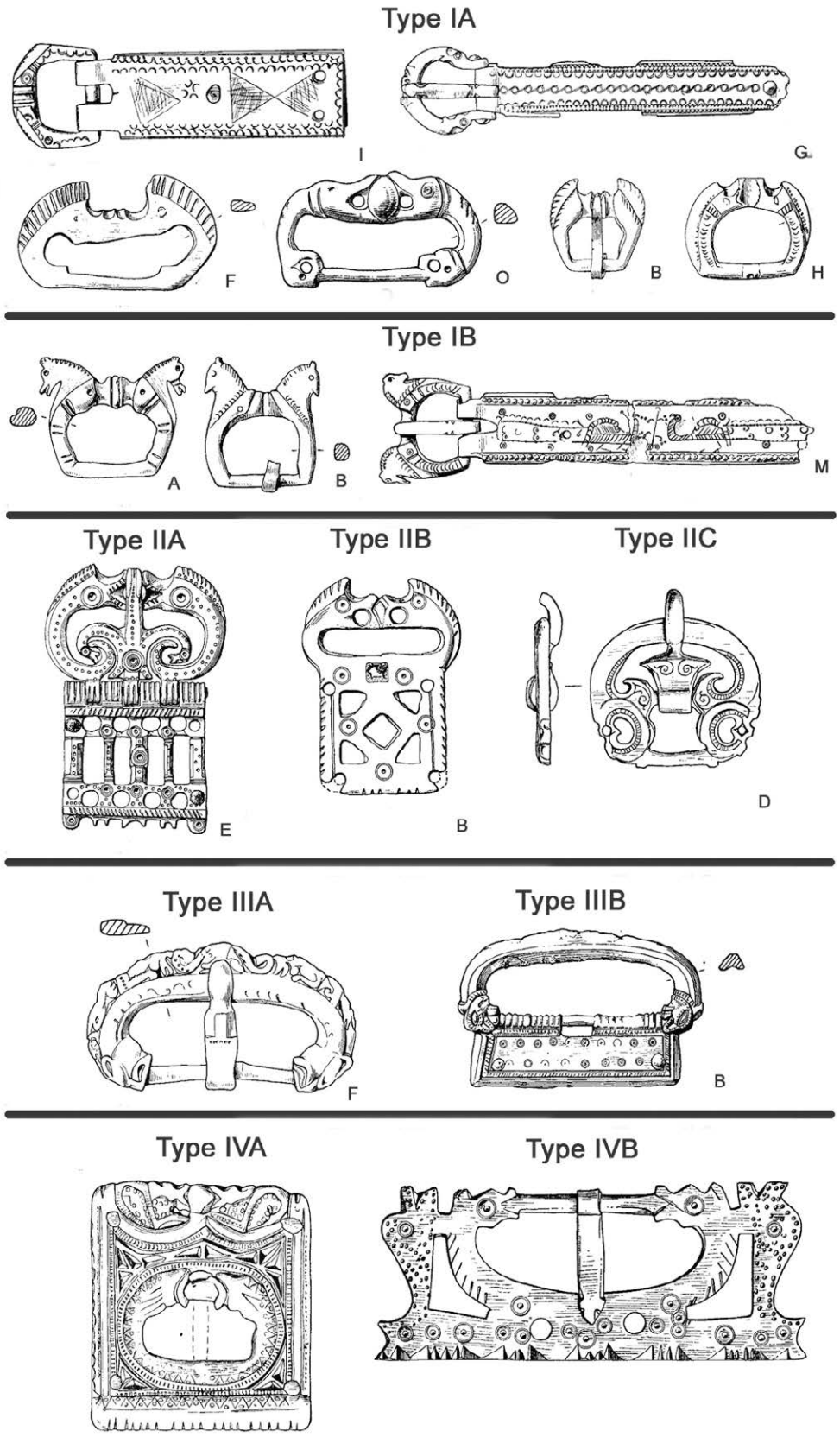


Figure 8.1 - The typology of late Roman zoomorphic buckles by Hawkes and Dunning (1961). After Hawkes and Dunning (1961), fig. 13-22.

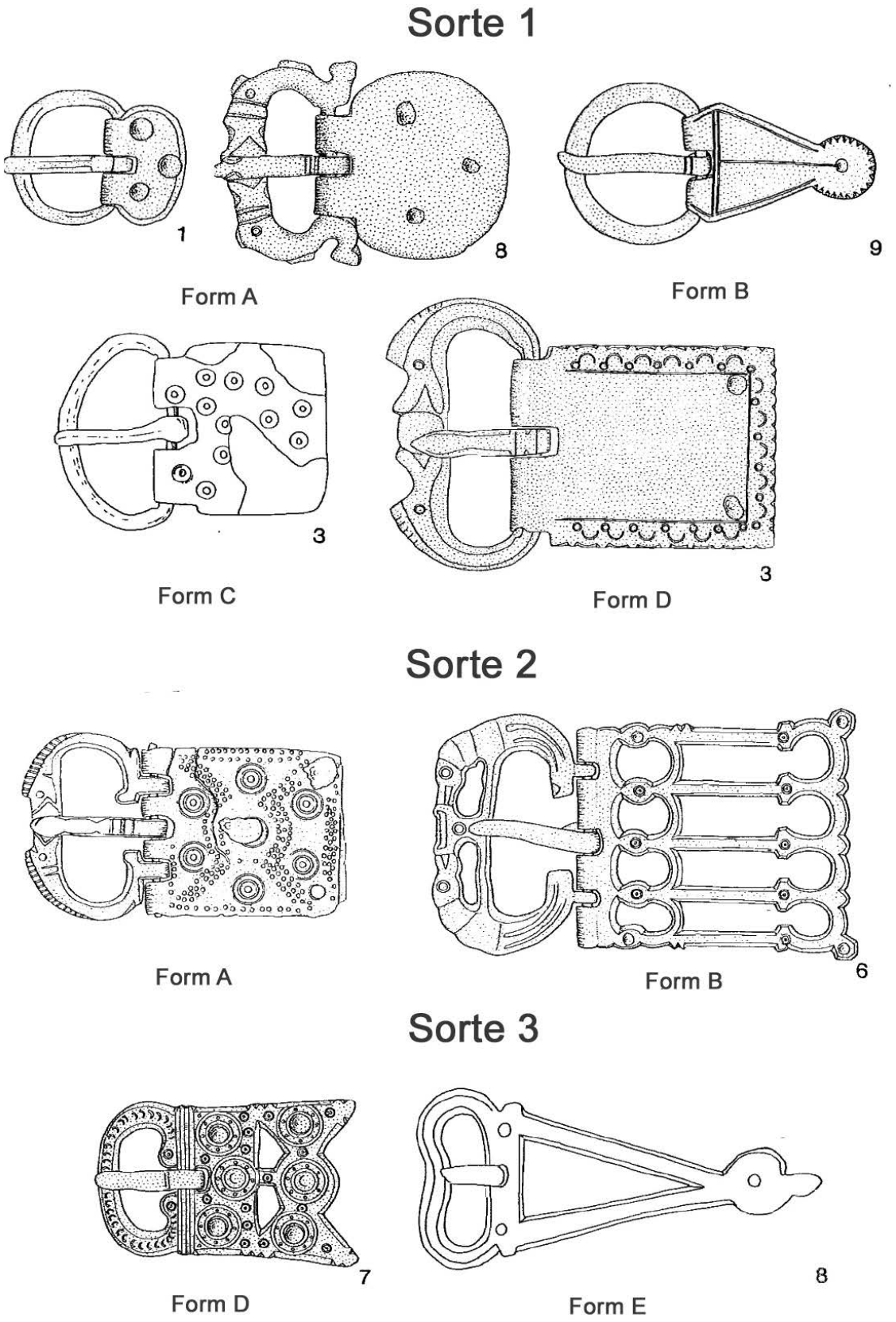


Figure 8.2 - The typology devised by Sommer (1984) dividing buckles into three types (Sorte) and various sub types (Forms). A selection of the forms categorised by Sommer (1984) are included in the figure. After Sommer (1984)

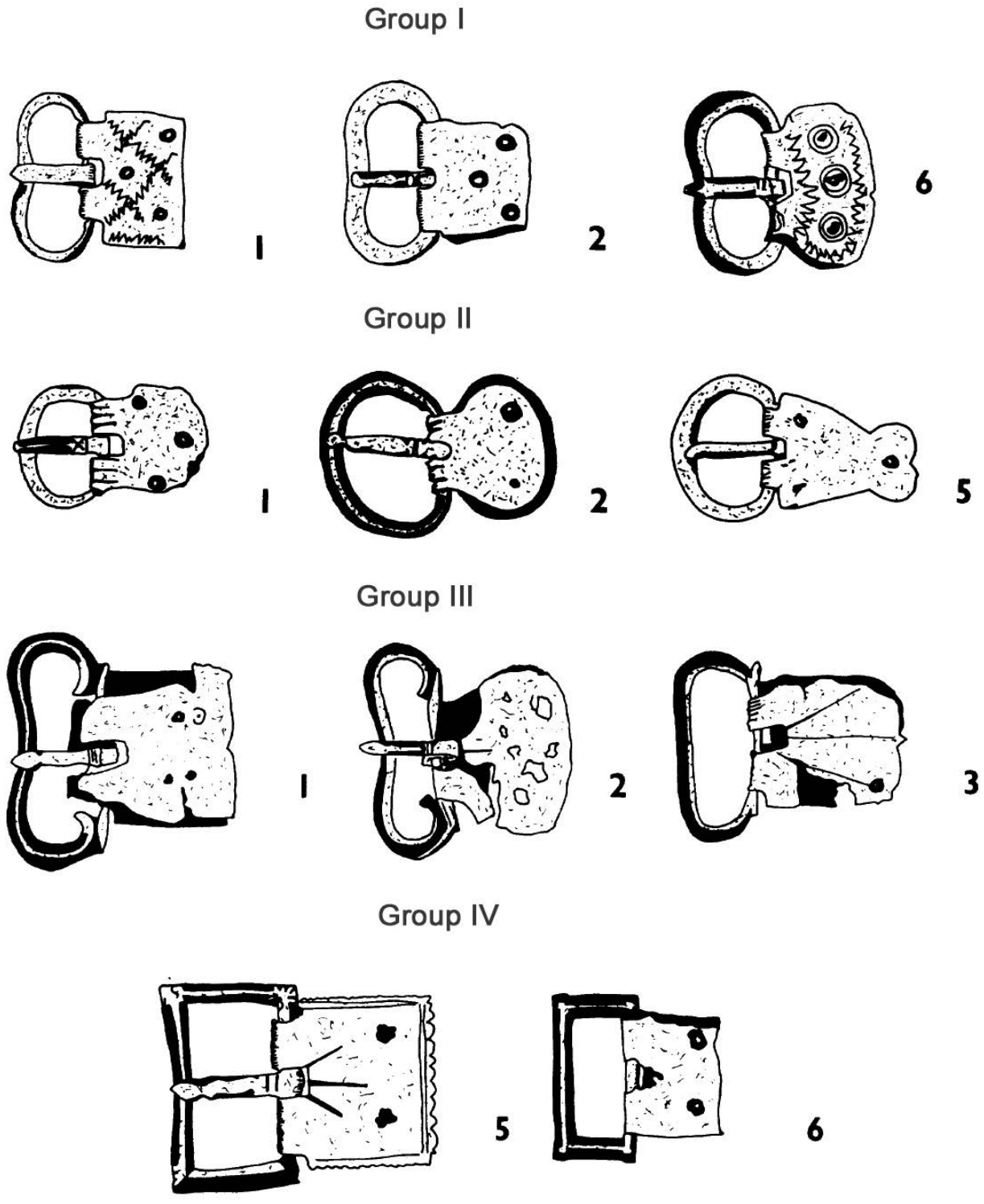


Figure 8.3 - The typology devised by Simpson (1976) focussing on the buckle shape to define four groups

changes in chronology of the non-zoomorphic buckles appear to be based on changes to the form of plate used (Sommer, 1984; Appels and Laycock, 2007, 164).

Stylistic elements can assist in differentiating continental and insular material for Type IA and IIA buckles in particular (Hawkes and Dunning, 1961, 41ff; Appels and Laycock, 2007, 171ff). Laycock (2007) noted features which are distinctive to British types illustrated in Figure 8.4. Similarly, it has been suggested that the style of decoration such as repoussé and form of the buckle plate can indicate an insular type (Clarke, 1979; Cool, 2010b, 288).

These buckles formed part of the *cingulum* which indicated the status and identity of the wearer. The subsequent sections will consider the current typologies broadly following the four types defined by Hawkes and Dunning to present how the belts varied significantly in width (from as little as 20mm wide to 140mm) and style.

The limitations of the classifications will be discussed before considering how others have interpreted this material and the research opportunities the material might offer. The number of well dated examples from Britain is surprisingly limited with the majority being unstratified finds, published examples of the different types are included in the following sections and on ADS (https://doi.org/10.5284/1090416)

Type I belt sets

The buckles associated with Type I belts have a pin bar which is cast in one piece with the loop. They would have been attached to a narrow belt (often c. 20mm wide, some as wide as 30mm). The belt would have terminated with an associated strap end (Figure 8.5), some of which have a bifid tip suggesting they also acted as nail cleaners (Eckardt and Crummy, 2006; Eckardt and Crummy, 2008, 109).

Continental examples were manufactured from the 340s onwards, in Britain they occur in archaeological contexts dating to after AD 350 (Table 8.1). Insular types date from c. AD 370 onwards (Hawkes and Dunning, 1961, 24-26; Lyne, 1999, 104; Henry, 2022).

Type IA buckles

Type IA buckles generally depict confronted dolphins with a pellet in-between (Figure 8.6, top centre and right). Stuart Laycock (2007) has highlighted a range of features to define continental and insular forms (Table 8.2).

Within Type IA are a series of proposed subgroups by Laycock (2007; 2008) including those defined as crescentic (Hawkes and Dunning, 1961, Fig. 13 g) and lionhead - depicted in Figure 8.6, top left (Hawkes and Dunning, 1961, Fig. 13 d). IA crescentic is an insular form, IA lionhead is best viewed as a continental type (Henry, 2022).

Type IB buckles

Type IB belts depict dolphins and outward facing horseheads (Figure 8.6, centre). They are an insular type (Hawkes and Dunning, 1961, 24; Appels and Laycock, 2007, 206; Leahy, 2007). Within the type are a range of subtypes based on decorative styles, these include buckle plates which are decorated with elements such as geometric motifs or peacocks. Peacocks, the tree of life, fish and griffins are associated with Christian iconography (Mawer, 1995, 59-65; Eckardt and Crummy, 2008, 96).

Hawkes and Dunning (1961) suggested the Type IB occurred from c. AD 370, recent research into well dated examples suggests the introduction of the type occurred in the final decade of the fourth century (Henry, 2022, Table 8.1).

Strap ends and associated fittings

Also associated with these belt sets are 'prototype Tortworth' and 'Tortworth' strap ends as well as a limited numbers of narrow belt stiffeners. The prototype Tortworth is an insular type which derives from the riveted Amphora strap end that is associated with Type II belt sets. Lyne (1999, 104) suggests dates from c. AD 370 into the fifth century. These strap ends can terminate in a knop or a bifid tip (Figure 8.6, bottom right).

Tortworth strap ends are also insular and are described after the location of the type specimen by Hawkes and Dunning (1961). They date from c. AD 390 and are used into the fifth century (Lyne, 1999, 104; Henry, 2022, Table 8.1). They often have a single rivet (due to the narrow width of the belt they were affixed to). Many examples have bifid ends (Figure 8.6 bottom left) suggesting they were also used as nail cleaners (Eckardt and Crummy, 2008, 109).

These two forms of strap end were probably worn in conjunction with narrow Type I buckles and have an

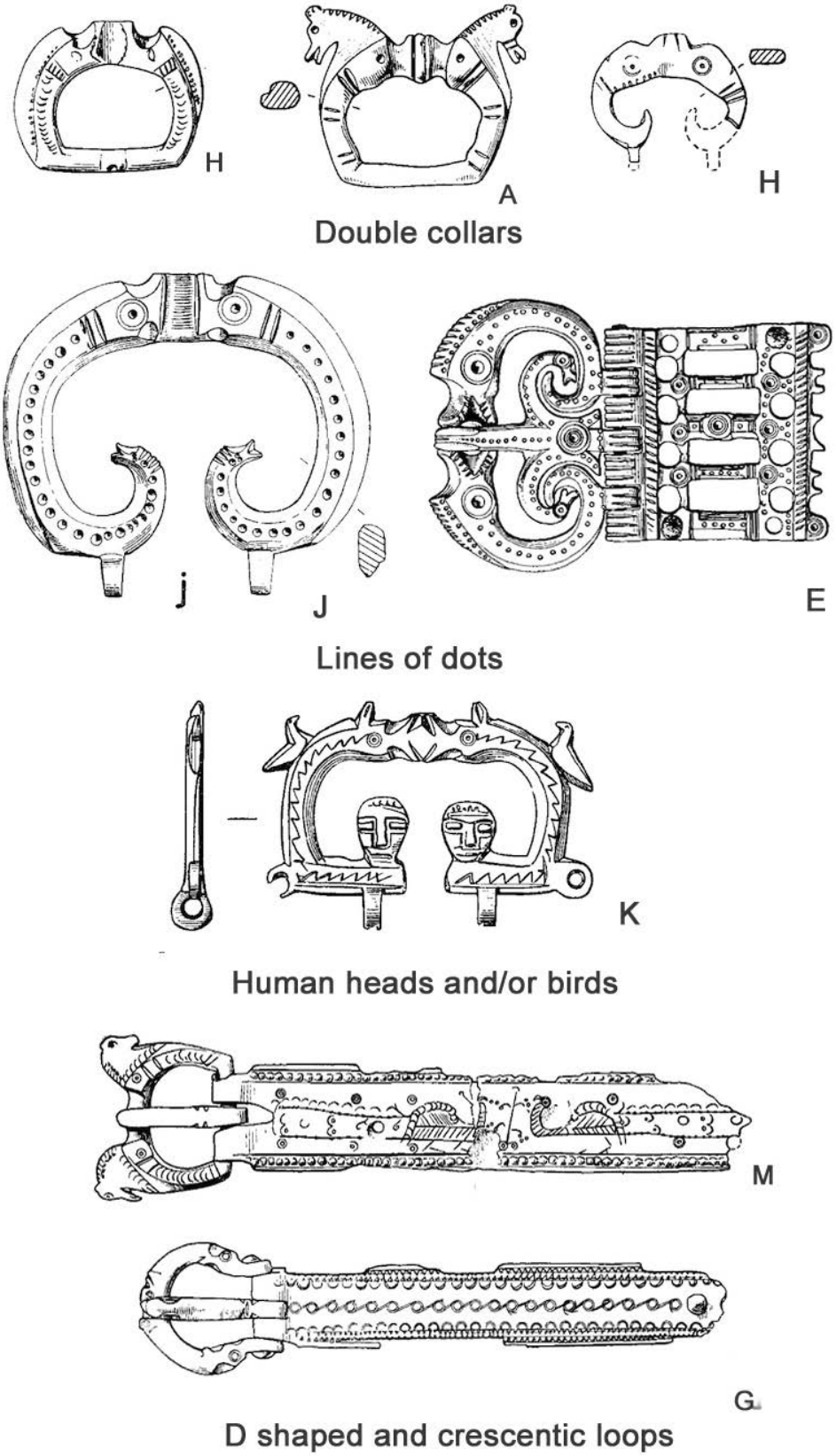


Figure 8.4 - Elements highlighted by Laycock (2007; 2008) as indicative of British manufacture. Illustrations derived from Hawkes and Dunning (1961)

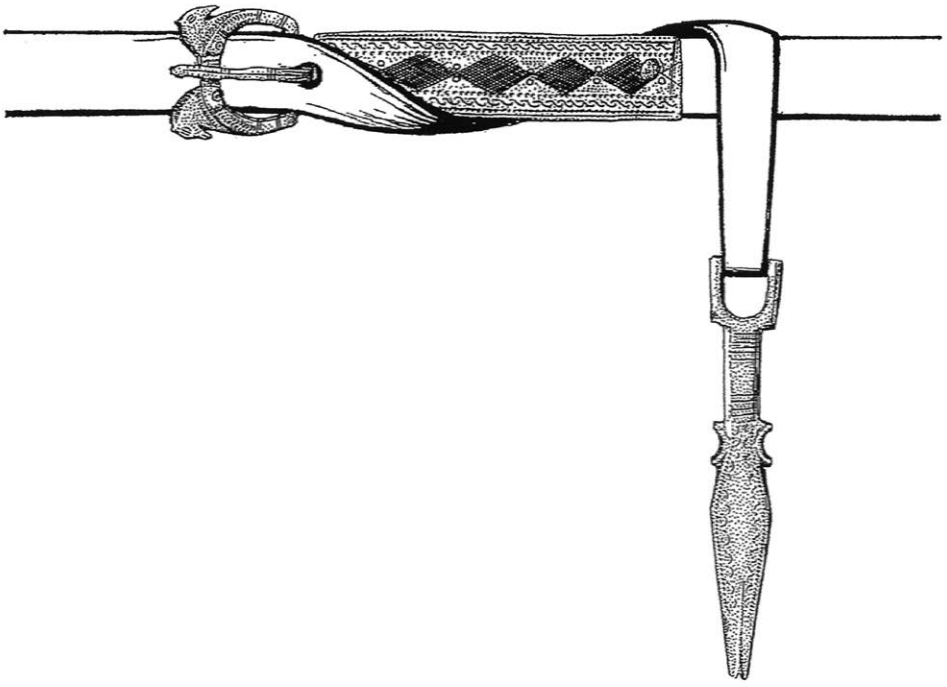


Figure 8.5 - A reconstruction of how a Type IB buckle and associated strap end nail cleaner may have been worn. Illustration by Nick Griffiths

Table 8.1 - Well dated examples of the different fittings associated with Type I belt sets (derived from Henry 2022b)

Type	Site	Date	Reference
IA (British)	Richborough	280+	Lyne (1999), 57
IA Lionhead	Catterick	375+	Hawkes and Dunning (1961), Fig. 13d
IB	Chichester	375+	Hawkes and Dunning (1961), Fig. 13h
IB	Lankhills	388+	Booth et al (2010) G. 1175
IB	Cirencester	395+	Paddock (1998, 321), 321, 62
IB Plate	Shakenoak	392+	Brodribb et al (2005), 13, 59 Fig. I.32 no. 59
IB Plate	Shakenoak	450	Brodribb et al (2005), 171, 204 Fig. III.30 no. 137
Prototype Tortworth	Richborough	280+	Lyne (1999), 82
Prototype Tortworth	Richborough	400+	Lyne (1999), 83
Tortworth	Richborough	280+	Lyne (1999), 79
Tortworth	Richborough	400+	Lyne (1999), 80
Tortworth	Richborough	280+	Lyne (1999), 81

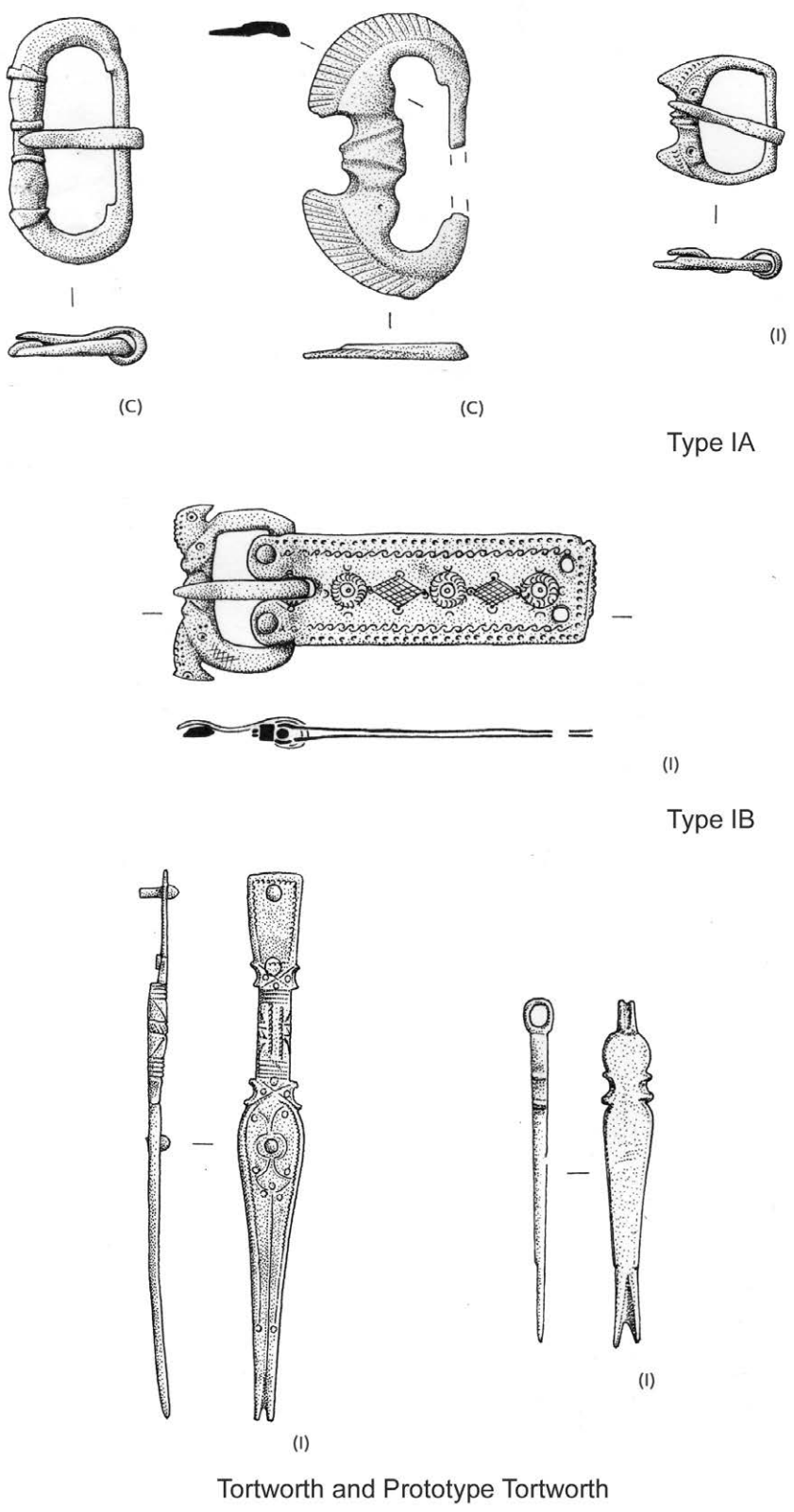


Figure 8.6 - Examples of Type IA, IB and associated strap ends. Latton, Wiltshire (top left), Ashton Keynes, Wiltshire (top centre), Wadley, Oxfordshire (top right), Dorchester on Thames (centre), Bowerchalke, Wiltshire (bottom left) and 'Dorset' (bottom right). Illustration by Nick Griffiths

Table 8.2 - Comparison of the elements highlighted by Laycock (2007) to define continental and insular examples of Type IA.

Continental examples	Insular examples
Narrow crest Large eyes Wide flat loop Flattened rectangular cross section Round buckle plate	Broad high crests Small eyes Rectangular or D shaped cross section Features can be more three dimensional Long buckle plate

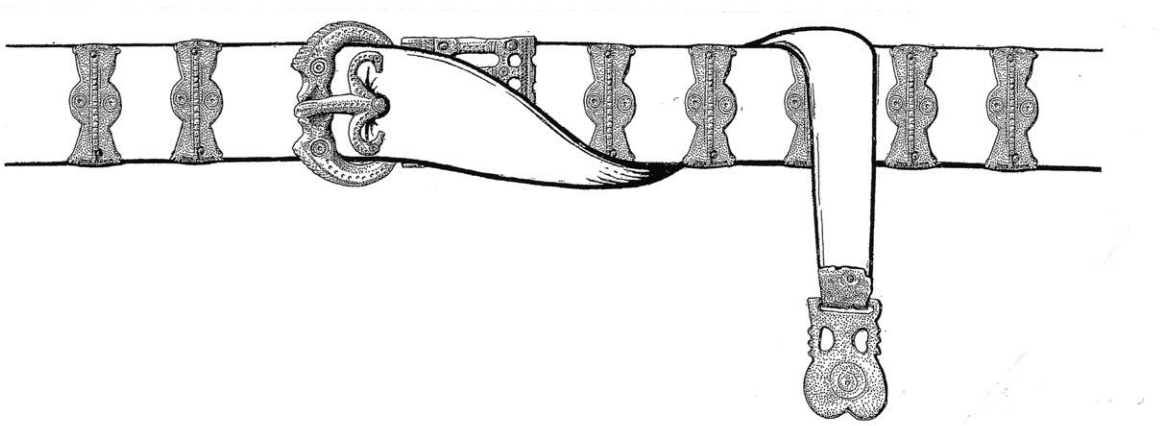


Figure 8.7 - A reconstruction of how a Type II buckle, belt stiffeners and associated strap end may have been worn. Illustration by Nick Griffiths

exclusively British distribution (Leahy, 1984, 30; Lyne, 1999, 104). Attempts have been made by Leahy (2007, 136) to link the distribution of Tortworth strap ends to Type IB buckles.

Narrow propeller stiffeners also occur in Britain, their size correlates with Type I buckles (Henry, 2022). Cut down heart-shaped strap ends associated with Type II belt sets have also been recorded. They indicate further variation in the belt sets and demonstrate modification occurred perhaps suggesting changing fashion and a preference for these narrow belt sets.

Type II belt sets

The leather belt associated with Type II buckles and fittings was wider than the belt used for Type I, generally measuring c. 40-65mm (Bishop and Coulston, 2006). Along with the various forms of buckle, fittings can include propeller stiffeners and amphora or heart shaped strap ends (Figure 8.7).

Production of Type II buckles began on the continent c. AD 330-340. In Britain, continental examples occur in archaeological contexts from c. AD 350 onwards; by c. AD 350-370 insular Type II buckles were being produced in Britain (Leahy, 1984, 29; Riddler *et al.*, 2010, 152-155; Esmonde Cleary, 2017, 192; Henry, 2022, Table 8.3). On the continent and in Britain amphora and heart strap ends associated with Type II belt sets date c. AD 350-390 (Leahy, 1984, 30; Lyne, 1999, 104; Cool, 2010b, 287; Henry, 2022, Table 8.3).

Well dated examples of Type II belt fittings are included in Table 8.3.

Type IIA

Type IIA buckles consist of separate loops, tongues and plates which are held together through a bolt (Figure 8.8, top). The decoration consists of confronted dolphins, further elements such as human heads and birds can also occur on insular forms.

Laycock (2007) has demonstrated variation in the form and decoration of continental examples when compared to insular types (Table 8.4). Continental examples have broad heads and crests and usually

Table 8.3 - Well dated examples of the different fittings associated with Type I belt sets (derived from Henry 2022b Table 8.3)

Type	Site	Date	Reference
IIA (Continental)	Cirencester	348-	Hawkes (1974), Fig. 3.6
IIA (Continental)	Lankhills	350-370	Clarke (1979), G. 37
IIA (Continental)	Caistor-St-Edmunds	400	Hawkes and Dunning (1961), Fig. 17g
IIA (Insular)	Lankhills	350-370	Clarke (1979), G. 443
IIA (Insular)	Lydney	364	Hawkes and Dunning (1961), Fig. 17k
IIA (Insular)	Lullingstone	380	Hawkes and Dunning (1961), Fig. 17j
IIA (Insular)	Caistor-St-Edmunds	400	Hawkes and Dunning (1961), Fig. 17c
IIB	Richborough	280+	Lyne (1999), 64
IIB	Wye	370	Hawkes (1974), Fig. 3.7
Round plate	Scorton	340-350	Eckardt et al (2015), G. 12
Round plate	Lankhills	370+	Booth et al (2010), G. 1846
Round plate	Lankhills	390+	Clarke (1979), G. 283
Triangular plate	Lankhills	350-370	Clarke (1979), G. 13
Triangular plate	Richborough	400+	Lyne (1999), 17
Rectangular plate	Birdoswald	350	Wilmott (1999), 249
Rectangular plate	Lankhills	350-390	Clarke (1979), G. 234
Rectangular plate	Gatcombe	360	Branigan (1977), 541
Rectangular plate	Richborough	400+	Lyne (1999), 37
Repousse plate	Lankhills	350-390	Clarke (1979), G. 106
Repousse plate	Neatham	375	Millett (1986), Fig. 73, 88
Repousse plate	Richborough	400+	Lyne (1999), 94
Amphora (Continental)	Richborough	350	Lyne (1999), 49
Amphora (Continental)	Lankhills	350-390	Clarke (1979), G. 105
Amphora (Continental)	Richborough	375-400	Lyne (1999), 50
Amphora (Insular)	Richborough	280+	Lyne (1999), 51
Amphora (Insular)	Lankhills	350-390	Clarke (1979), G. 234
Amphora (Insular)	Richborough	400	Lyne (1999), 54
Heart	Lankhills	350-370	Clarke (1979), G. 81
Heart	Lankhills	350-390	Clarke (1979), G. 426
Heart	Colchester	388	Crummy (1981)
Heart	Richborough	400	Lyne (1999), 44
Propeller	Castle Copse	300-400	Hostetter and Noble Howe (1997), Fig. 115
Propeller	Colchester	350-400	Crummy (1981), Fig. 8.1
Propeller	Richborough	400	Lyne (1999), 85

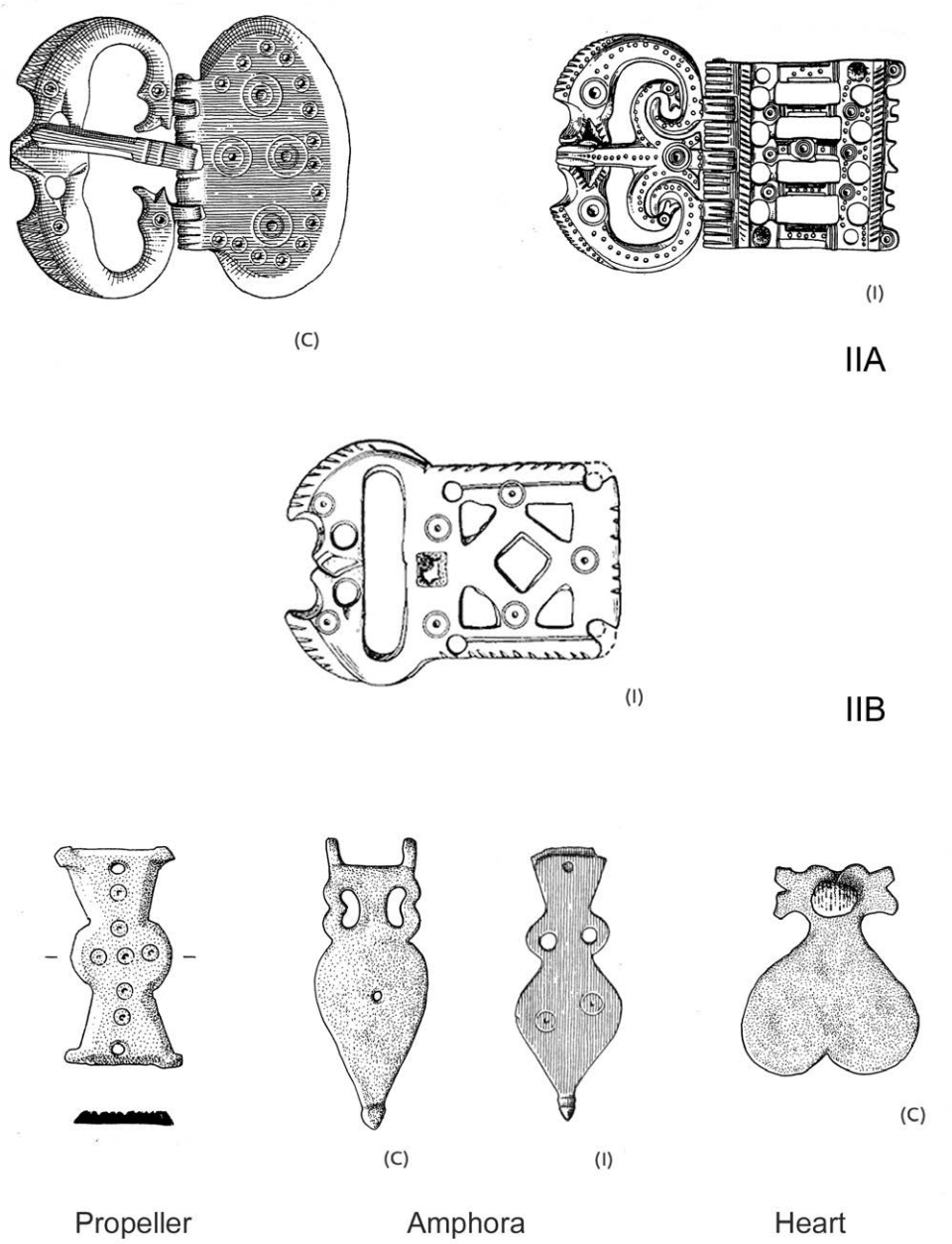


Figure 8.8 - Examples of Type IIA (Lankhills, Winchester), IIB (Colchester), a propeller belt stiffener (bottom left, Standon, Hertfordshire) and associated strap ends (amphora - centre left, Richborough, insular amphora - centre right, Lankhills, heart - right, Ickham, Kent). Illustration by Nick Griffiths and Hawkes and Dunning (1961)

Table 8.4 - Comparison of the elements highlighted by Laycock (2007) to define continental and insular examples of Type IIA.

Continental examples (Figure 8.8, top left)	**Insular examples (Figure 8.8, top right)**
Broad heads and crests Three dimensional features Flattened rectangular cross section Usually flat and uncurved terminals Terminals either plain or zoomorphic Usually 40-50mm wide	Loop is more rounded Curled terminals Can be decorated with lines of dots, birds and human heads Much more varied in size and proportion

have flat and uncurved terminals which are sometimes zoomorphic (Figure 8.8, top left). The insular examples have a more rounded loop and curled terminals (Figure 8.8, top right).

The buckle plates on both continental and insular examples generally have an openwork plate with four perforations, circular, rectangular or pelta shaped (Figure 8.8 top right). Some examples, usually associated with insular examples decorated with birds can also terminate in half a propeller moulded into the plate.

Type IIB and non-zoomorphic parallels

Type IIB buckles have a plate and loop cast in a single piece (Figure 8.8, centre). The majority have a rounded loop and curved terminals, similar to insular Type IIA buckles, leading to the suggestion they are an insular form. The plates generally have two or three (rather than the four with Type IIA) rectangular perforations.

Some non-zoomorphic buckle types can also bear similarities with the Type IIB buckle. The continental examples have a distinct moulded complete openwork propeller on the plate (see Figure 8.2). They are rare in both Britain and Europe. Insular examples have a distinctive ribbed band located between the buckle and the plate usually with rectangular perforations (Henry, 2022, 92).

Type IIC

Type IIC were considered by Hawkes and Dunning to have derived from Type IIA yet there are considerable differences in terms of construction and decoration. The frame has two hinge bars and is decorated with confronted animals. Carr (2017, 68) citing examples from Bifrons and High Downs argues this is a fifth century post-Roman type. They are not considered as part of this analysis.

Non-zoomorphic buckles

A range of non-zoomorphic buckles are associated with the belt fittings that were used on Type II belt sets. They have been categorised by the shape of the buckle loop (Simpson, 1976) or form of the plate (Sommer, 1984). The latter appears to be more distinctive division and will be followed here. The principal forms of buckle plate are round, rectangular (sometimes with repoussé decoration) and triangular.

Rectangular plates have been divided based on decoration; undecorated, ring and dot or repoussé. Generally ring and dot decoration on these buckles is rare, it has been suggested repoussé decoration could be an indicator of British production (Clarke, 1979; Cool, 2010b, 288).

Triangular plates in Britain usually consist of a buckle and plate cast in a single piece. While Sommer (1984) dates the type to c. AD 310-360 in the Rhineland and Gaul, the number of well dated types in Britain is limited, a mid- to late fourth century date is suggested (Riddler *et al.*, 2010, 152; Henry, 2022).

Strap ends and associated fittings

Type II buckles were used on belts that also could include propeller stiffeners, heart and amphora strap ends (Leahy, 1984, 24; Cool, 2010b, 288). Heart strap ends are a continental type (Figure 8.8, right). Amphora strap ends include continental and insular forms with variation noted with the design of the handles of the amphora and the strap end proportions, the insular forms can terminate in a bifid tip (Appels and Laycock, 2007, 256).

Simpson's (1976) amphora typology considered the method of attachment to the belt. Type A was attached by a hinge (see Figure 8.8), Type B was riveted onto the belt. A third group attached through a belt loop has been classed as Type C (Appels and Laycock, 2007, 256;

Henry, 2022). The heart strap end is generally attached through a hinge or sometimes a rivet loop.

Propeller belt stiffeners (Figure 8.8, left) were designed to strengthen the belt and examples from graves suggest that up to 10 propeller belt stiffeners were utilised (Bishop and Coulston, 2006). While propeller belt stiffeners are depicted on the Arch of Constantine constructed in AD 315 (Lyne, 1999, 104), Ager (2010) suggests that they were mainly in use in the second and third quarter of the fourth century.

Sub-groups of the belt stiffeners can be defined on the basis of decorative features (such as the presence of a central rib), or, in a small number of cases, attachment through integral rivets. Laycock (2008) has linked the examples with integral rivets to Spain although similar mounting styles are known from second and third century objects in Britain.

Type III belt sets

The leather belt used with the Type III buckles was of different construction to that associated with Type I and II buckles (Figure 8.9). The belts themselves were substantially wider (up to 140mm), at both ends of the belt were belt stiffeners (Bishop and Coulston, 2006). The belts sometimes included strap guides, suspension loops and extra plates which provided strength (Swift, 2011). Loops could also be attached to the belt to act as hangers for attachment of a knife or utensils (Bishop and Coulston, 2006).

Few well dated examples of Type III belt fittings occur in Britain which are included in Table 8.5.

Type IIIA

Type IIIA buckles consist of open jawed animal heads which are confronted across the pin bar (Figure 8.10, top left). It has been suggested that the production of Type III began c. AD 364/370 and continued into the early fifth century (Leahy, 1984, 29; Sommer, 1984). Well dated examples in Britain occur in the final decade of the fourth century (Henry, 2022, Table 8.4).

Type IIIB

IIIB consist of a similar design, but the loops and plate are cast in one piece. Sommer (1984) dates the continental Type IIIB to the fifth century; a single possible unfinished example was recorded from the

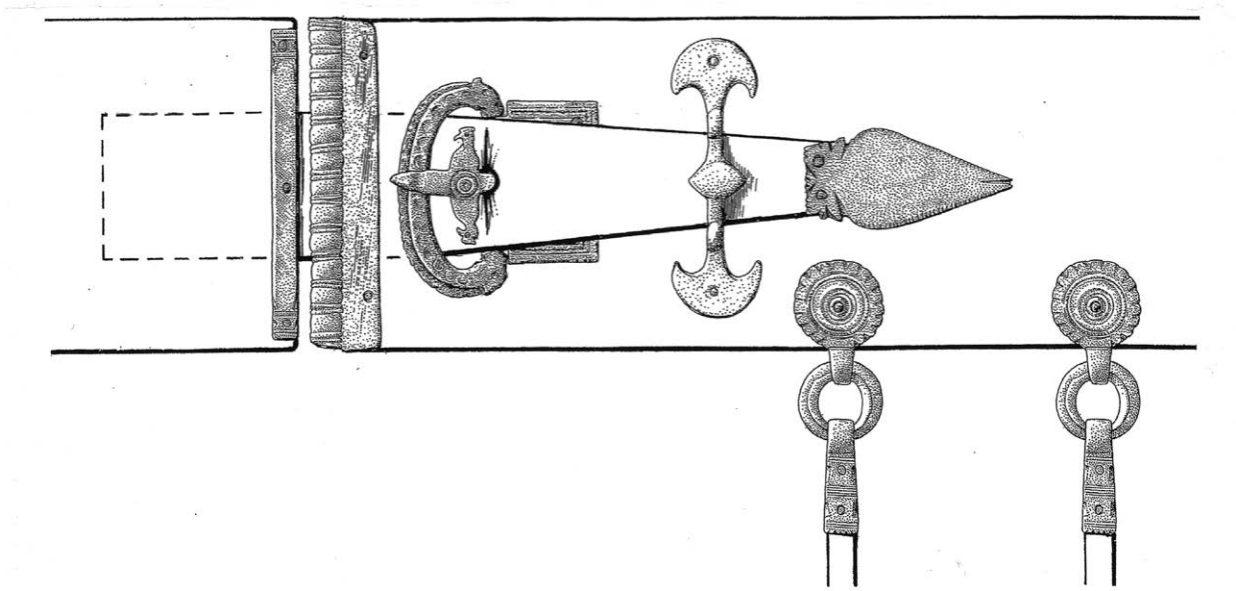


Figure 8.9 - A reconstruction of how a Type IIIa buckle, belt stiffeners and associated strap ends and fittings may have been worn. Illustration by Nick Griffiths

Table 8.5 - Examples of well dated Type III belt fittings derived from Henry 2023b)

Type	Site	Date	Reference
IIIA	Richborough	388+	Hawkes and Dunning (1961), Fig. 20b
IIIA	Lankhills	390+	Clarke (1979), G. 376
IIIA	Dorchester-on-Thames	390+	Booth (2014), Fig. 3.1
VA Lancet	Lankhills	390+	Clarke (1979), G. 376

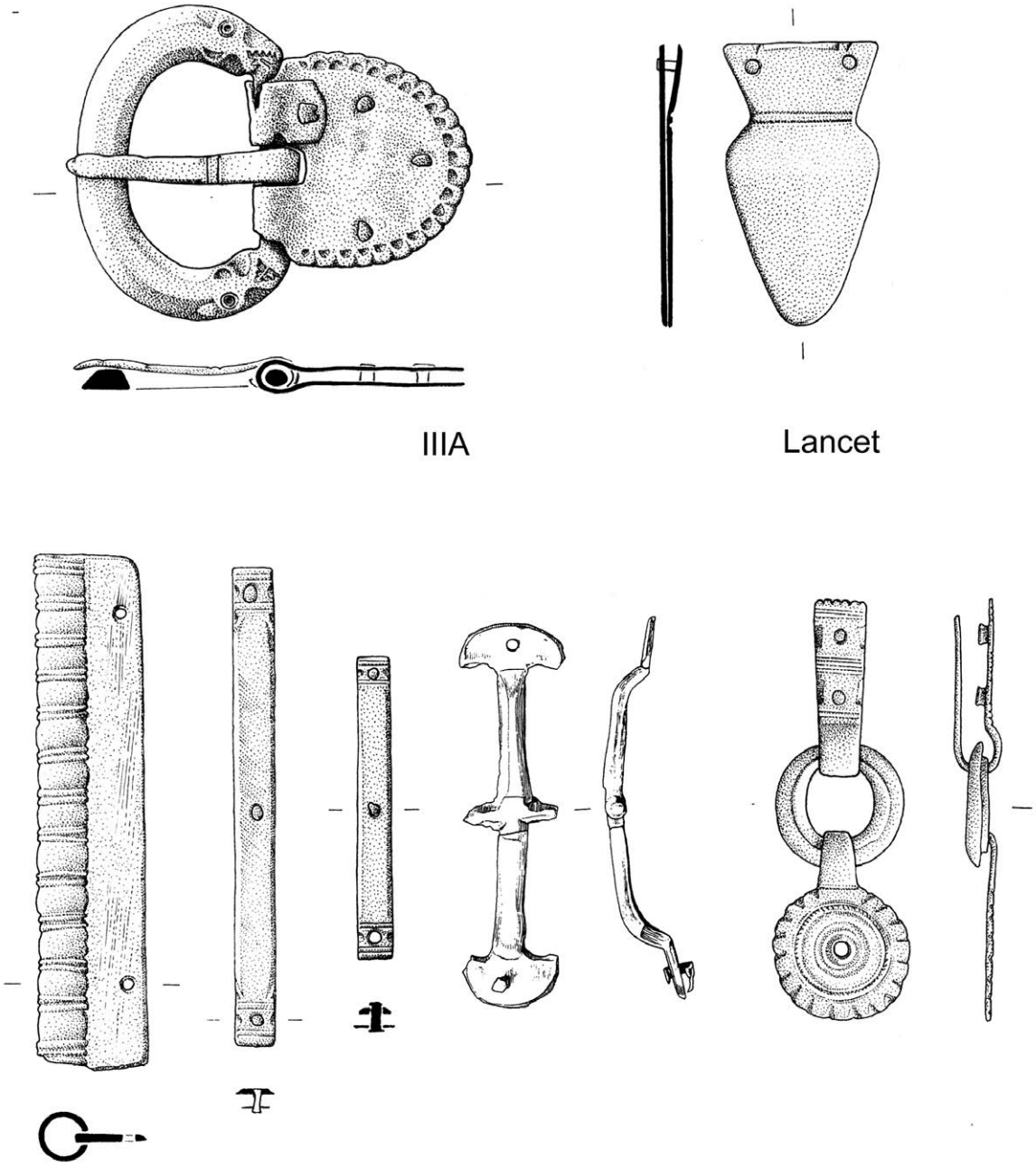


Figure 8.10 - Example of a Type IIIA buckle, Lancet strap end, associated belt fittings, stiffeners and loops (From Dorchester on Thames excluding one belt stiffener from Richborough (bottom centre)). Illustration by Nick Griffiths

Ickham watermill in Kent which might suggest insular examples were also manufactured (Riddler *et al.*, 2010, Fig. 72 no. 122). Carr (2017, 68) discussing examples from Mucking, Essex and Nunburnholme, Yorkshire suggests this is a fifth century type.

Strap ends and associated fittings

The principal strap end associated with the Type III belts is the lancet type (Figure 8.10, top right). These strap ends in Britain can sometimes be modified post production to have a bifid tip as seen in Figure 8.9.

The evolution in the form of construction of the belt and its increased complexity resulted in the need for a larger quantity of associated stiffeners and fittings. They include rosette hangers (Hawkes and Dunning Type VI; Figure 8.10, bottom right) and stiffeners (Hawkes and Dunning Type VII -Figure 8.10, bottom left and centre).

Type IV Belt sets

The belt used with the Type IV buckles is of a similar style to that of Type III (Figure 8.11). The belts themselves were a little narrower, up to 100mm wide, at both ends were belt stiffeners with a slot cut in the belt to allow a smaller leather section to pass through (Bishop and Coulston, 2006). The decoration on Type IV buckles and their associated fittings are often chip carved. Sommer (1984) dates Type IV buckles to AD 364-407 west of the Rhine, no well dated examples are recorded from Britain (Henry, 2022).

Type IVA

Type IVA is similar in form to IIIA but the buckle is cast within a plate with chip carved decoration (Figure 8.12, right).

Type IVB

Type IVB is a loop set in an openwork frame, a single example was recorded by Hawkes and Dunning (1961) from Catterick.

Strap ends

The associated Type V strap ends have been decorated with a variety of chip carved motifs or are lancet types (Figure 8.12, left). There appear to be a number of potential sub groups in these strap ends including examples with three dimensional lions.

Typological approach

No comprehensive typology has been developed for the late-Roman belt fittings used in Britain. The most

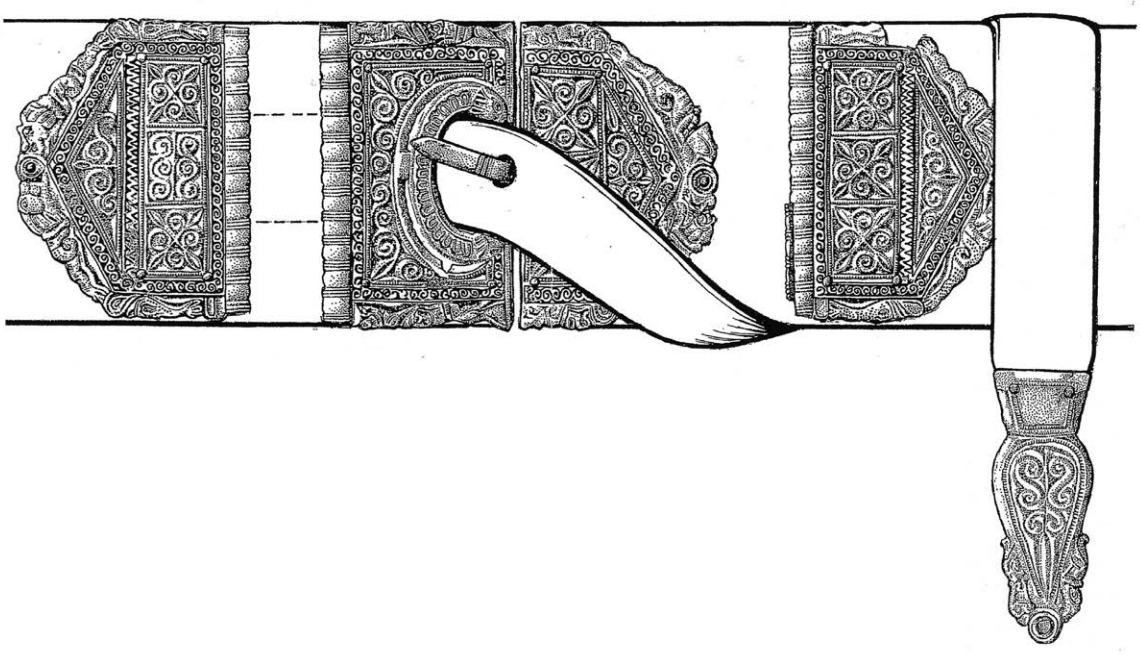


Figure 8.11 - A reconstruction of how a Type IV buckle, belt stiffeners and associated strap end may have been worn. Illustration by Nick Griffiths

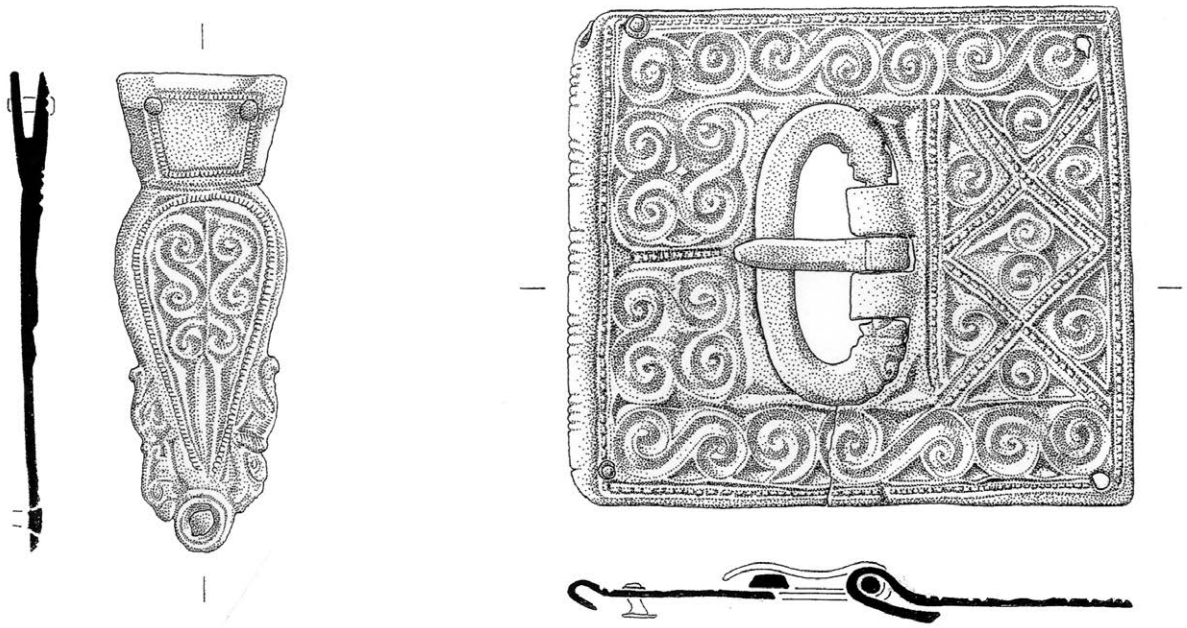


Figure 8.12 - Example of a Type IVA buckle (Smithfield, London) and lancet strap end (Mansell Street, London). Illustration by Nick Griffiths

significant limitation with the material discussed by Hawkes and Dunning (Hawkes and Dunning, 1961) is that the typology is not fully representative of the material linked with the *cingulum*.

A key issue when considering material from the various typological studies highlights that there were no fixed associations, for example amphora strap ends can be associated with zoomorphic and non-zoomorphic buckles.

Within the typologies used, Laycock (2007) has demonstrated that there are both insular and continental examples. This presents an opportunity to consider insular and continental types in a greater detail (Table 8.6), the following format expands on previous work undertaken by the author (Henry, 2022).

Production

The continental types are thought to have been produced in state *fabricae.* These objects did not arrive in Britain transported in bulk, instead they were worn. While it has long been recognised that there are particular types only produced in Britain the work of Laycock (2007) in particular has highlighted the quantity of insular types which diverge from continental prototypes which implies the existence of a quantity of workshops producing such material in Britain (Swift, 2010, 473).

A small number of unfinished examples are known from Britain which retain casting sprues or the edges of the buckle have not been filed post production. Evidence of production can potentially inform us of regions where workshops produced insular belt fittings. The evidence currently suggests widespread production of these objects at a range of centres. Examples include a Type IA buckle from Shurdington, Gloucestershire; a Type IB buckle from Arreton, Isle of Wight; a Type IIA from Rackheath, Norfolk; a Type IIA from Chilmark, Wiltshire; a Type IIIB from Ickham Mill, Kent, and a miscast amphora strap end from Navenby, North Lincolnshire (Appels and Laycock, 2007; Leahy, 2007, Figure 10, no. 14; Henry, 2022). Coulston (2010, 55) noted a lead master for casting amphora strap ends from Stanwix, the object is an amphoriskos paralleled at Springhead (See an example in Schuster, 2011, 244-5).

Previous distribution studies

The distribution of belt fittings was first considered in detail by Hawkes and Dunning (1961) and authors such as Leahy (1984; 2007), Simpson (1976), Laycock (2007; 2008), Coulston (2010), Esmonde Cleary (2017) and Carr

Table 8.6 - The typological approach used within this study for belt fittings

Type	Buckles	Belt fittings
Type I (AD 370/390+)	Type IA IA Continental IA Insular IA Lionhead IA Crescentic Type IB	Type I strap ends Prototype Tortworth Tortworth Belt stiffeners Narrow propeller
Type II (AD 350-370+)	Type IIA IIA Continental IIA Insular Type IIB Type IIB non-zoomorphic Non-zoomorphic buckles Circular plates Rectangular plates Repousse decoration Triangular plates	Type II strap ends Continental heart Continental amphora Insular amphora Belt stiffeners Propeller
Type III (AD 390+)	Type IIIA Type IIIB	Type III strap ends Type VA/Lancet Belt stiffeners
Type IV (AD 390+)	Type IVA Type IVB	Type IV strap ends Type VA/Lancet

(2017; 2019). No national studies have been undertaken on all forms, the focus generally has been on the zoomorphic examples first published by Hawkes and Dunning (1961). The majority of analyses evaluate the spatial distribution, this will be considered through the four main types. Subsequently the social distribution will be considered.

Types I and II

Hawkes and Dunning (1961, 28) noted that the majority of Type I and II buckles and fittings were from the civilian zone of the West, South-west and Midlands (Figure 8.13, left). In particular there was an emphasis in the distribution in the environs of Cirencester where over 70 per cent of the corpus occurred (Swift, 2000, 185; Cool, 2010b, 288). Citing the presence of late Antonine and Severan military equipment, the presence of soldiers in this region was considered far from unusual (Bishop, 1991, 25-26; Cool, 2010a, 8). The distributions by Leahy (2007) highlight the significant increase in the corpus of material available and the concentration in both the environs of Cirencester but also North Lincolnshire (Figure 8.13, right).

No Type I buckles were recorded from Hadrian's Wall and they were also rare at the Saxon shore forts. This was viewed as evidence that these fittings were not issued to the *limitanei* (Leahy, 2007, 140). Consideration of the material from the northern frontier by Coulston (2010) included one example from Hadrian's Wall (Figure 8.14). He concluded that although there were more belt fittings in general than previously recorded, the number is still significantly lower than in the south of Britain.

Type II buckles have been considered to have a military function and have been linked to the Theodosian campaign after the Barbarian Conspiracy (Hawkes and Dunning, 1961, 26; Leahy, 1984, 29). In the northern frontier area Type II buckles are better represented than Type I but they remain rare on Hadrian's Wall where differences between east and west can be identified (Leahy, 1984, 24; Leahy, 2007, 137; Cool, 2010a, 4).

Types III and IV

Type III and IV belt fittings are rare in Britain. Their spatial distribution is both sparse in number and widespread geographically (Figure 8.15). While this is in part a consequence of the late date for the introduction of the type it has been suggested by Nick Griffiths (pers. comm.) that these types and their rarity

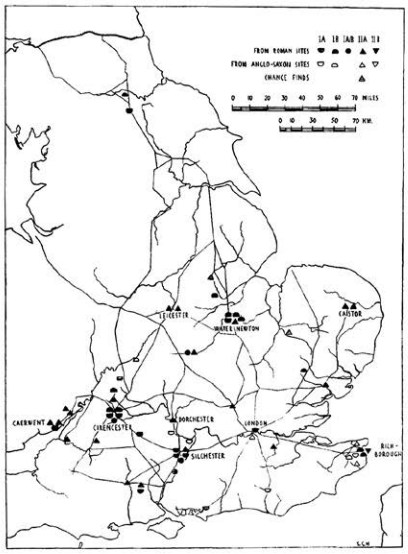


FIGURE 9. DISTRIBUTIO:\ OF BRITISH-MADE BUCKLES, TYPES I AND II (pp. 28 ff.)

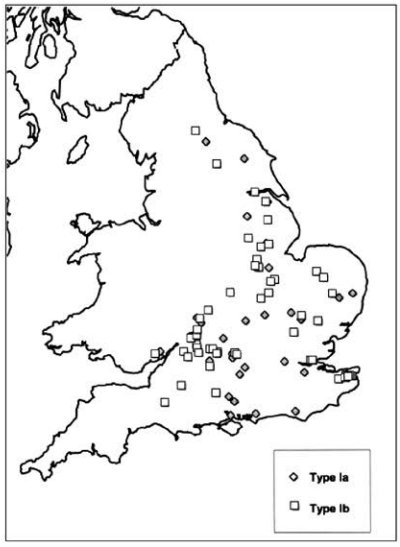


FIG. 4. THE DISTRIBUTION OF BUCKLES OF HAWKES AND DUNNING TYPE IA AND IB.

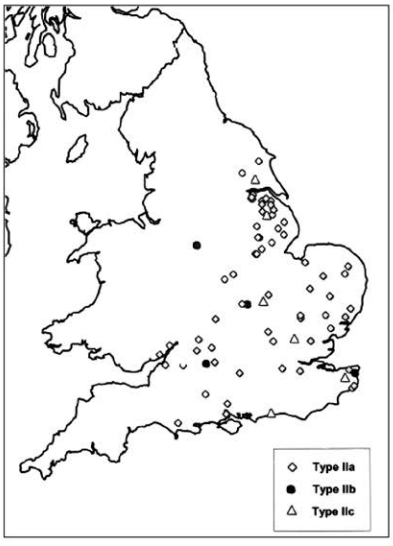


FIG. 5. THE DISTRIBUTION OF BUCKLES OF HAWKES AND DUNNING TYPE IIA, B AND C.

Figure 8.13 - Distribution of insular Types I and II (left) by Hawkes and Dunning (1961, Fig. 9) with the distribution of Type I (centre) and Type II (right) by Leahy (2007, Fig 4 and Fig. 5).

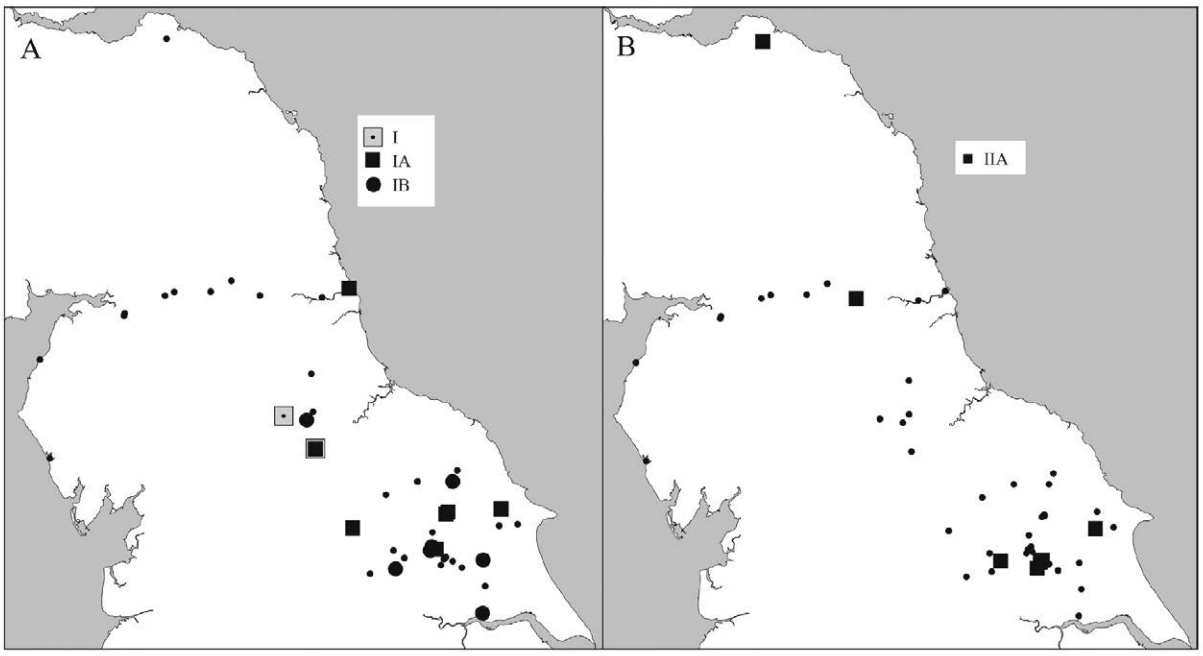


Figure 8.14 - The distribution of Type I and II buckles in the northern frontier by Coulston (2010, Fig 6.1). The distribution highlights the general paucity of Type I and II on Hadrian's Wall but highlights other belt fittings have been recovered (the smaller circular dots).

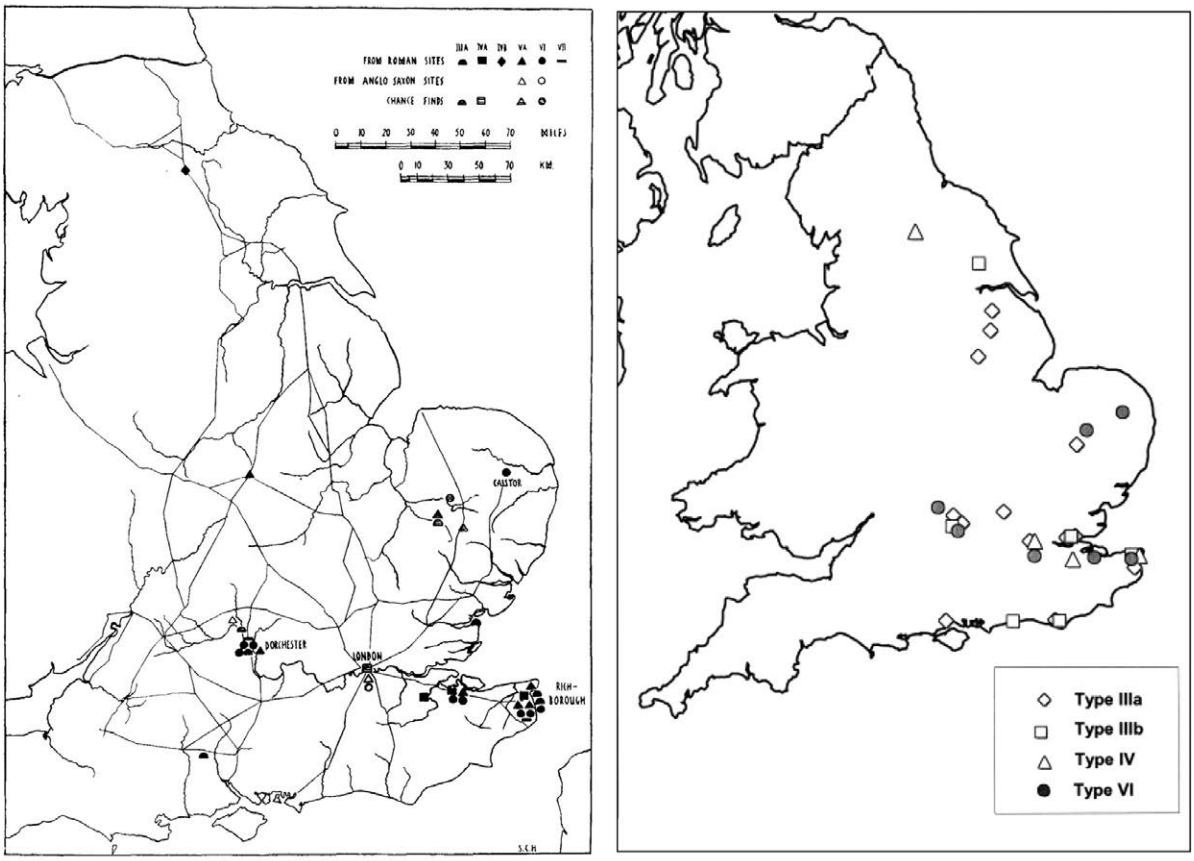


Figure 8.15 - Distribution of Types III and IV by Hawkes and Dunning, left (1961, Fig. 5) and Leahy, right (2007, Fig. 6).

might reflect the rank and status of the wearer. Type IIIA buckles are located on or near the Roman road network and they occur around some of the Saxon shore forts to the east of Britain (Leahy, 1984, 24; Leahy, 2007, 137).

The movement of people

Objects which fall outside the usual distribution have been used to suggest the movement of their owners (Eckardt, 2014). A small number of insular British buckles have been recorded on the continent; these include a IA Crescentic type buckle from Buggenum, Holland and a Type IB buckle plate from Westerwanna, Germany decorated with a peacock (Eckardt, 2014, 55). While these objects might indicate the movement of people, the wearer may not have been British in origin. Instead the Christian significance of the peacock motif may have been the primary reason for its selection (Mawer, 1995, 60; Eckardt, 2014, 55).

Social distribution

Some forms of social analysis have been undertaken, but often the focus is on considering the changes noted between the uses seen in the Roman and post-Roman period. The initial corpus collated by Leahy (1984, 23) highlighted that only three Type I buckles were from military contexts, 12 were recorded from walled towns and 30 from undefended settlements. The most recent study by Carr (2017; 2019) consisted of 430 Hawkes and Dunning belt fittings. His settlement distribution considering the material by quantity instead of proportion but noted 51 finds from urban contexts and 58 finds from rural contexts (Carr, 2017, 42). In his corpus, only three examples were recorded from the actual defences of urban centres leading to him questioning their supposed military associations (Carr, 2017, 43).

Continuation into the fifth century

Belt fittings appear to have retained their importance even when repaired suggesting they remained in use for a significant time. This is evidenced in the dataset by repairs to the plate through riveting (such as the Type IIIA buckle depicted in Figure 8.10, top left). Repairs are also identifiable through evidence of replacement pins, for example iron pins or reusing fragments objects such as bracelets as buckle pins (Henry, 2022, 91). Repairs may not necessarily indicate prolonged use, for example the same Type IIIA buckle which has been repaired exhibits little wear, as the jaws of the zoomorphic buckle remain well defined. This suggests that the repair could have occurred soon after production.

Modifications such as the cutting down of amphora or heart strap ends for use with Type I buckles and the addition of a bifid tip post production could also suggest continued use. Although these elements inform us about the needs and requirements of the wearer, particularly following British traditions on some continental material, it could also hint at longer life spans for these objects.

Late Roman belt fittings are recorded from a number of early-medieval graves. A total of 31 examples were recorded by Leahy (2007, 134). He noted that where the sex could be determined 16 were female and 11 were male. This contrasts with Roman burials where belt fittings are linked with men. An exception could be the female burial with a Type IB buckle from the Dyke Hills which was suggested as fourth century (Hawkes and Dunning, 1961, 10). The human remains have not survived and the brooch forms are of fifth century date with evidence of repairs leading to a fifth century date suggested by Kirk and Leeds (1952, 69) which seems more convincing.

The reason for the transition of an object of male equipment to an object worn as part of dress for both sexes is debated. Perhaps it was considered acceptable for some females to adopt traits of the male persona to highlight their husbands' status (Leahy, 1984, 23; Leahy, 2007, 134). Ager (2010) suggests that they could have been the wives or heirs of warriors who had served in auxiliary units in Britain. In contrast Fleming (2021) has highlighted Roman material culture was being used in new ways as the population of Britain created new identities and emphasises the role of women as part of this process.

Research questions

No systematic study of these fittings has compared the continental and insular material, particularly of the same type. This is a key area of research given 1,334 fittings have been recorded in this corpus. Different hypotheses presented, such as evidence of militias, or the use of these fittings by the civilian elite, will be evaluated based on the regional and sub-regional distribution patterns.

Can this corpus offer insights into those who wore different types of belt set? For example, do specific forms of continental or insular forms predominate at certain site types.

Regional patterns have been previously identified such as Type I belt sets concentrating in the environs of Cirencester. Through systematic analysis of various aspects of the dataset can we identify nuances within the distribution patterns that can tell us about regional variation and changing fashion in the fourth and fifth centuries?

Similarly, we know that there was a change in how these objects were used in the fifth century, can these objects assist in informing how the threads that held Roman Britain together fell apart?

The dataset

A total of 1,334 late Roman belt fittings are included as part of this study. The dataset has been added to ADS (https://doi.org/10.5284/1090416) and has been principally compiled using the corpus collected by Leahy (2007), the unpublished corpus by Stuart Laycock (Appels and Laycock, 2007; Laycock, 2008) as well as the PAS and RRS. As with each artefact type considered in this study in each corpus is the risk of extensive duplication, care has been taken to avoid this. Laycock's corpus includes a significant quantity of poorly provenanced examples which have been omitted here.

Analysis and Results

We face a range of challenges when evaluating this material. The primary issue relates to the fact that previous national studies have only considered a proportion of the types which occurred, for example zoomorphic belt fittings (Hawkes and Dunning, 1961; Leahy, 2007; Carr, 2017) or non-zoomorphic types (Simpson, 1976). Although Sommer (1984) considered

a wider corpus, the data for Britain primarily relied on the Hawkes and Dunning survey limiting its impact.

The emphasis of this study will be placed on the four main belt set types following Hawkes and Dunning's definition of Type I (c. AD 370/390+), II (c. AD 350/370+), III and IV (c. AD 390+) which includes both zoomorphic and non-zoomorphic types. Within these four main groups material which was produced both on the continent and in Britain will be analysed in detail.

Belt fittings have been recorded from 740 sites (Figure 8.16). The greatest concentrations can be seen in the South and parts of the South-west, East Anglia as well as Richborough and Ickham Mill in Kent. Several absences of material in the corpus also occur, notably very few examples are recorded from London which, given it was the diocesan capital is likely to be highly unrepresentative. Other regions with limited recorded examples include Hadrian's Wall, the West Midlands as well as Devon and Cornwall

Six or more belt fittings have been recorded from 21 sites (Figure 8.17). The greatest number occur at Richborough, Kent (78) followed by Ickham Mill, Kent (35), Lankhills, Winchester (33) and Cirencester, Gloucestershire (13). Apart from the military sites at Richborough and South Shields, the remaining sites with six or more belt fittings are either urban, nucleated, rural or PAS rural.

PAS Finds

The PAS has vastly increased the number of belt fittings with 791 examples incorporated here. The PAS distribution broadly matches that of the excavated dataset which has major concentrations in the environs of Cirencester (Figure 8.18). The PAS data enhances our understanding of the distribution with significant quantities of belt fittings recorded in Wiltshire, Oxfordshire and Hampshire, East Anglia, and Lincolnshire. Generally, very few PAS belt fittings have been recorded north of York – a pattern reflected in the excavated dataset. Interestingly, few are recorded from Kent which is surprising given the corpus in the excavated group and as there are over 30,000 PAS records for finds from the county, so this is a real absence.

Figure 8.19 compares the proportions of various belt fitting forms recorded from the excavated and museum dataset and the PAS. In the PAS dataset there are higher proportions of Type IB and IIA and IIB buckles and no Type IV buckles. The proportion of non-zoomorphic buckles is substantially lower. In general, strap ends dominate the PAS corpus. In part this could relate to our ability to identify unstratified fragments of non-zoomorphic belt fittings that when out of secure contexts are potentially undiagnostic. The analyses below also indicate that non-zoomorphic buckles and fittings tend to occur in higher proportions at urban sites. Consequently their general absence on the PAS database could reflect the rural emphasis of this dataset and be a genuine reflection of the distribution rather than a bias relating to unstratified material.

Comparison by site type

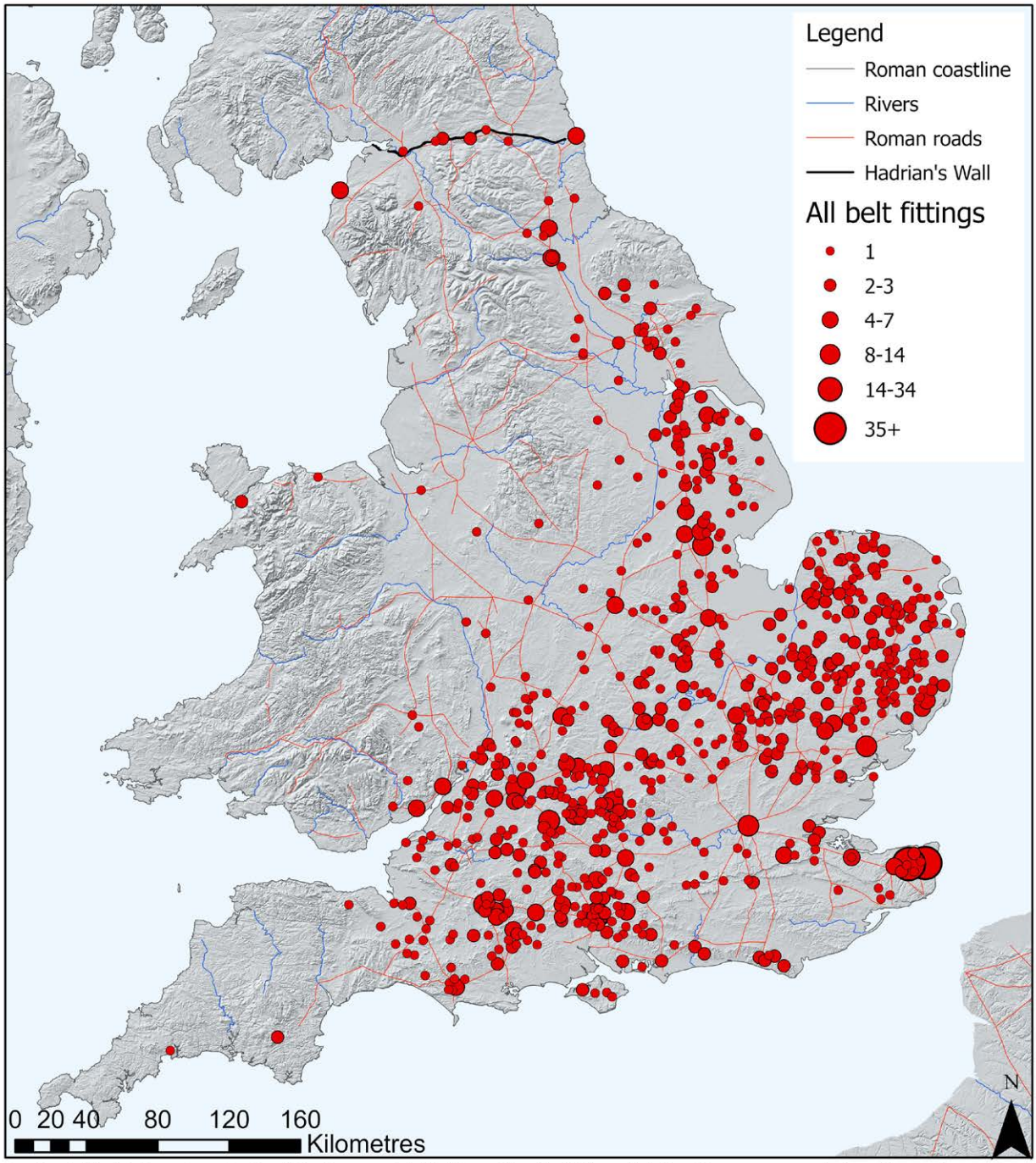
Belt fittings are generally found in similar numbers throughout the settlement hierarchy (Figure 8.20). These belts were potentially worn by a range of groups and it has been suggested an insular form of *cingulum* was worn in Britain (Hawkes and Dunning, 1961, 28; Hawkes, 1974, 390-391; Leahy, 2007, 137). While at face value we might expect higher proportions from military sites, the pattern appears to reflect the chronology of these objects and the changing patterns of supply.

As part of this study belt fittings have been divided based on their likely location of manufacture and are either defined as insular (manufactured at various workshops in the diocese of Britain) or continental. These divisions could be based on the type (such as Type IB) or stylistic traits.

Spatially, concentrations of continental material occur along Dere Street, in East Anglia, Oxfordshire, Hampshire, south Wiltshire, in the environs of Cirencester, in Kent and small quantities on the northern frontier (Figure 8.21). Interesting absences of continental material can be noted in the environs of Bath (Avon, Somerset, Wiltshire, and Dorset) and in the East Midlands in general. In these regions concentrations of insular material occur demonstrating it is not collection bias, but instead appears to reflect a genuine pattern.

Smaller quantities of insular material occur along Hadrian's Wall as well as at Richborough where only 18 of 78 belt fittings (~23 per cent) are recorded as insular. Between London and Richborough, with the exception of Ickham Mill, insular material is recorded in lower quantities than continental material.

In terms of social distribution, continental material occurs in greatest proportions at military and nucleated sites (Figure 8.22). In contrast, insular material occurs



Ancient World Mapping Center "Background 16", "Coastline" , "Rivers". http://awmc.unc.edu/wordpress/mapfiles.
Roman road network based on Margary (1973).

Figure 8.16 - The distribution of all belt fittings in Britain associated with the late Roman cingulum militaire (n=1,334)

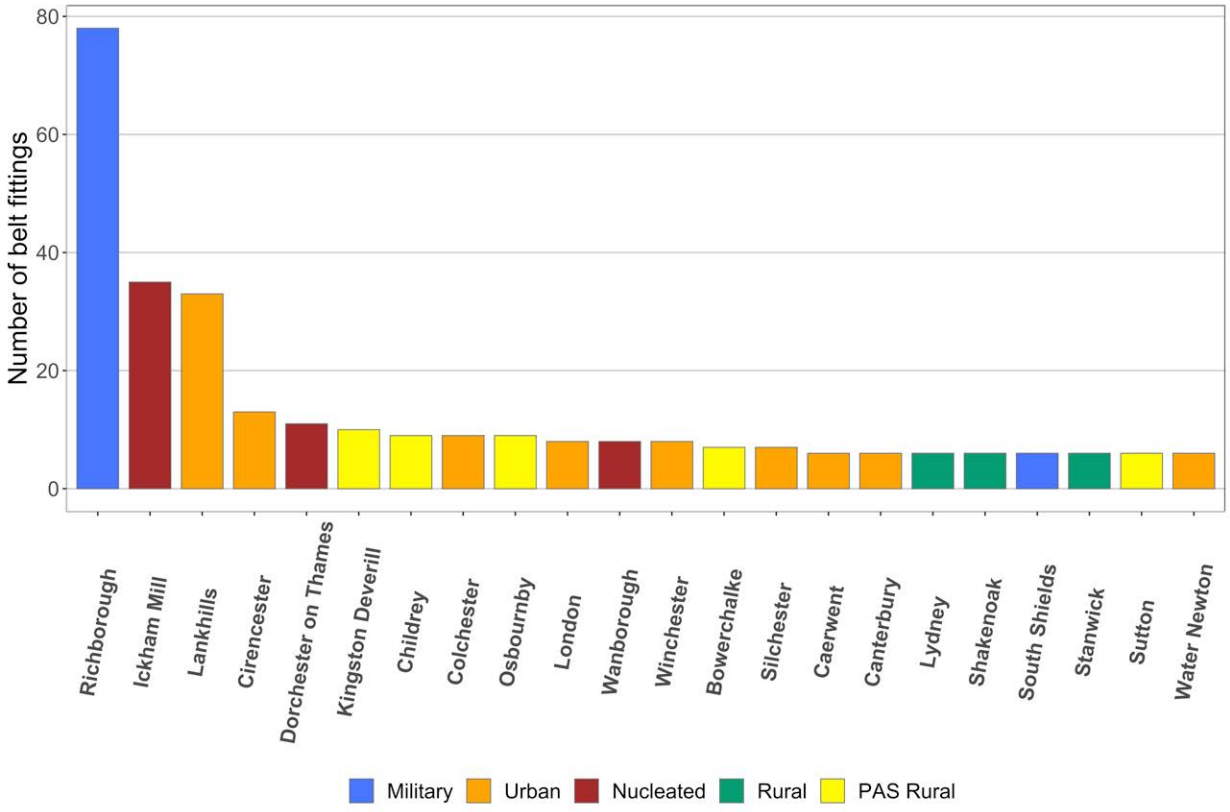


Figure 8.17 - The quantity of belt fittings recorded from individual sites (with a minimum of six examples).

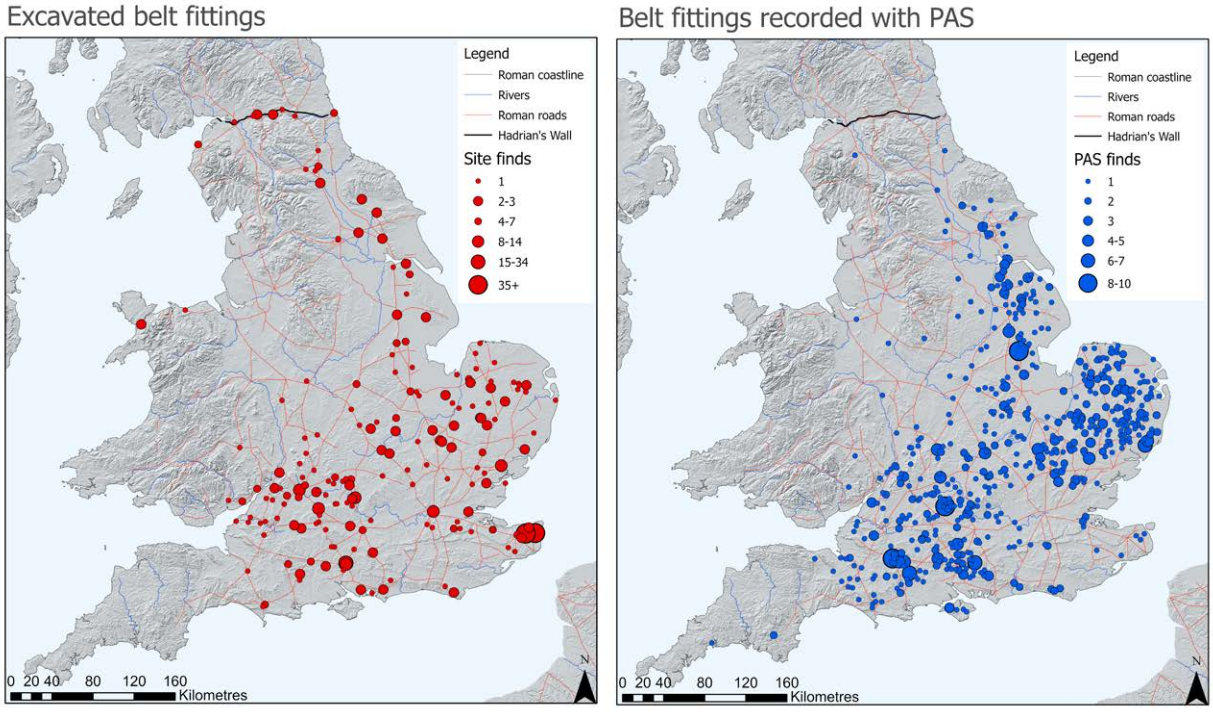


Figure 8.18 - Comparison of belt fittings recorded from excavations and museum collections (543) with those recorded with the PAS (791).

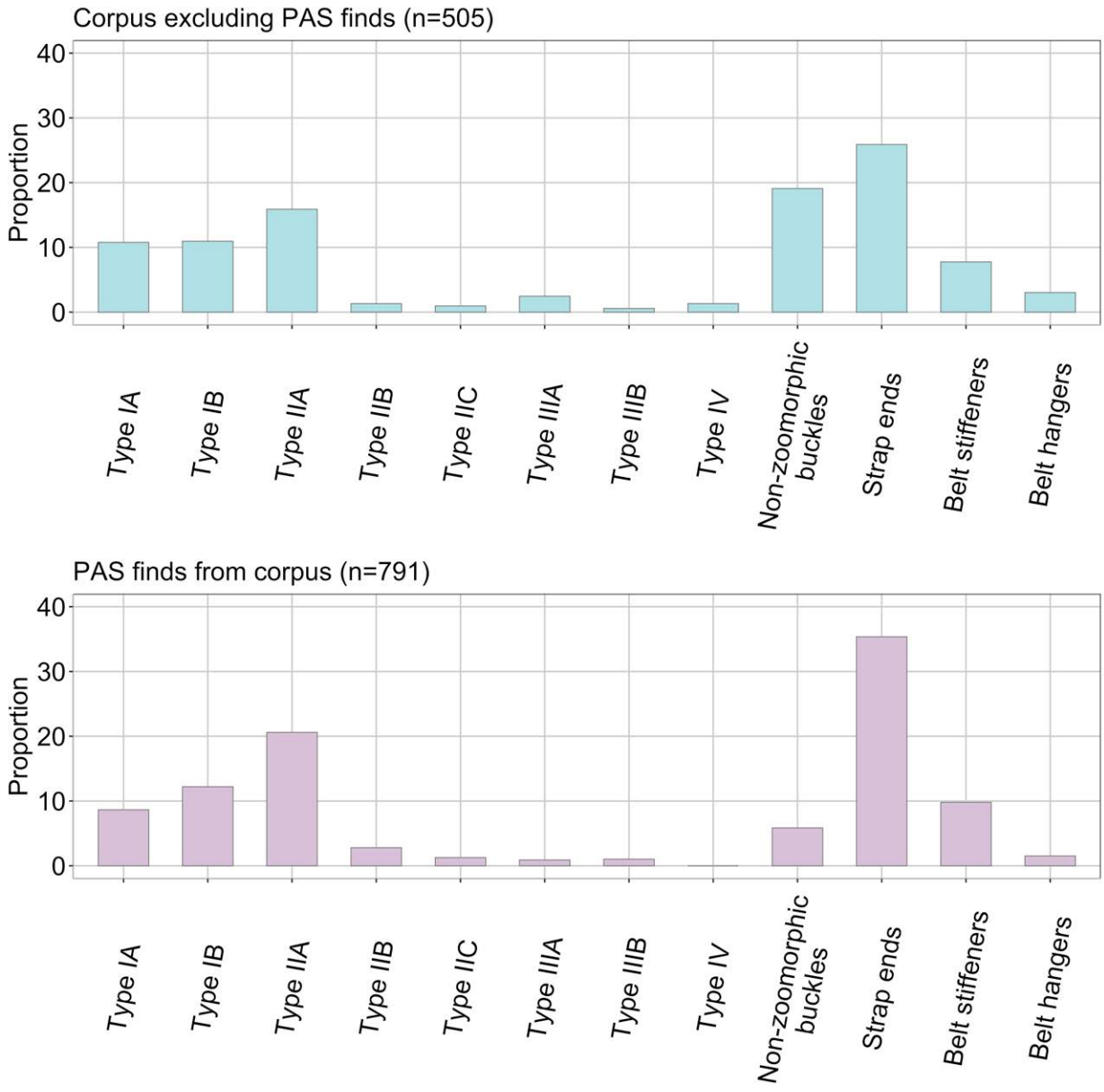


Figure 8.19 - Comparison of the key belt fitting types recorded with the PAS and excavated datasets

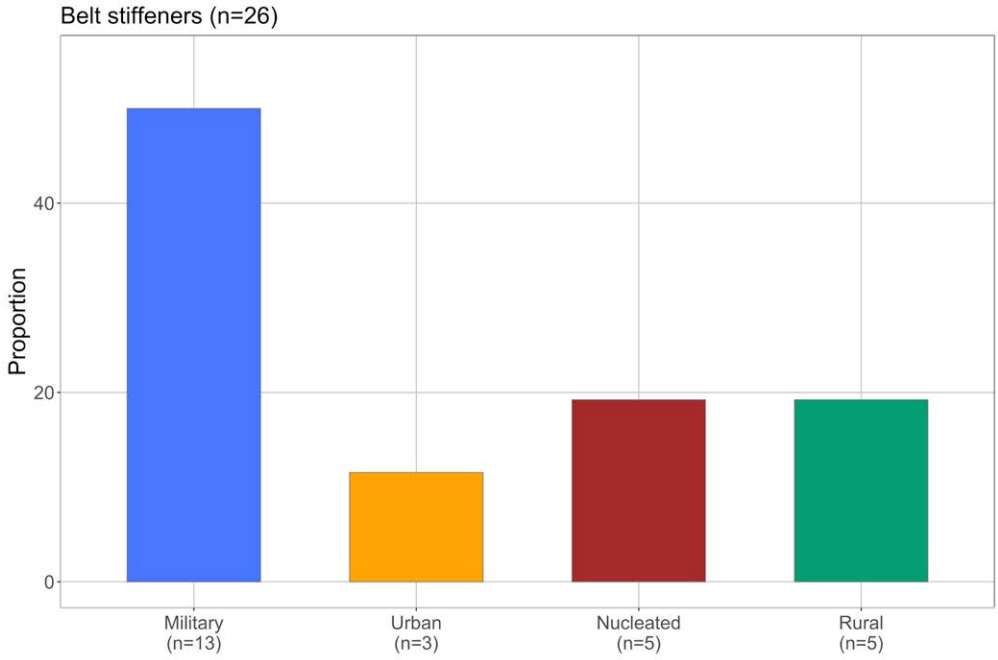


Figure 8.20 - Comparison of belt fittings from military, urban, nucleated, and rural sites

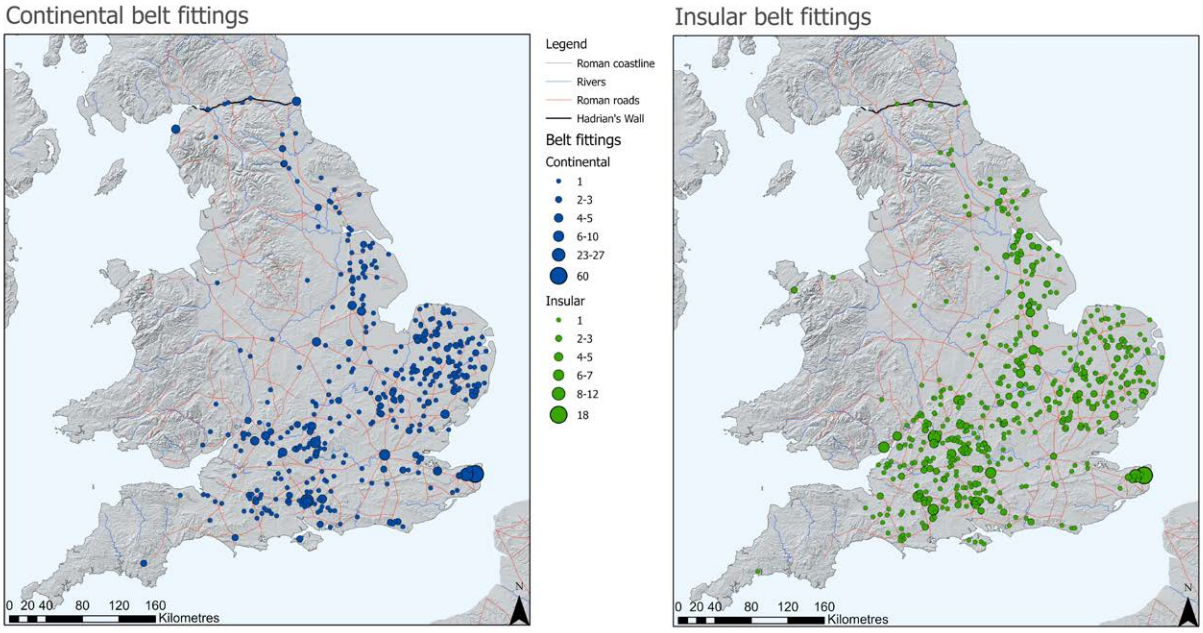


Figure 8.21 - Comparison of the spatial distribution of belt fittings defined as being produced in Britain or the Continent. Some types such as propeller belt stiffeners or non-zoomorphic buckles have been defined as continental.

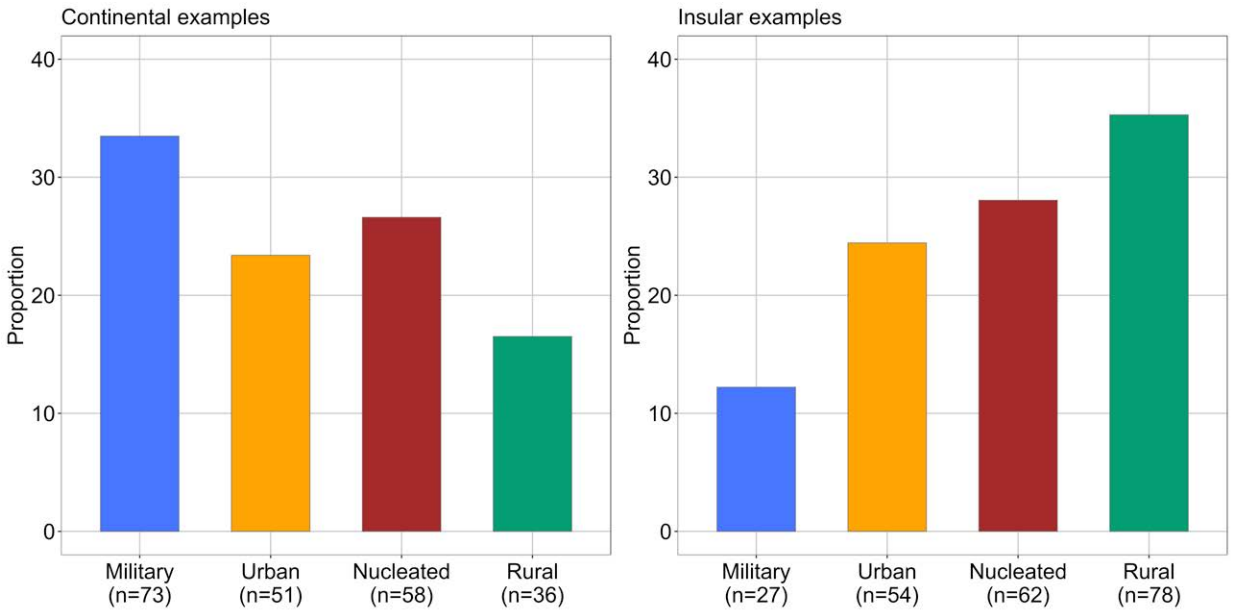


Figure 8.22 - Comparison of continental and insular material defined by site type.

at rural sites in significantly higher proportions, and at military sites in significantly lower proportions. The quantity from urban and nucleated sites is broadly comparable between insular and continental material.

Military sites

The material from Richborough forms 70 per cent of the military corpus, significantly affecting the patterns seen (Figure 8.23). The continental material forms a higher proportion of material from the Saxon shore fort sub-group in contrast to insular material. Insular belt fittings associated with military sites occur in slightly higher proportions on Hadrian's Wall and other military sites – this pattern reflects the changing proportions at Richborough.

Coulston (2010, 54) emphasised that higher quantities of late Roman belt fittings were recorded from the northern frontier compared with previous studies by Hawkes and Dunning (1961) and Leahy (1984; 2007). Yet, the general paucity of belt fittings from this region remains notable and appears to be chronological (Henry, 2022). The belt fitting types which do occur were introduced c. AD 350, the later examples from AD 370/390 onwards are generally absent reflecting changing patterns in overall supply to the northern frontier that have been highlighted by Evans (2000, 40-41) and Bidwell (2017, 292).

Urban sites

When large towns and *civitas* capitals are compared we can see broadly comparable proportions of insular and continental material (Figure 8.24). The material from Lankhills, Winchester forms a significant part of the assemblage from urban (*civitas* capital) centres.

Within the data we can discern trends, such as the quantity of insular belt fittings generally occurring in Cirencester. This pattern has previously been identified where it was noted 70 per cent of the corpus of Type I fittings occurred (Swift, 2000, 185; Cool, 2010b, 288).

Nucleated sites

Higher proportions of belt fittings (both continental and insular material) occur at undefended nucleated settlements (Figure 8.25). Continental material occurs in higher proportions at defended *vici* than insular forms which might offer insights into the roles of these defended centres.

Rural

In the rural dataset the greatest quantity of both insular and continental belt fittings occurs at villas where continental material occurs in slightly higher proportions (Figure 8.26). Insular material occurs in

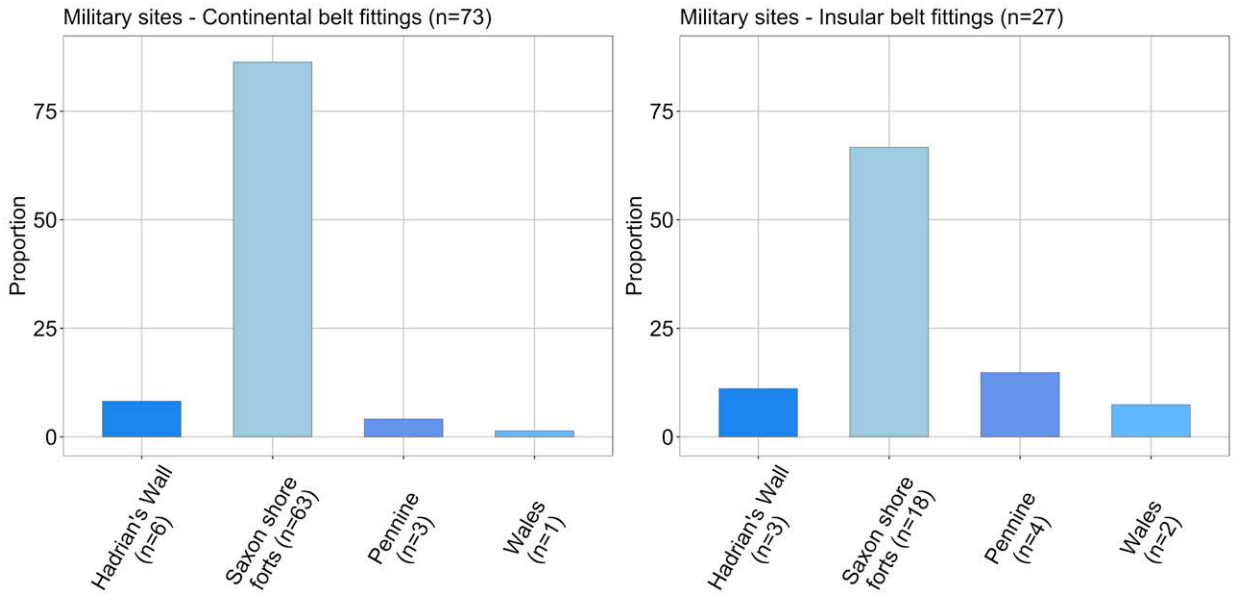


Figure 8.23 - Comparison of the military sub types. The assemblage of the Saxon shore fort at Richborough dominates the corpus.

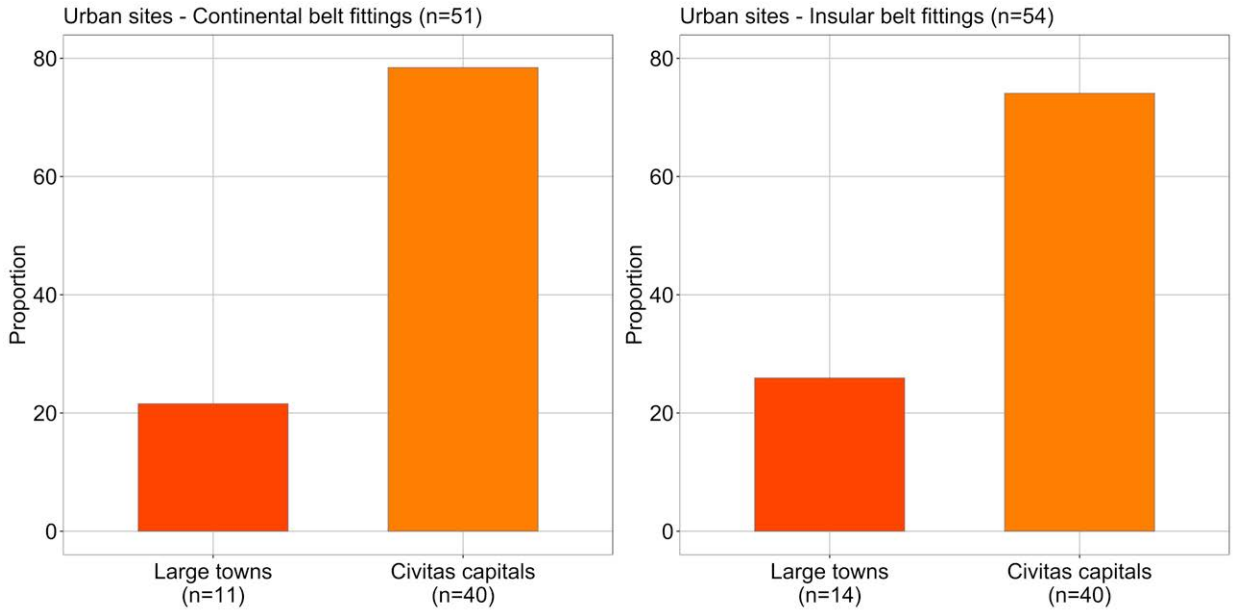


Figure 8.24 - Comparison of the continental and insular material recorded within the corpus from urban centres.

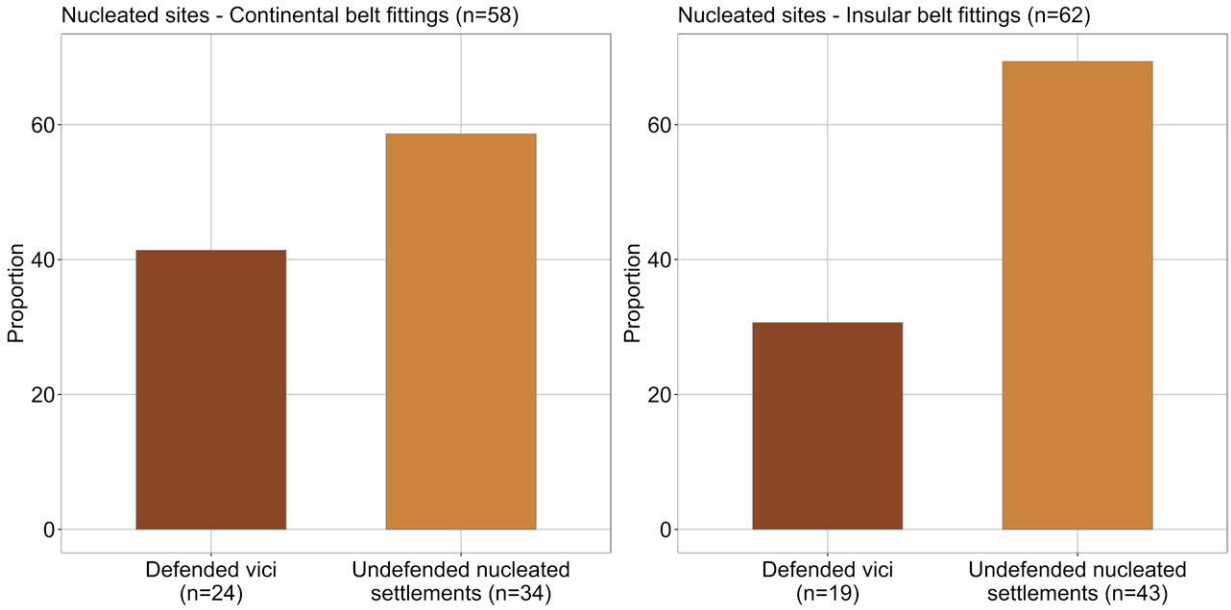


Figure 8.25 - Comparison of continental and insular belt fittings from nucleated sites

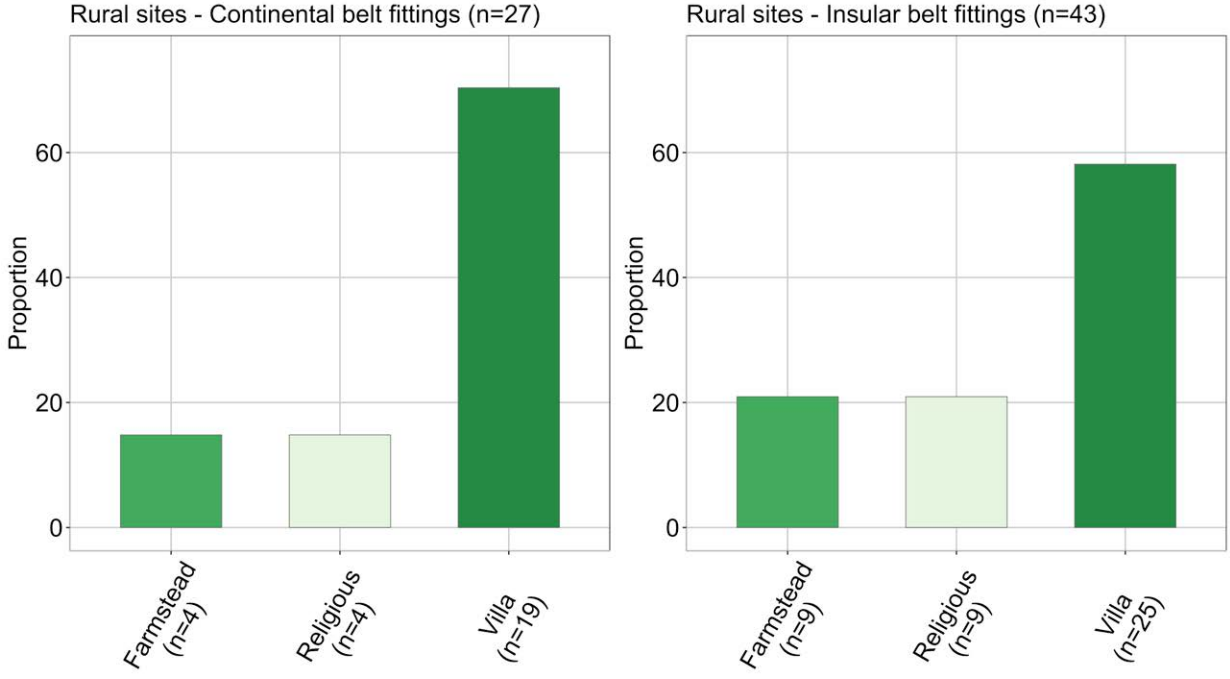


Figure 8.26 - Comparison of continental and insular belt fittings within rural sites

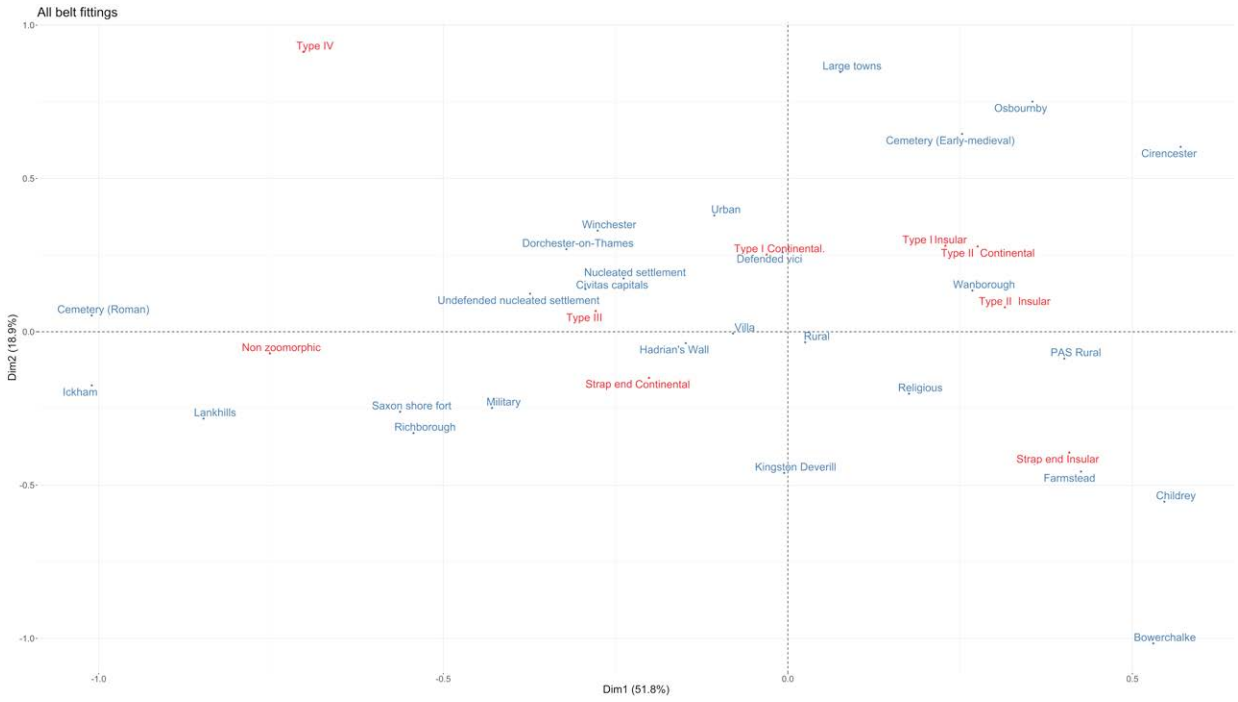


Figure 8.27 - Correspondence analysis of all belt fittings from Britain excluding London, the Other military subgroup and Sutton as well as propeller stiffeners and rosette hanger

slightly higher proportions at farmsteads and religious sites.

Correspondence analysis

While stylistic traits allow us to differentiate types produced on the continent and in Britain, the origins of some forms remains uncertain without systematic metallurgical analysis on a substantial sample. This issue particularly pertains to non-zoomorphic buckles and propeller mounts. Correspondence analysis has been conducted to examine patterns in the data for these more problematic buckle types, considering the trends identified in the results above. This analysis will be used to frame some of the discussions in the subsequent sections.

The assortment of belt fittings considered in the correspondence analysis have been categorised according to the overarching belt sets they accompany—Type I, Type II, Type III, and Type IV. To render the findings more accessible, strap ends have been simply classified into continental and insular forms. Omitted from the analysis is data from a number of sites that distorted the presented results by being substantial outliers. These include London, the 'other military' sub-category, material from Sutton in Suffolk (skewing the data due to the presence of four amphora strap ends) as well as propeller stiffeners and Type VI rosette hangers.

Within these constraints, intriguing insights emerge (Figure 8.27). The majority of Type I and II buckles form distinct clusters, with sites exhibiting diversity in the rural, PAS rural, and nucleated settlement categories. Type I continental buckles appear closely associated with urban centres and defended *vici*. The remaining clusters predominantly revolve around Type III belt sets and non-zoomorphic buckles.

Urban and nucleated sites generally exhibit higher proportions of continental Type I buckles, often accompanied by elevated numbers of Type III buckles. In contrast, insular types are dispersed across a diverse range of sites, particularly rural ones. The observed pattern with non-zoomorphic buckles, while interesting, appears to reflect a bias in the archaeological record, concentrating on select, extensively investigated sites such as Lankhills, Ickham Mill, and Richborough. Conversely, a similar pattern is evident in the data from Cirencester, hinting at differences in the *cingulum militare* in this region.

Comparison by type

This section will focus on belt fitting types considering both the social distribution and spatial analysis. Their types will be discussed in chronological order:

- Type II belt sets (AD 350/370+)
- Type I belt sets (AD 370/390+)
- Type III and Type IV belt sets (AD 390+)

Within these broad types further forms of analysis will consider methods of attachment, decorative styles, and belt dimensions. Such an approach will highlight significant factors which should be considered in conjunction with the social and spatial analyses undertaken previously in this chapter. This will allow us to consider who used these belt fittings and what they represented through new perspectives.

Type II belt sets (AD 350/370+)

Hawkes and Dunning Type II buckles consist of Types IIA, IIB and IIC. Type IIA and IIB buckles were produced on both the continent and in Britain. The continental examples appear to have been introduced c. AD 350. Insular examples are based on continental forms and appear to have been produced from c. AD 370. Type IIC is considered a post-Roman type, so is not evaluated here.

Type IIA buckles have generally been associated with amphora- and heart-shaped strap ends, and propeller belt stiffeners. Non-zoomorphic buckles have a similar chronology and are also associated with these strap ends and stiffeners and so are included in this analysis.

Type IIA

The general distribution of all Type IIA buckle forms is focussed to the south of the line between the Seven and the Humber or along Dere Street (Figure 8.28). While this pattern bears similarities with the distribution of belt fittings illustrated in Figure 8.15 a greater quantity of Type IIA buckles are recorded from East Anglia and the distribution of these buckles north of the Humber or in Kent is limited. These buckles occur in highest proportions at rural sites followed by urban and nucleated sites (Figure 8.29). Very few examples of this form are recorded from military sites in Britain.

When the continental and insular forms are compared, continental examples are recorded in greatest numbers in the eastern half of the diocese particularly in East Anglia and North Lincolnshire, they are more limited between Cirencester and Winchester (Figure 8.30). In contrast, insular Type IIA buckles are far more widespread with examples on Hadrian's Wall, but with some notable absences around north Dorset and south Somerset, areas of the East Midlands and generally, in Kent.

Continental IIA buckles occur in broadly similar proportions at urban, nucleated, and rural sites albeit the sample size is small (Figure 8.31). Higher proportions of insular examples occur at rural sites. As has been noted, they are uncommon at military sites.

Type IIB

Type IIB tends to be more common in the east of Britain with clusters in the environs of Winchester (Figure 8.32). Few Type IIB buckles can be assigned to a site type. A single military example is recorded from Richborough, three recorded from rural sites and two from nucleated sites. The remainder have been recorded through the PAS.

Non-zoomorphic buckles

Non-zoomorphic buckles are considered with the Type II belt sets as they are associated with amphora- or heart-shaped strap ends as well as propeller belt stiffeners when deposited as grave goods.

There is a cluster of non-zoomorphic buckles in the south and South-west of Britain, at Richborough, Ickham Mill and Canterbury as well as in East Anglia and some examples recorded from Ermine Street, Dere Street and Hadrian's Wall (Figure 8.33).

Non-zoomorphic buckles of all types are recorded in greatest quantities from urban and nucleated sites followed by military sites (Figure 8.34). Correspondence analysis highlights these buckles are a prominent feature of the assemblages from sites such as Ickham Mill, Richborough and Lankhills, Winchester (See Figure 8.27). To evaluate if this pattern occurs with the four principal buckle plate forms (round, rectangular, triangular and repoussé) and the non-zoomorphic variant of the Type IIB buckle, each will be considered in turn.

Non-zoomorphic buckles with round plates consist of a separate plate wrapped around the pin bar. They are uncommon from Britain with the majority recorded from the cemeteries of Lankhills, Winchester or at Scorton, Catterick as well as in Kent (Figure 8.35, top right). This is also visible with the social distribution

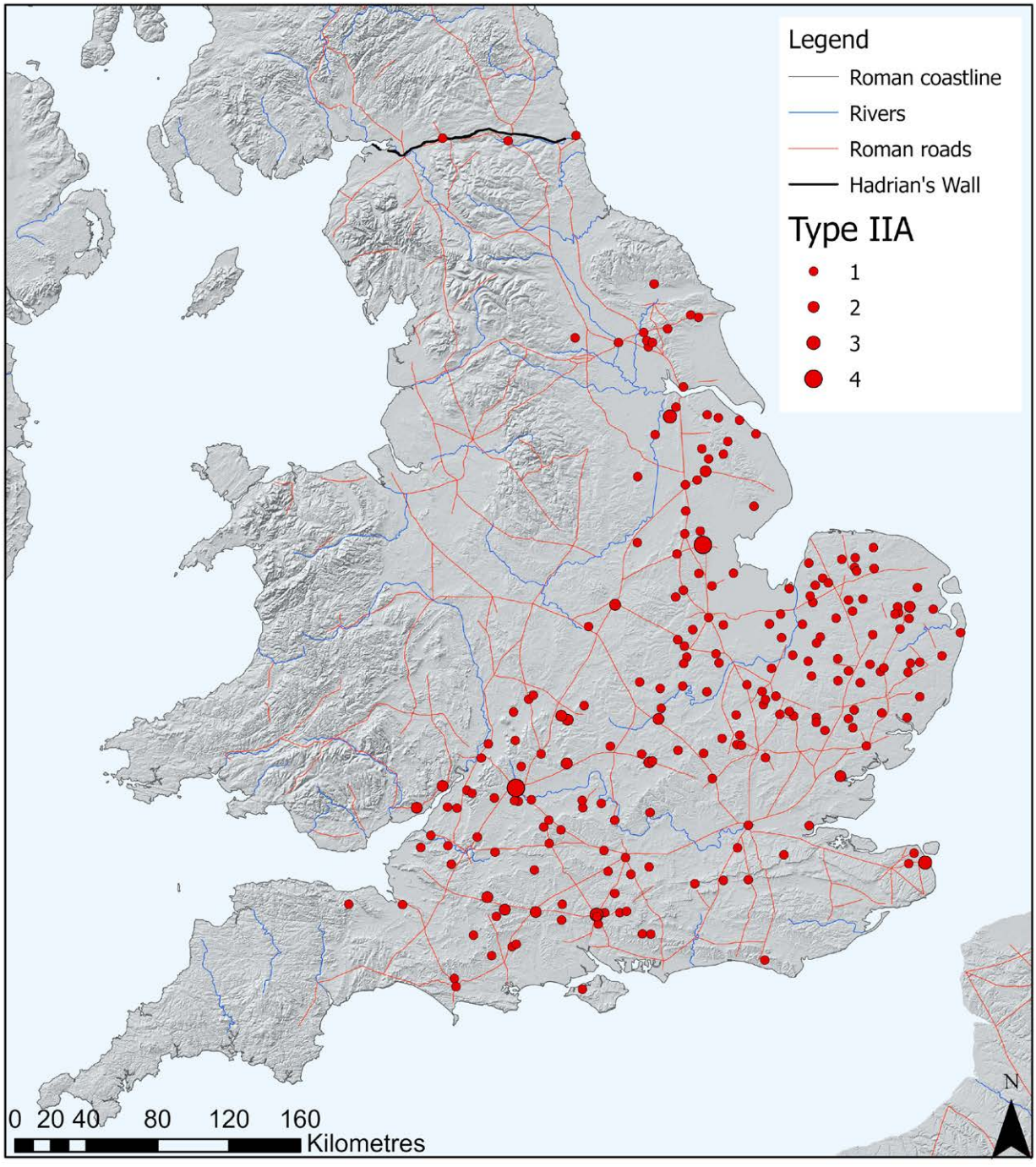


Figure 8.28 - The distribution of all Type IIA buckles in Britain

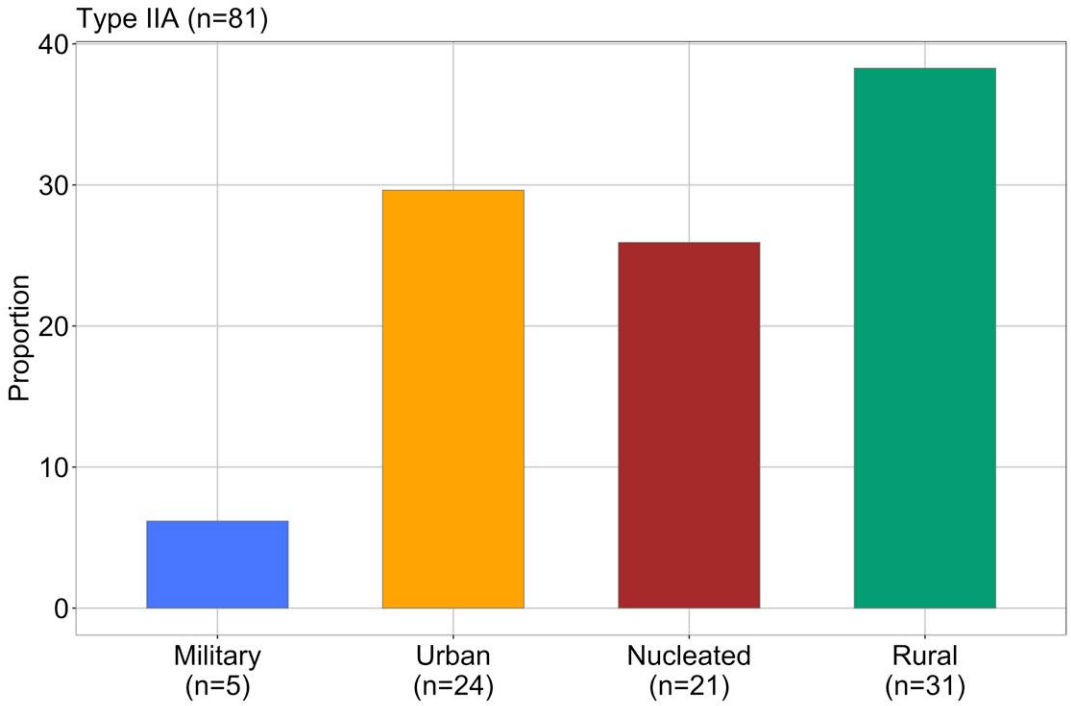


Figure 8.29 - The social distribution of all Type IIA buckles

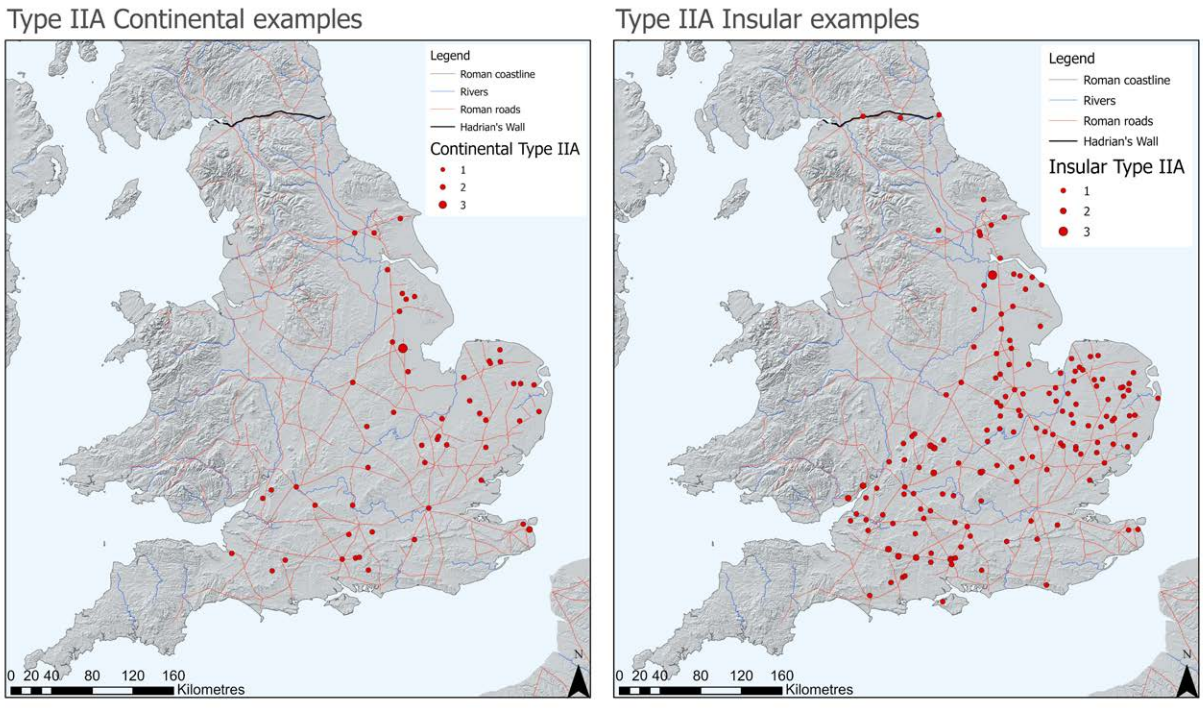


Figure 8.30 - Comparison of the spatial distribution of continental Type IIA buckles and insular Type IIA buckles

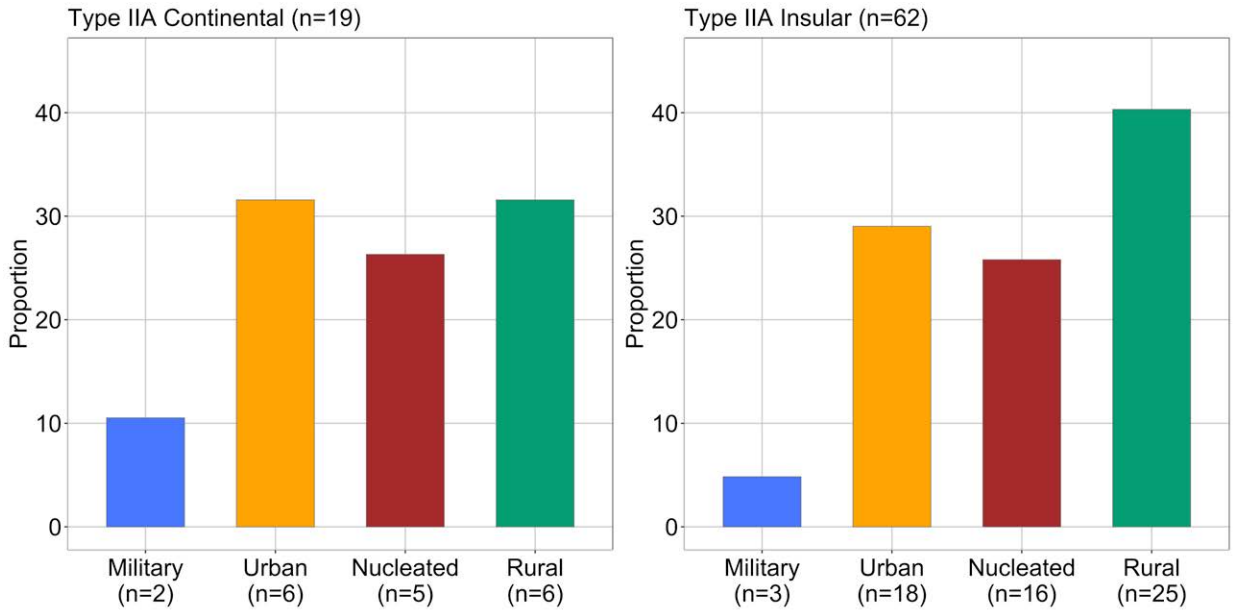


Figure 8.31 - Comparison of the social distribution of IIA continental and insular buckles

with an emphasis on urban and nucleated sites (Figure 8.36, top right).

Non-zoomorphic buckles with triangular plates can be cast in a single piece with an integral plate or a separate triangular plate can be wrapped around the pin bar. Their spatial distribution occurs primarily to the east of Britain or the south with a number recorded in south Wiltshire, Hampshire, and north Dorset (Figure 8.35, centre left) These buckles occur in highest proportions at rural sites followed by nucleated and urban sites (Figure 8.36, centre left). The majority of examples of this form have been recorded with the PAS underlining a rural emphasis.

Non-zoomorphic buckles with rectangular plates can either be plain or decorated with a ring and dot motif. They are recorded from sites in the south of Britain or the northern frontier (Figure 8.35, centre right). Clusters include material from Hampshire, Dorset, and Kent. Their social distribution indicates they occur in greatest proportions at nucleated sites followed by military and urban sites (Figure 8.36, centre right).

The distribution of non-zoomorphic buckles with plates with repoussé decoration is focussed on the South-west although a large number have been recorded from Ickham Mill, Kent (Figure 8.35, bottom left). The only example from a military site is at Richborough. Generally, these buckles occur in higher proportions at nucleated sites and urban sites (Figure 8.36, bottom left). The quantity of examples recorded with the PAS might suggest a rural emphasis as was seen with the examples with triangular plates. If this is the case their spatial distributions differ.

Stuart Laycock (2007; 2008) viewed the non-zoomorphic variant of Type IIB as an official product suggesting that they were produced on the continent. Spatially the distributions of the Type IIB and this variant are similar with concentrations in the south of Britain with an interesting cluster in the environs of Winchester and in East Anglia (Figure 8.35, bottom right). Within the settlement hierarchy this type occurs in highest proportions at nucleated sites (Figure 8.36, bottom right).

The social analysis of these buckles, against a comparator of insular and continental profiles, suggests that types which could be defined as insular are those with repoussé decoration and potentially those with triangular plates (particularly integral examples of this). The emphasis of specific types on urban and nucleated settlements might offer us a glimpse into suggesting which of these forms were used principally by the bureaucracy.

Amphora strap ends

Amphora strap ends date from c. AD 350 onwards and appear to remain in use throughout the fourth century and perhaps into the fifth century. Continental and

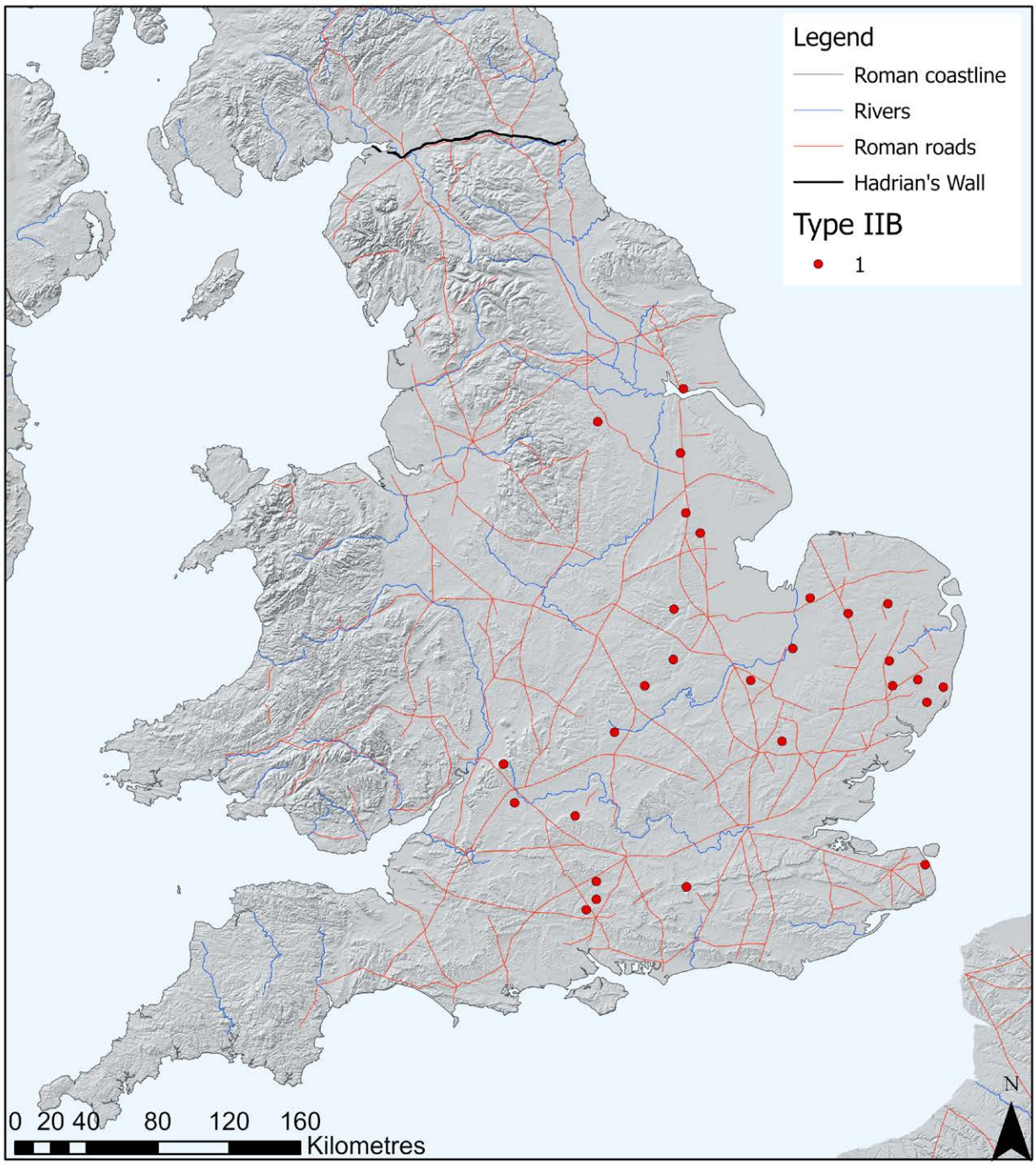


Figure 8.32 - The spatial distribution of Type IIB buckles

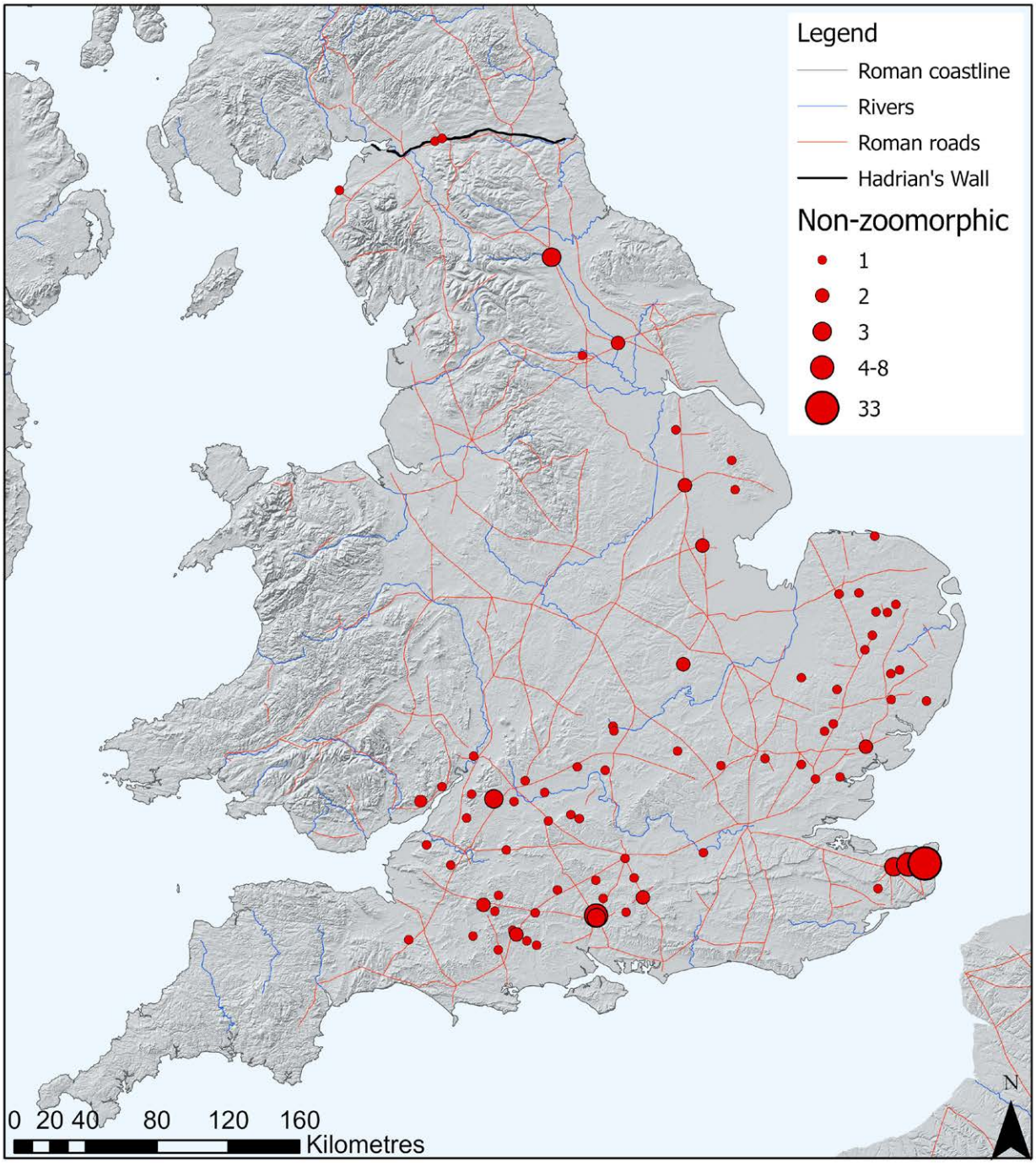


Figure 8.33 - The spatial distribution of all non-zoomorphic type buckles

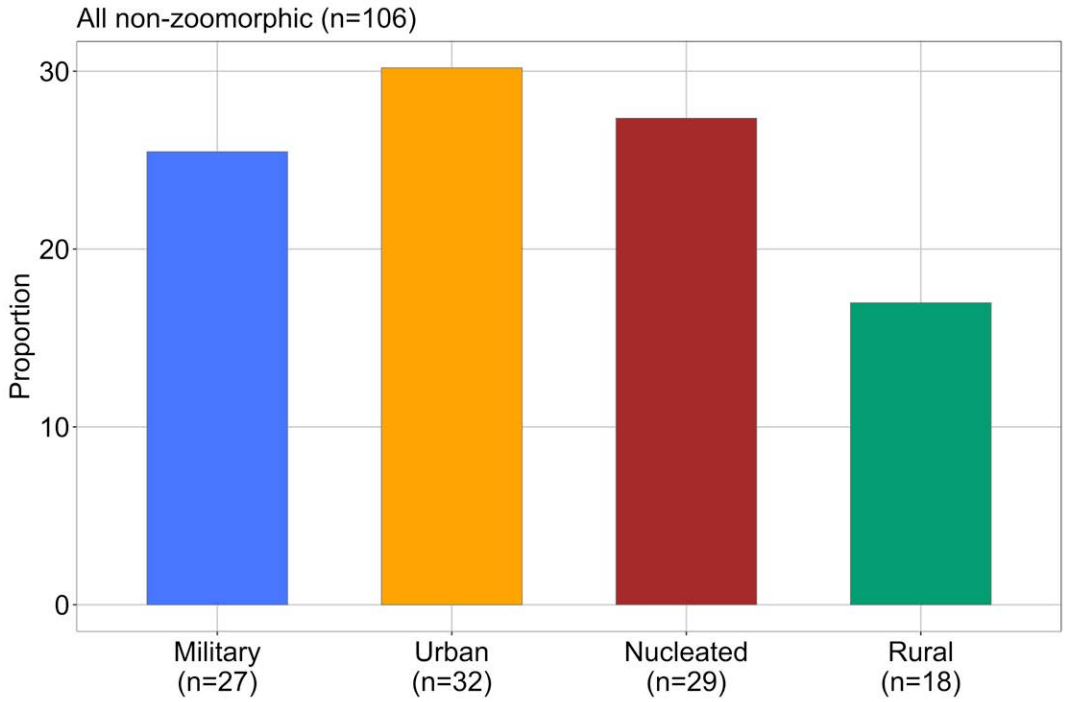


Figure 8.34 - The social distribution of all non-zoomorphic buckles

insular examples of amphora strap ends occur in Britain. At present further refinement of difference between the dates of the continental and insular material is not possible. If they follow a similar pattern to other types, the insular variants are probably slightly later in date.

Spatially the main concentrations of all amphora strap ends occur in the East or South of England and in Kent (Figure 8.37). The type is a common find in East Anglia, along Ermine Street and Dere Street. In the south there is a concentration in the environs of Winchester, in Dorset, Oxfordshire and Berkshire. Generally, this type appears uncommon in Somerset, Wiltshire and Gloucestershire. This is significant given the density of Type IIA buckles in the region (See Figure 9.30).

Amphora strap ends in general occur in their highest proportions at rural sites followed by military sites (Figure 8.38). Only small number of these objects are recorded from urban sites. This pattern contrasts with that seen in with Type II buckles. This might suggest that those who used belt sets with amphora strap ends were based in towns in lower numbers or that these forms were generally not used together.

When the continental and insular amphora strap ends are compared, continental types occur in higher numbers in East Anglia (Figure 8.39). In the south, both insular and continental material occur in broadly comparable distributions, with a concentration along the Ridgeway and along the road from Winchester to the Mendips in Somerset.

Higher proportions of continental material occur on urban and nucleated settlements compared with insular forms (Figure 8.40). The proportions of continental and insular material at military sites are broadly comparable.

The method of attachment of these strap ends to the belt varied: Type A – hinged, Type B – riveted, Type C – a loop (Simpson, 1976; Henry, 2022). The forms of attachment on continental and insular strap ends have been explored in Figure 8.41. A significant number of examples within the corpus are incomplete. Where the method of attachment could be identified Type C (a loop) only occurred on continental examples. Insular examples are more commonly riveted than hinged.

Heart-shaped strap ends

Heart-shaped strap ends occur in Britain from c. AD 350 and examples from Colchester and Richborough date to the last decade of the fourth and into the fifth

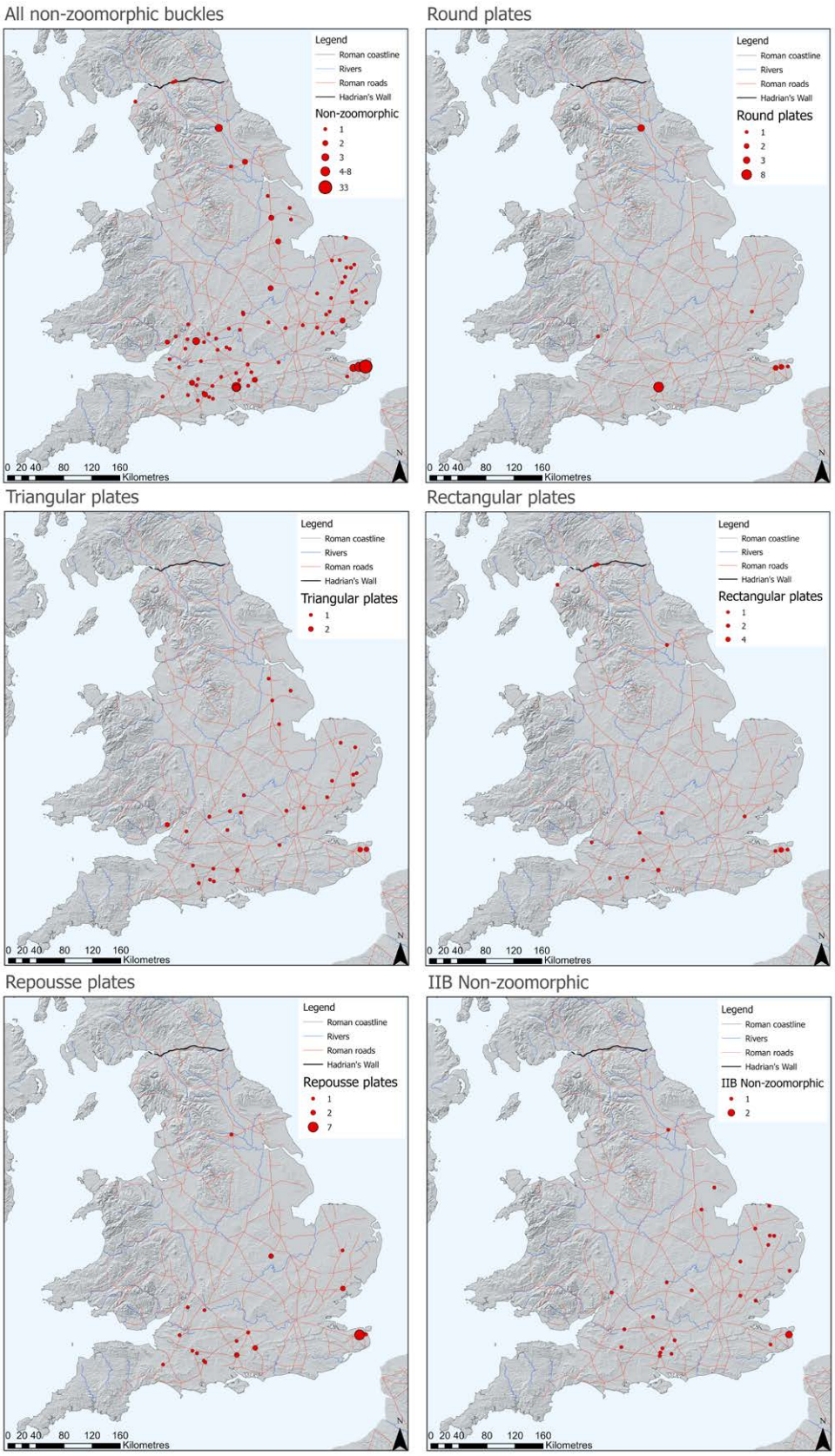


Figure 8.35 - The spatial distribution of all non-zoomorphic type buckles divided by plate type

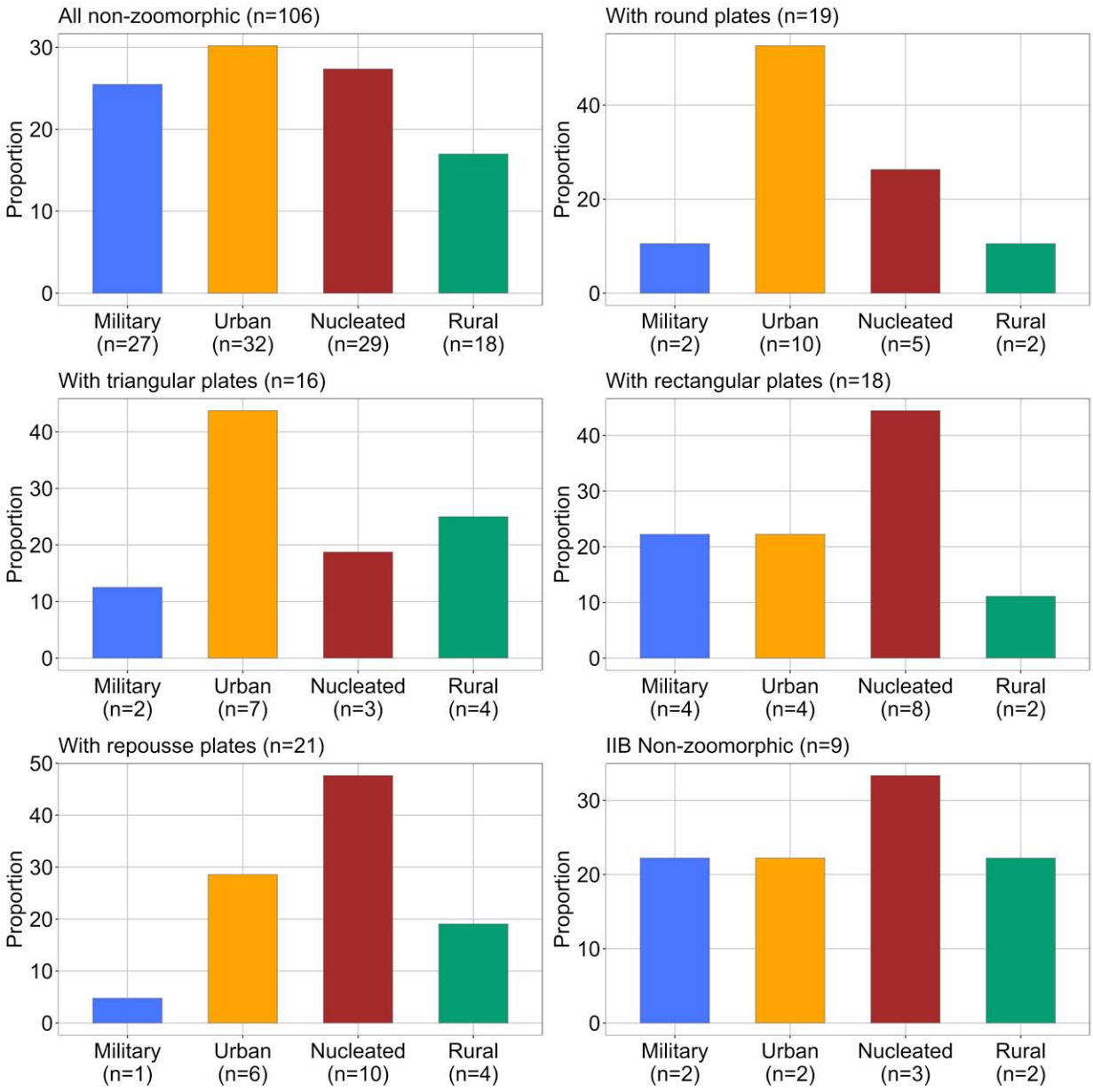


Figure 8.36 - The social distribution of non-zoomorphic buckles divided by plate type

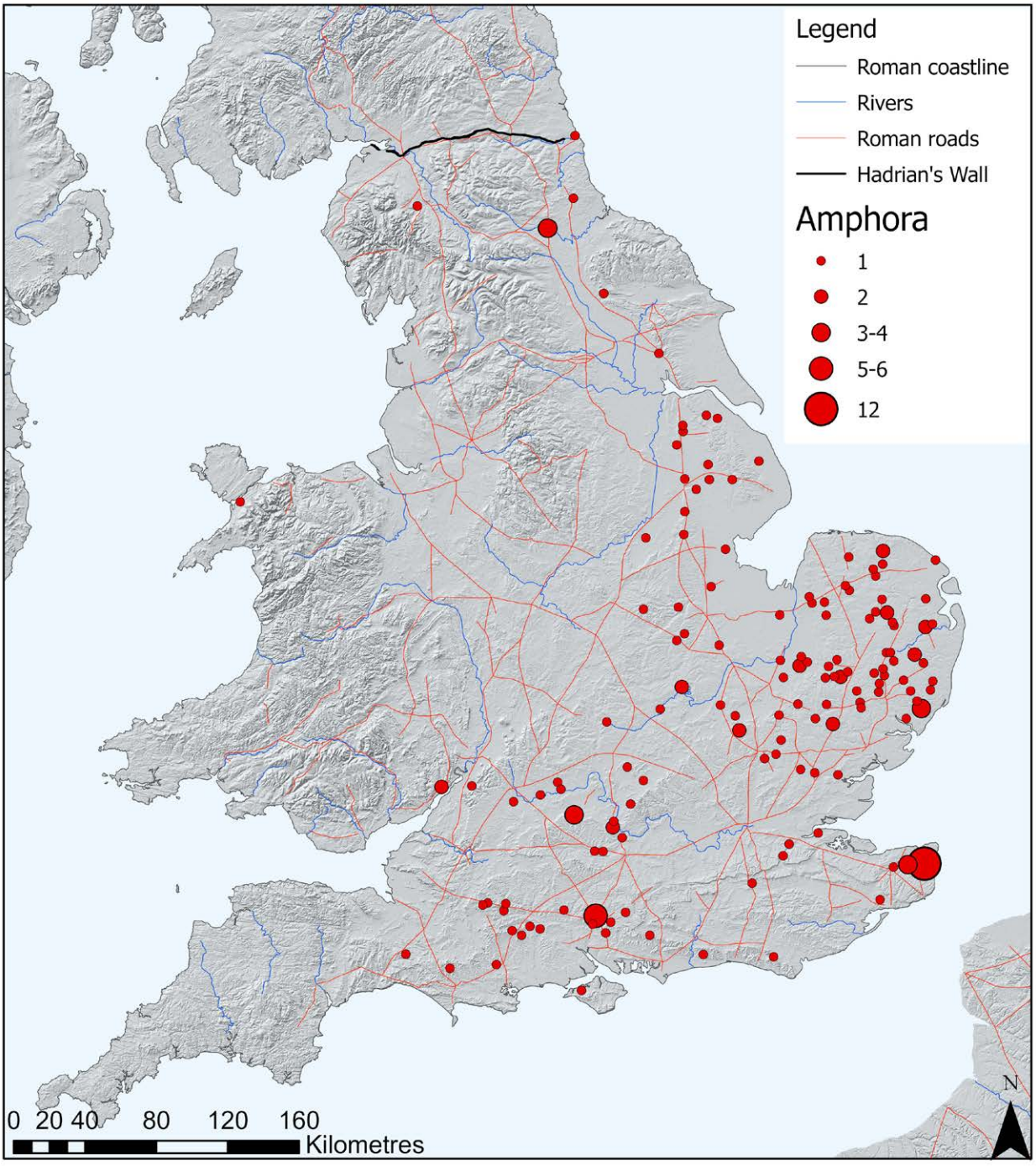


Figure 8.37 - The spatial distribution of all amphora strap ends

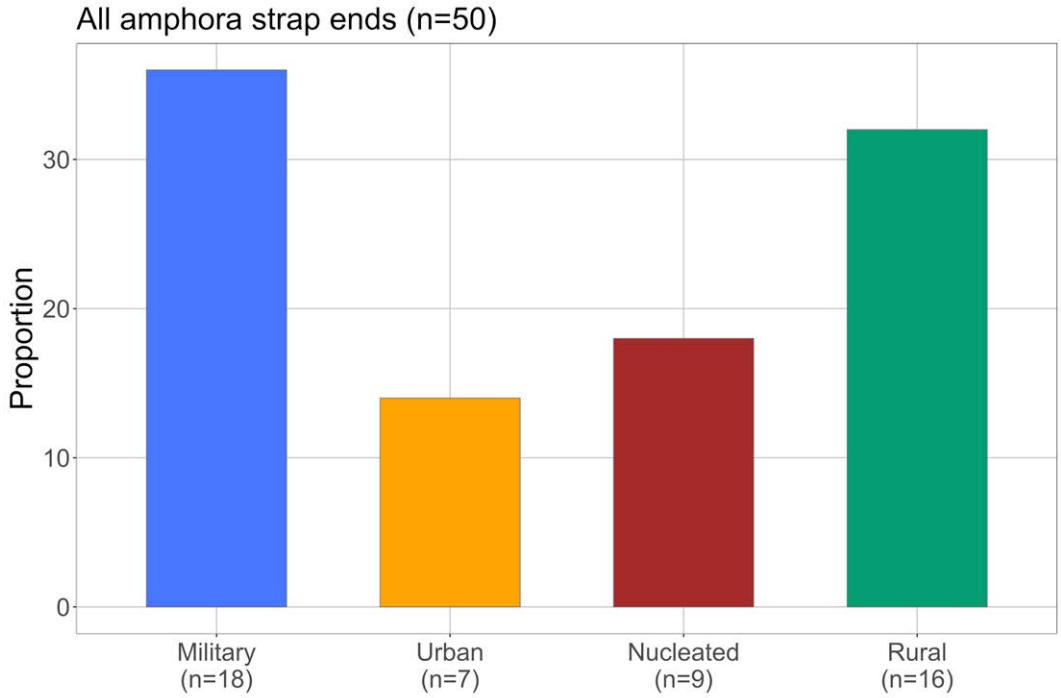


Figure 8.38 - The social distribution of all amphora strap ends

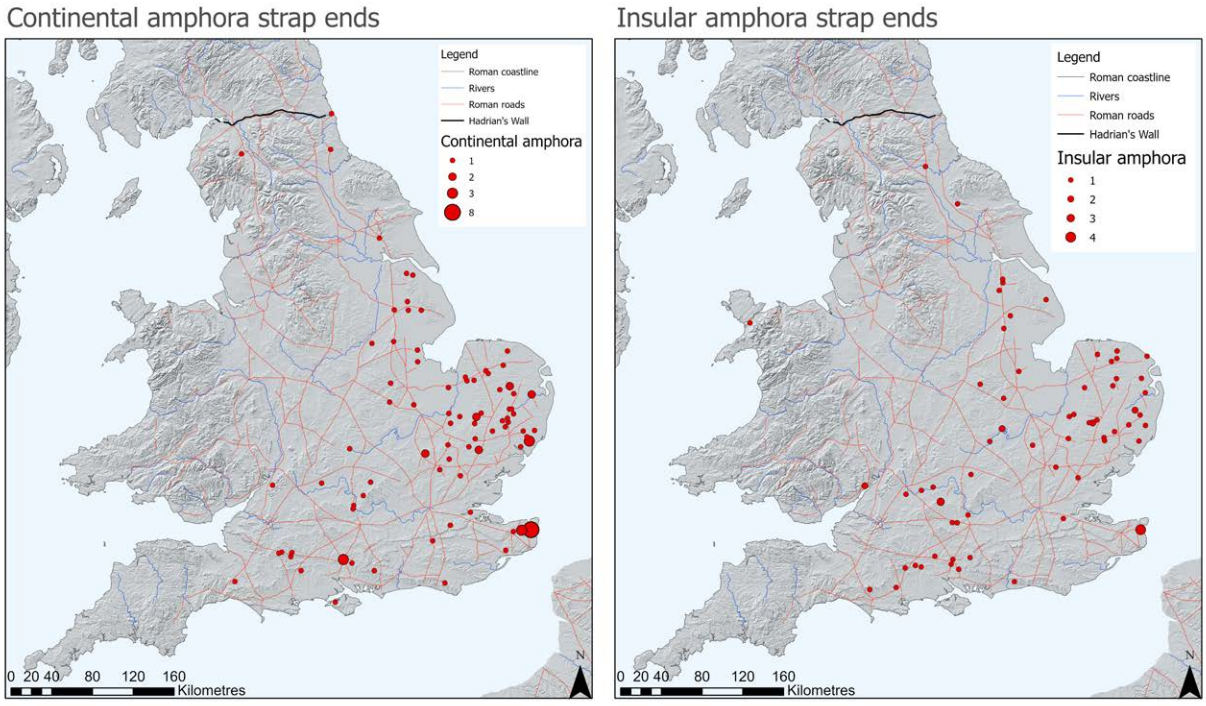


Figure 8.39 - Comparison of continental and insular amphora strap ends

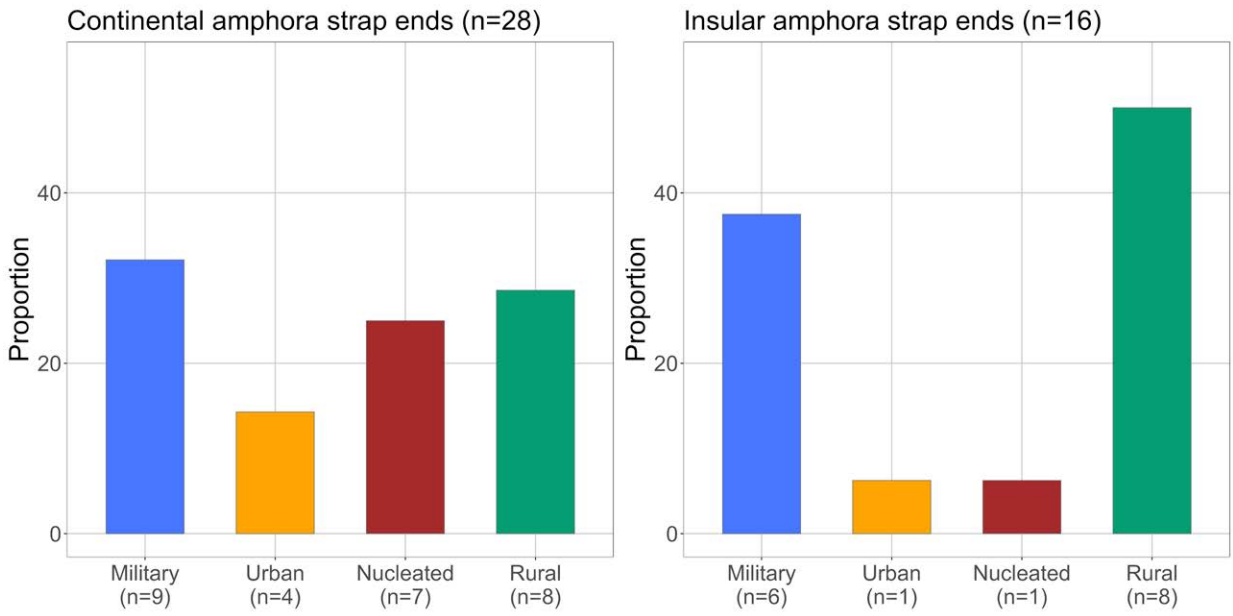


Figure 8.40 - The social distribution of continental and insular amphora strap ends

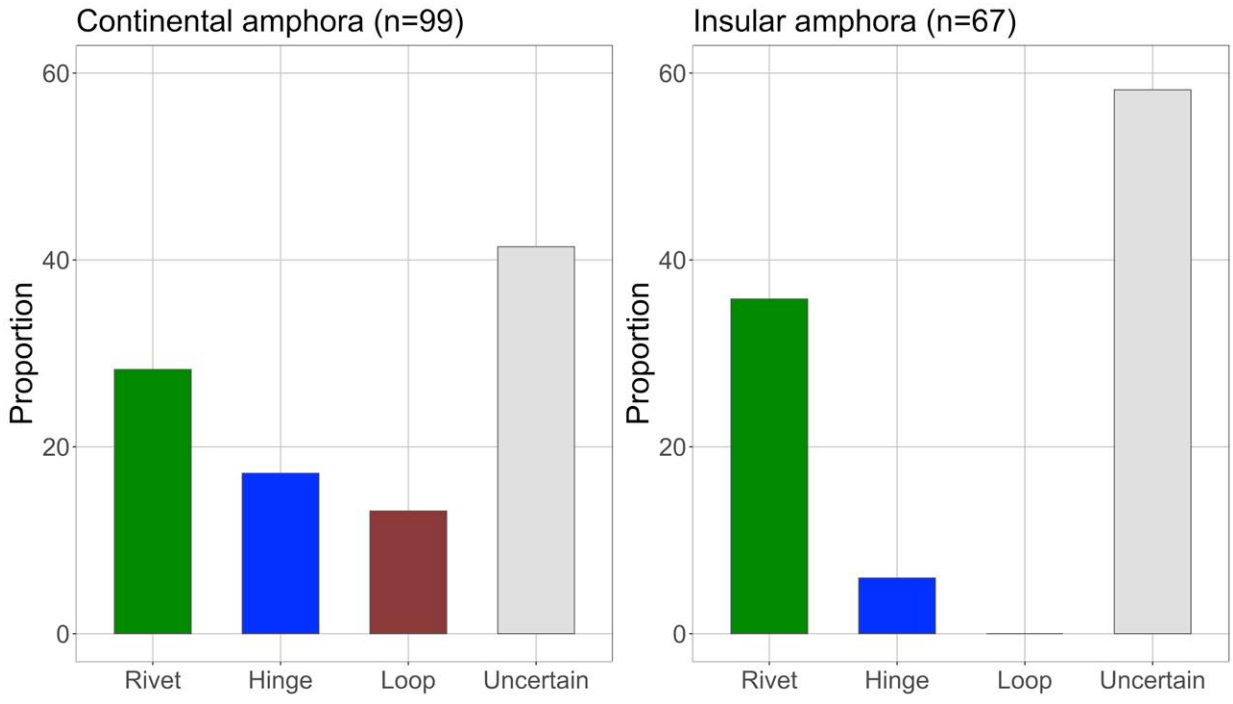


Figure 8.41 - Comparison of the attachment methods of insular and continental amphora strap ends

century respectively. They are a continental type which can be attached by a loop or a rivet.

Lower numbers of heart strap ends are recorded from Britain in comparison with amphora strap ends. Spatially, concentrations occur in the environs of Winchester, in Kent, in East Anglia and along Ermine Street in Lincolnshire and North Lincolnshire (Figure 8.42). One example is recorded on Hadrian's Wall. The distribution is distinctive and contrasts with that of Type IIA buckles (Figure 28 and Figure 30). These strap ends are rarely recorded from Dorset, Wiltshire, Somerset, or Gloucestershire.

Heart strap ends occur most frequently at nucleated followed by military sites - partly due to the quantity recorded at Ickham Mill and Richborough (Figure 8.43). The proportion of strap ends from urban sites remains lower than that seen with the buckles associated with Type II belt sets. These variations might hint at those groups which wore these objects.

Propeller belt stiffeners

Dating evidence for propeller stiffeners from Britain is poor but they appear to occur from AD 350 onwards based on the small sample size (Henry, 2022, Table 8.3). This correlates with the dates for the Type II belt sets and buckle types these belt stiffeners are primarily associated with.

Spatially, propeller belt stiffeners occur in greatest numbers in East Anglia, Hampshire, Wiltshire and Oxfordshire as well as the northern frontier and on Hadrian's Wall (Figure 8.44). As noted with the strap ends associated with Type II there are generally few recorded from Gloucestershire, Somerset, or Dorset as well as the East Midlands. Few are recorded from Richborough or Ickham Mill.

Belt stiffeners occur in highest proportions at military sites, primarily they are recorded from the northern frontier (Figure 8.45). Few are recorded from urban sites, and none are recorded from Lankhills cemetery in Winchester or from Cirencester. Given the general quantity of belt fittings deposited as grave goods at Lankhills, this suggests that not all belt sets formed of continental material required the addition of belt stiffeners at this date. The absence of belt fittings from other key urban centres in the South and South-west is notable.

Within the wider corpus of propeller shaped belt stiffeners, a distinctive form which has a raised central spine occurs. They generally have an eastern or a northern distribution with few being recorded from the south and the South-west (Figure 8.46). The number recorded from Hadrian's Wall and the northern frontier might suggest that these objects should be considered potentially slightly earlier, chronologically, and associated with troop movements. Similarly, should they also be interpreted as a military form?

Type II belt sets (AD 350/370-) – Discussion

The results of the analysis of fittings associated with Type II belt sets challenges our assumption that the majority of belts would have strap ends. It also suggests that only certain social or political groups principally wore belts with propeller shaped stiffeners, they are not an essential element as one might expect.

We can highlight differences in the spatial and social distribution of continental and insular forms of the Type IIA buckle. Insular forms occur in higher proportions at rural sites. Spatially, variation also occurs with somewhat higher quantities of insular material recorded in the South and the South-west as well as East Anglia and along Ermine Street and Dere Street.

There appears to be variation in who wore these belts regionally as well as in the settlement hierarchy such as parts of the South-west and East Anglia. Broadly similar patterns can be identified when we consider the non-zoomorphic types. Examples with round or rectangular plates have a different social distribution to those with triangular and repoussé plates – the latter form's social distribution is similar to that of insular Type IIA buckles. Metallurgical analysis comparing these buckle types might offer further insights into these potential links.

When the social and spatial analyses are considered in combination they suggest that although some of these insular forms appear to not be linked with other object types (Figure 8.47). Amphora strap ends, heart strap ends, and propeller belt stiffeners all occur in lower proportions at urban sites in contrast to the profiles seen at military sites. Can we tentatively suggest that generally continental forms of these objects might have had closer associations with the military than the administration?

Chronologically, these objects appear to be introduced earlier than the Type I belt sets. The variation noted between Type I and Type II might suggest a contraction of the area of interest to the state through

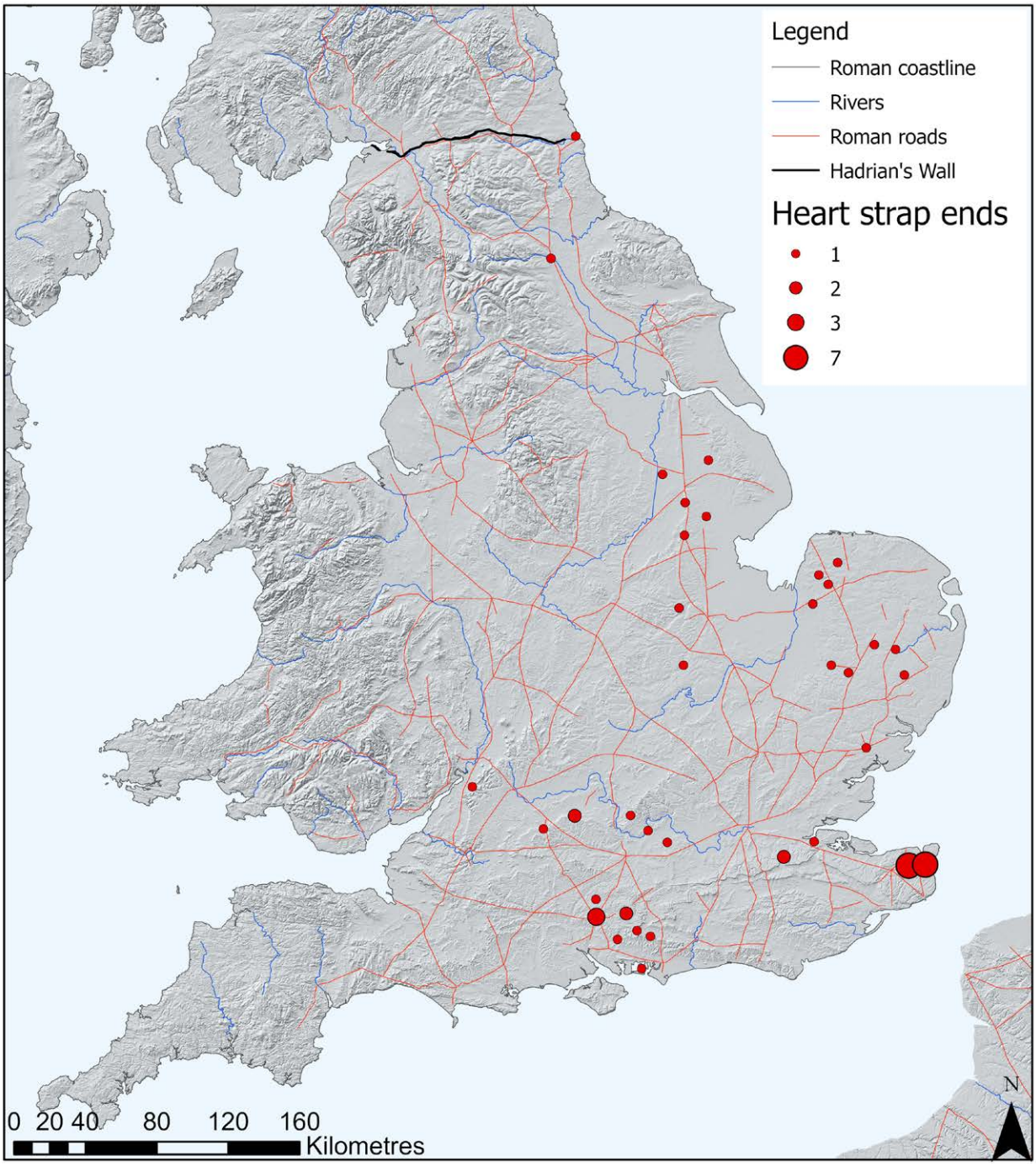


Figure 8.42 - The spatial distribution of heart shaped strap ends

the declining distribution of continental material in the years between AD 350/370 and AD 390. This is evident in East Anglia. Conversely though, this could also represent the possibility that in these areas the earlier Type II belt sets retained their prominence in contrast to Type I.

The results challenge the assumption that these belts would have utilised all of the associated fitting such as the strap ends and propeller stiffeners. This either suggest that in this wider type some belts did not use them, perhaps due to the material of the belt itself; or that the additional adornments were either actively

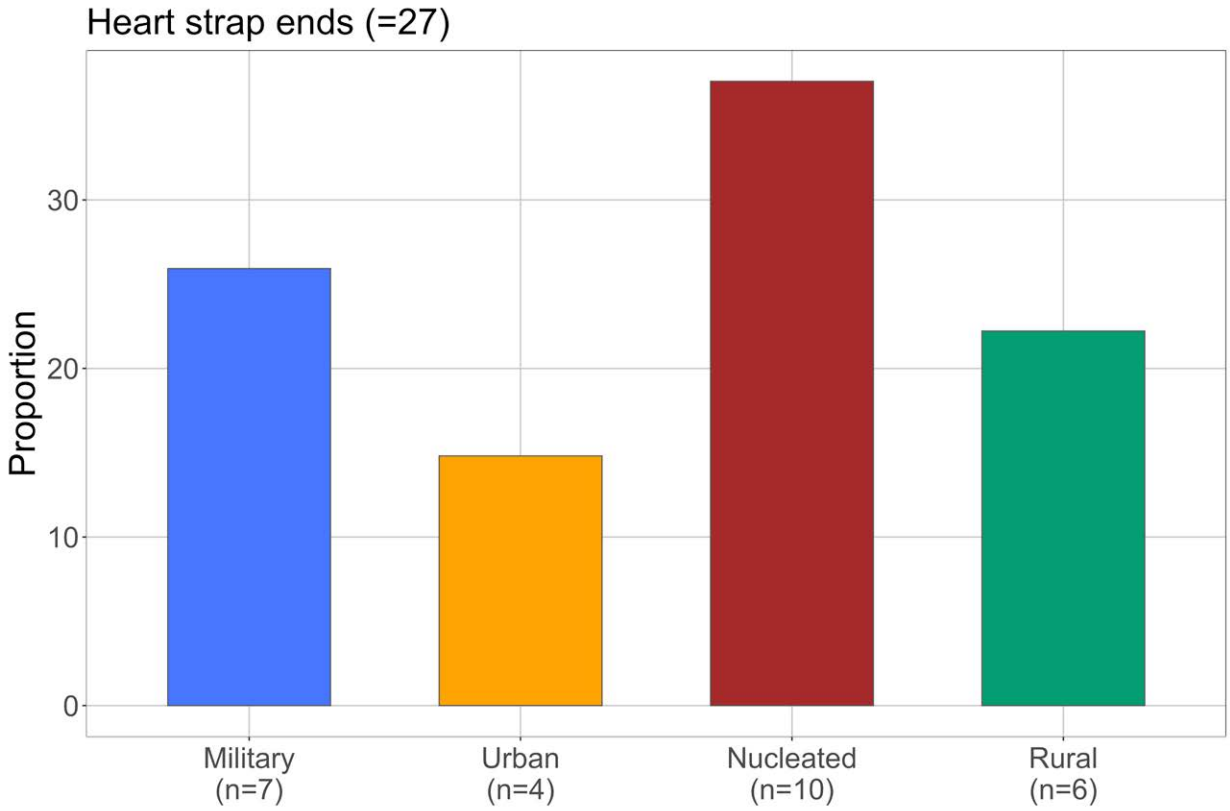


Figure 8.43 - The social distribution of heart shaped strap ends

selected or ignored in some regions. Otherwise, are we seeing evidence of variation in how or where these belts were worn, was there variation between the waist belts and shoulder to waist belts for example?

Type I belt sets (AD 370/390+)

Type IA and IB buckles have generally been associated with narrow belt sets (usually 20-30mm wide) and narrow strap ends including the prototype Tortworth and the Tortworth type. Further elements such as short propeller belt stiffeners can also be associated with these belt sets which have a regional distribution.

Type IA buckles

Type IA buckles include continental and insular forms. Continental Type IA buckles date to the mid-fourth century onwards, the insular variants which occur date to after c. AD 370 (Henry, 2022, Table 8.1). When all Type IA buckles are considered, they follow the overall broad pattern, very few examples are recorded north of the Humber (Figure 8.48).

There is an eastern emphasis for continental IA buckles and the continental Type IA lionhead subgroup generally occurs to the south of the Fosse Way (Figure 8.49). In contrast, the insular examples of Type IA generally occur in the South and the South-west, particularly in the region between Cirencester and Winchester, smaller clusters occur in East Anglia and along Dere Street. While the corpus of Type IA Crescentic buckles remains limited, the majority occur in Hampshire, Oxfordshire and Wiltshire. Examples of Type IA crescentic to the north of the Humber or in Kent suggest the movement of individuals to different regions.

The social distribution of all Type IA buckles indicates they occur in higher proportions at urban and nucleated sites (Figure 8.50, Top left). Higher proportions of insular Type IA buckles occur at rural sites and higher proportions of continental types occur at military sites. Only five examples of IA Crescentic type can be assigned to a social category, four of which occur at nucleated sites and are not illustrated.

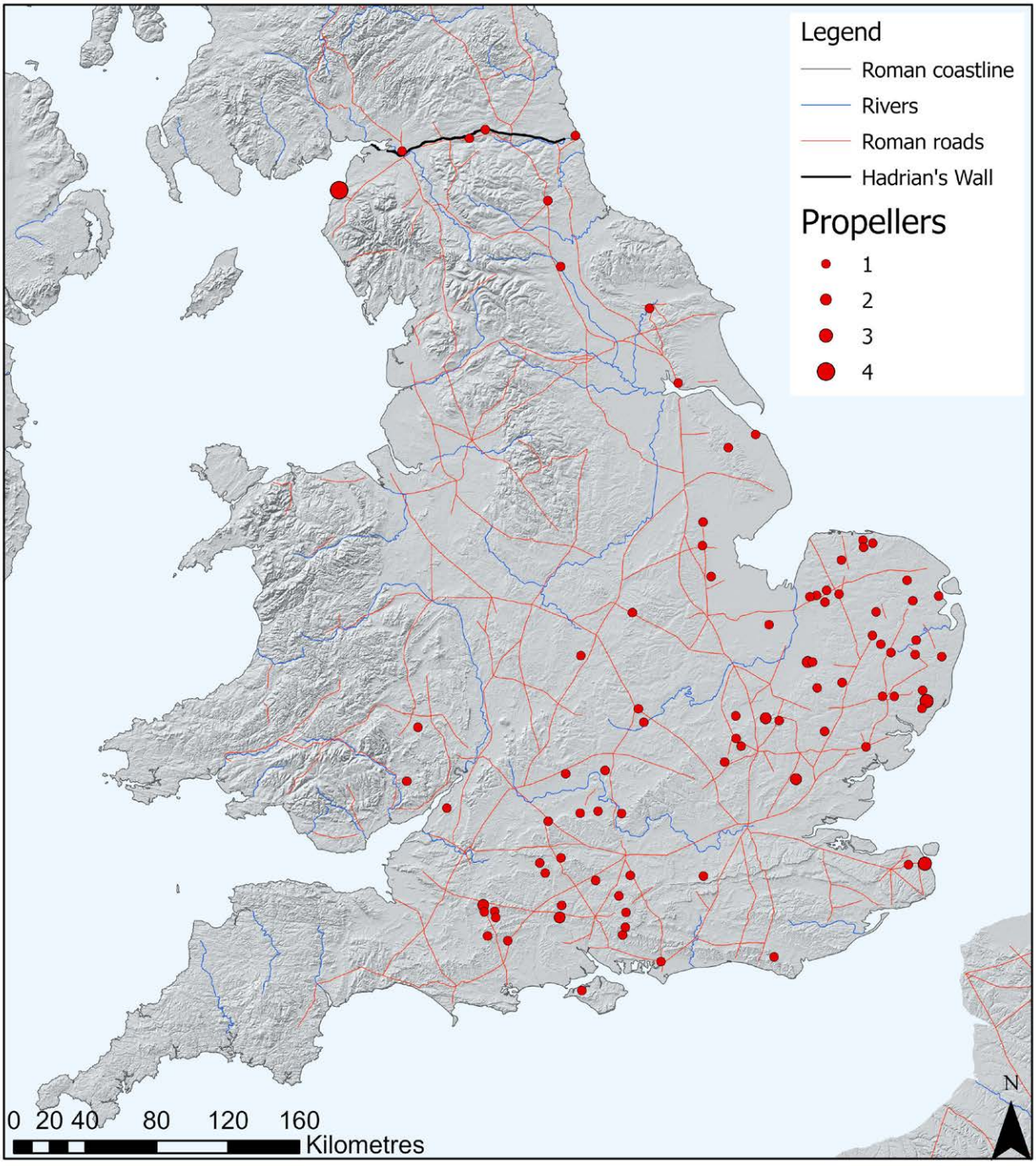


Figure 8.44 - The spatial distribution of all propeller belt stiffeners

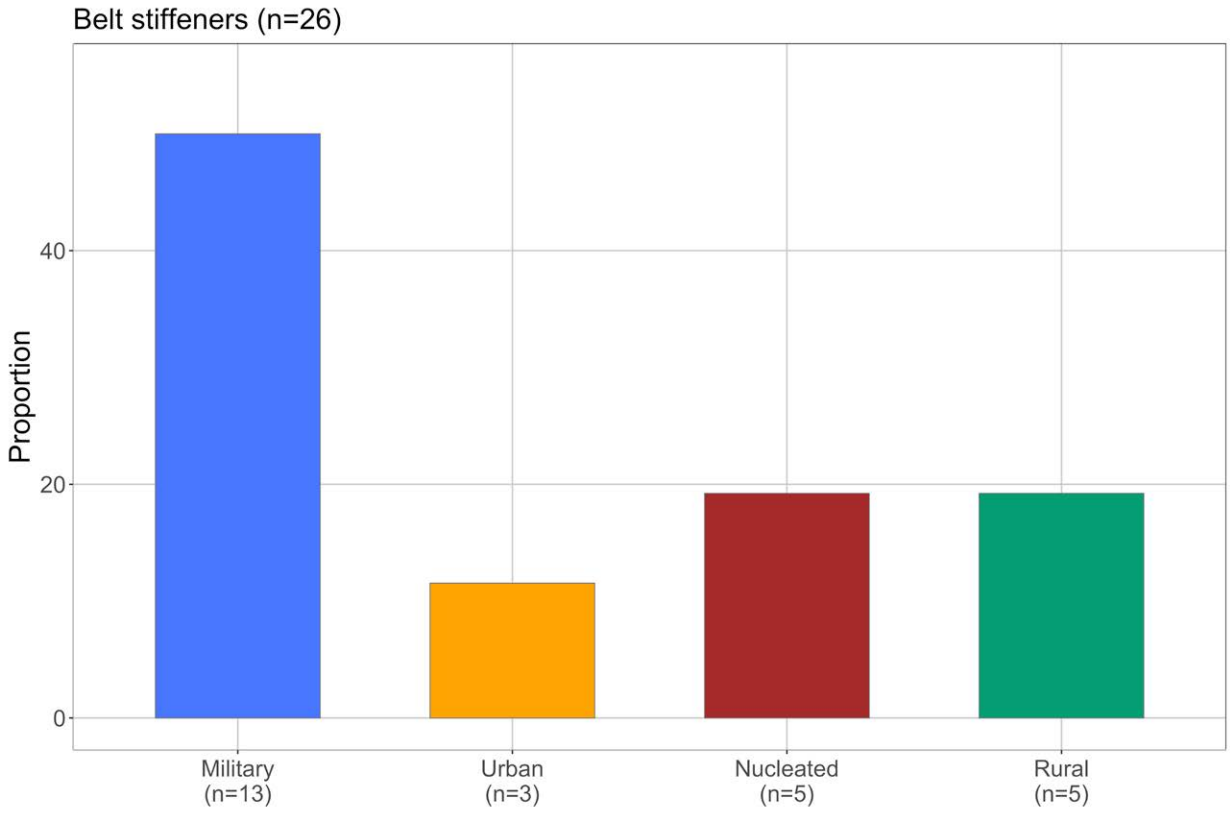


Figure 8.45 - The social distribution of all propeller shaped belt stiffeners

Type IB

Stylistically and based on well dated examples, it appears that Type IB buckles are later than the insular Type IA, dating after c. AD 390 (Henry, 2022, Table 8.1). The type has a widespread distribution primarily to the south of the Fosse Way with a major concentration between Cirencester and Winchester (Figure 8.51). In contrast to Type IA, there are fewer examples of IB buckles from East Anglia and Kent. Given the substantial quantity of belt fittings in general at Ickham Mill and Richborough, the limited quantity appears significant.

Type IB buckles occur in comparable proportions from urban, nucleated, and rural sites (Figure 8.52). Only three are recorded from military sites. This indicates a greater rural and urban emphasis for this type in contrast to Type IA, when PAS material is also considered (not illustrated) the rural or nucleated emphasis is further underlined.

Prototype Tortworth and Tortworth strap ends

The limited number of well dated examples suggest that the prototype Tortworth dates from c. AD 370 onwards and the Tortworth to c. AD 390 onwards (Henry, 2022, Table 8.1). In general with both types the main concentrations occur in the South and South-west (Figure 8.53). Variations can be noted such as higher concentrations of Tortworth strap ends in west Dorset and Somerset and in North Lincolnshire. A cluster of prototype Tortworth strap ends occurs in South-west Wiltshire. In general, there are few examples of either type in Norfolk or Suffolk and only one example from the northern frontier at Vindolanda. Given the overall quantity of belt fittings from Ickham Mill, Richborough and Lankhills cemetery in general, there are few of either of these strap ends.

Both strap end types occur in greatest proportions at rural sites (Figure 8.54). The proportion of examples from military sites remains broadly similar, higher proportions of Tortworth strap ends occur at urban

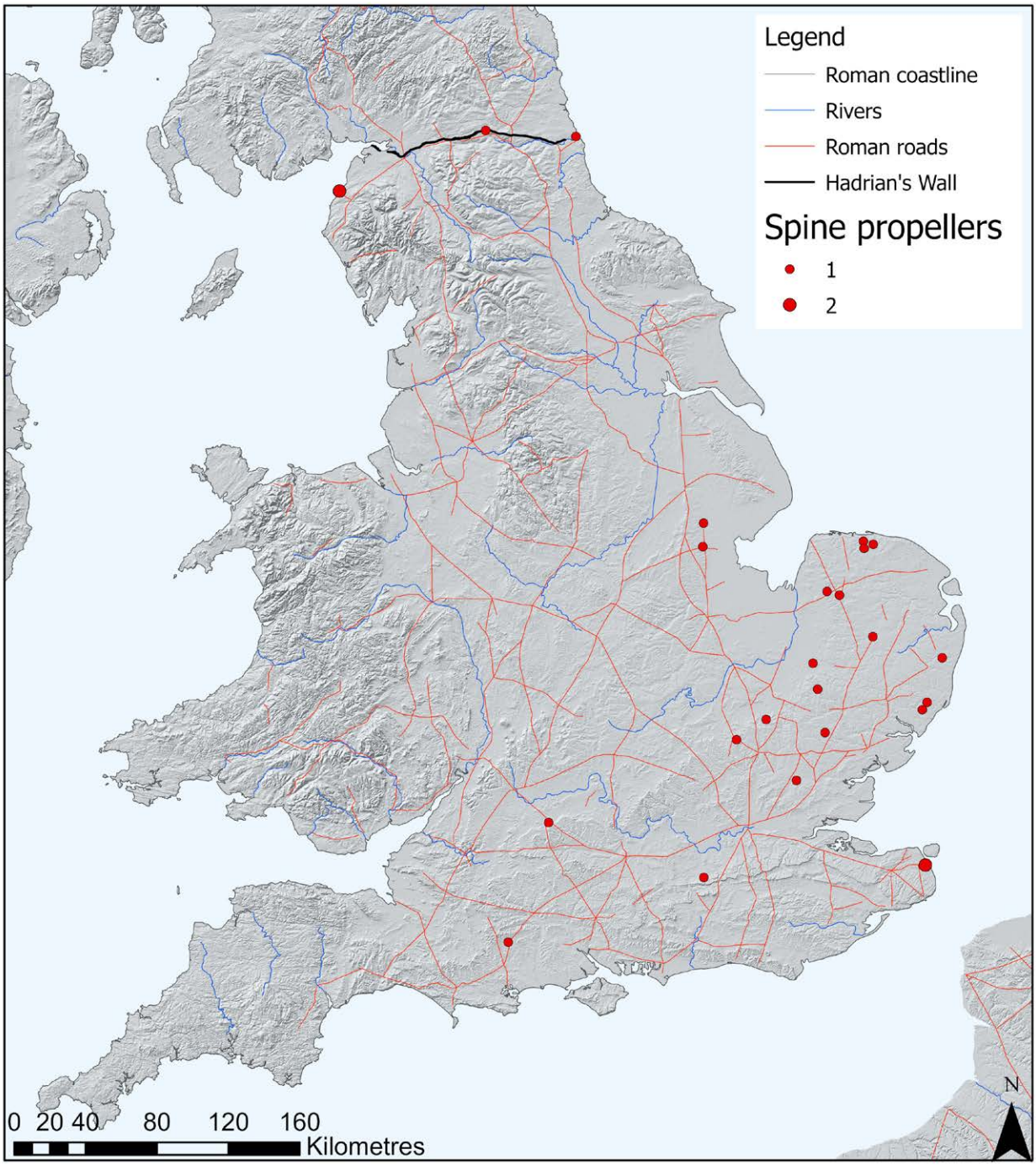


Figure 8.46 - The spatial distribution of propeller belt stiffeners with raised spines

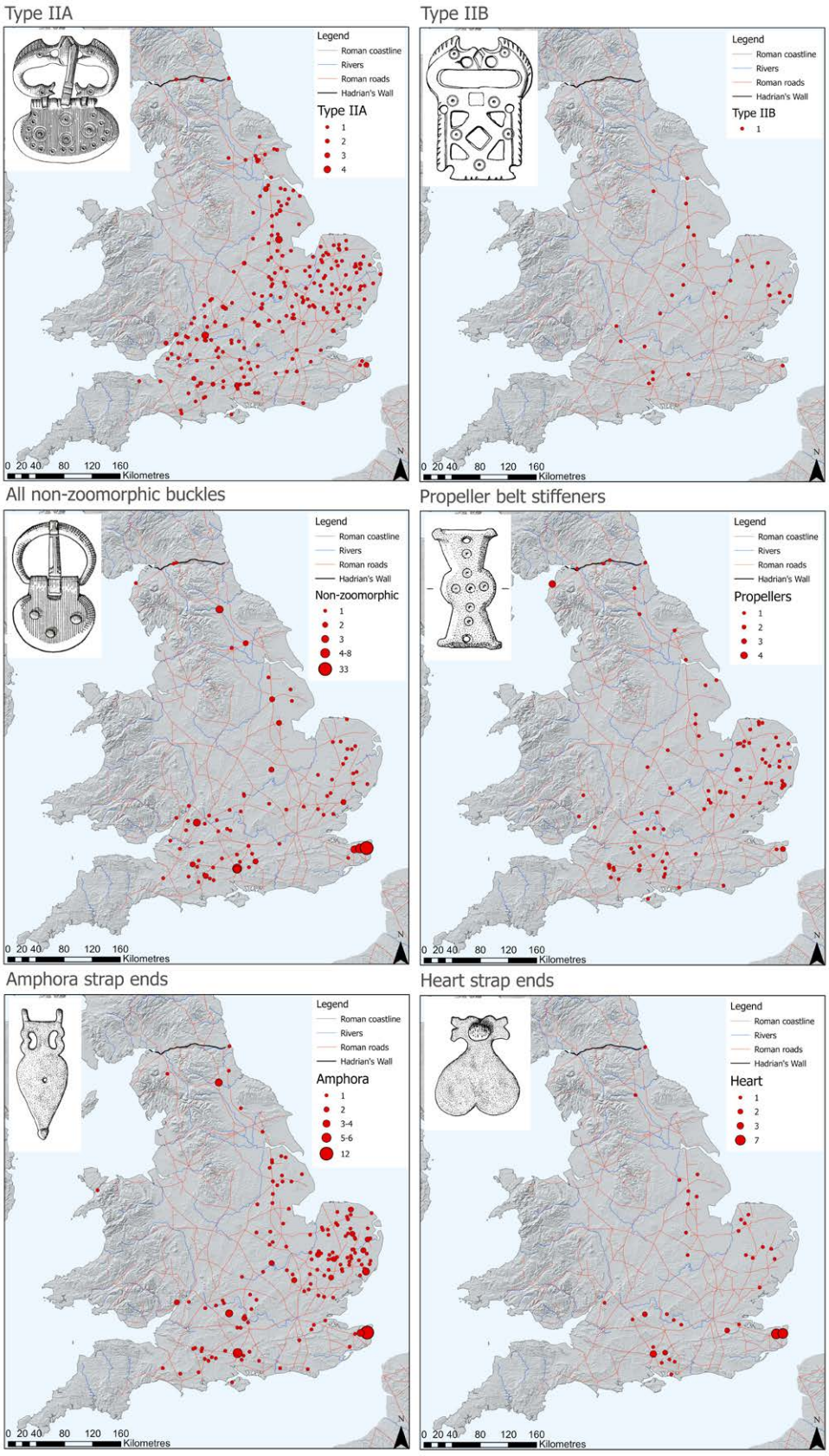


Figure 8.47 - The spatial distribution of belt fittings associated with Type II belts.

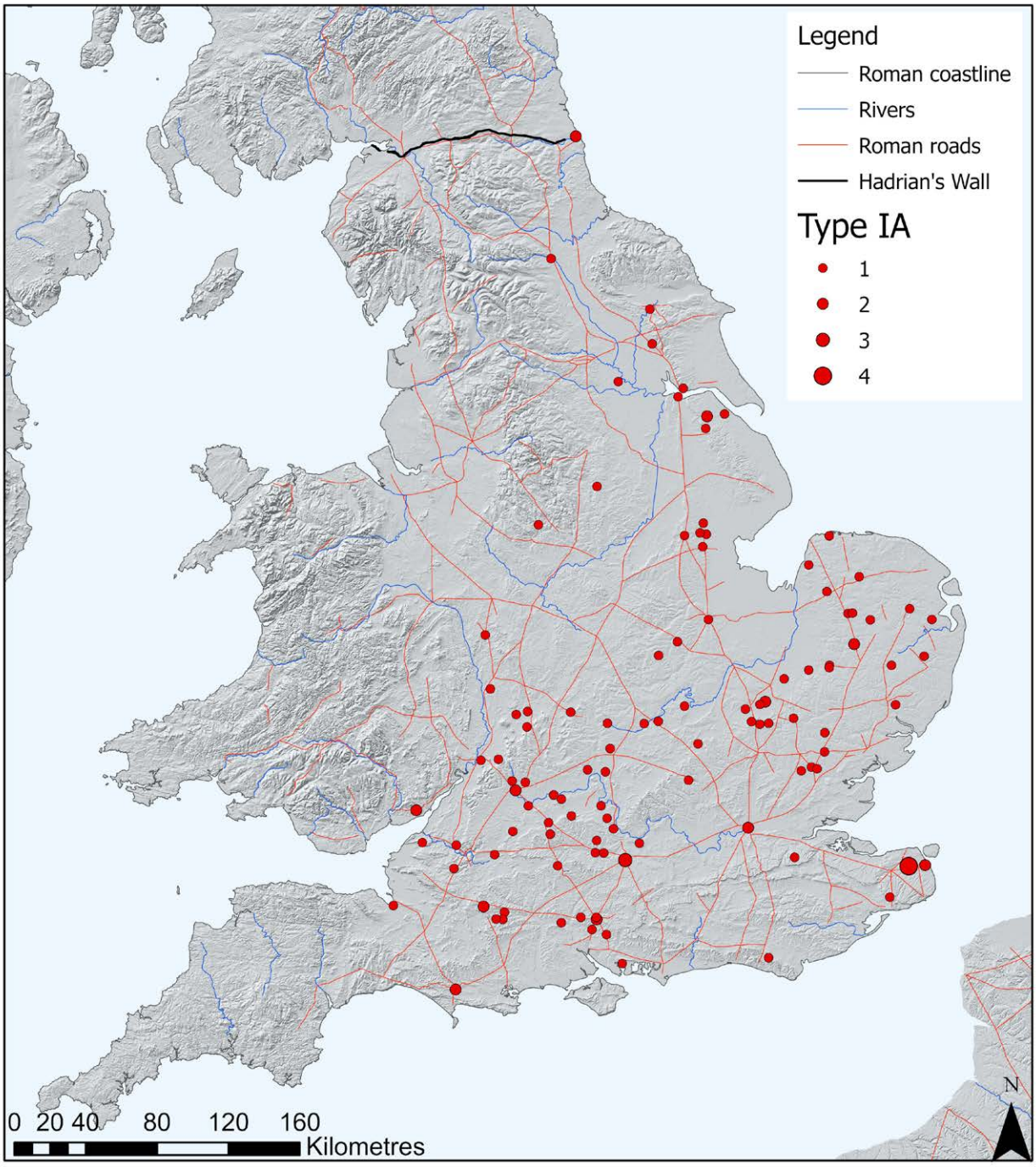


Figure 8.48 - All Type IA buckles

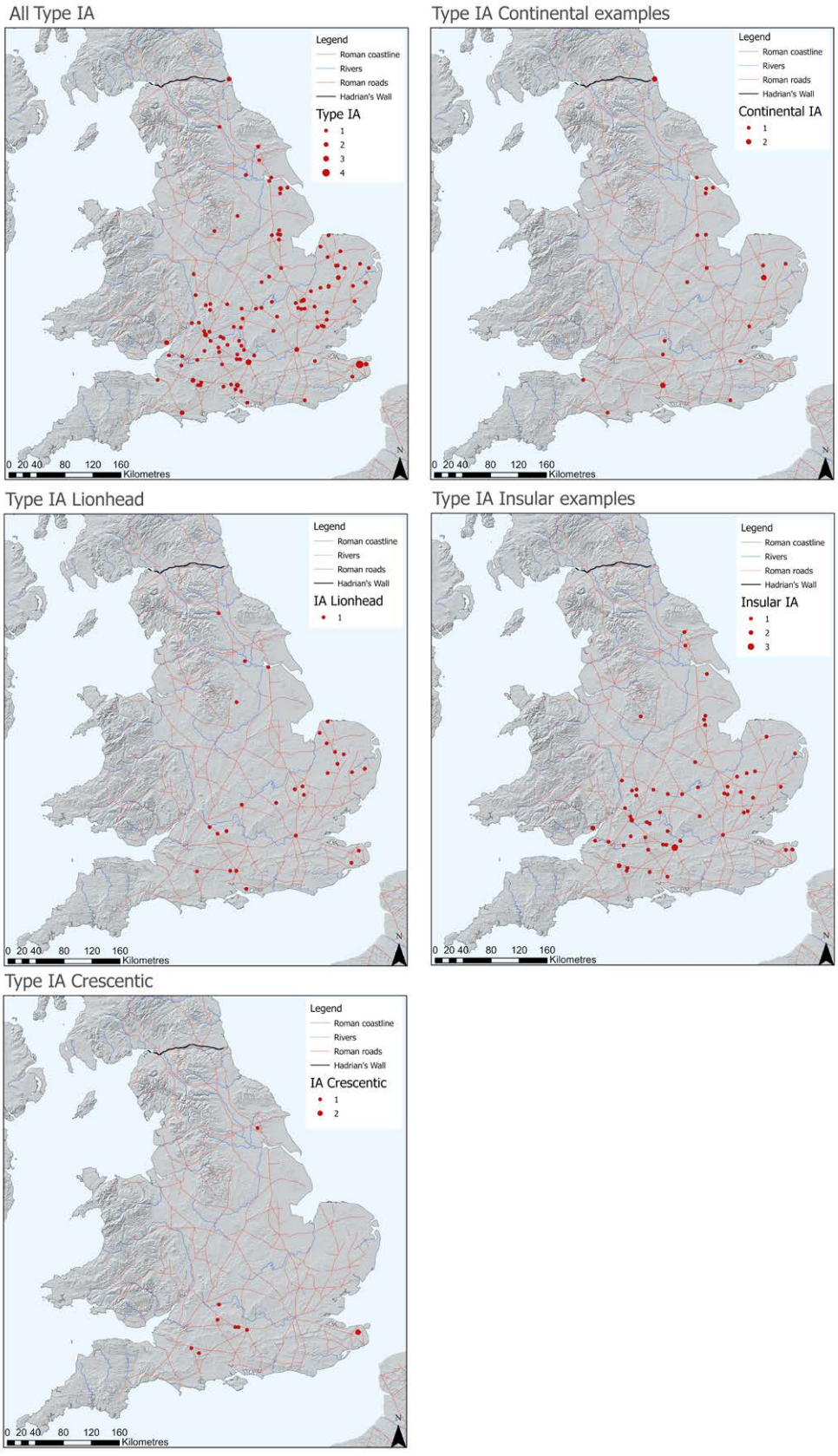


Figure 8.49 - The distribution of all Type IA buckles against subsets within this dataset consisting of continental and insular IA buckles, IA Lionhead and IA Crescentic.

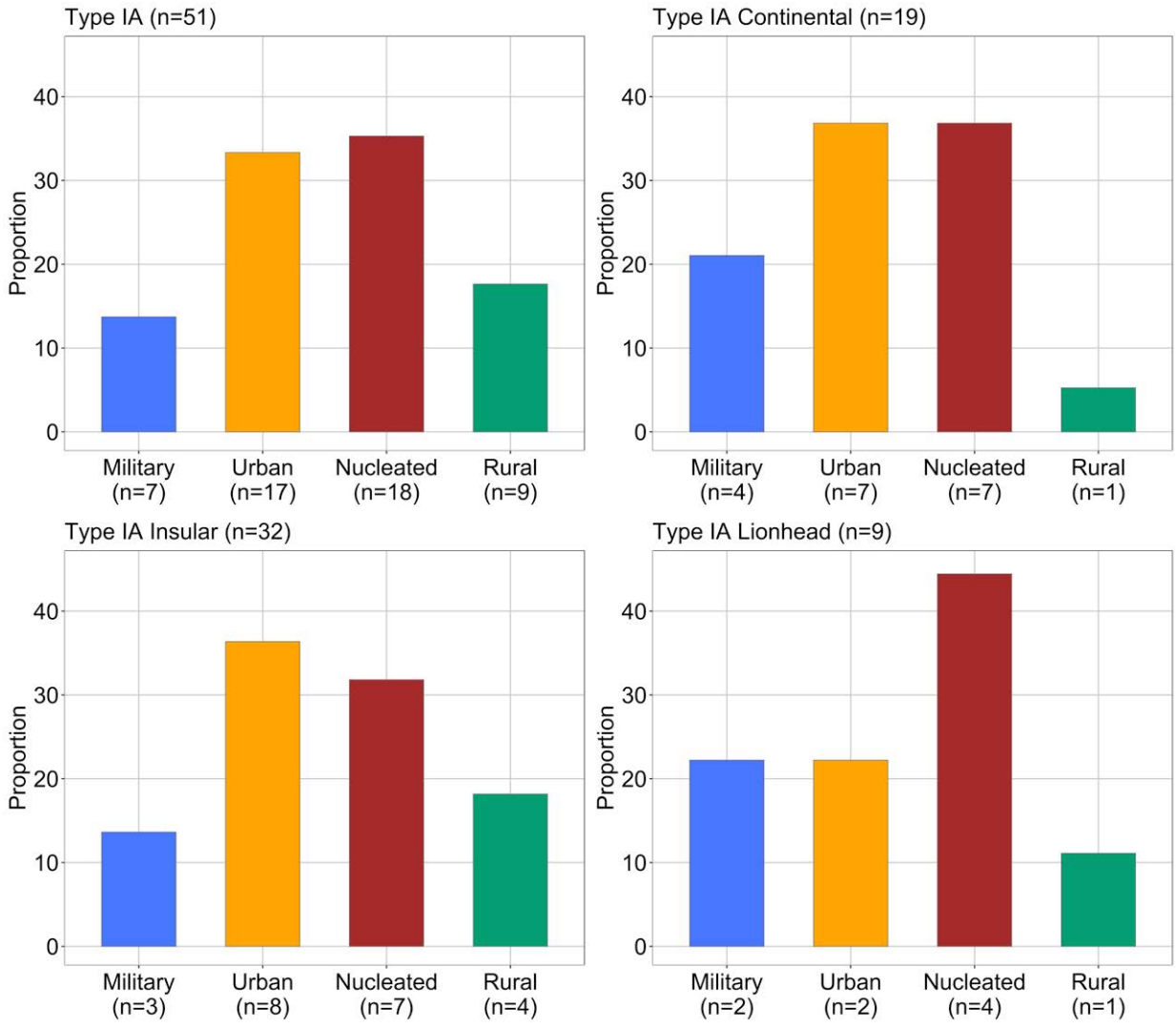


Figure 8.50 - The social distribution of Type IA buckles

sites, but overall numbers are small. Although stylistically it can be suggested that the prototype Tortworth is a slightly earlier form, their spatial and social distribution is not notably different.

Short propeller mounts and other modifications

A small group of propeller belt stiffeners recorded with the PAS are less than 20mm and are linked with these Type I belt sets (Henry, 2022). Their distribution is primarily in Hampshire, Wiltshire, and Gloucestershire (Figure 8.55). The limited quantity prevents the effective analysis of the social distribution. Modified Type II belt set strap ends have been linked with Type I belt sets. To date the only examples are recorded from the villa at Stanwick, Northamptonshire and from Mere, Wiltshire.

Type I belt sets (AD 370/390+) - Discussion

Each sub type linked with the Type I belt set has a distribution mostly south of the line between the Severn and the Humber as well as along Ermine Street and Dere Street (Figure 8.56). The insular types occur in greater proportions at rural sites. Continental examples of Type IA occur in higher proportions at military sites.

Type I belt sets are some of the latest British made Roman items of material culture. The concentration of

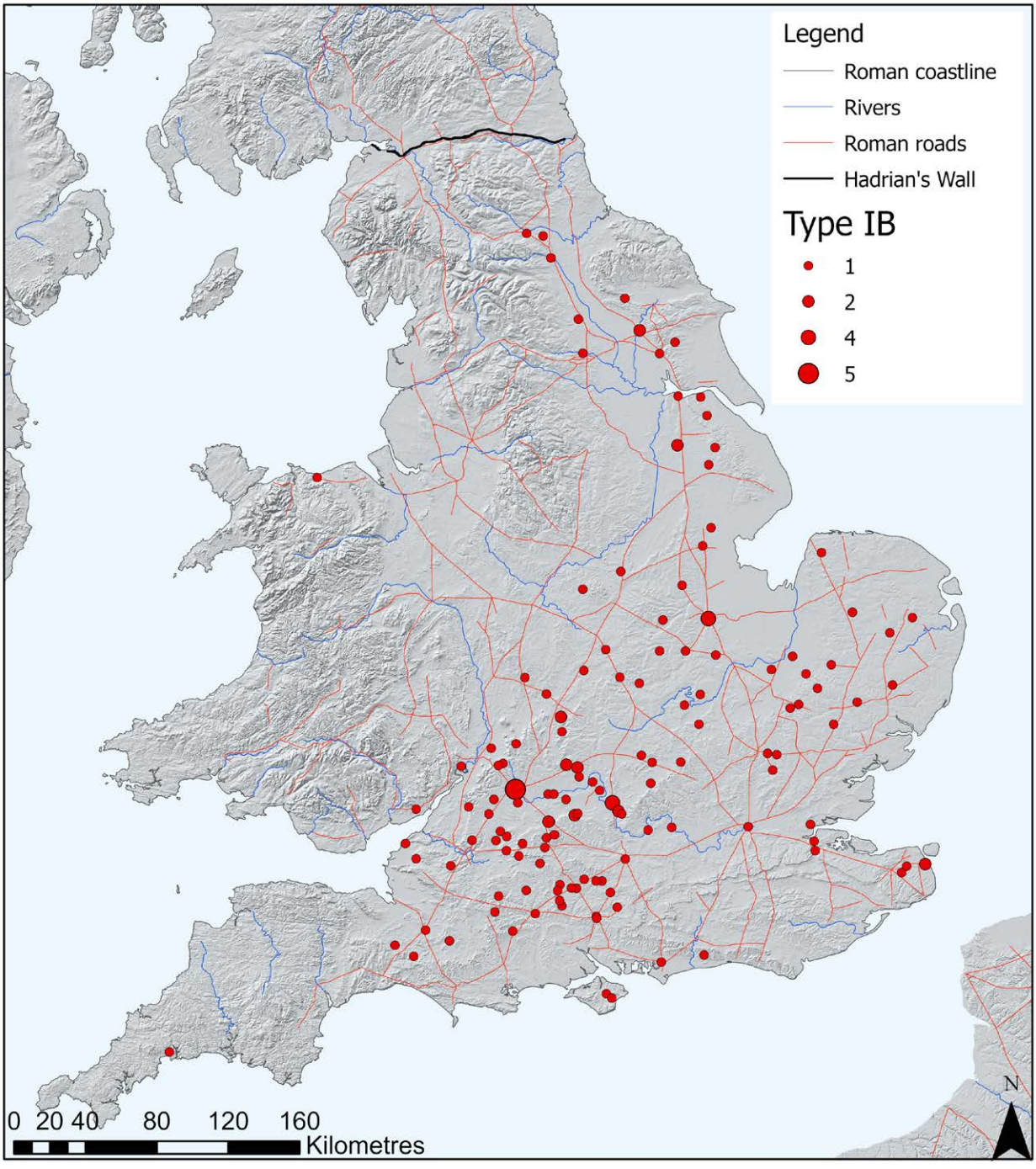


Figure 8.51 - The distribution of Type IB buckles

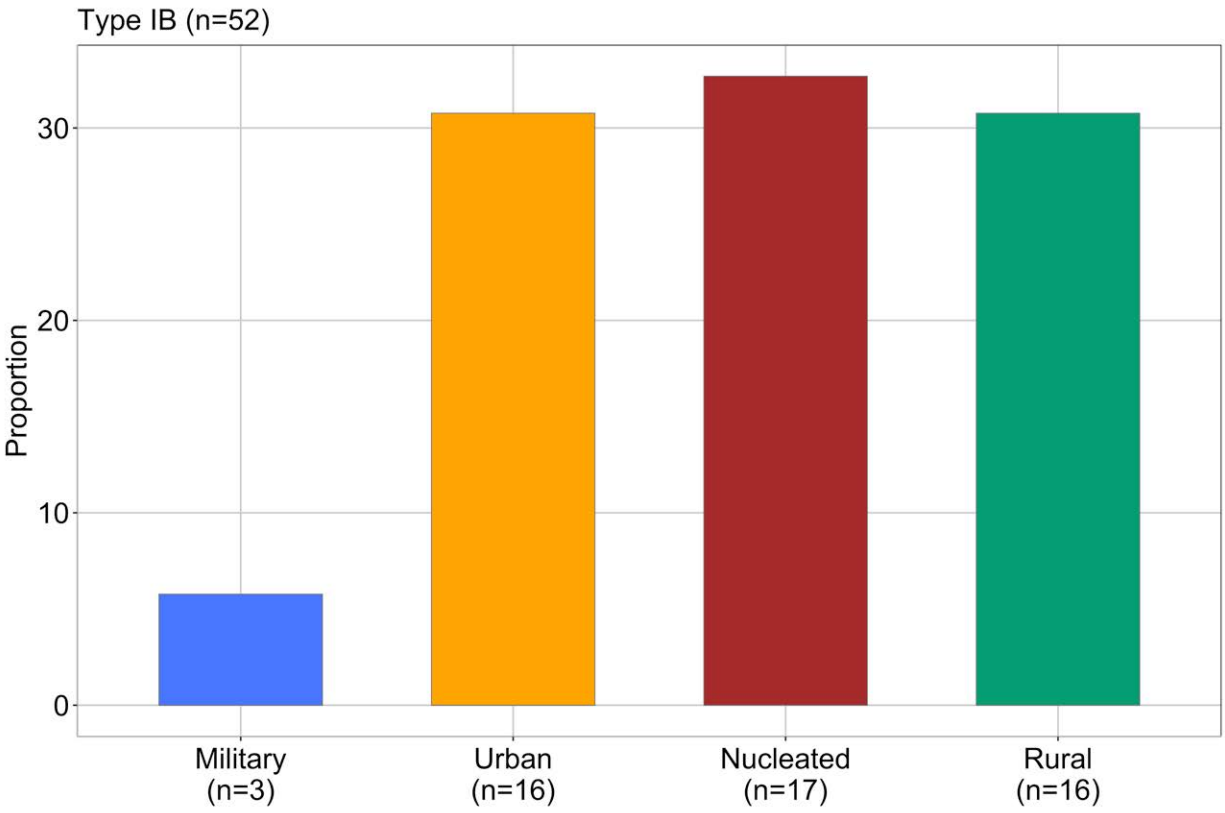


Figure 8.52 - The social distribution of Type IB buckles

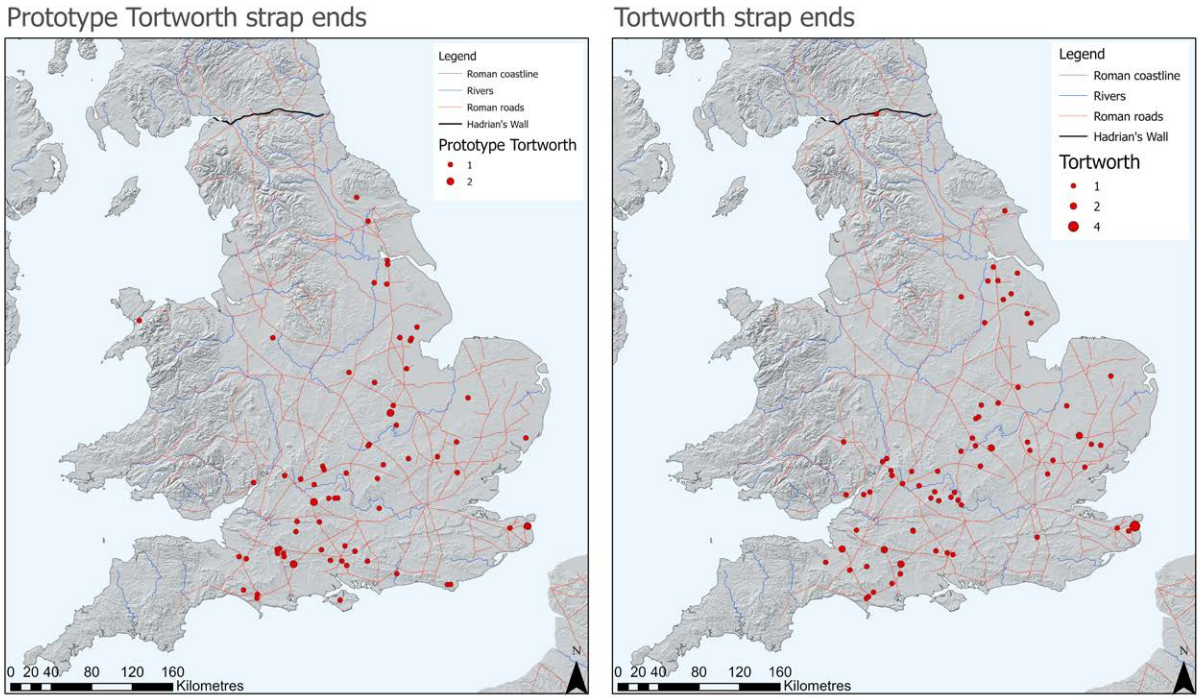


Figure 8.53 - Comparison of the distribution of Prototype Tortworth and Tortworth strap ends

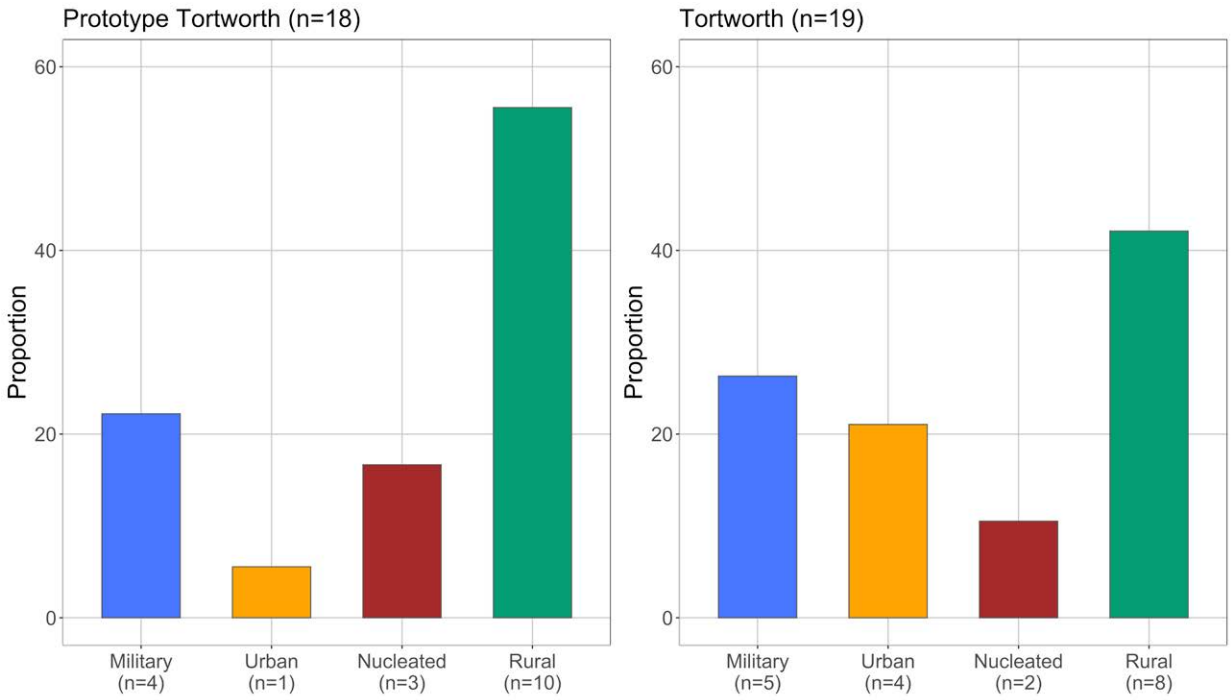


Figure 8.54 - The social distribution of Prototype Tortworth and Tortworth amphora strap ends

these fittings in the south, particularly in the region of Cirencester raises questions of continuity into the fifth century. The key question seems to be who wore these belt sets and what did their use represent? Stuart Laycock (2008) for example has linked them to tribal militias. Given the widespread distribution of these fittings from Cornwall to Hadrian's Wall this conclusion should be questioned but a link to the local elite underlined by Esmonde Cleary (2013, 89) appears pertinent.

These belt sets have been linked with an insular form of *cingulum*. Information on where examples were placed in inhumations is limited, consequently we should be cautious when making assumptions of how these belts were worn, along with their visibility. The long thin buckle plates would be more comfortable if the belts were worn from the shoulder rather than waist belts (Henry, 2022).

Type III and Type IV belt sets (AD 390+)

Type III buckles consist of Types IIIA and IIIB; Type IV of IVA and IVB. Associated with this type are a range of belt stiffeners, rosette loops and lancet type strap ends (Type VA). Generally these lancet strap ends are plain rather than chip carved, a feature linked with Type IV belts. Due to the limited number of examples, the social distribution will be grouped by Type III and Type IV buckles in general as well as Type VA strap ends and Type VI rosette hangers.

Type III

Both Type IIIA and IIIB buckles have a more restricted distribution than the Type I and Type II belt sets (Compare Figure 8.47, Figure 8.56 and Figure 8.57). Finds occur in Kent, Cambridgeshire, the environs of Dorchester-on-Thames and in Gloucestershire. Generally, the distribution of Type IIIB buckles is mostly to the east of Britain, but the quantity of both types remains low.

These buckles occur in higher proportions at nucleated sites, followed by military sites (Figure 8.58). Given this material has been linked with the military or civil administration, this profile is interesting and contrasts with the profiles of other continental material. This could be affected by a small sample size but perhaps indicates that the individuals wearing these particular belts performed a specific role.

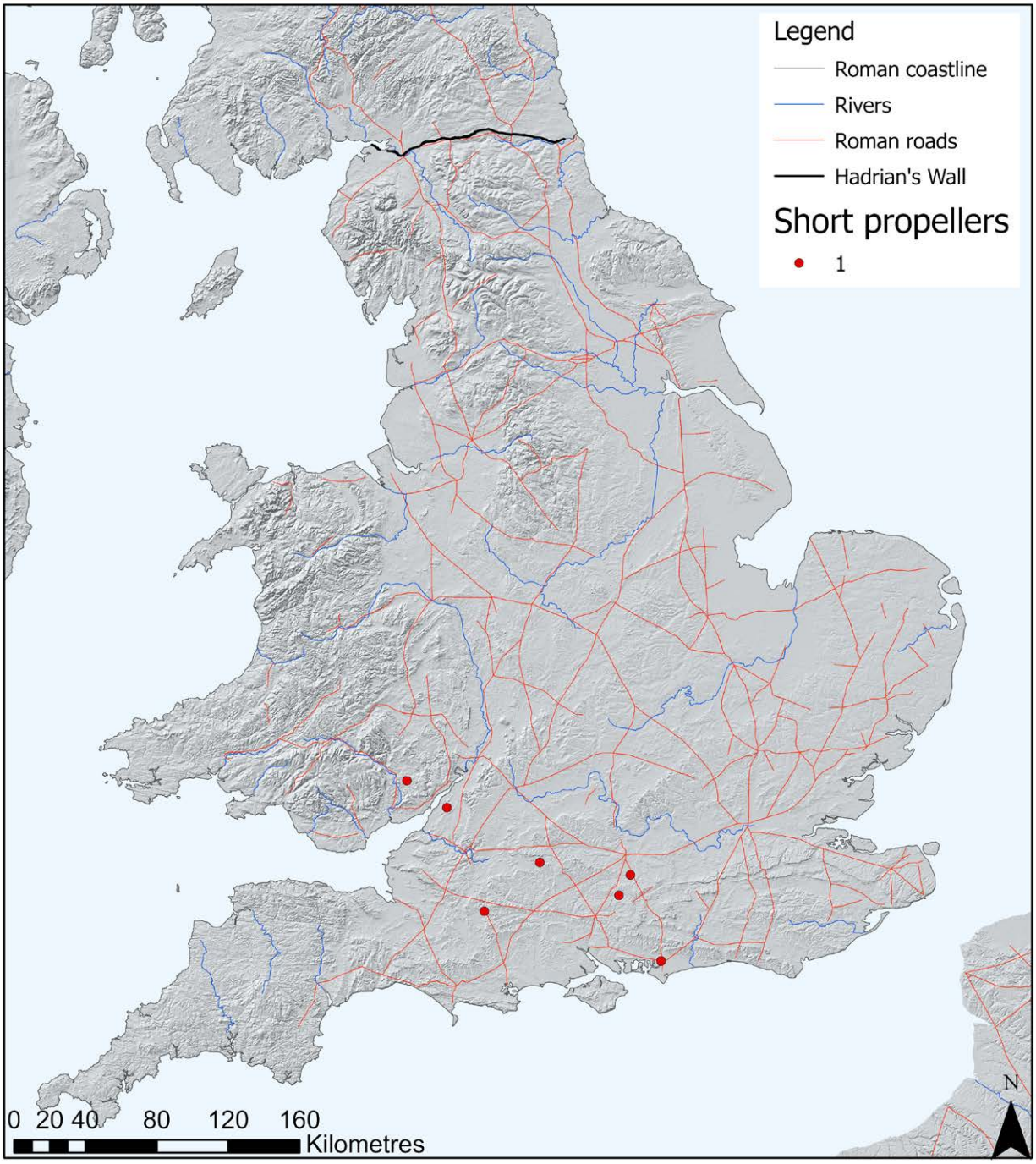


Figure 8.55 - The distribution of short propeller belt stiffeners less than 20mm. These objects appear to be associated with the Type I belt sets due to their size.

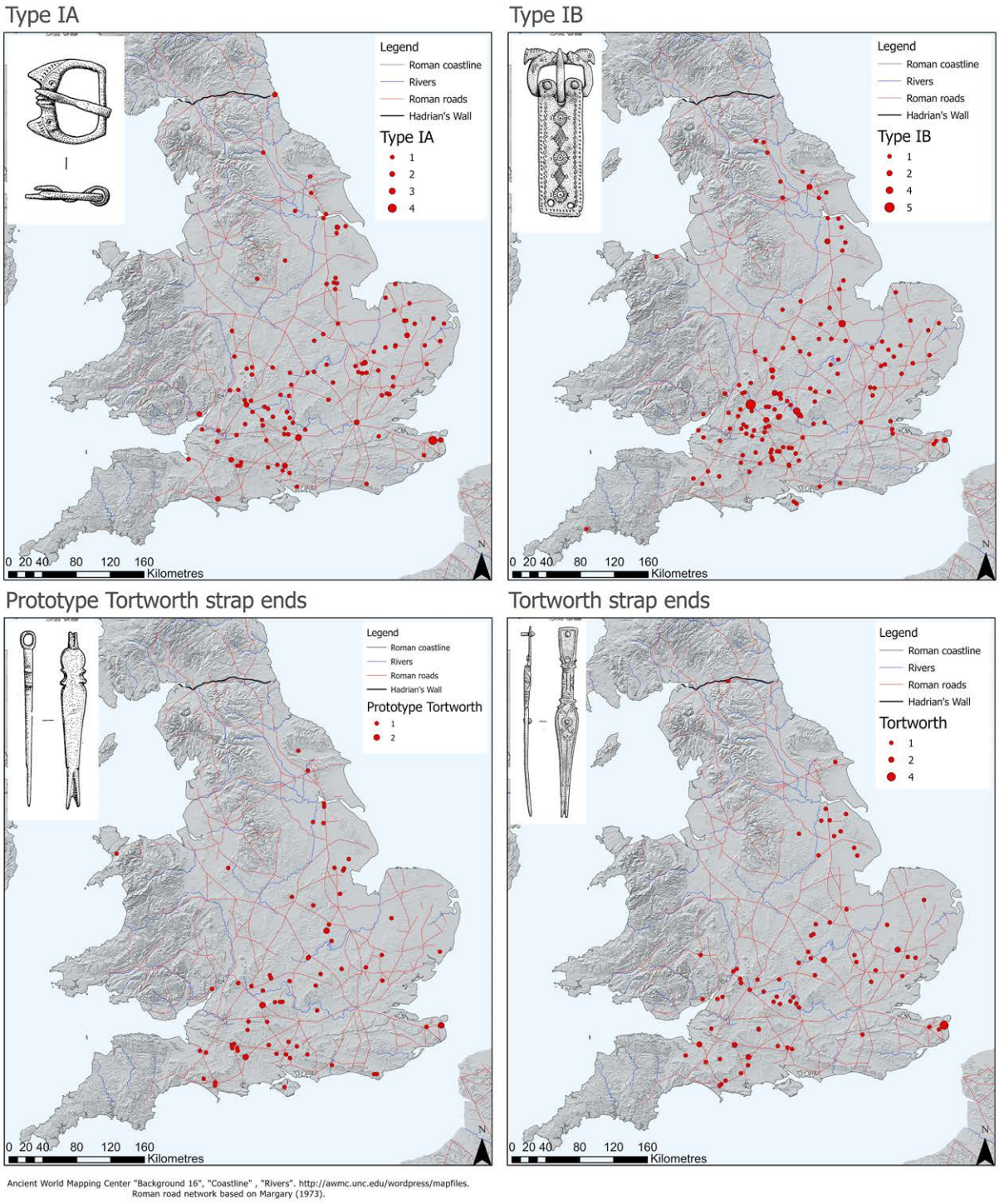


Figure 8.56 - Comparison of all Type IA buckles, Type IB buckles, Prototype Tortworth strap ends and Tortworth strap ends.

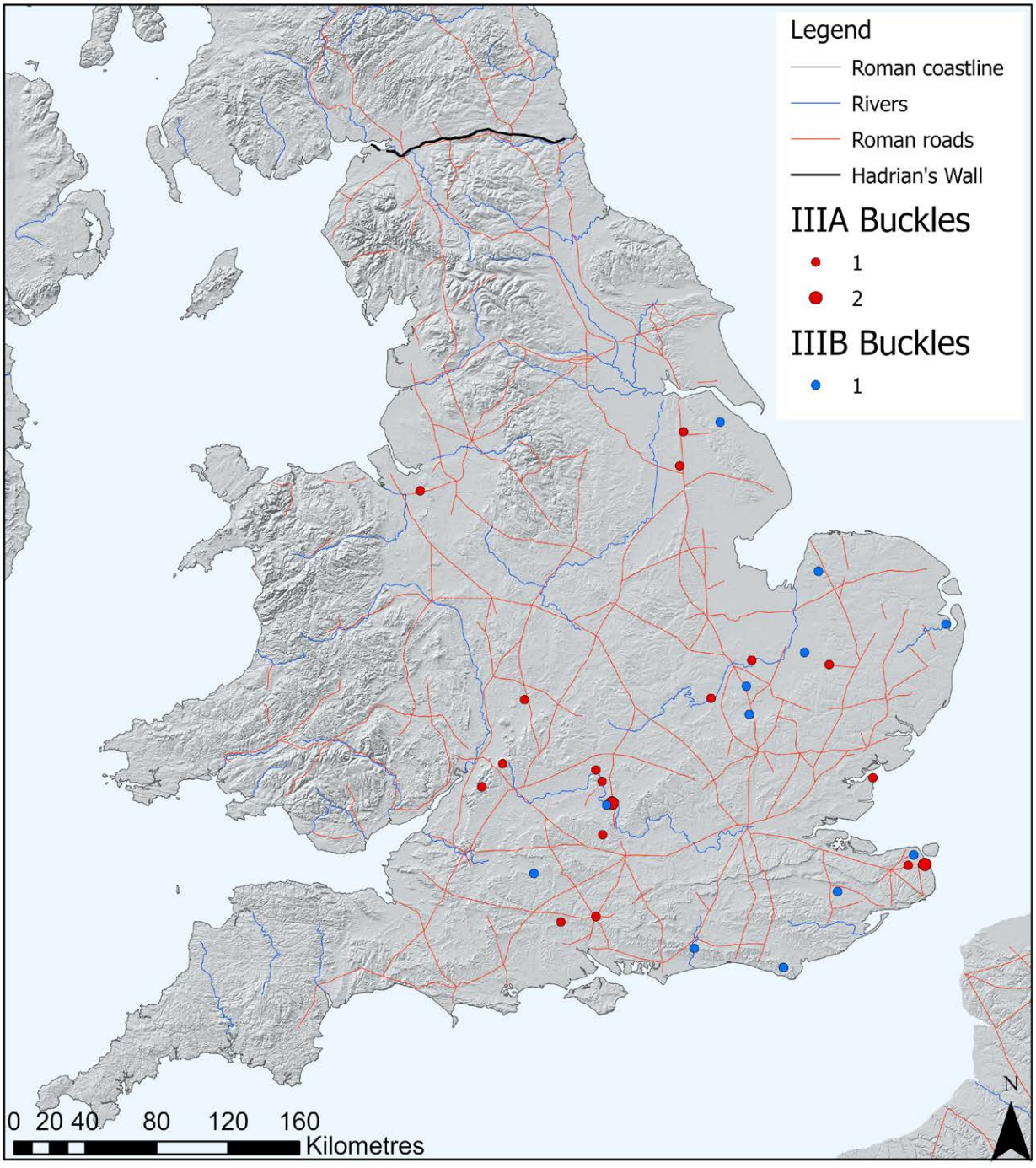


Figure 8.57 - The spatial distribution of Type IIIA and IIIB buckles

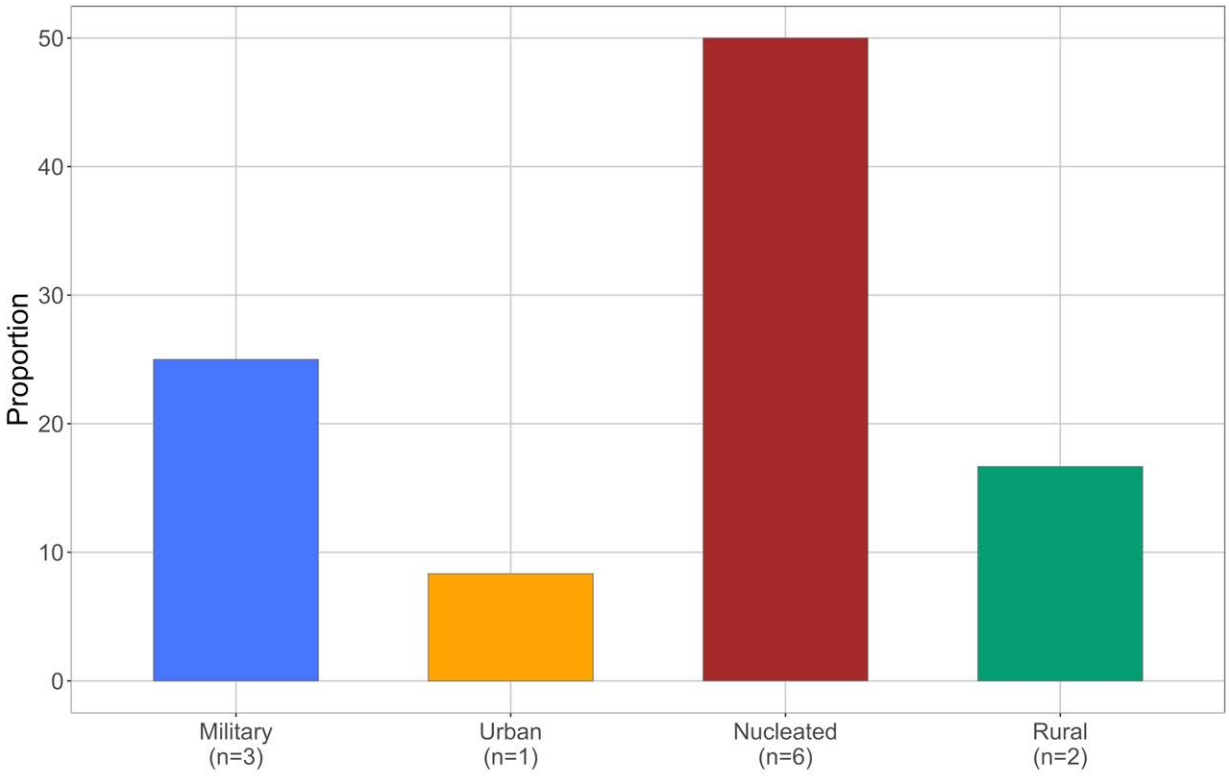


Figure 8.58 - The social distribution of Type IIIA and Type IIIB buckles

Type IV

The majority of Type IVA buckles are concentrated in the South-east with an example also recorded from Leicester (Figure 8.59). Only one example of a Type IVB buckle has ever been recorded, from Catterick. A further potential example from Wroxeter does not appear to be workable as a buckle (Mould, 2000). Both Type III and IV highlight the contraction of the distribution of continental material, particularly Type IV which has been noted previously (Esmonde Cleary, 2017, 193). No Type IV buckles are recorded with the PAS.

The number of Type IV buckles from urban sites is significantly higher than from either military or rural sites but overall numbers are too small to allow firm conclusions to be drawn (Figure 8.60).

Type VA strap ends

Type VA strap ends can be associated with both Type III and Type IV belt sets. The available evidence suggests that the plain examples are associated with Type III and those with chip carved decoration should be associated with Type IV belts but this is unlikely to be a hard and fast link (Henry, 2022, 104-108). The distribution of these strap ends is more widespread than either the Type III or Type IV buckles with examples recorded from the West Midlands (Figure 8.61). The cluster in this region is interesting as it is not reflected in other datasets in the belt fittings corpus considered here.

Type VA strap ends occur in highest proportions at urban sites followed by military and nucleated sites (Figure 8.62). This pattern is a closer reflection of Type IV buckles than Type III which appears different. As noted, we should be cautious about making too many conclusions given the small sample size of the Type III buckles.

Type VI Rosette hangers

Rosette hangers (Hawkes and Dunning Type VI) are also recorded with these belt sets as grave goods and are well represented with the PAS. Their distribution differs from the Type III and IV belt fittings in general with a significant focus on the eastern coast (Figure 8.63). A further concentration occurs in the environs of Dorchester-on-Thames including finds from burials in the Dyke Hills (Hawkes and Dunning, 1961, 9; Booth, 2014; Welch, 2014).

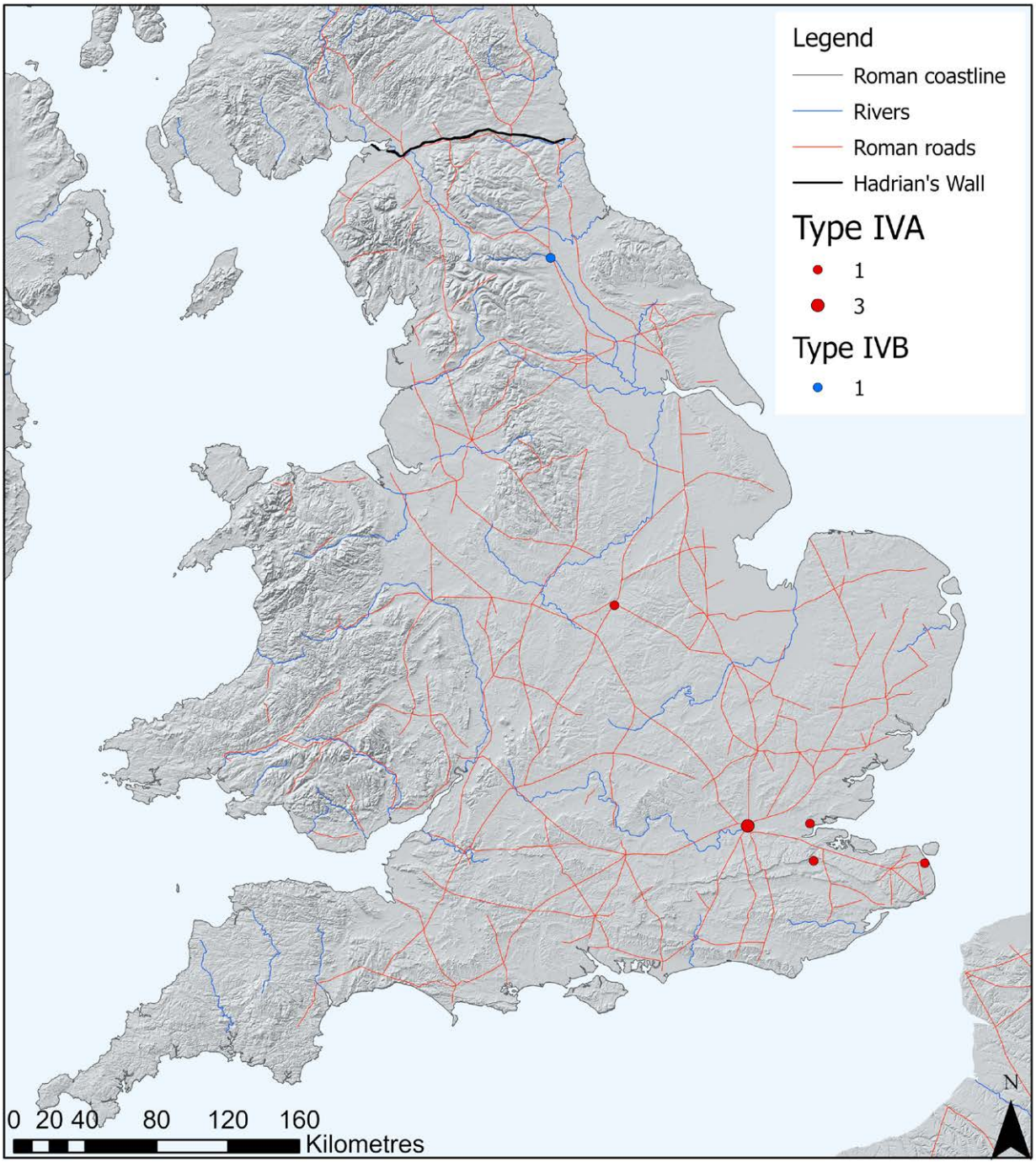


Figure 8.59 - The spatial distribution of Type IV buckles

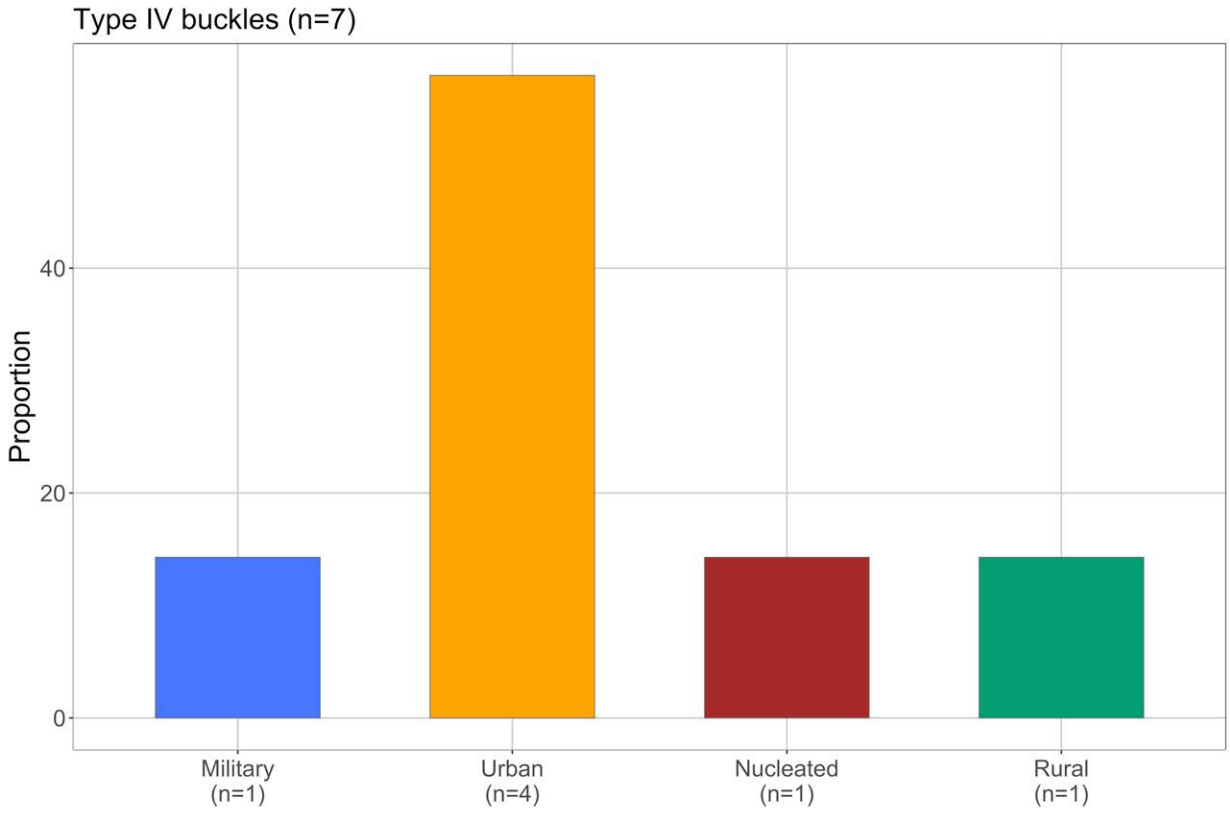


Figure 8.60 - The social distribution of Type IV buckles

When considering the settlement hierarchy these rosette hangers again occur in greater proportions at military sites followed by urban and nucleated sites (Figure 8.64). The eastern focus of the distribution is significant.

Type III and IV belt sets (AD 390-) -Discussion

The number of buckles and belt fittings associated with Type III and Type IV belt sets is substantially lower than Type I or Type II (Figure 8.65). This could reflect reduced mobility of troops into Britain perhaps in the early fifth century. They were significant objects emphasising the status of the wearer. Does this therefore link these objects to particular groups? Nick Griffiths (pers. comm.) argues that those who would have worn these pieces are high ranking officers. Their distribution is generally focussed away from what we might have assumed to be the key frontiers, are we viewing regions where particularly high-status soldiers or bureaucrats were based?

Their distribution differs from that seen with other material and contracts significantly, particularly evident with Type IV. The implications of this at present cannot be clearly defined due to the limited sample size but the variation seen when the different elements of these belt sets are compared does suggest that regional differences also occur, perhaps best highlighted through the rosette belt hangers.

Continuation into the fifth century

As with crossbow brooches, the evidence suggests that buckles and belt fittings could have had long lives and repairs are often noted in the dataset such as the Type IIIA buckle from Dorchester on Thames (Hawkes and Dunning, 1961, Fig. 1.1). In contrast to crossbow brooches where no examples are recorded from contexts dated to after AD 425, belt fittings occur more regularly in the later fifth century, generally from Anglo-Saxon burials.

These conclusions are visible in the corpus from this study, in which 33 examples, predominantly Type IA or Type IB buckles, are recorded from Anglo-Saxon graves (Figure 8.66). No belt fittings from the late Roman period are recorded within female graves, whereas

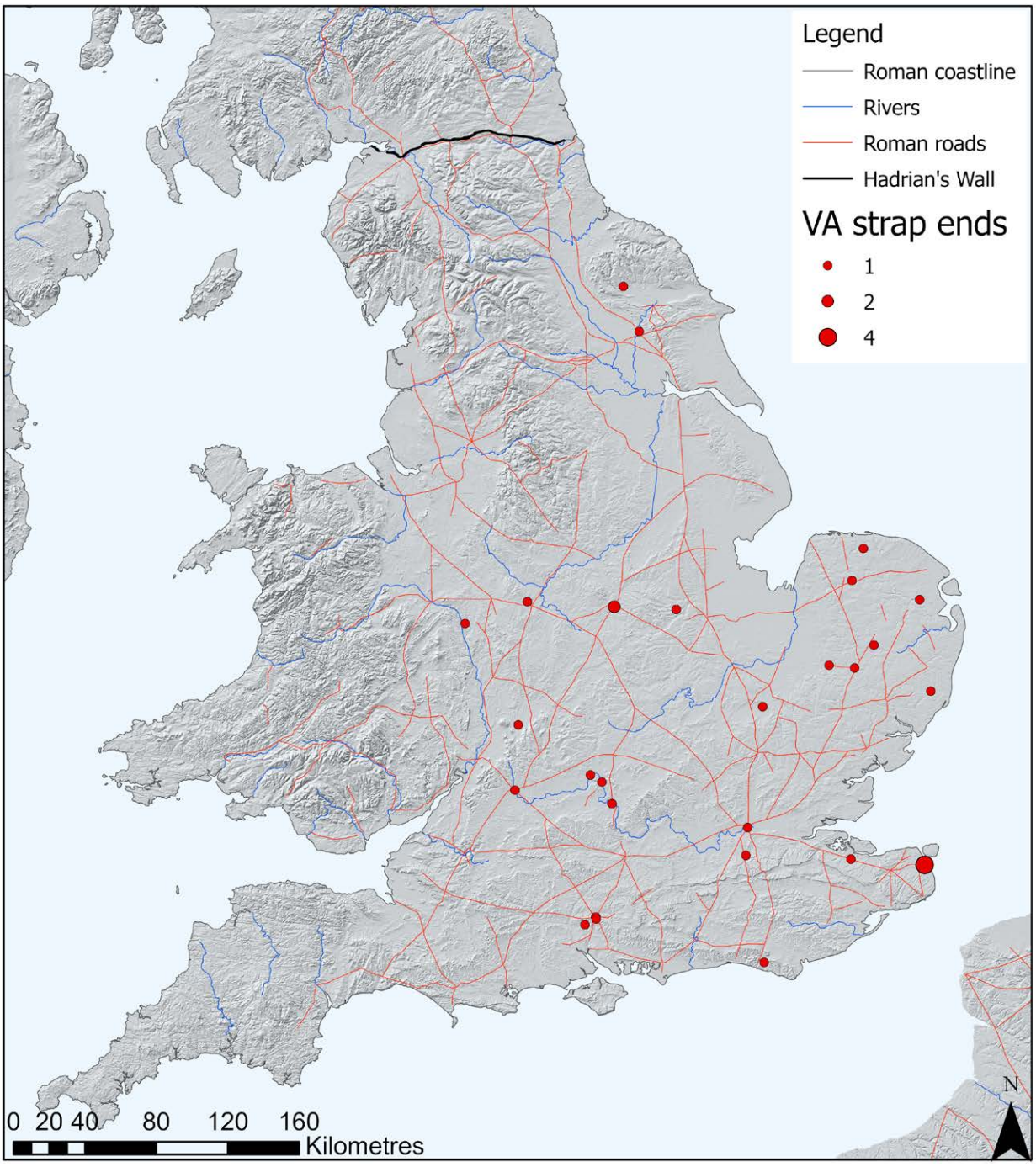


Figure 8.61 - The spatial distribution of Type VA strap ends

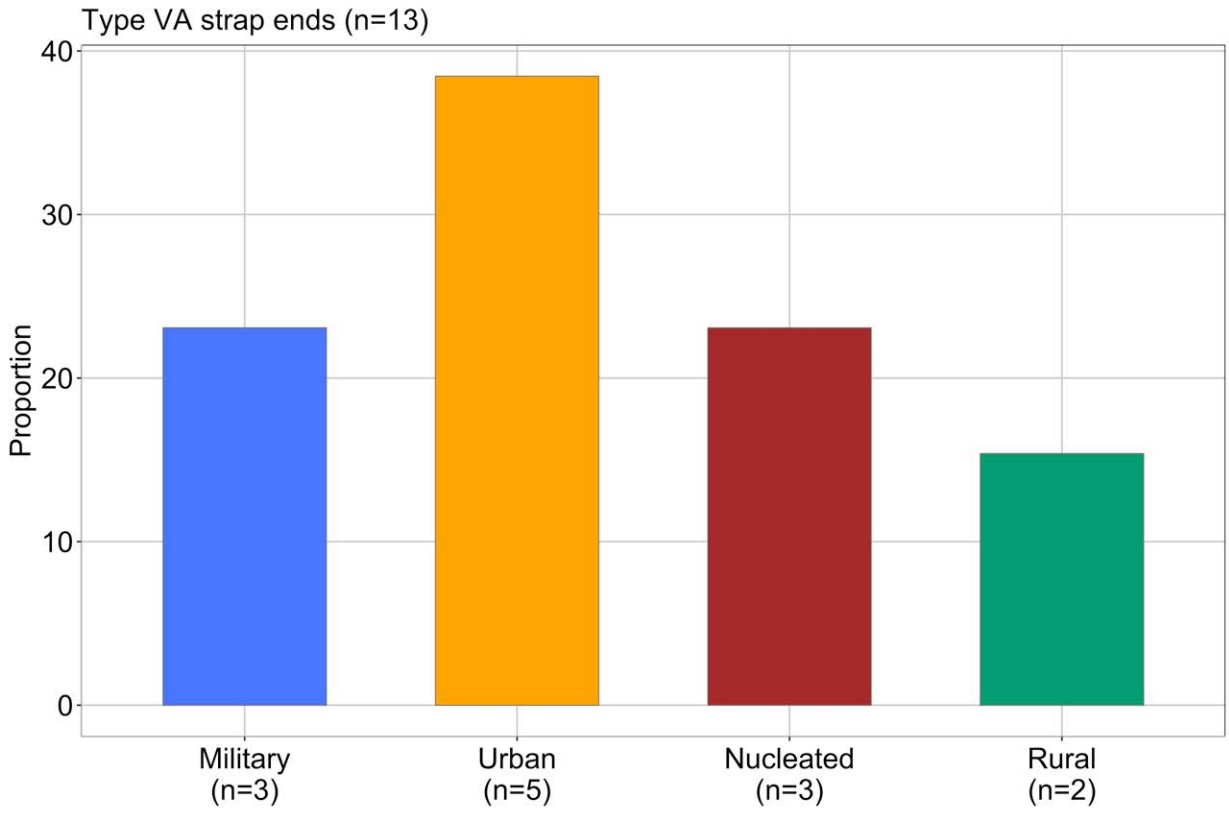


Figure 8.62 - The social distribution of Type VA strap ends

they form a high proportion of those who have such buckles in the early-medieval period (Leahy, 1984, 23; Leahy, 2007, 134). This underlines the changing importance of these objects and how they were used by the population to emphasise status in the fifth century.

The Anglo Saxon distribution of these objects is drastically different to the late Roman distribution. They primarily occur in a band between the Severn Estuary and Kent. The main concentration falls outside of the core distribution of both Type IA and Type IB buckles.

Key observations on belt fittings

The analysis of the corpus reveals a chronological progression contrary to the stylistic types assigned by Hawkes and Dunning. Type II buckles, occur from the mid-fourth century onwards, while insular forms emerge around the start of the final quarter of the fourth century. Concurrently, Type I buckles emerge in the final quarter of the fourth century, with insular forms such as the Type IB and Tortworth strap ends dating to the last decade of the fourth or the fifth century. Additionally, Types III and IV start appearing in the archaeological record in the final decade of the fourth century, the majority of the Type III and IV are continental types with a small number of potential copies of Type III buckles. Types I, III and IV continued in use into the fifth century.

The analysis of the corpus has highlighted that Type II buckles occur from the mid-fourth century onwards with insular forms produced from around the final quarter of the fourth century. Also in the final quarter of the fourth century Type I buckles appear with type IB and Tortworth strap ends dating to the last decade of the fifth century.

The analysis of the corpus has demonstrated that objects associated with Type I and Type II belt sets occur in greatest numbers. Analysis by site type and geographic region demonstrates that variation also occurs, this mostly appears to be influenced by the prolific number of insular types and their diversity. When the social profiles for insular and continental

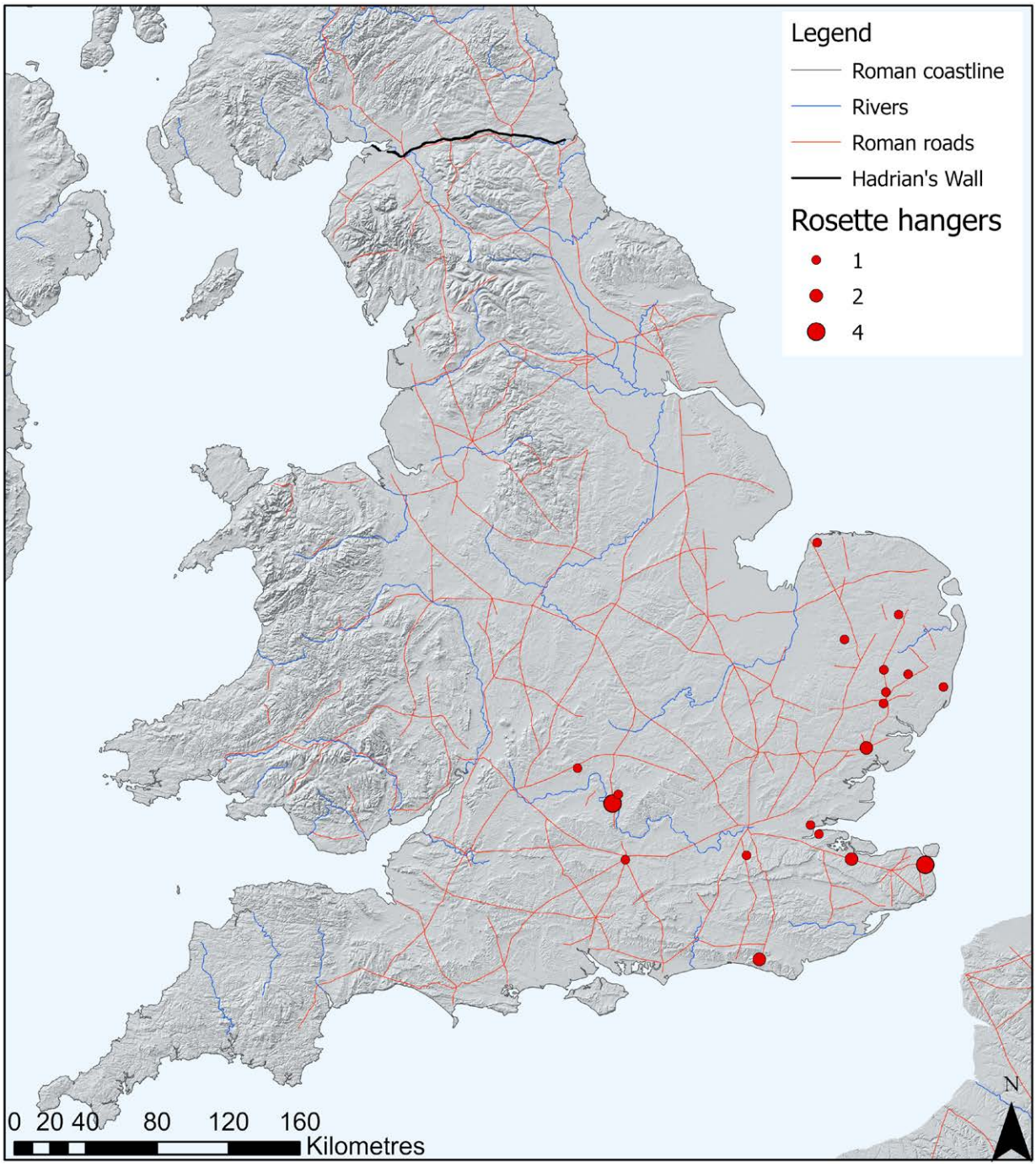


Figure 8.63 - The spatial distribution of rosette hangers (Hawkes and Dunning VI)

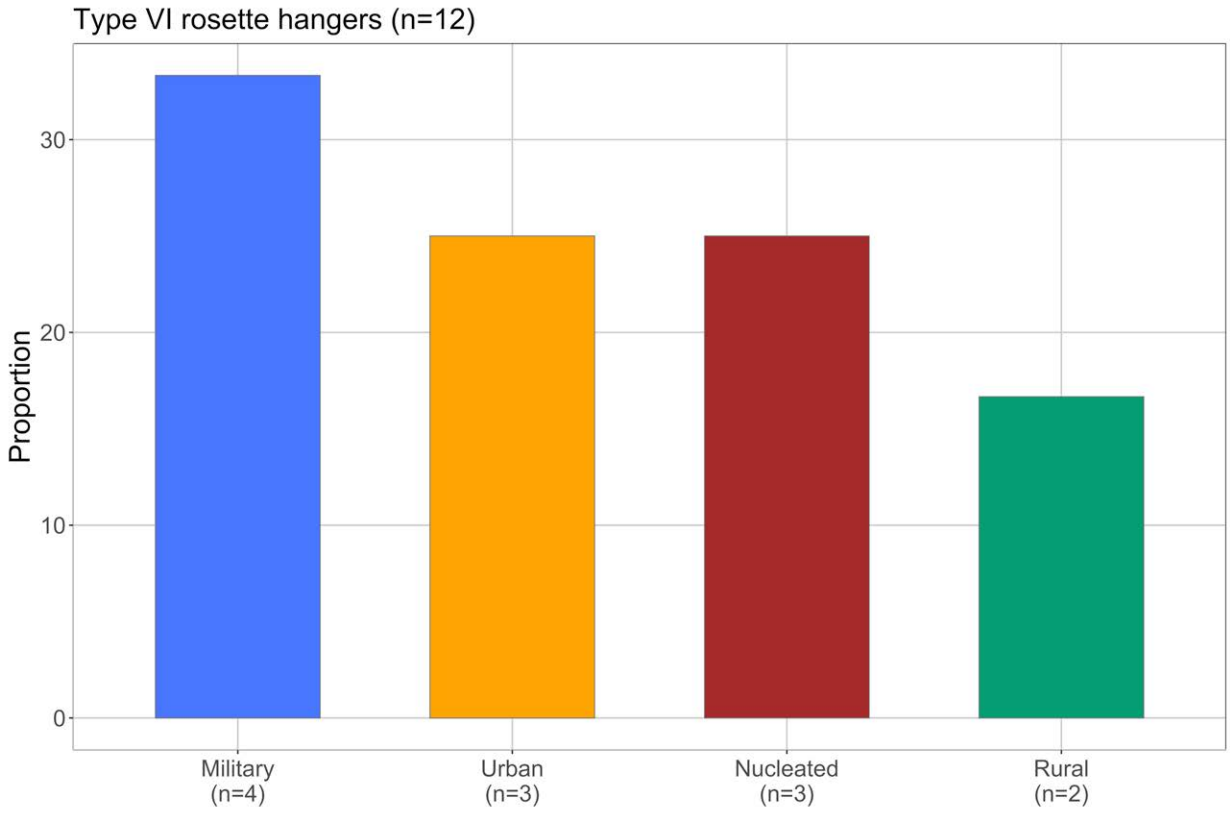


Figure 8.64 - The social distribution of Type VI rosette hangers

material are compared, we can see distinctive social patterns. The results allow us to suggest that some object types that cannot be stylistically linked with certainty at present are likely to be insular or continental products.

- Belt sets, thought to be linked to military, civil administration, and high-status civilians, exhibit varied usage across social and economic groups. The proliferation of insular forms at rural sites across the diocese demonstrates that this is not simply a reflection of soldiers at rural sites.
- The distinctions between continental and insular types may further underscore the diversity in the social and economic groups utilising Type I and Type II belt sets.
- The material from Hadrian's Wall predominantly aligns with chronologically earlier forms associated with Type II belt sets, while Saxon shore forts feature a higher prevalence of Type I, III, and IV fittings. This chronological variation is linked to changing supply dynamics on the northern frontier around AD 370.
- The proportion of continental material at nucleated settlements and urban centres is greater in most regions. An exception is Cirencester, which has a greater proportion of insular Type I belt fittings.
- We can note significant changes to the distributions over time particularly when comparing Type II belt distributions where the emphasis is to the East of Britain and with Type I where the majority occur in the South-west or along Ermine and Dere Street.
- The emergence of insular forms in late Roman Britain stands out as a distinctive phenomenon, raising inquiries into the reasons behind the local evolution of this material and the specific social or economic groups that embraced it. Esmonde Cleary's (2013, 89) proposition that these artefacts were utilised by the civilian elite adds an additional layer of complexity, prompting further investigation into the occurrence of locally developed forms and their potential implications.

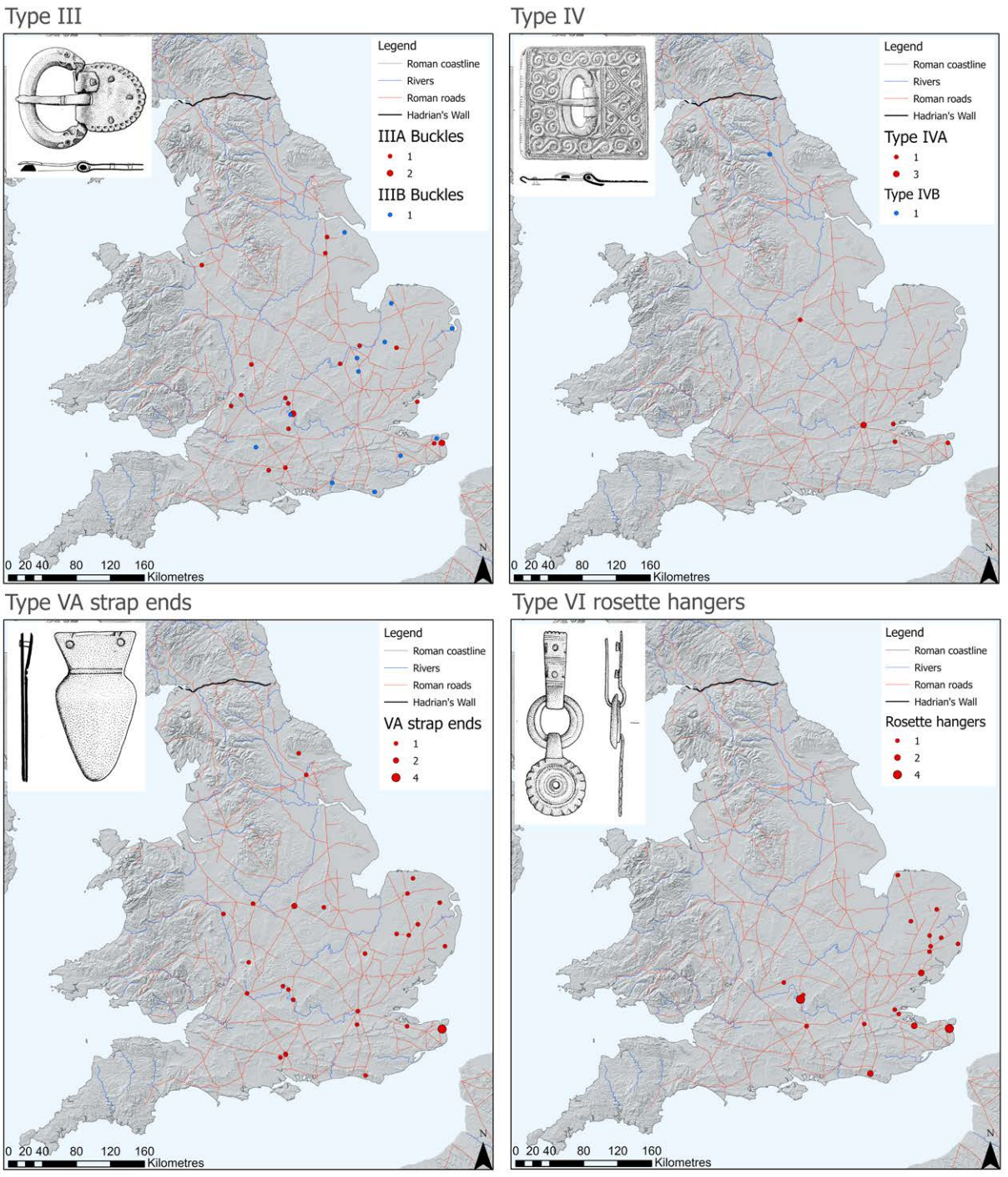


Figure 8.65 - Belt fittings associated with Type III and Type IV belt sets

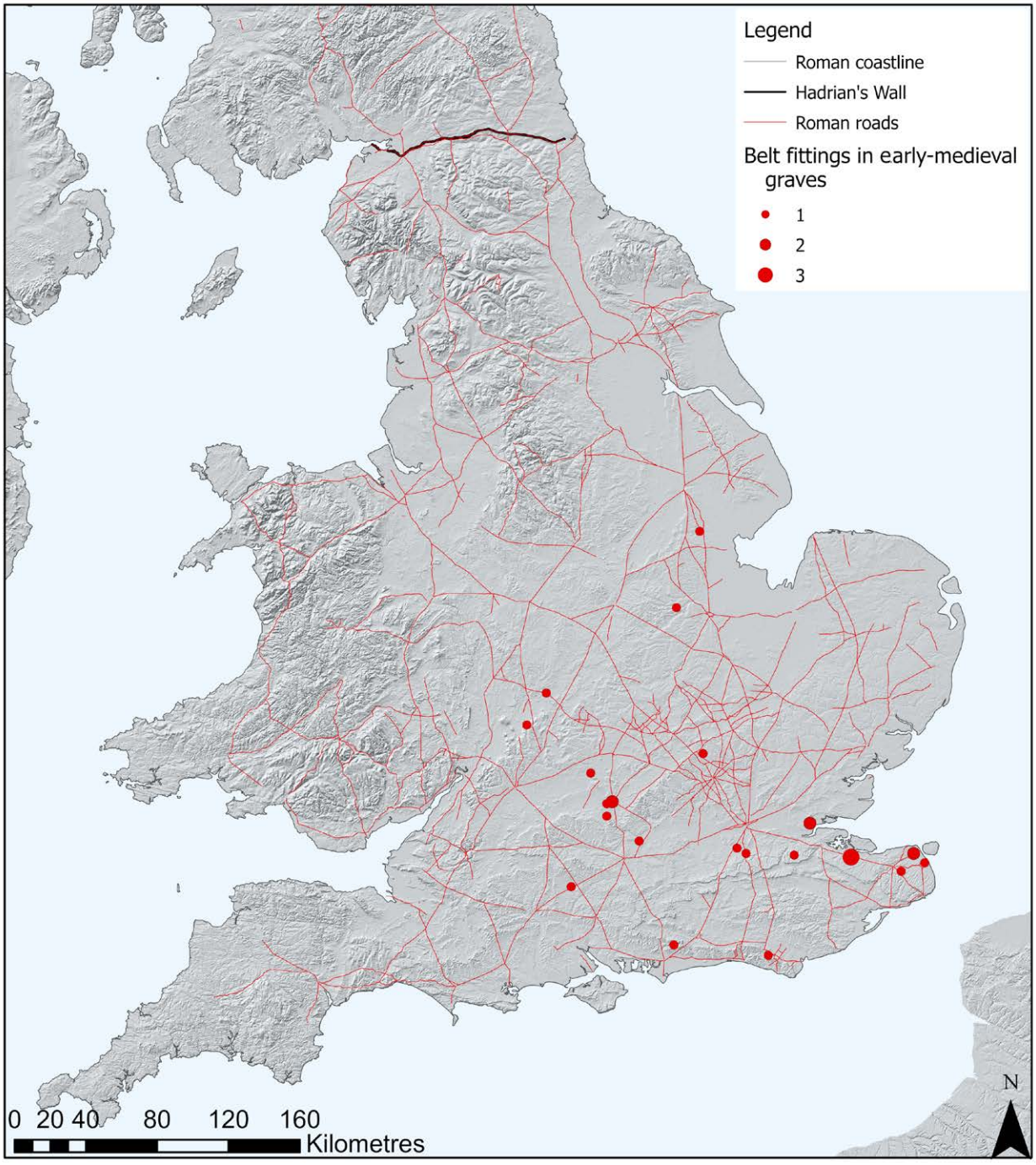


Figure 8.66 - The distribution of belt fittings from Early-Medieval burials

- It is important to emphasise that these typological variations would not necessarily be obvious at a distance to others. Yet, the results emphasise significant regional variation which I would argue is a result of various materials being used to construct the belt itself. This would lead to obvious distinctions between belt styles.
- In the Anglo-Saxon period these objects continue to retain their power in certain areas. The evidence suggests those who wore them changed. To date no examples are recorded as grave goods deposited with women in the late Roman period whereas they form a high proportion of the Anglo-Saxon corpus.

9. Spurs

For the majority of the Roman period, spurs were not seen as a necessary part of cavalry equipment. In the last third of the fourth century a new distinctive form was introduced which was attached using a rivet (Cool, 2010b, 290; Henry, 2022b, Table 9.1). They have been associated with late Roman cavalry units and connected with the employment of growing numbers of tribesmen from free Germany (Worrell, 2004; Booth *et al.*, 2010).

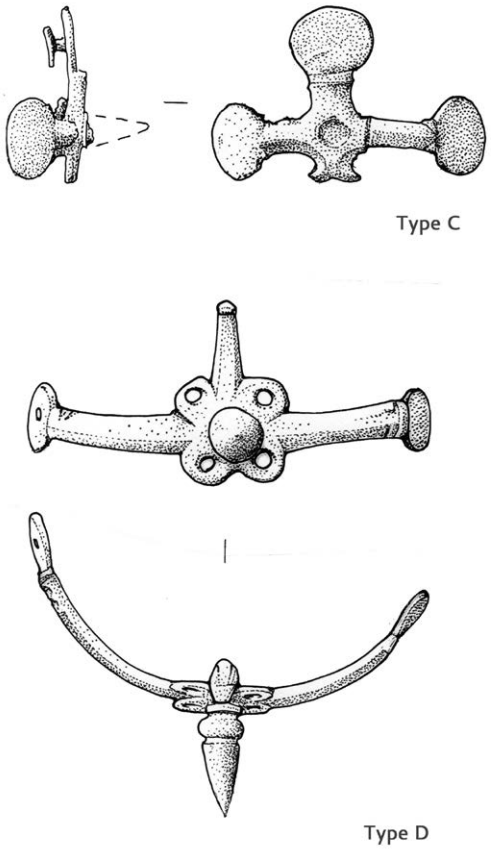


Figure 9.1 - A Type C prick super from Lankhills (top) and a D prick spur from Rudston (bottom). Illustration by Nick Griffiths

Typological studies

Roman spurs in Britain were first discussed in detail by Shortt (1959) and more recently by Leahy (1996), Worrell (2004) and Cool (2010b, 290; 2010a). These studies define the type as a rivet spur. In Germany they have been analysed in greater detail by Giesler (1978) where they are defined as the Leuna type (after five pairs were discovered in Leuna, Saxony-Anhalt).

Giesler (1978) defined four variants of the Leuna type: Type A (the Scandinavian variant); Type B (Central German variant); Type C (Eastern Provincial variant); and Type D (Western Provincial variant). Type C and D occur in Britain and can be identified by the form of the projection from the heel plate (Giesler, 1978; Henry, 2022b). Type C has a projecting circular loop and Type D a projecting hook (Figure 9.1).

Typological approach used

The Giesler (1978) typology will be followed.

Production

The work on spurs in Britain generally has defined them as a British type or a British variant (Shortt, 1959; Leahy, 1996; Worrell, 2004), the occurrence of both eastern and western provincial types in the diocese emphasises a continental link. Presumably given the status of these objects they were likely produced in the state run *fabricae*.

Distribution

The most recent analysis of late Roman spurs by Cool (2010a, 5-7) noted a predominantly coastal distribution although in general the quantity of spurs was limited (Figure 9.2). Two distinct clusters are noted in the North-east and one in the south-central area centred on Hampshire (Worrell, 2004; Cool, 2010a). Worrell (2004) argued that many of the excavated examples came from sites associated with the late Roman army, towns or villas. Cool (2010a, 4) viewed the distribution as significant as it is different to the majority of distributions of late Roman objects.

Status and identity

Spurs have been associated with late Roman cavalry units and connected with the growing numbers of tribesmen from free Germany within the army (Worrell, 2004; Booth *et al.*, 2010). Discussing the Stilicho diptych, Cool (2010a, 7) argued that spurs

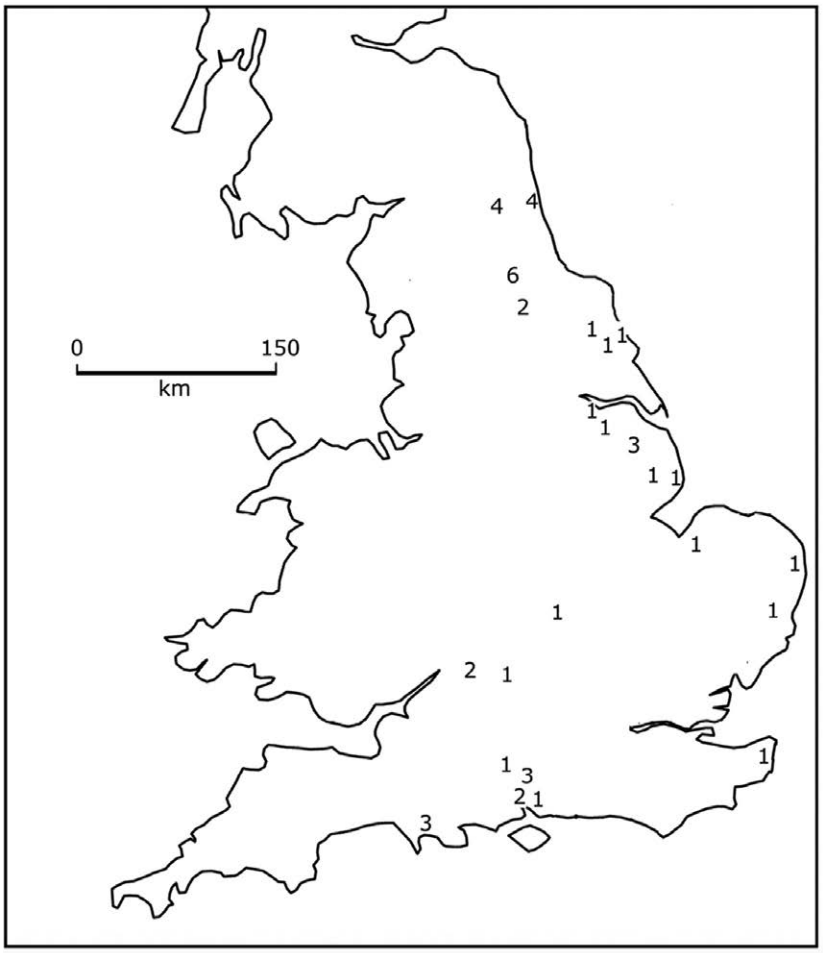


Figure 9.2 - The distribution of rivet spurs by Cool (2010a; Figure 1.3)

are visible on the portrait suggesting that they were part of military costume. Consequently, they have been ascribed some form of official significance (Cool, 2010b, 291; Esmonde Cleary, 2017).

Previous social distribution of these objects has emphasised that their status remained equivocal and that they might have been items of either military uniform or civilian dress and associated with the hunt (Leahy, 1996; Cool, 2010a). Spurs from villas have been used as evidence that their proprietors were high ranking administrative officials (Fleming, 2021, 30). We should be cautious with using single objects to make such conclusions.

Research questions

It has been argued that the coastal distribution of these objects is significant as they do not follow the general distribution pattern of objects in Roman Britain, (Cool, 2010a). Do horses and spurs represent mobility and hint at the location of mobile elements of the late Roman state?

The inclusion of two spurs, a silver gilt continental amphora strap end and a non-zoomorphic buckle as grave goods within a burial of a man at Lankhills, Winchester led to the individual being described as exceptional (Booth *et al.*, 2010, G1846; Cool, 2010b, 291).

Spurs are objects of high status, consequently their distribution will initially be considered in conjunction with various elements of other datasets in the study such as the items listed above as well as Type 3/4, 5 and 6 crossbow brooches and Type III and IV belt fittings to consider any correlations or wider implications.

Similarly, can we discern noticeable patterns when Type C and Type D spurs are considered in greater detail.

The dataset

In total 86 examples have been included in the corpus building on the work by Shortt (1959), Giesler (1978), Worrell (2004) and Cool (2010a). Further examples recorded with the PAS and RRS were also added to the corpus. The dataset is available on the ADS (https://doi.org/10.5284/1090416)

Analysis and Results

This chapter emphasises the challenges relating to how we view spurs in the late Roman period. Their status has been viewed as equivocal, and they have been linked with late Roman cavalry or hunting. Consequently, they might have been used as part of both military uniform and civilian dress.

A total of 86 examples of late Roman spurs have been recorded from Britain from 62 sites (Figure 9.3). The greatest concentrations can be seen to the east and north of Britain, particularly along Dere Street and sites such as Piercebridge, Corbridge, and South Shields. To the south, concentrations occur near Cirencester, Winchester and in Dorchester. Four spur

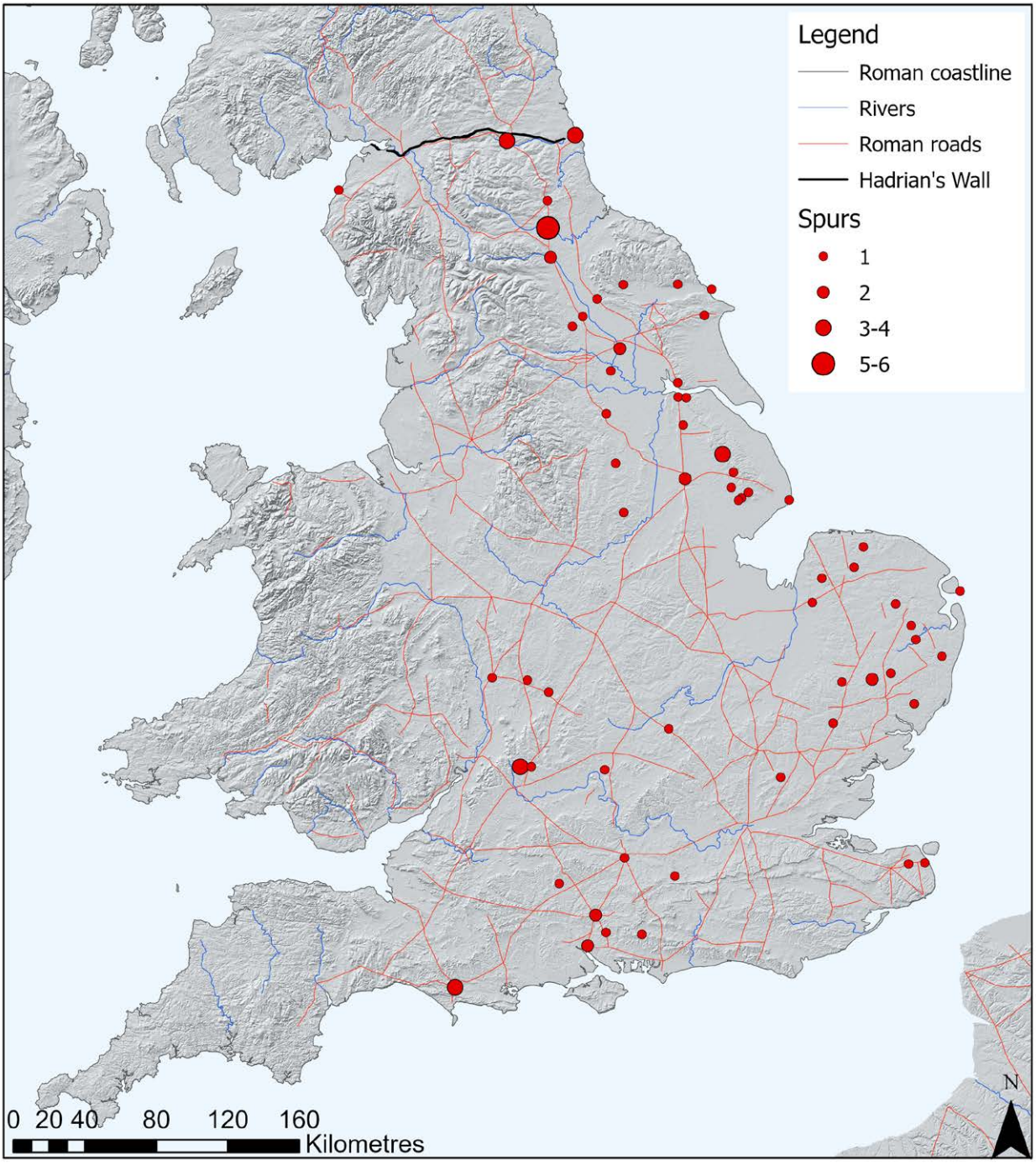


Figure 9.3 - The distribution of the corpus of 86 rivet spurs in Britain (site finds and PAS)

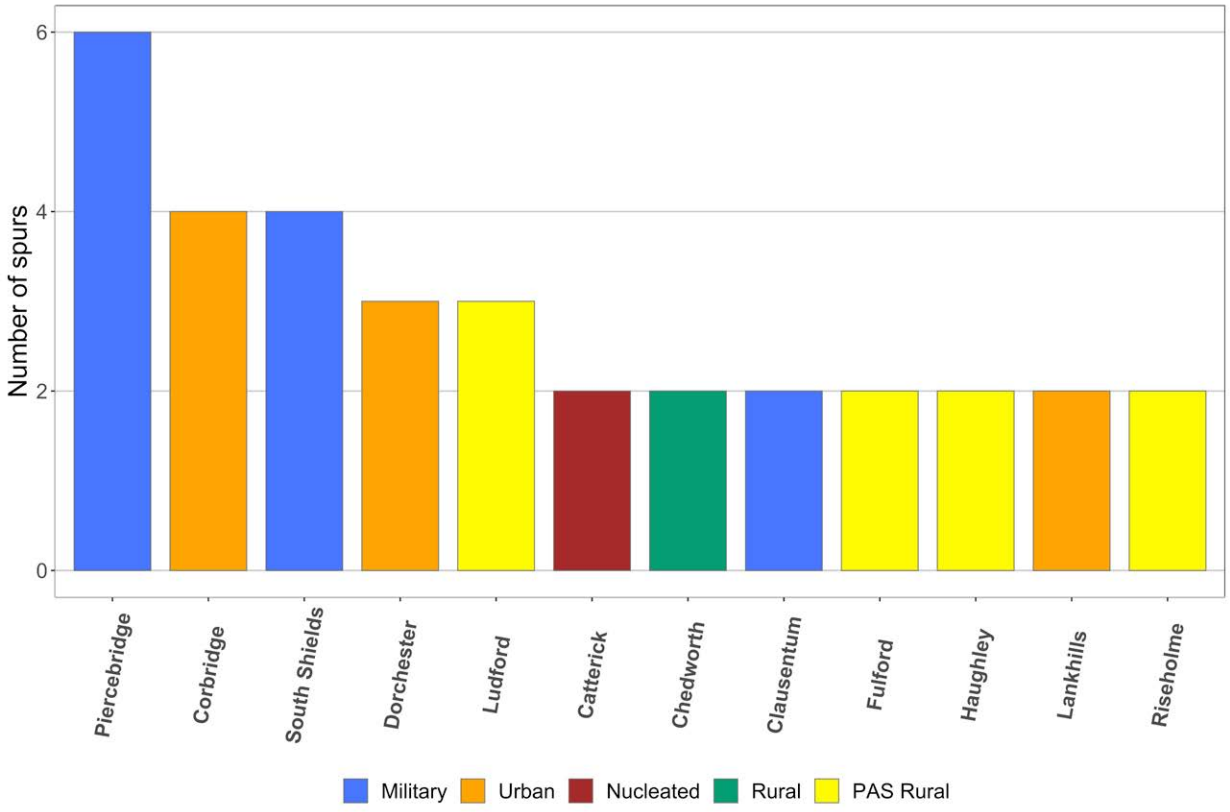


Figure 9.4 - The quantity of sites where two or more spurs have been recorded from Britain.

fragments are housed within the Cripps collection at Corinium Museum (Cirencester) but lack provenance and have not been included here.

Two or more spurs have been recorded from 12 sites in Britain (Figure 9.4). The greatest quantities are recorded from military sites including Piercebridge (6) and South Shields (4) as well as urban sites Corbridge (4) and Dorchester (3).

PAS Finds

The PAS has almost doubled the size of the corpus of late Roman spurs from Britain. Although the work by Worrell (2004) and Cool (2010a) included PAS data the main emphasis on excavated sites led to a bias towards military or urban sites. Since 2010 further objects recorded by the PAS (and examples noted by the RRS) have greatly added to this corpus.

In general, the addition of rivet spurs recorded with the PAS complements the excavated dataset filling in apparent gaps in the distribution pattern such as in Lincolnshire or Suffolk (Figure 9.5). When excavated and PAS examples are considered in combination the PAS further emphasises the general proliferation of rivet spurs along Dere Street with major concentrations in Yorkshire, North Lincolnshire and Lincolnshire as well as a number in the environs of Winchester noted by Worrell (2004) and Cool (2010a).

Comparison by site type

Previous studies have noted that based on the distribution of these objects they would be linked to both the military and the hunt given the quantity from both military and high-status rural sites (Leahy, 1996; Cool, 2010a; Fleming, 2021). A key research question for this study is to consider the spatial and social distribution of this corpus.

Spurs occur in highest proportions at military followed by rural sites but are recorded from sites across the settlement hierarchy (Figure 9.6). It should be noted that almost half of the current corpus is recorded with the PAS demonstrating the value of this dataset.

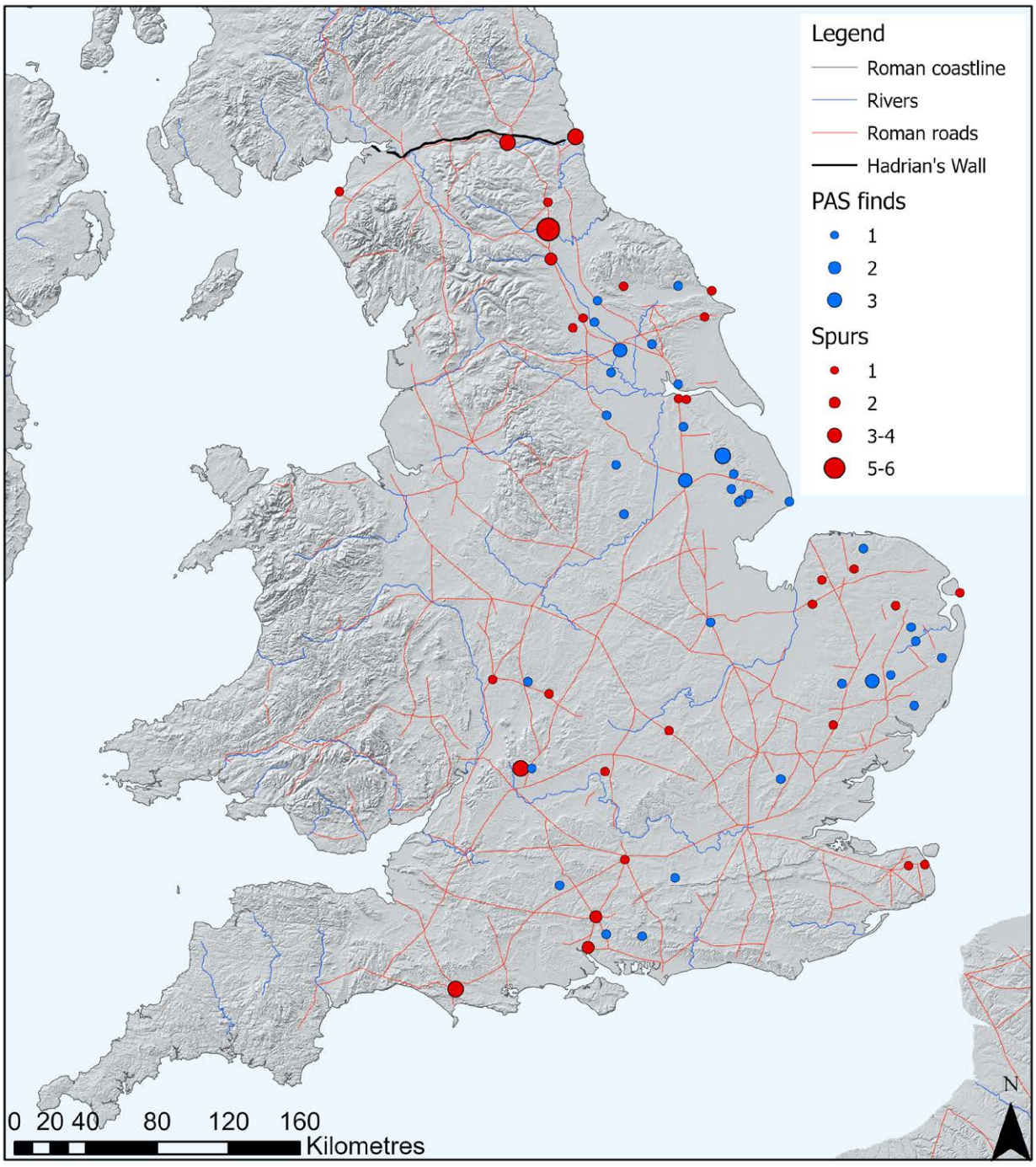


Figure 9.5 - Comparison of excavated examples of late Roman rivet spurs and those recorded with the PAS

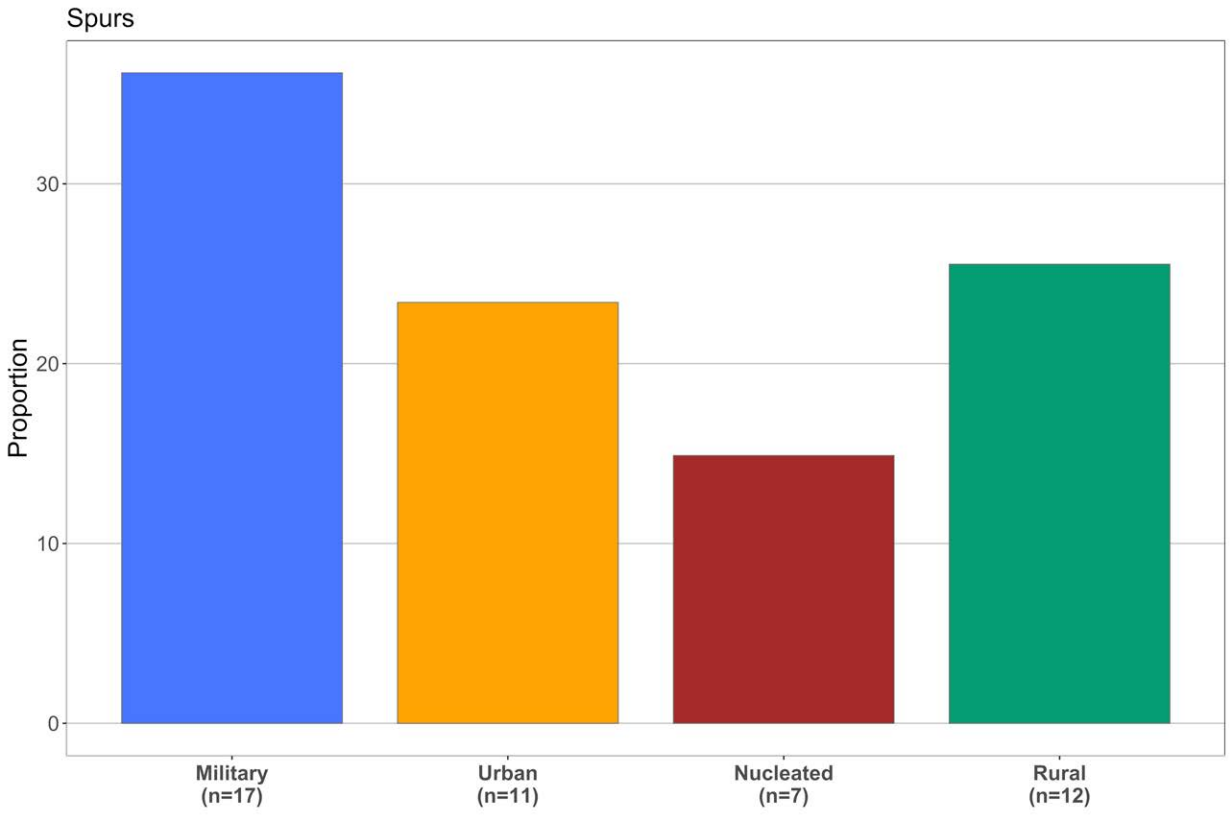


Figure 9.6 - The proportion of rivet spurs from military sites, urban sites, nucleated and rural sites (n=47)

Military

The distribution of the spurs corpus differs in emphasis to that of crossbow brooches and belt fittings (Figure 7.3 and Figure 8.16). Cool (2010a) argued that the distribution of spurs indicated that the frontiers of the diocese had changed, while Moorhead (2012, 215) highlighted the importance of Dere Street to mobile military troops in the late Roman period.

Interestingly, in contrast to the analysis of crossbow brooches, belt fittings and penannular brooches, the highest proportion of spurs occur in the Pennines sub group, principally due to the assemblage at Piercebridge and other sites along Dere Street (Figure 9.7). Sites on Hadrian's Wall and the Saxon shore forts both have the same proportions, and no examples are recorded from Wales.

Urban

All 11 spurs recorded from urban sites occur at *civitas* capitals (including Corbridge) and have not been illustrated here. As noted above a group of spurs form part of the Cripps Collection at Corinium Museum but unfortunately, no provenance is recorded.

Nucleated

Two spurs are recorded from the defended *vicus* at Catterick, the remainder of the corpus from nucleated settlements occur at undefended settlements across Britain (Figure 9.8). The sample size remains small for this social category.

Rural

The number of spurs from rural sites remains small and emphasis has often been placed on those from villa sites such as Rudston, East Riding of Yorkshire or Chedworth, Gloucestershire. Fleming argued that the spur at Rudston indicated that a proprietor of the villa was a high ranking administrative official (Fleming, 2021). Although the examples from villas form a high proportion of the corpus from rural sites, they do also occur at farmsteads and religious sites (Figure 9.9).

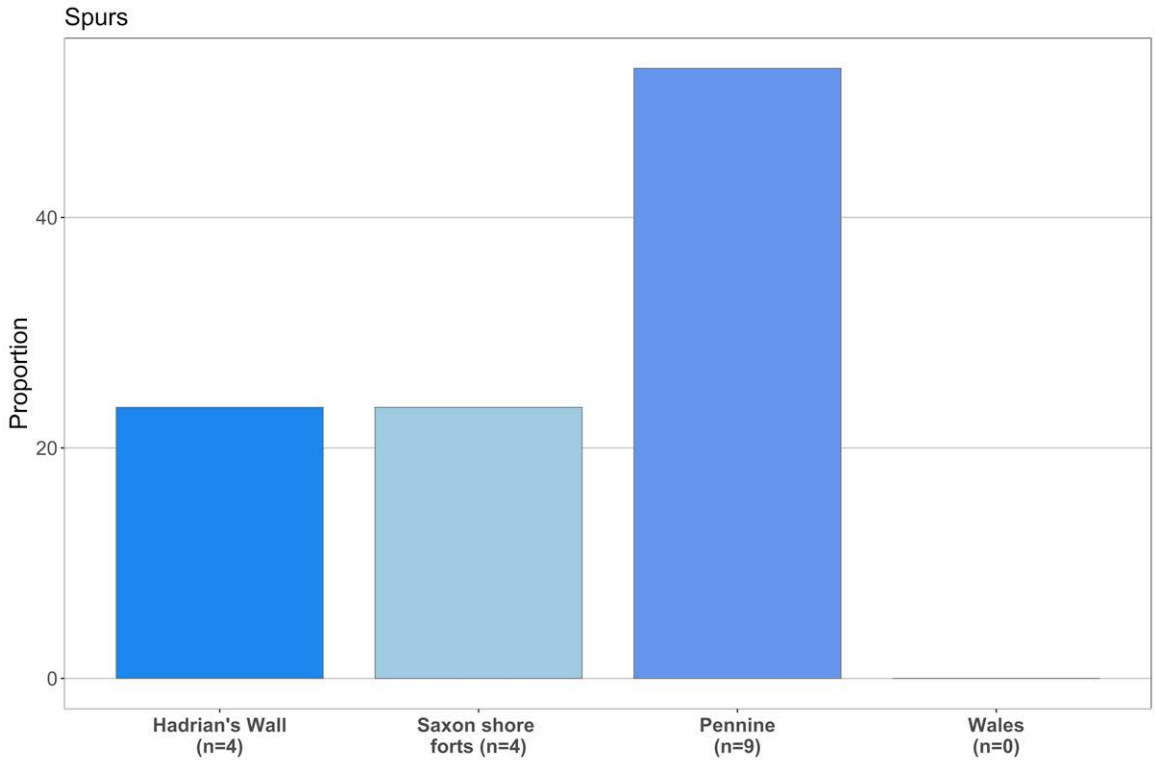


Figure 9.7 - Comparison of the proportion of rivet spurs from the military sub types (n=17)

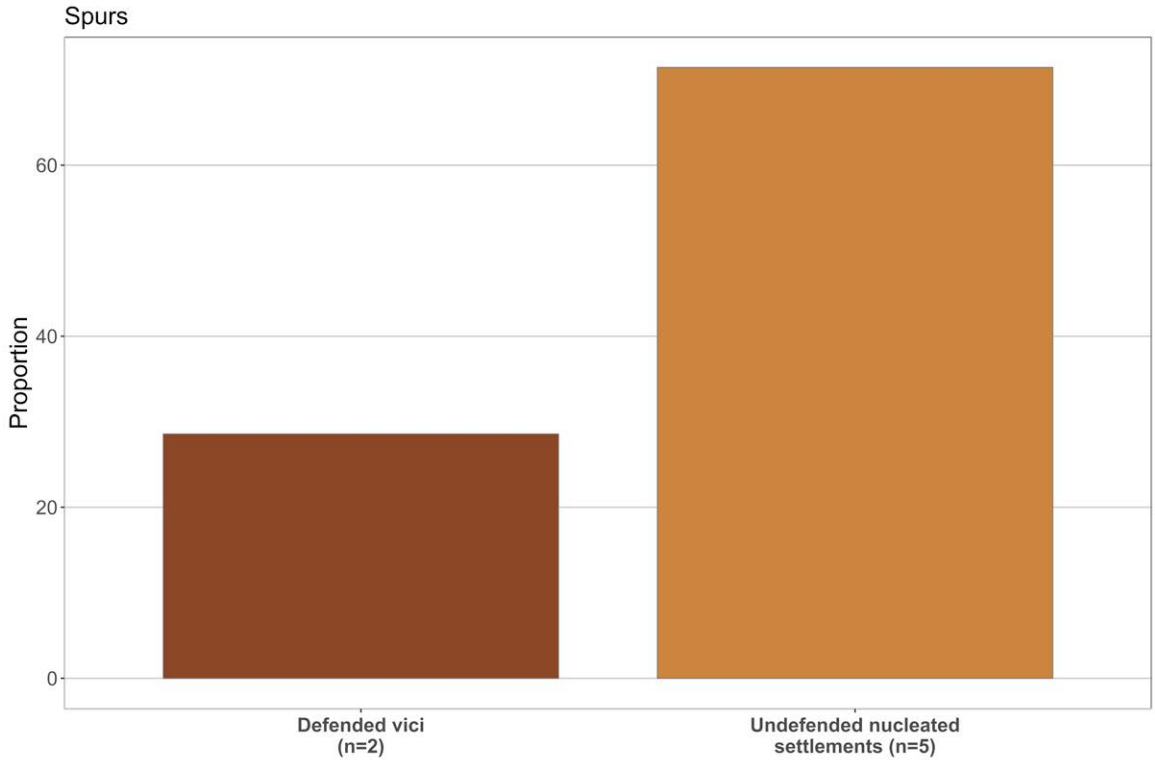


Figure 9.8 - Comparison of spurs from nucleated sites (n=7)

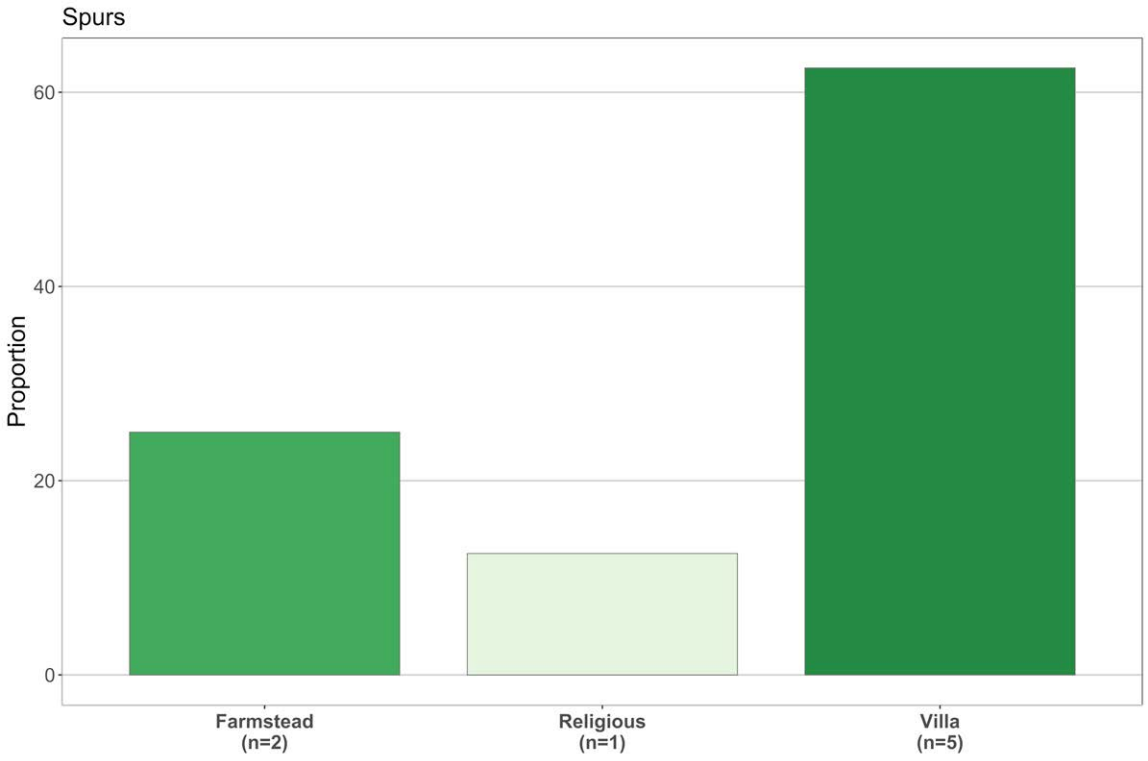


Figure 9.9 - Comparison of proportions of rivet spurs from rural sub types. (n=8)

Comparison by type

Although a significant proportion of the corpus occurs at military site the quantity from urban and rural sites continues to suggest that the association of these object is equivocal. In the rural sub-groups these objects occur at a range of site types, but perhaps too great an emphasis has been placed in the past on the material from villas. As has been demonstrated with crossbow brooches and belt fittings associated with the late Roman state, these objects occur across the settlement hierarchy. The question of what social and economic groups these objects could be linked to will be explored when Type C and Type D spurs are considered.

Type C (Eastern Provincial variant)

Only nine examples of Type C spurs are recorded from Britain as part of this corpus; the type has a varied distribution including examples in the south and east of Britain (Figure 9.10). On the continent the examples recorded by Geisler (1978, Tafel 9) predominantly occur in Pannonia.

Perhaps most significantly, no examples of this type in Britain have yet been recorded from military sites, three are recorded from urban sites (Winchester and Silchester), and one from both nucleated and rural settlements. While recognising the limited sample size, this type has been defined as an eastern provincial type. Might this suggest the late Roman bureaucracy or suggest the *comitatenses* were billeted in towns?

Type D (Western Provincial variant)

Spatially the distribution of Type D spurs is widespread but there is a clear emphasis along Dere Street and the northern frontier as a whole (Figure 9.11). Examples also occur in the south of Britain in the environs of Winchester and Cirencester. On the Continent, examples of this type occur on the Rhine (Giesler, 1978, Tafel 9).

The social distribution of Type D further emphasises the material recorded from military sites (Figure 9.12). A high proportion of Type D spurs recorded from urban and nucleated sites are also located in the northern frontier. This suggests that if a particular form of spur could be linked to the late Roman *comitatenses* it would be the Type D.

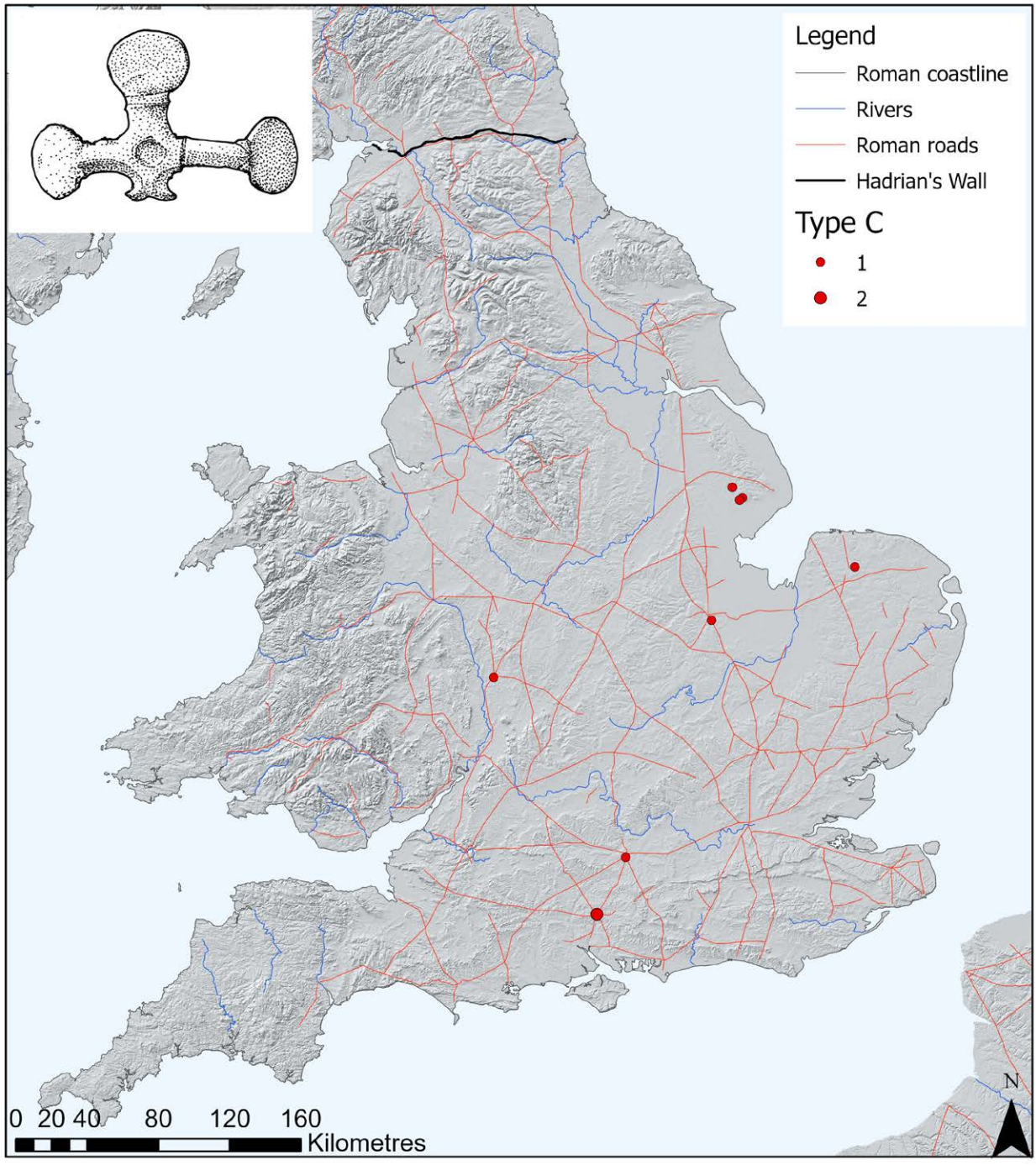


Figure 9.10 - The distribution of Type C spurs (Eastern Provincial variant)

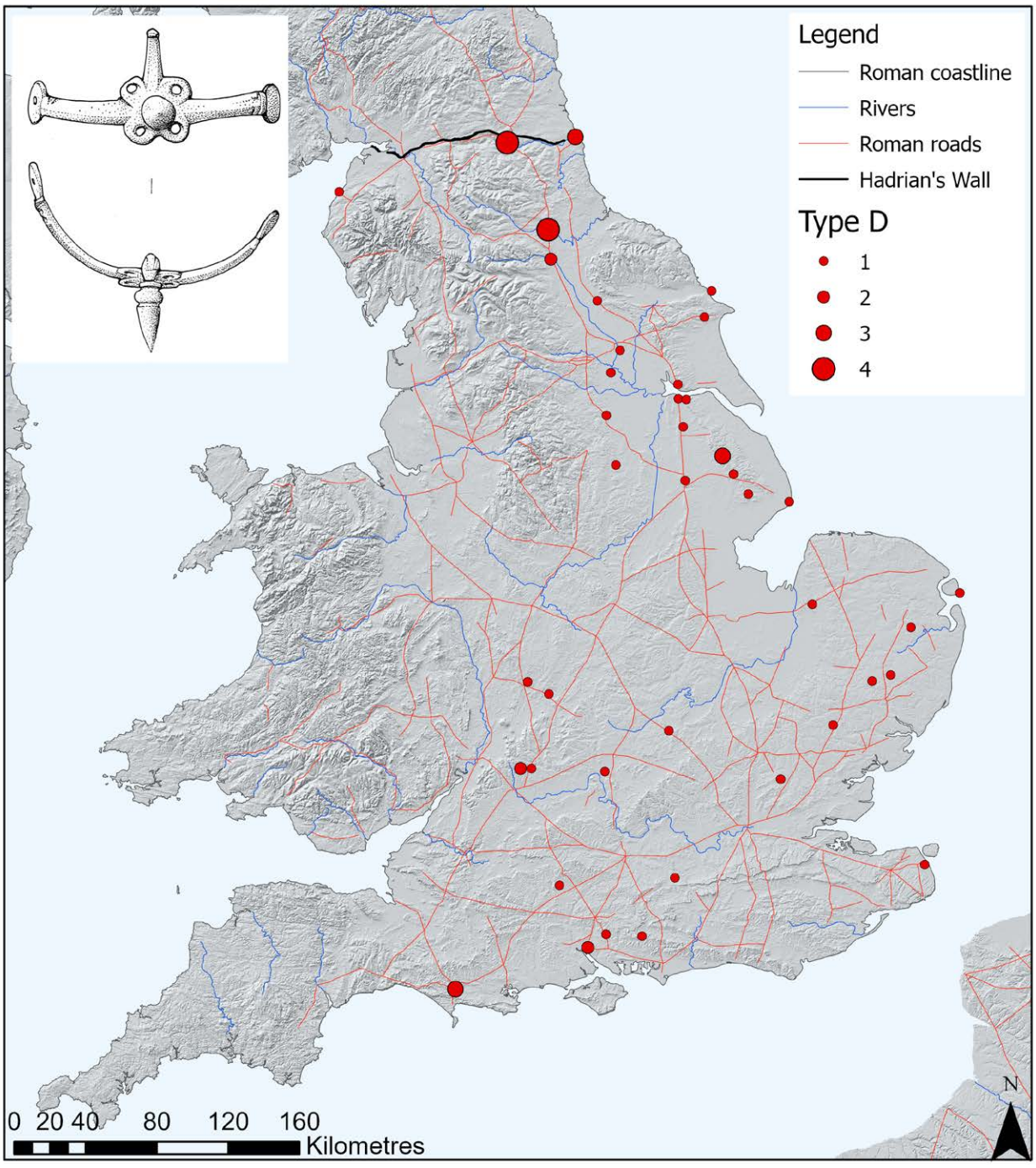


Figure 9.11 - The distribution of Type D spurs (Western Provincial variant)

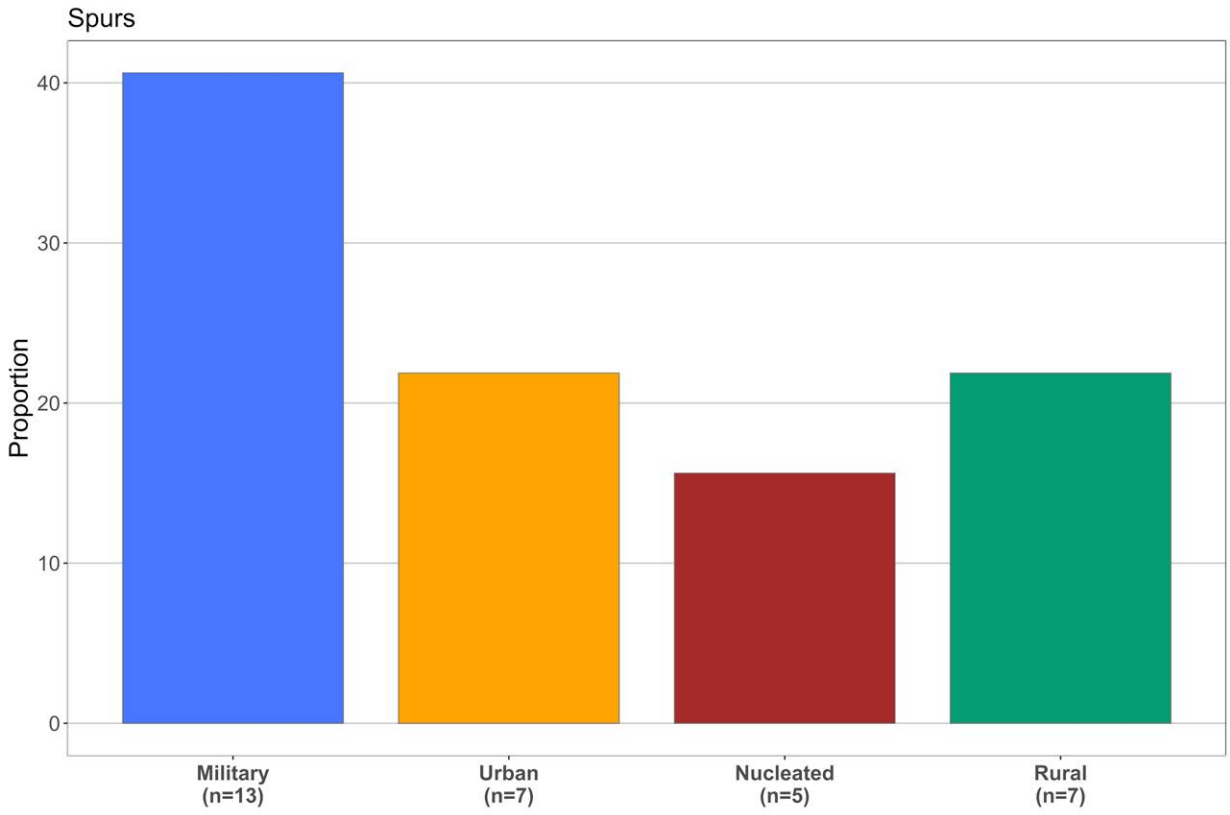


Figure 9.12 - The social distribution of Type D rivet spurs (n=32)

Continuation into the fifth century

The evidence suggest that spurs appear in the final quarter of the fourth century and it has been argued primarily should be linked with the late Roman military. Given this link, it is significant that no examples are recorded which date from AD 425 onwards or occur in Anglo-Saxon graves. This appears to support the argument that either all or the majority of the units in Britain (particularly the *comitatenses*) were not present for long after AD 400.

Key observations

Both Type C and Type D spurs appear to be late Roman introductions in the last third of the fourth century. The spatial distribution of rivet spurs considered in this corpus further emphases the conclusions made by Worrell (2004), Cool (2010a) and Fleming (2021) which highlight the importance of the northern distribution. Spatially these objects have a North-eastern distribution with major concentrations in Yorkshire and Lincolnshire. Of crucial importance are the concentrations on Dere Street with six examples recorded from Piercebridge. The distribution generally is focused on the major roads and emphasises mobility (Moorhead and Stuttard, 2012, 216).

- It has been argued that the status of these objects is equivocal and potentially linked to the hunt. The analysis with the strong urban and military emphasis does seem to suggest that these objects should be linked with the late Roman state.
- Unlike crossbow brooches and belt fittings, generally the distribution of spurs from military sites has a northern emphasis rather than along the Saxon shore forts.
- The most common type in Britain is the Type D (Western provincial variant) which forms 90 per cent of the corpus. While examples are known across the diocese, the emphasis is to the north.
- Spurs occur at urban and nucleated sites; none are recorded from the large towns which is likely to be an absence of data. Type C generally occurs in greater proportions at urban and nucleated sites.

- The absence of the eastern provincial (whose distribution focuses on Pannonia) type C at military sites is significant. Given it has been argued that the *comitatenses* were billeted in towns perhaps this is unsurprising.
- When this corpus is compared with the distributions collated by Giesler (1978) we can note that both Type C and D occur in Britain in greater numbers. There remains a key emphasis of Type D (which generally occurs in the Rhine frontier) in Britain. In the past four decades the continental corpus is likely to have increased.
- No examples date from after the first quarter of the fifth century and none are recorded from Anglo-Saxon graves. This is significant and suggests specific units were not based in Britain after c. AD 400.

Hilary Cool has suggested that spurs perhaps date to after AD 370 (2010b), the number of dated examples is limited but generally supports this suggestion. Given the absence of other forms of late Roman material culture and the limited quantities of spurs from Britain it seems perhaps a late date of c. AD 390 is pertinent and perhaps the uniforms worn by those who used these objects differed to other groups linked with the late Roman state. If the suggestion that these objects perhaps date to the last decade of the fourth century or later, their different distribution might also offer an indication of the movement of specific late Roman troops, potentially the *comitatenses* and officials at the very end of the Roman period in Britain.

10. Penannular Brooches

Penannular brooches are a simple form of dress fastener used to fasten tunics which were in use from the late Iron Age to early-medieval period with little typological change (Booth, 2015). They are constructed from a hoop of metal with two terminals and a pin (Allason-Jones, 2010; Booth, 2015). The majority of surviving examples are produced from copper-alloy, although silver and iron brooches are also known. They form a greater proportion of site brooch assemblages in the late Roman period when compared to the first and second centuries (Allason-Jones, 2010; Collins, 2010).

Typological studies

The principal typology was developed by Fowler (1960). She assigned penannular brooches to seven groups and 33 sub-groups based on terminal design. This typological approach is generally the basis of recording penannular brooches in Britain but Mackreth suggested that further features such as the decoration on the hoop and terminals also warrant consideration (Mackreth, 2011; Booth, 2015).

Booth (2015) reassessed and revised Fowler's typology identifying a range of groups and sub-groups in Fowler's broad framework. This revised typology highlighted in Figure 10.1 indicates the chronological period when a particular type emerges.

For the late Roman period the key revision is that the form previously defined as a type D7 by Snape (1993) and H4 by Fowler (1960) has been reclassified as Type M. It has been described as a late Roman variant and as restricted to late Roman military sites in the northern frontier (Cool, 2000; Collins, 2010).

Typological approach used

The corpus will follow the typology developed by Fowler and refined by Booth (2015). The longevity of the types detailed in Figure 10.2 highlights the challenges faced. Types A, C, D, E and M will be considered in this study as the principal late Roman types.

Production

The forms of a number of penannular brooch types changed little over a millennium creating chronological challenges. The work by Booth (2015) highlighted that there were two periods of high deposition of these brooches from c. AD 1-150 and c. AD 300-450 (Figure 10.2).

Distribution

Discussions of the distributions of penannular brooches focuses on typology rather than chronology. Each type has a distinctive distribution that generally persists throughout the period each type is used; Booth links this to the region of manufacture (Booth, 2015, 311).

The distribution of Type C is almost exclusively to the south, South-West and East of England (Figure 10.3, top left). They are recorded in greatest numbers from towns and also rural sites, few are recorded from military sites (Booth, 2015, 140).

The principal concentration of Type D brooches occurs in the South-west (Figure 10.3, top right). The majority are recorded from towns, villas, hillforts, and some military sites. Booth (2015, 148) notes few are from rural settlements and that Type D brooches are also found in higher than average quantities in North Lincolnshire.

Type E is more widely distributed across the country and chiefly derives from towns, military sites, and wider settlements (Figure 10.3, bottom left). Booth (2015, 173) noted that these sites are generally those with evidence of late or post-Roman occupation. Collins (2010, 71) emphasised that with the exception of an example from Edinburgh all Type E brooches from his study area were found inside the frontier at military sites and noted their absence from York.

The Type M distribution is generally restricted to military sites and urban centres such as Birdoswald, South Shields, Piercebridge and York (Figure 10.3, bottom right). They might be a feature of sites with fifth century occupation as they have a relatively short chronology in the late fourth and fifth century (Cool, 2000; Collins, 2010; Booth, 2015, 179).

Status and identity

Booth (2015, 322) suggested that the floruit in the fourth century may suggest a change in meaning highlighting similarities in the distribution of Type E penannular and crossbow brooches. In southern Britain the use of

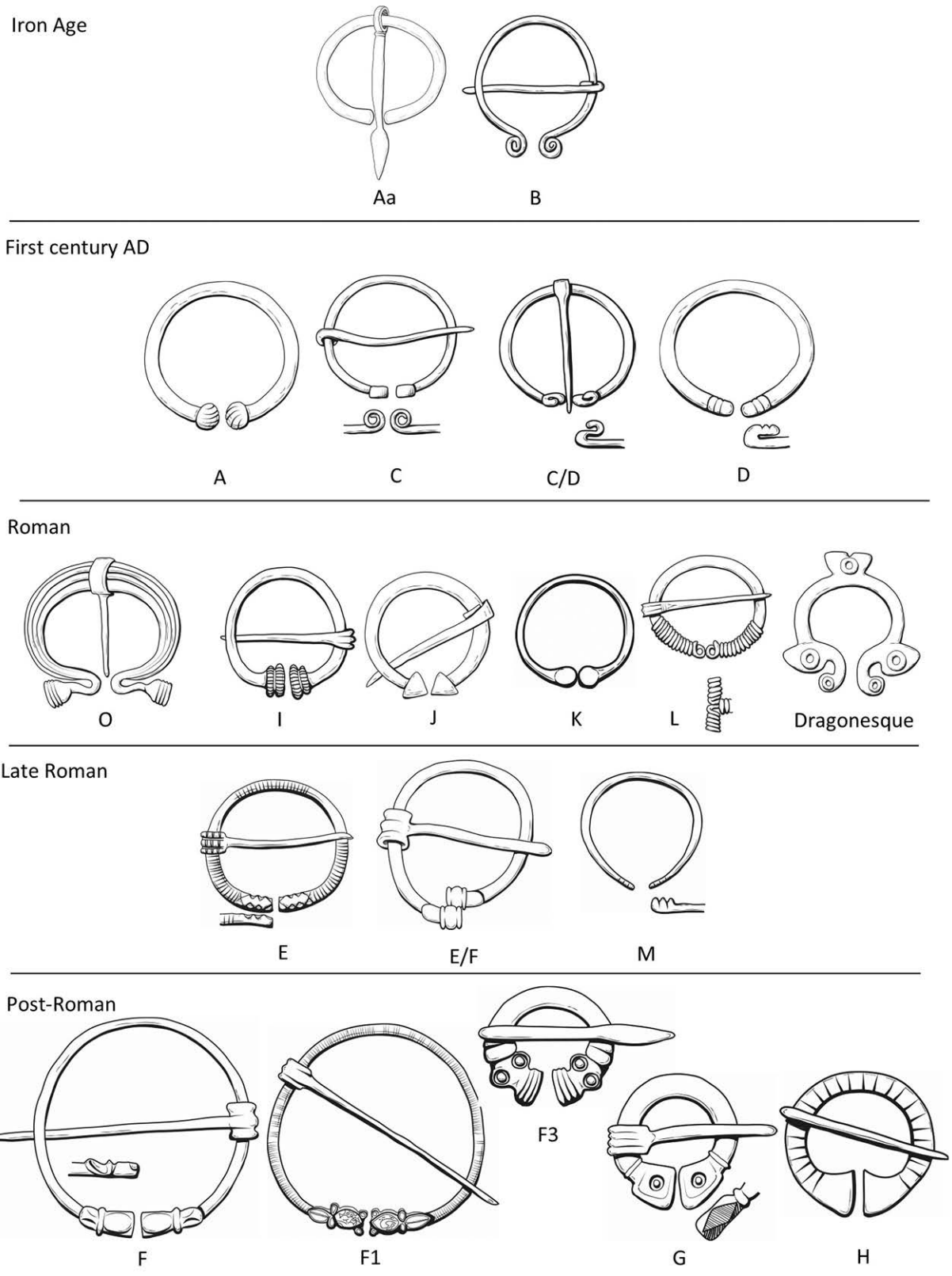


Figure 10.1 - The revised penannular brooch typology by Booth (2015, Figure 4.42)

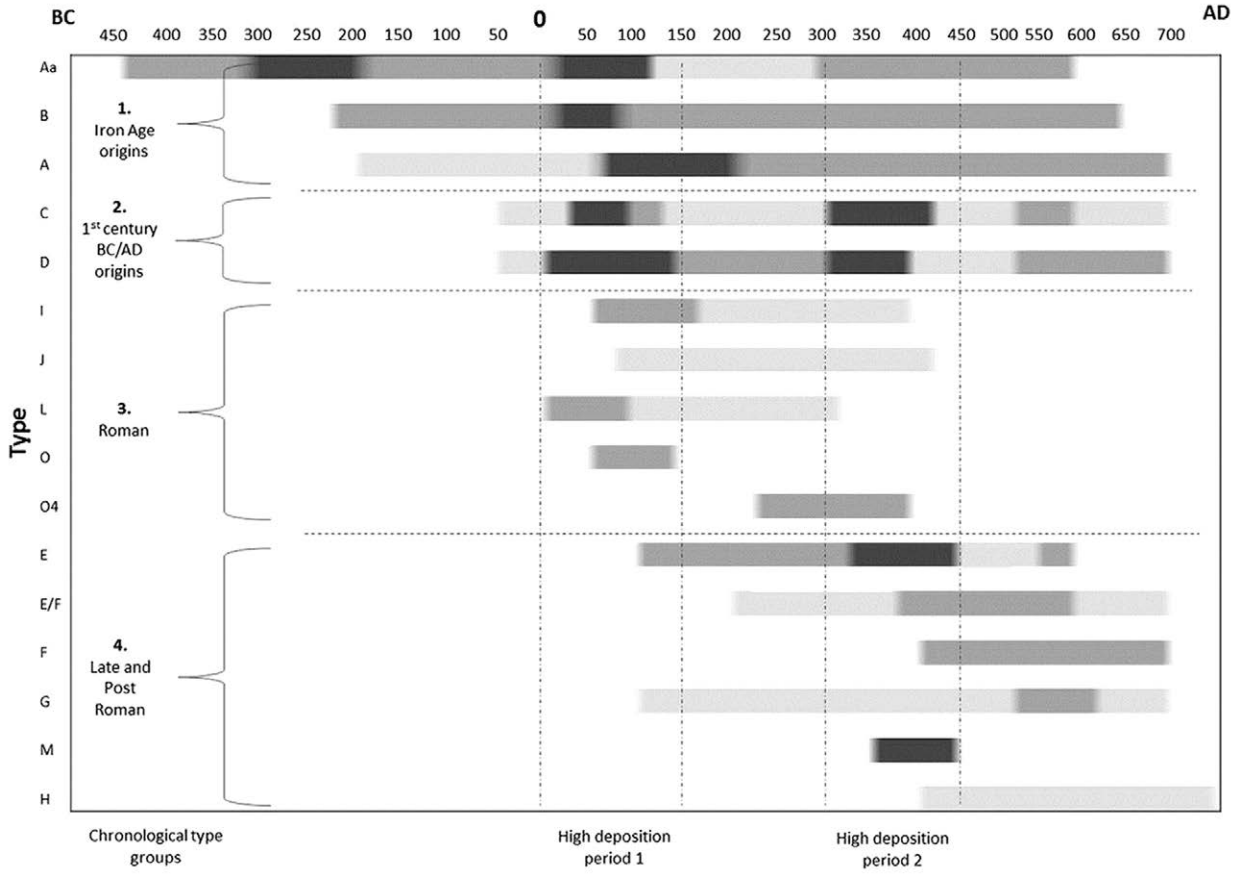


Figure 10.2 - Comparative chronology of all penannular brooch types considered by Booth (2015, Figure 4.40). The darker areas represent higher quantities.

penannular brooches perhaps became more exclusive and may have been restricted to certain social groups (Booth, 2015, 320).

Collins (2010, 68) citing continental furnished graves, argued penannulars were worn singly on the shoulder by men with military equipment suggesting they were part of military uniform. He concluded that in northern Britain the reduction in continental contacts and material culture led to an opportunity for a local frontier culture to develop (Collins, 2010, 73).

Continuation into the fifth century

Unlike early-medieval examples Roman penannular brooches tend to be uniform in the material used to construct both the body and the pin (White, 1988; Collins, 2010; Swift, 2014). Those from secure Roman contexts which are constructed from different materials are likely to be evidence of repairs (Swift, 2014).

As the various types had particularly long lives often spanning almost a millennium continuation into the fifth century will not be analysed here.

Research Questions

Penannular brooches will be compared with belt fittings and crossbow brooches to consider the conclusions made by Collins (2010) and Booth (2015). Are there correlations or variations in their distribution, for example Booth (2015, 322) has highlighted a similarity in the distribution of Type E and crossbow brooches.

As has been emphasised these objects have long chronologies but the types are considered as a whole rather than dividing by period. Undertaking spatial and social analysis based on period provides a novel opportunity to evaluate variations in the types chronologically. Here the comparison will focus on early and late Roman examples of each type to critique the arguments presented by authors such

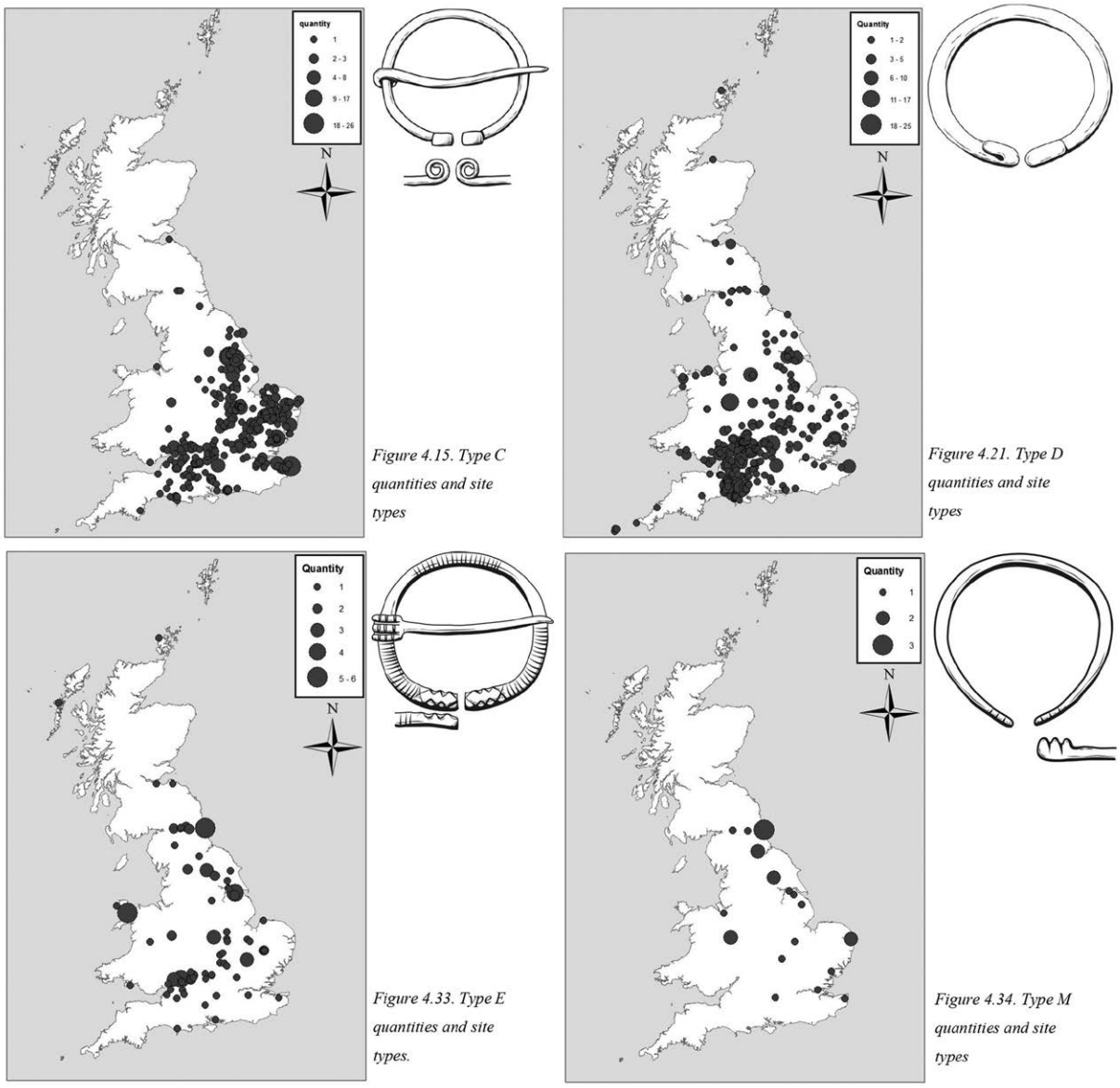


Figure 10.3 - The distribution of Types C, D, E and M within Booth's (2015) corpus. Type C and D both occur from the first century BC with major peaks in deposition in the first and fourth centuries AD; Types E and M have later fourth and early fifth century peaks. Note the inconsistency in graduation

as Collins (2010) and Booth (2015) and evaluating if we can discern changing use over time based on the proportions of type from the settlement hierarchy and their spatial distribution.

The dataset

The corpus collated by Booth (2015) which incorporates the data from Mackreth (2011) and the PAS will form the majority of the brooches considered as part of this study with a small number of examples from the RRS. Only closely dated typological groups or well dated examples from archaeological contexts will be included as part of this study (464 penannular brooches in total; the dataset is available on the ADS - https://doi.org/10.5284/1090416).

Analysis and Results

Here the main types considered as part of the study will be evaluated through a comparison of proportions of each type divided by early Roman and

late Roman assemblages followed by social analysis, correspondence analysis and an analysis of each type.

While the timespan of particular types has been highlighted we also face issues regarding residuality. With penannular brooches this can be caused by the contexts from which they were recovered (primarily from the fills of pits and ditches rather than occupation phases) as well as curation (White, 1988; Booth, 2015, 305; Henry, 2021b). Similarly, as observed in Chapter 6, the social categories assigned as part of this project might not reflect the category in the early Roman period.

Penannular brooches by context date

The initial analysis of the results considers the variation which occurs between all of the recorded penannular brooches from Roman contexts followed by the early Roman penannular brooches and late Roman penannular brooches spatially and socially to evaluate if we can discern a change in use over time. The assigned date for each brooch is derived from the date of the archaeological context it was recovered from. The chronological division to AD 260 (Early Roman) and from AD 260 (Late Roman) has been chosen as the vast majority of penannular brooches either date to the first and second century or the fourth century floruit. Initially this will be compared with all Roman examples. The two broad phases allow for the major chronological distinctions to be compared.

All Roman penannular brooches

A corpus of 454 Roman (including 269 early Roman and 161 Late Roman examples) has been collated primarily using the data from Booth (2015). Although the initial discussion will evaluate a broader range of types, the main focus of this analysis will be the key late Roman types: Types A, C, D, E and M (Type M is solely a late Roman type).

Penannular brooches from Roman contexts have been recorded from 155 sites. The examples are widespread across Britain with significant quantities recorded from the South-west including South Cadbury hillfort, as well as sites such as Richborough, Castleford and Wroxeter (Figure 10.4).

The corpus has been divided into military, urban, nucleated, rural and other (primarily consisting of hillforts). Five or more penannular brooches from Roman contexts are recorded from 27 sites with more than 20 examples recorded from South Cadbury Hillfort, Richborough, Castleford and Wroxeter (Figure 10.5).

Penannulars from early and late contexts

A total of 271 Penannular brooches from contexts which are defined as Early Roman (before AD 260) were recorded from 108 sites. In total 162 Penannular brooches were recorded from contexts defined as Late Roman (after AD 260) from 77 sites. The greatest quantities of Early Roman penannulars occur in Dorset, in the Midlands and in the North of Britain (Figure 10.6, Centre). In the Late Roman period penannular brooches can be seen at sites along the Fosse Way in the South-west as well as North Lincolnshire and Northamptonshire (Figure 10.6, Right).

In the Early Roman period Types D, A, C and O are the most common types and Types D and A form over 60 per cent of the corpus (Figure 10.7). In contrast in the late Roman period Type C and D form the greatest proportions followed by E, M and A. The results also emphasise chronological variations with some forms, Type O is an early Roman continental type, Type E and M are late Roman.

Spatial and temporal comparison is essential to understand if penannular brooches were used in different ways and by different social groups over time as has been suggested by Booth (2015) and Collins (2010). The distributions of each type spatially and socially will be undertaken at a wider scale, initially considering the settlement hierarchy at a diocesan level; subsequently a consideration of the variation noted in each type will be explored.

Comparison by site type

When relative proportions penannular brooches from Early and Late Roman contexts are compared we can identify chronological patterns. In the Early Roman penannular brooches are recovered from urban, nucleated and rural contexts in broadly comparable proportions followed by other and military sites (Figure 10.8). There is an increase in the number of examples from military sites in the Late Roman period. This could be due to the introduction of new Types (Type E and M) which have a focus on military sites. Collins (2010) linked these types to the frontiers.

Military

Over two thirds of the brooches from this group are recorded from sites in Wales or the other military sites

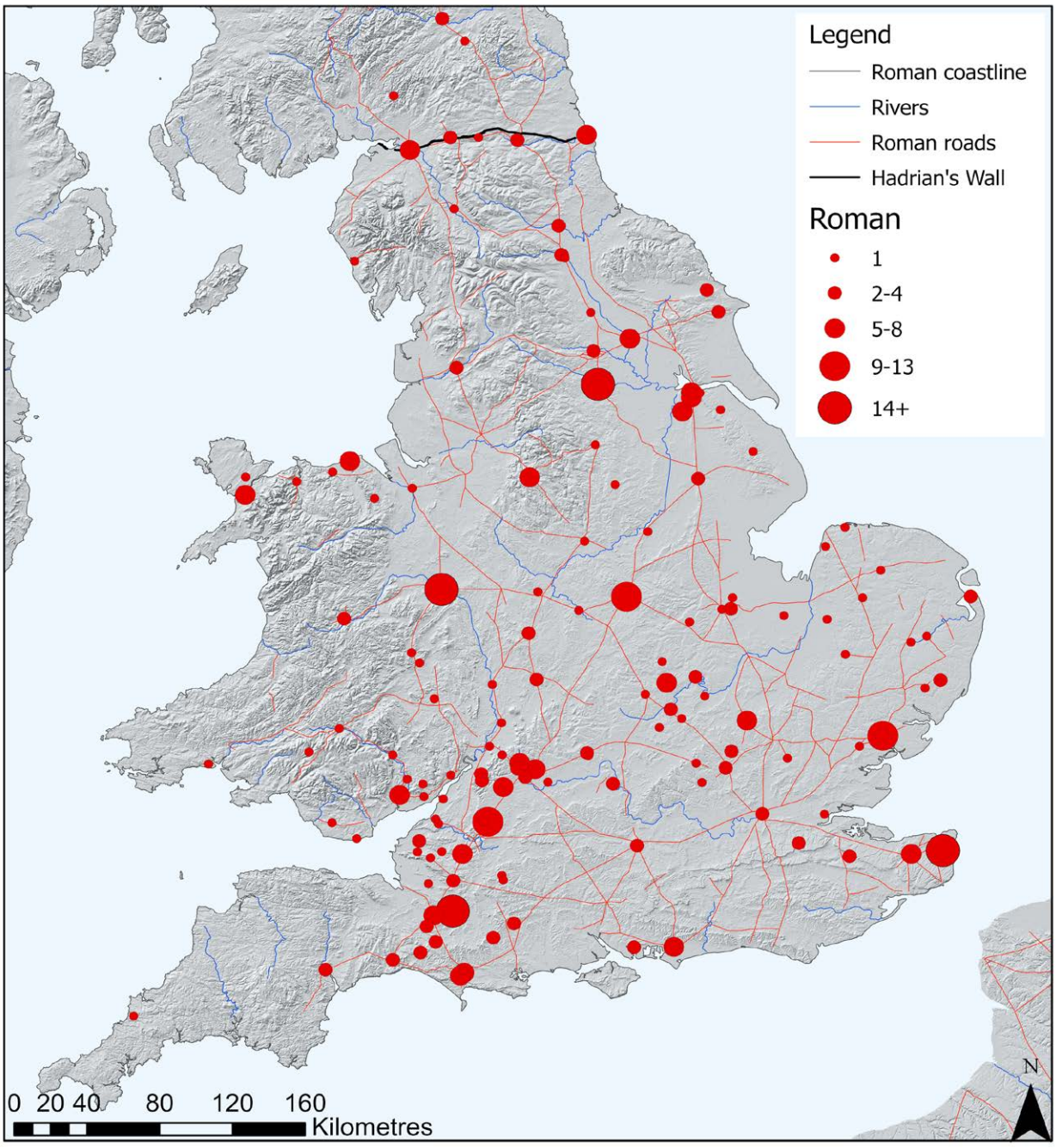


Figure 10.4 - Distribution of penannular brooches from Roman contexts (total =454)

subgroups (Figure 10.9). These sites across Britain include the Antonine Wall. Only a small quantity of brooches is recorded from the early Roman period from Hadrian's Wall or the Pennine forts.

By the late Roman period the Saxon shore forts (particularly Richborough), and Hadrian's Wall form the majority of the corpus. Collins (2010, 73) argued that as continental contacts and material culture was becoming more restricted there was an opportunity for a local frontier culture to develop in the north of the diocese. Although the Type M was a fourth century development, we might expect them in greater numbers if penannular brooches were an important element of such a culture.

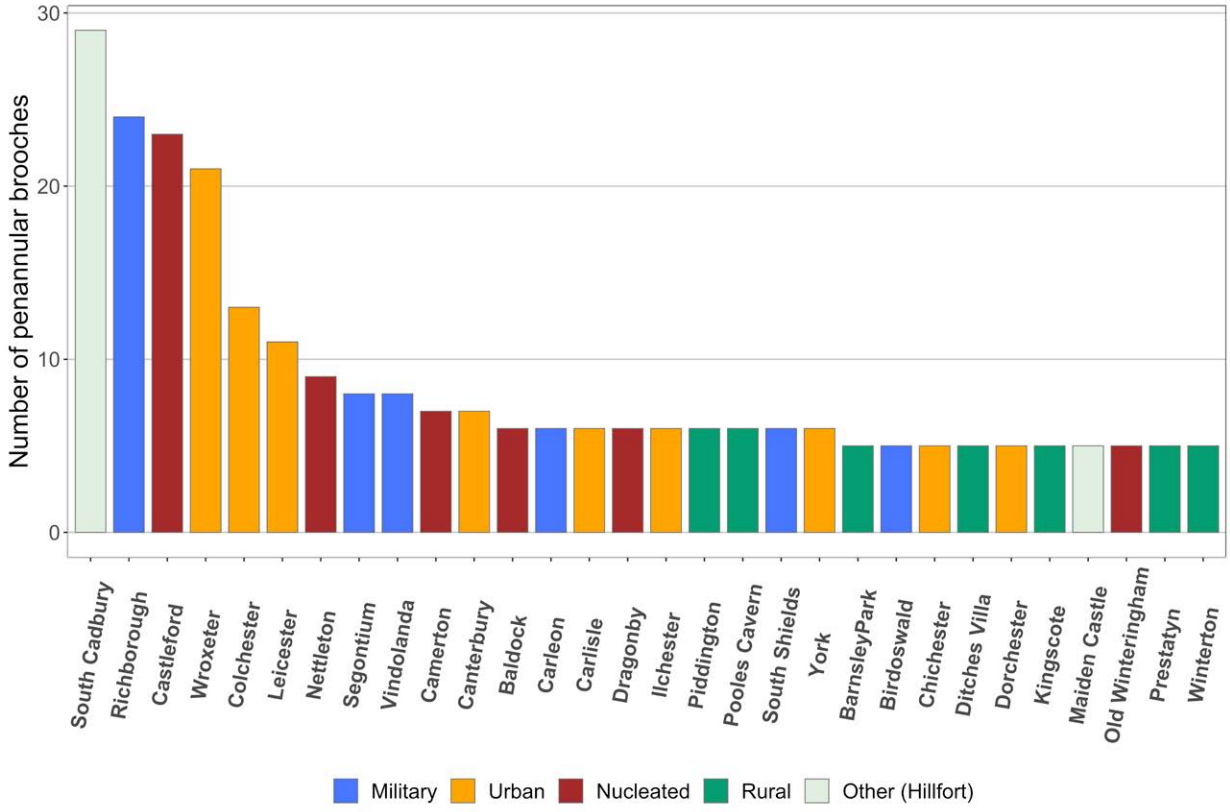


Figure 10.5 - The quantity of penannular brooches recorded from individual sites (with a minimum of five examples).

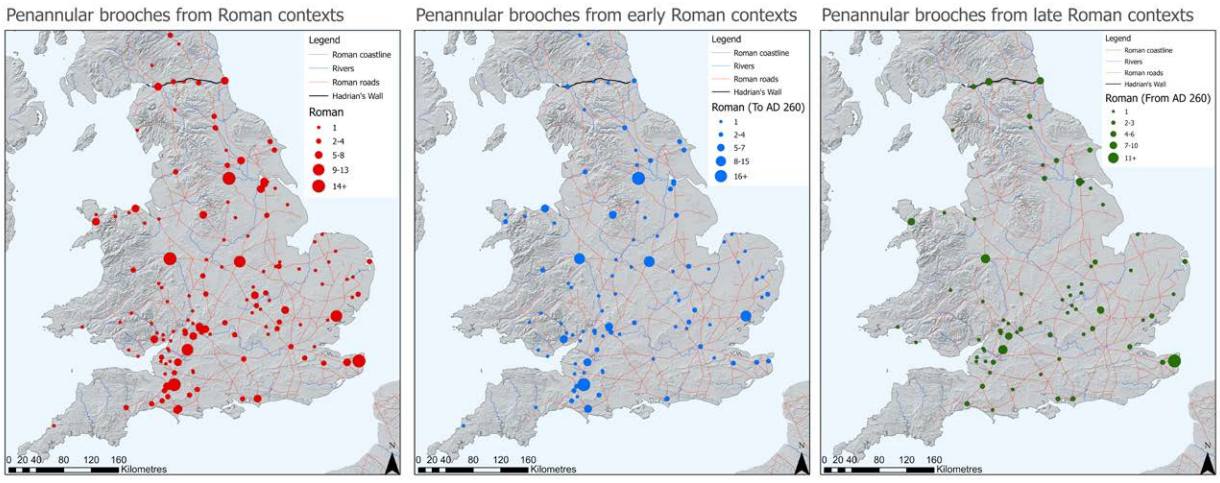


Figure 10.6 - Distribution of penannular brooches from all Roman, early Roman, and late Roman contexts

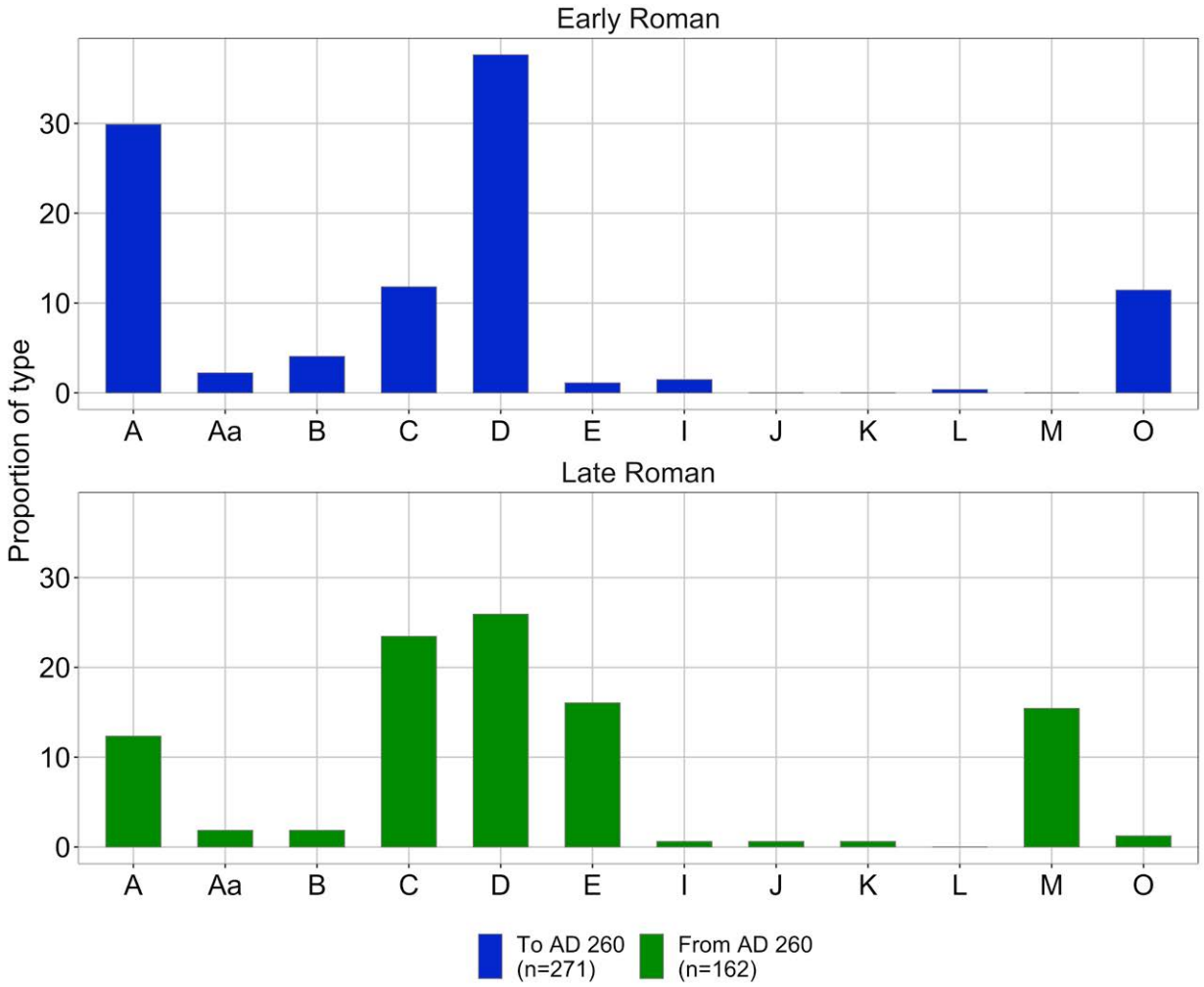


Figure 10.7 - Comparison of the proportions of each Penannular brooch type from Early Roman and Late Roman archaeological contexts.

Urban

In both the Early and Late Roman corpora penannular brooches from *civitas* capitals dominate assemblages from urban sites, forming over three quarters of the urban corpus (Figure 10.10).

Nucleated

Early Roman penannular brooches occur in broadly similar proportions on undefended settlements and sites which became fortified in the Roman period (Figure 10.11). Such fortifications often were constructed in the later Roman period.

In the later Roman period only 20 per cent of brooches from nucleated sites occurred at defended *vici*. Given it has been argued that the social and economic groups who wore these objects changed over time, this change in distribution is significant, arguing against strong associations between the majority of penannular forms and the military.

Rural

Early Roman penannulars are most commonly recorded at villas, farmsteads, enclosed farmsteads and religious sites (Figure 10.12). By the Late Roman period villas account for a significantly higher proportion of the assemblage. The reduction in the quantity of

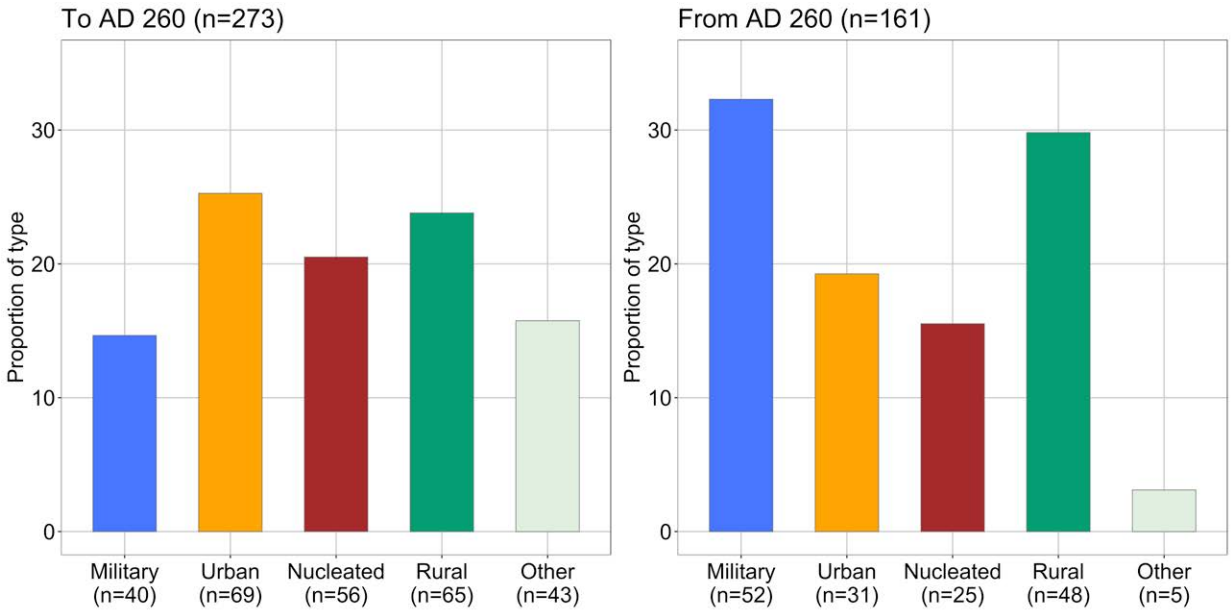


Figure 10.8 - Comparison of the social distribution of penannular brooches from early and late Roman contexts. The other category defined here is primarily hillforts.

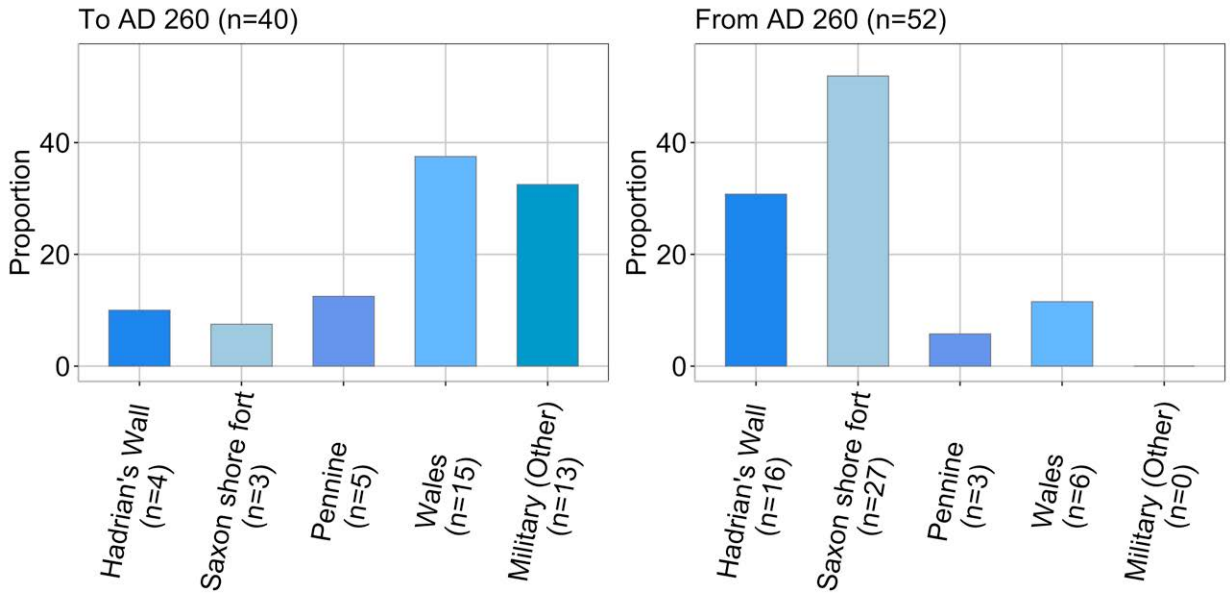


Figure 10.9 - Comparison of early and late Roman penannular brooches by military sub type

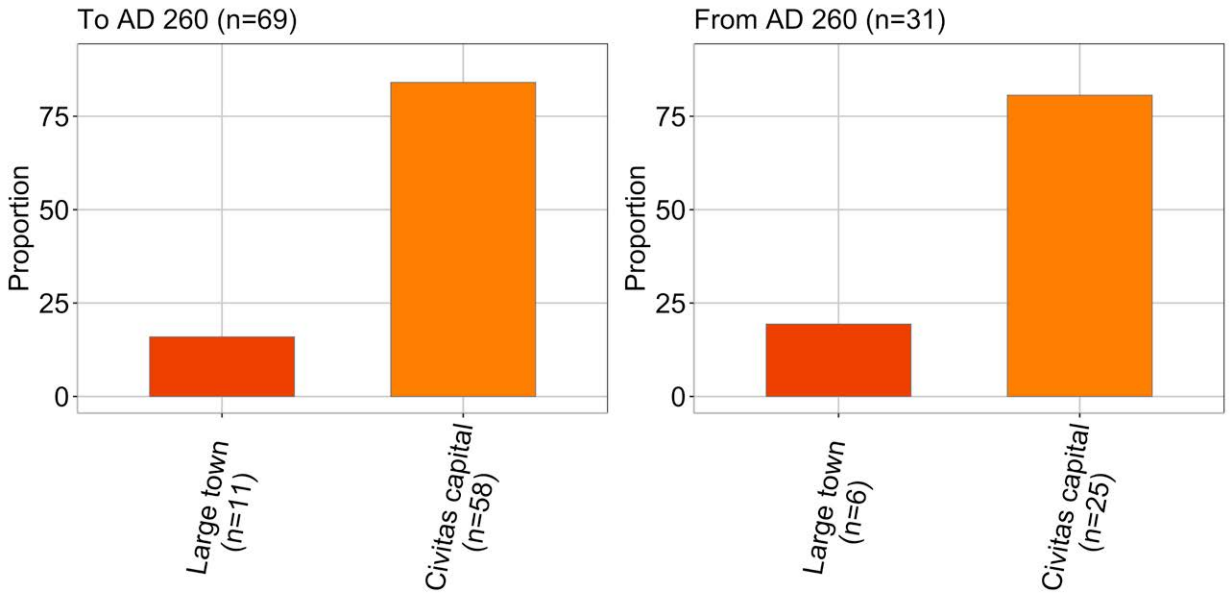


Figure 10.10 - Comparison of early and late Roman penannular brooches by urban sub type

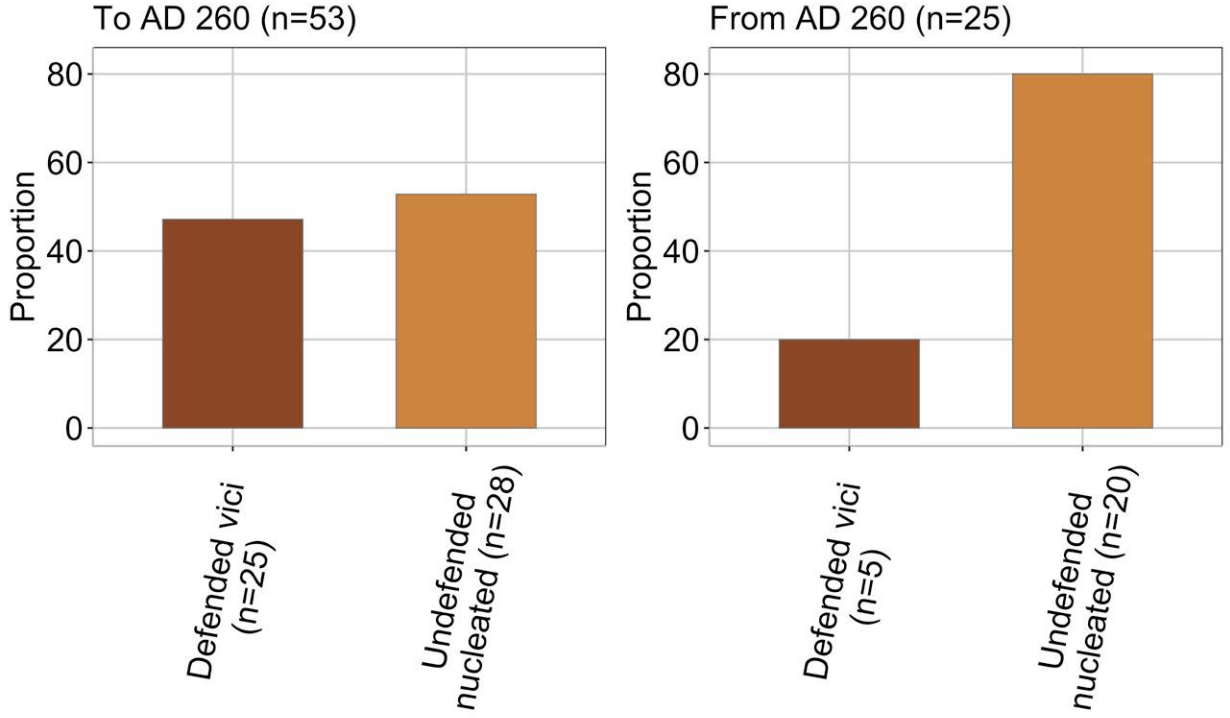


Figure 10.11 - Comparison of early and late Roman penannular brooches by nucleated settlement sub type

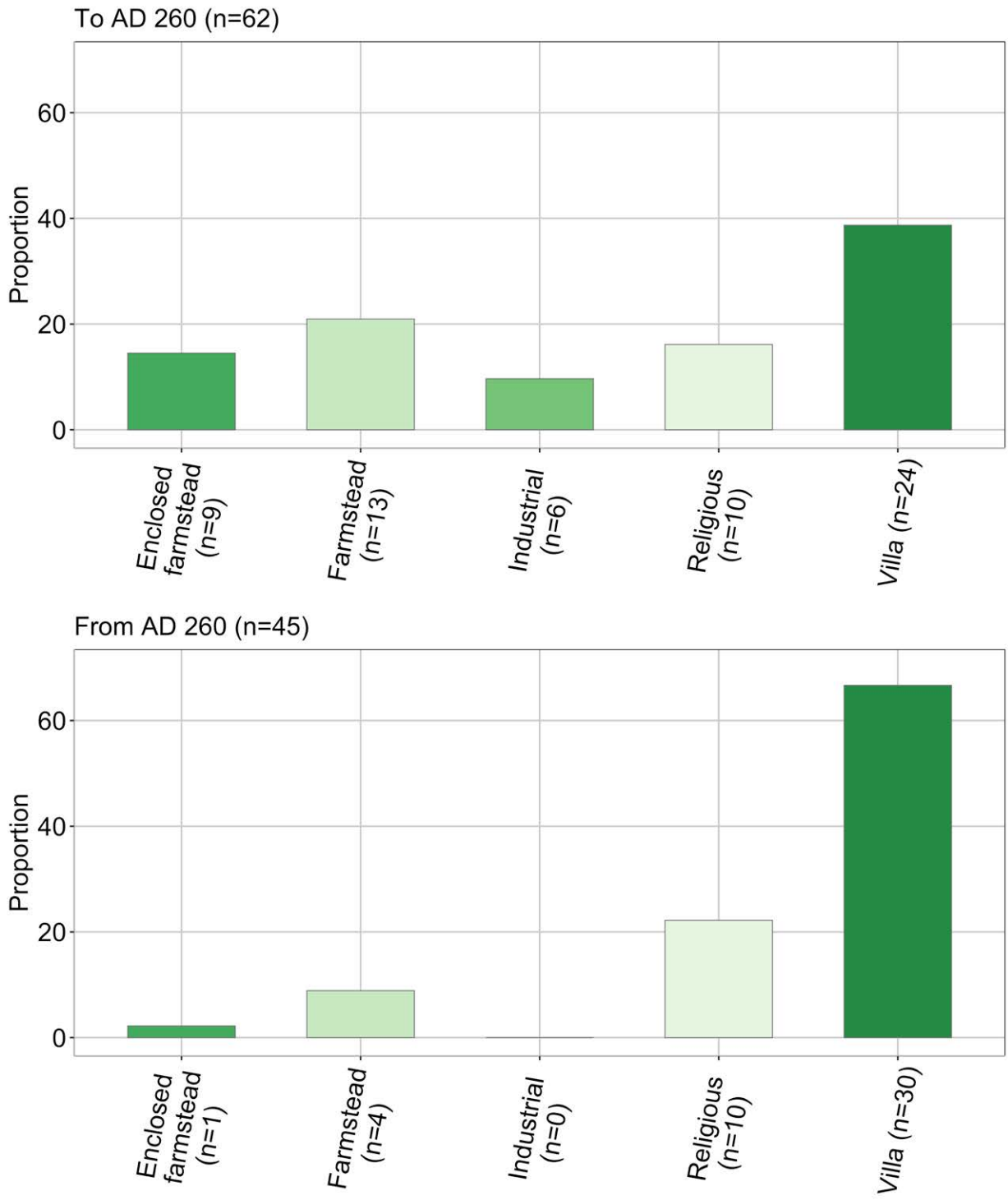


Figure 10.12 - Comparison of early and late Roman penannular brooches by rural sub type

examples recorded from enclosed farmsteads is likely to be chronological (Smith *et al.*, 2016).

Correspondence analysis

This section will consider the correspondence analysis results for all Roman penannular brooches from the various site types and sites with at least five examples. Subsequently Early and Late Roman examples will be considered focussing on specific types to allow for comparison.

When all penannular types from Roman contexts are considered, the complexity caused by continued use over time periods with drastic social and political change leads to unclear patterns within the data (Figure 10.13). Sites such as Camerton, Baldock, and nucleated settlements as a whole cluster together. Other groups include Colchester, forts, military sites in general and Hadrian's Wall. The results underline the complexity of how penannular brooches were used over time but also masks the changing chronological trends seen in the analysis above over time illustrated in this chapter.

Early Roman

It has been shown that Types A, C, D and O occur in highest proportions in the Early Roman period (See Figure 10.7). As part of the correspondence analysis these types and Type E (to allow for comparison with the Late Roman examples) have been plotted (Figure 10.14). Type A generally clusters around military sites in the north of Britain. The quantity of Type A brooches from Castleford heavily influences the nucleated (defended *vici*) results in this analysis. Urban centres, rural sites, and military sites in Wales have higher quantities of Type C and D.

Late Roman

In the Late Roman period Types A, C, D, E and M are the most common. Correspondence analysis comparing the Early Roman and Late Roman assemblages suggests that there were changes to the social, political, or economic groups who wore these brooches at a range of sites in the late Roman period (Figure 10.15). Military sites as a whole, Birdoswald, large towns, South Shields and Hadrian's Wall are grouped together due to higher

Figure 10.13 - Correspondence Analysis plot of all penannular brooches of Roman date by type and site type

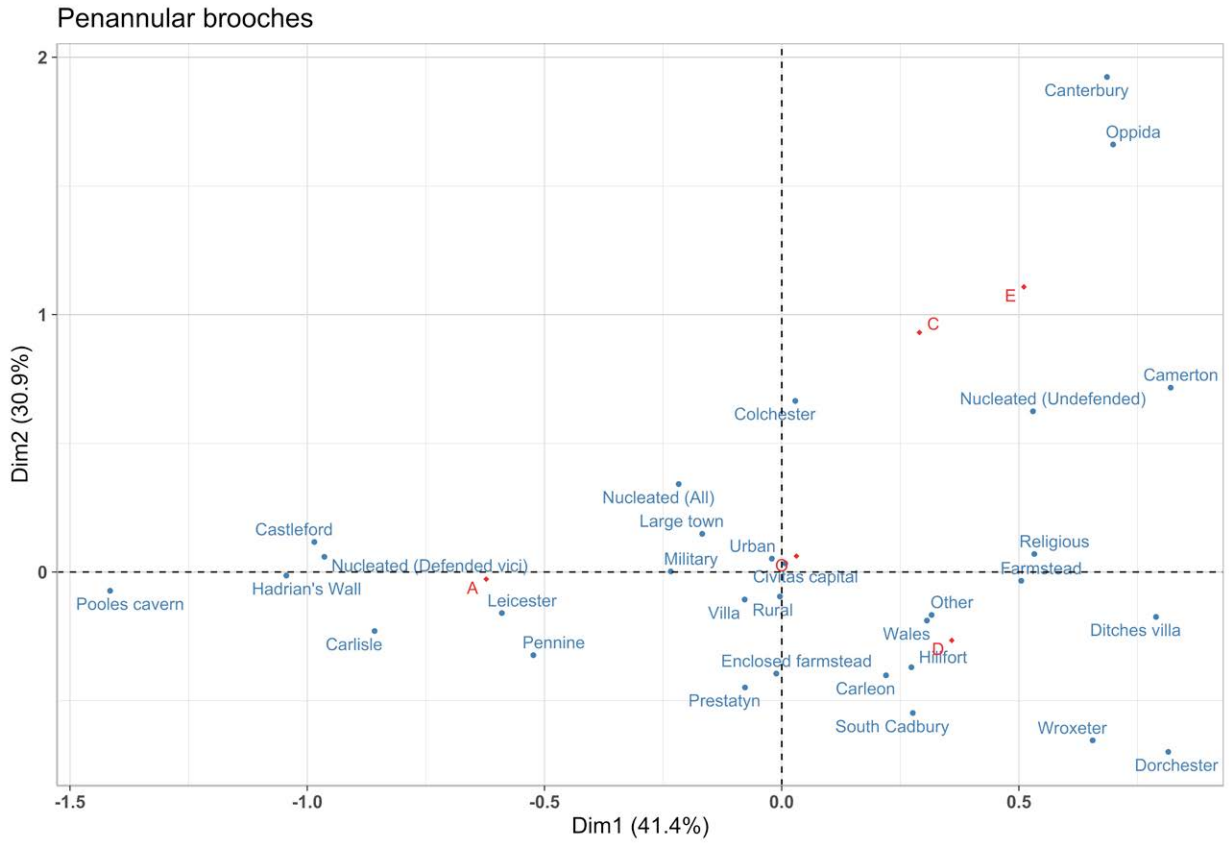


Figure 10.14 - Correspondence analysis of early Roman penannular brooches

quantities of Type E or M. Sites such as defended *vici* and undefended nucleated sites, civitas capitals, urban centres and Richborough have higher proportion of Type A or C. Type D clusters around religious sites, Baldock and Wroxeter.

Correspondence analysis further highlights the variation between the assemblage from the Saxon shore forts and other military sites primarily due to the higher proportions of Type C brooches recorded from Saxon shore forts. The occurrence of high proportions of Type C is a trend seen in urban centres in Britain in general (Henry, 2022b, 73). The majority of urban sites fall into a single cluster again suggesting a stronger military link at sites such as York. The quantity of Type C brooches from Richborough might emphasise the continued use of the town and links between the urban centre and the fort (Wilmott, 2017; Breeze *et al.*, 2022).

Comparison by brooch type

This section will consider Type A, C, D, E and M brooches individually to identify any further chronological or spatial trends in the dataset which could offer further insights into this enigmatic object type.

Type A

Type A brooches have mid-Iron Age origins, the principal floruit of the type occurred in the mid-first to late second century AD although they continued in use until AD 700 (Booth, 2015, Figure 4.40). They appear to have arrived in substantial numbers with the military and have previously been viewed as a military type. There is little evidence from their site distributions for which social or economic groups wore these brooches. They could have been worn by soldiers, their families, or other inhabitants. Such challenges faced when considering brooches and gender in military bases has been highlighted by Vincent Van Der Veen (2021).

Early Roman Type A brooches occur in greatest numbers to the north of Britain with a significant quantity recorded from Castleford (Figure 10.16, top left). Late Roman examples occur in far more limited numbers with concentrations in North Lincolnshire,

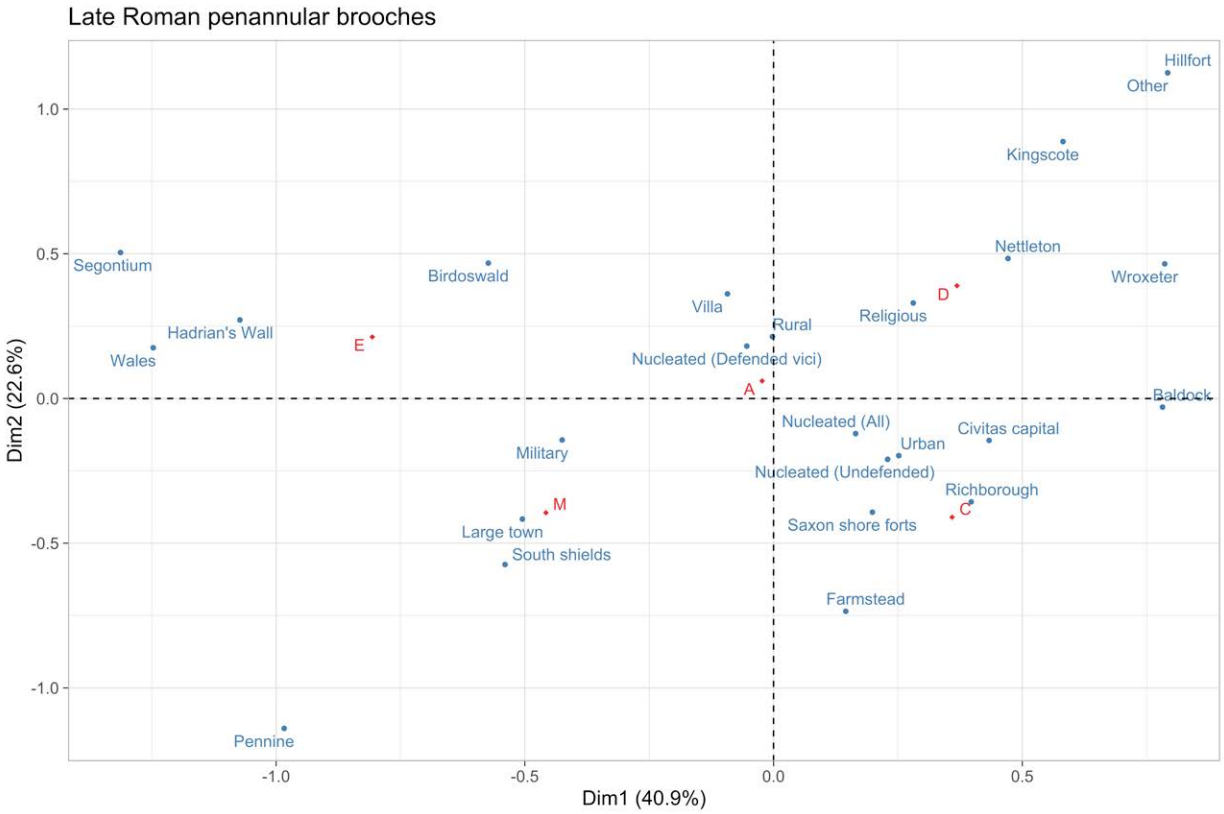


Figure 10.15 - Correspondence analysis of late Roman penannular brooch types

in the environs of Cirencester, Portchester Castle and Richborough (Figure 10.16, top right).

Although it has historically been viewed as a military type it occurs throughout the settlement hierarchy in the Roman period (Figure 10.17, top left). There is an increase in the number of Late Roman examples from rural sites which is significant as previous analysis of this type noted that they were not part of the local repertoire of the rural population in northern England (Booth, 2015, 315). The analysis presented here suggests that this changed over time and these brooches began to be used by a broader range of social and economic groups by the fourth century.

Type C

Type C brooches have late Iron Age origins and the type continued in use until c. AD 700. Major floruits in deposition during the Roman period occurred in the mid- to late first century and in the fourth century (Booth, 2015, Figure 4.40). The core distribution is to the east of Britain (Booth, 2015, 141).

Generally, the distribution of Type C is restricted to the south of the Fosse Way in both the early and late Roman period (Figure 10.16). Late Roman Type C brooches are well represented at Richborough and Canterbury in Kent. Socially, in the early Roman period nucleated sites dominate, in the late Roman period the proportion declined and a substantial increase in the proportion of brooches from military sites – principally this is due to the material from Richborough (Figure 10.17, top right). While the core of the distribution of all Type C brooches may be the east of England, when the examples from early or late Roman contexts are mapped this trend is not visible. The absence could be due to a paucity of well dated examples from East Anglia or it emphasises changes is use occurred over time.

Booth (2015, 319) noted a decline in the general numbers of both Type C and Type D brooches at military sites in the late Roman period which was linked to the de-militarisation of southern Britain. This type primarily occurs at urban centres and villas in the late Roman period. We should perhaps view the

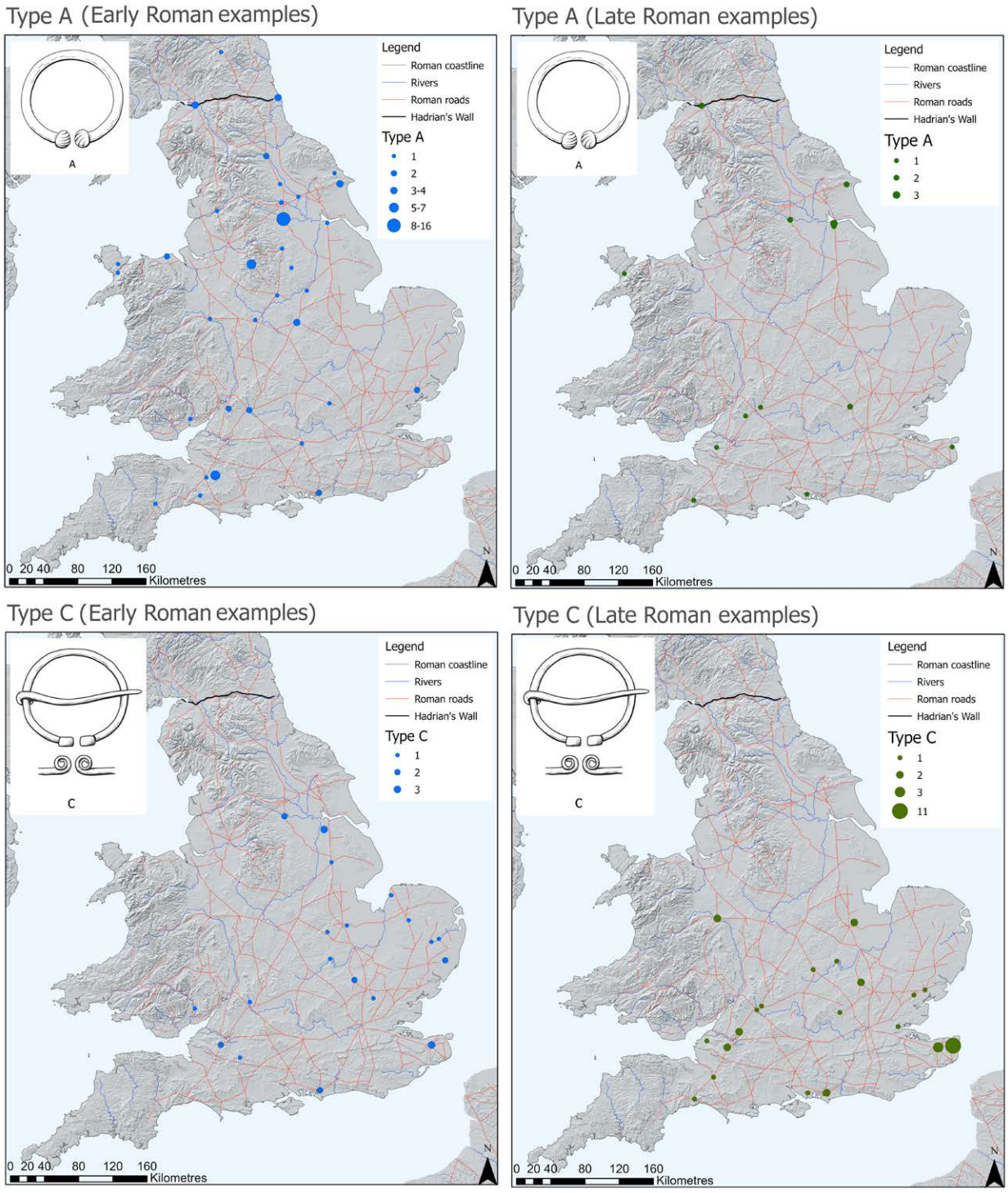


Figure 10.16 - The distribution of penannulars from early Roman (top left) and late Roman contexts (top right) Type A penannular brooches and early Roman (bottom left) and Late Roman contexts (bottom right) Type C brooches.

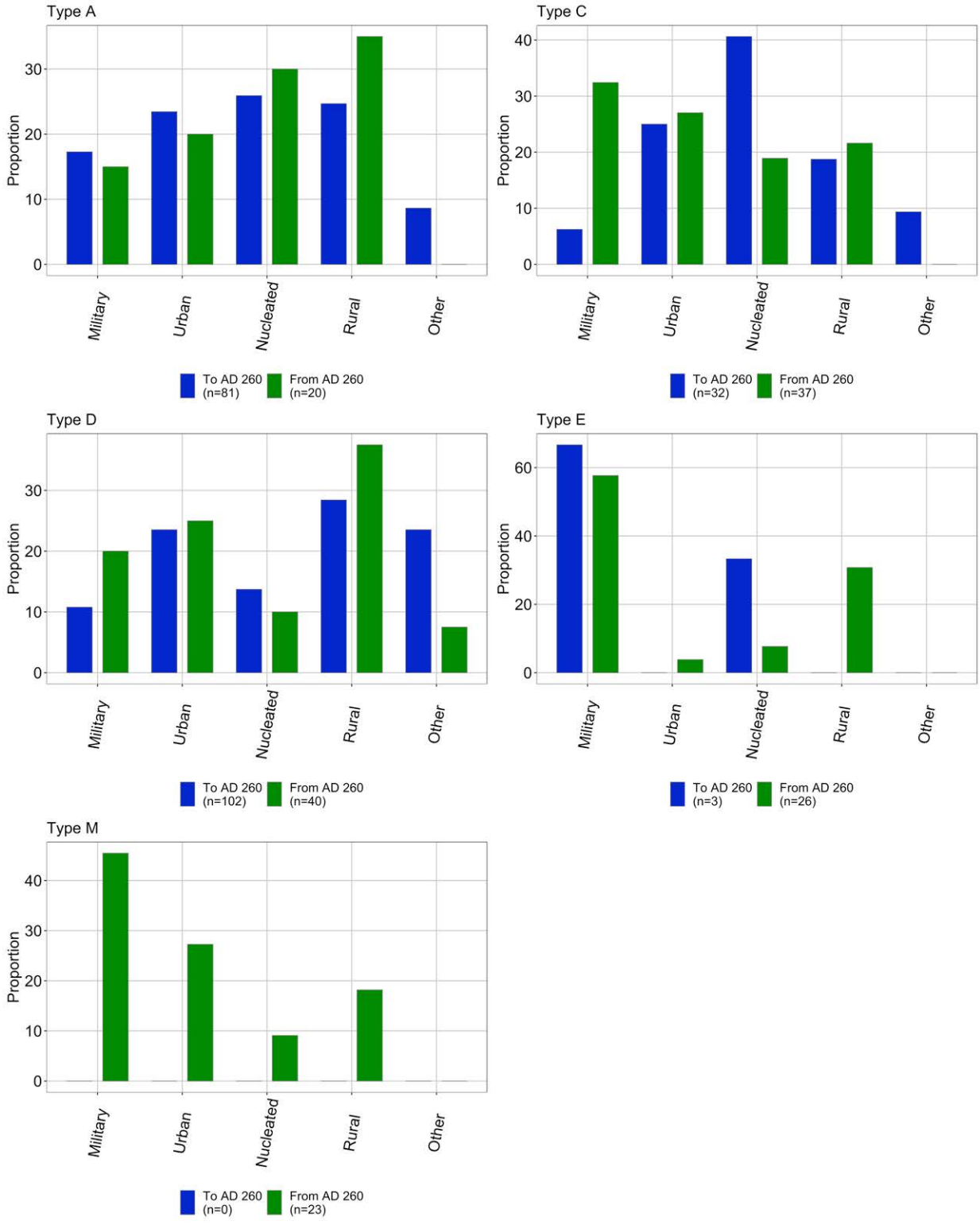


Figure 10.17 - Comparison of the social distribution of early Roman and late Roman Type A, C, D, E and M penannular brooches

assemblage of these brooches from Richborough as evidence that the town or civilian activity (the latter is also suggested at Portchester Castle) continued in use and this type reflects an aspect of urban identity (Cunliffe, 1975; Henry, 2022b).

Type D

Type D has late Iron Age to early Roman origins with floruits in the mid-to late first century and in the fourth century (Booth, 2015, Figure 4.40). Deposition of this type continued to occur until AD 700. Type D is generally seen as a western and South-western type.

In the early Roman period Type D brooches primarily occur in large numbers at sites in the South-west and in western Britain (Figure 10.18, Top left). A similar concentration is noted in the Late Roman period in the environs of Cirencester and Wroxeter – a small number of examples are recorded from Richborough and on Hadrian's Wall.

The proportion of brooches from military and rural contexts increases in the late Roman period (Figure 10.17, Centre left). This is partially due to the decrease in examples from other sites (primarily hillforts). Generally, the core area of Type D distribution and the patterns seen in the social analysis remains broadly constant throughout the Roman period. This contrasts with the changing patterns noted with Type A and Type C.

Type E

A small quantity of Type E brooches are recorded from the early Roman period, but the floruit of deposition occurred in the fourth and early fifth century suggesting that it is actually a late type (Booth, 2015, Figure 4.40). The type continued in use until AD 600. Type E is a comparatively uncommon type with 110 examples recorded by Booth (2015), in contrast 659 Type D brooches were recorded.

Type E generally occurs at rural sites along a central belt between Somerset and Northamptonshire and military sites including Hadrian's Wall, Segontium and Richborough (Figure 10.18). Only three examples are recorded from the early Roman period. In the late Roman period, the greatest proportions of Type E occur at rural sites or military sites (Figure 10.17, Centre right).

Type M

Type M is a late Roman introduction and in use between the mid-fourth and mid-fifth century (Booth, 2015, Figure 4.40). It is an unusual type and only 23 examples have been recorded as part of this study. This type has previously been suggested as a feature of sites with fifth century occupation and a local substitute or alternative to crossbow brooches (Collins, 2010). Type M arguably has the closest distribution to that of crossbow brooches (Henry, 2022b).

The distribution of the type is primarily along Hadrian's Wall and to the east of Britain with multiple examples recorded from sites such as South Shields and York (Figure 10.19). While there is a reduced military emphasis noted as part of this study, military sites still account for over 40 per cent of the proportion of these brooches followed by urban and rural sites (Figure 10.17, Bottom).

Key observations

We face numerous challenges when considering this long-lived brooch type, consequently the longevity of specific forms and evidence of continued use into the fifth century has not been evaluated.

Booth (2015, 303) highlighted the importance of moving away from traditional modes of typological classification of these brooches, and her dataset provides an opportunity to consider these brooches spatially and socially through chronological divisions. Approaching the challenges of analysing penannular brooch types based on the date of the context has demonstrated a range of trends which can be noted when penannular brooches of Roman date are evaluated. Broadly it can be suggested that Types A, C and D appear to have a similar social character in the late Roman period based on the proportions found across the settlement hierarchy. Spatially there remain distinct distributions suggesting regionality in dress accessories.

Collins (2010, 320) suggested that these brooches represented a change in meaning in the later fourth century. Such a change could represent the growing regionality in dress accessories in the late Roman period (Swift, 2000; Booth, 2015). Yet, it should be recognised that the general key regional distributions noted with Type C and D throughout the Roman period remained consistent.

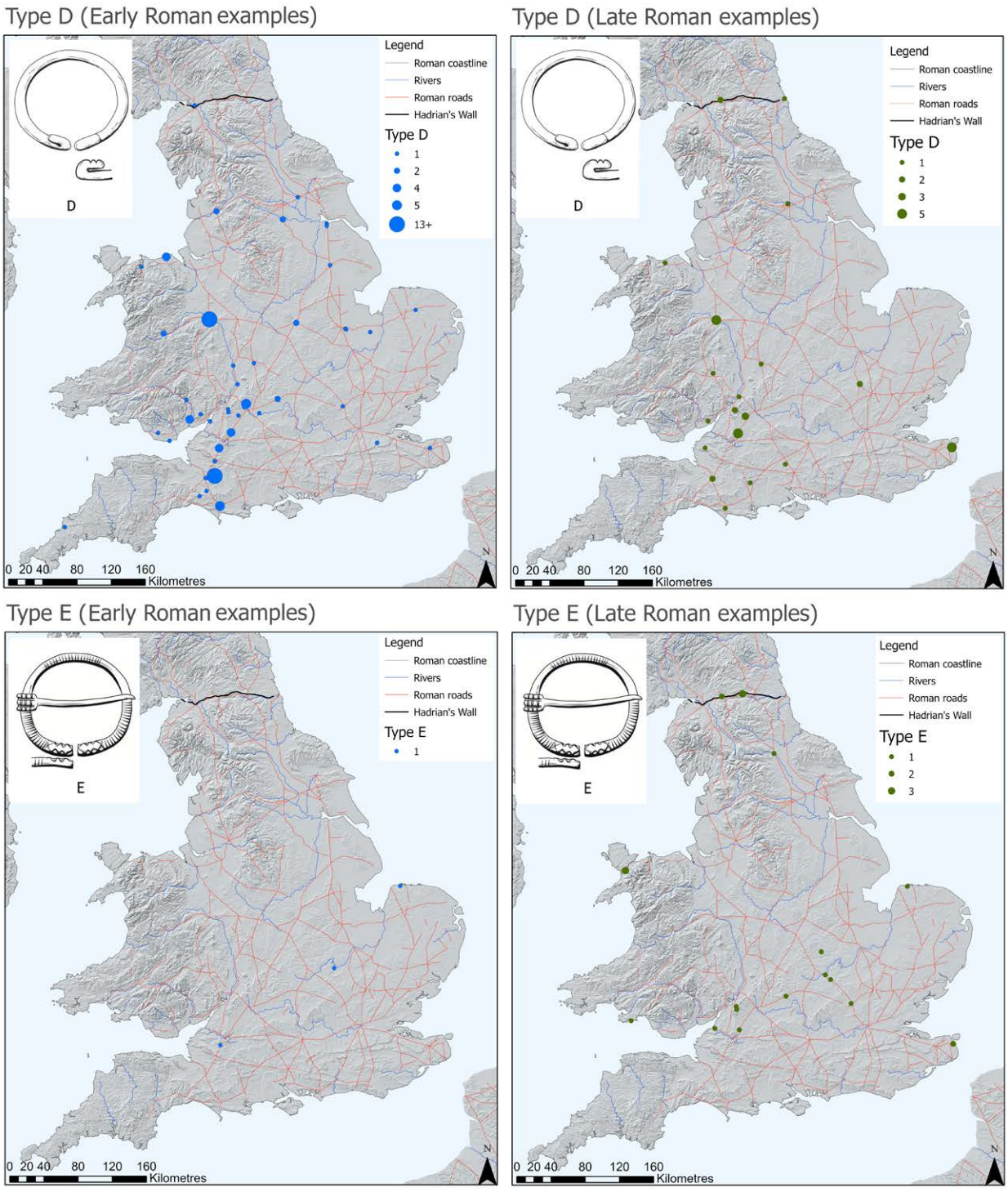


Figure 10.18 - The distribution of early Roman (left) and late Roman (right) Type D and Type E penannular brooches

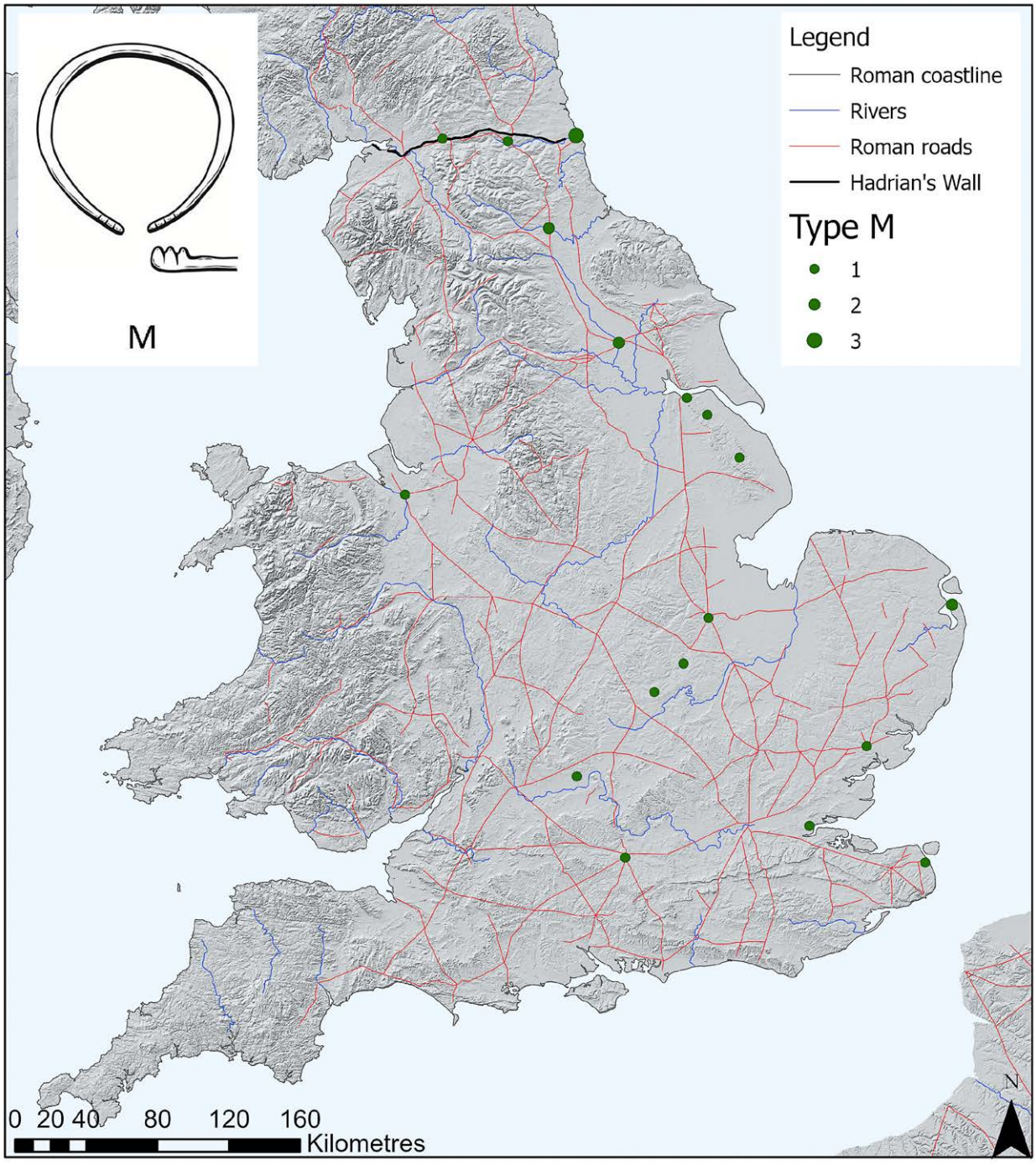


Figure 10.19 - The distribution of Type M penannular brooches

- As Booth (2015) has highlighted the rural distribution of Type E brooches suggests they were worn by wider sections of society rather than as an indicator of a badge of office in a similar fashion to crossbow brooches.
- If a type could potentially be linked to the state in some form based on its distribution it would be Type M.
- The social distribution of penannular brooches at military sites indicates chronological change.
- Richborough has a significant quantity of Type C brooches, these brooches have a strong link to urban sites indicating that we should not assume that the town at Richborough declined after the imposition of a Saxon shore fort.
- The proportions of these brooches from the East of England are different to those from the other study areas, with significantly lower proportions of brooches from rural sites.

The meaning of penannular brooches is complex, their distributions vary spatially, socially and chronologically. The size of these late Roman brooches and the suggestion they were used to fasten tunics rather than cloaks also raises questions about how visible these items would have been. Within the repertoire of late Roman material culture are object types such as belt fittings which have also been linked to both the state, the elite and militias. With some penannular brooch types we might be seeing a further potential representation of influential groups such as militias which requires further exploration.

11. Coinage

Coinage was central to the payment and taxation cycle of the Roman Empire as well as the market economy such as it was in Roman Britain. Coinage is different to the other forms of material culture evaluated here. The core aim of this study is to find ways of understanding the political and administrative structure of the state in the later fourth century, and its slow decline/cataclysmic end/transition into the fifth century. The analysis of material associated with the individuals who embodied the state is one dimension, but the monetary economy and taxation cycle is certainly another. To that end, it is essential to analyse the coinage as well.

This chapter utilises a recently published coin corpus from England and Wales collated by the author (Henry, 2024b). Detailed discussions of methodological approaches, typological frameworks, and site-type mean comparisons are presented in that publication and have been abridged here to avoid duplication.

This section will consider what changing patterns of coin use and supply can tell us about sites, regions, the provinces, and the diocese of Britain in the later fourth and fifth centuries. The work of Cool (2010) in particular has demonstrated that we should consider material culture distributions that differ from the norm. Here coinage can be used as a proxy to evaluate a level of state engagement in various regions of Britain. Does the distribution of coinage correlate with chronologically well-defined material culture linked with representatives of the state. Part of the analysis will consider the distribution of hoards to evaluate how the patterns noted between sites with high coin loss correlate with hoarding.

Typological studies

A range of statistical methods have been developed to assess regional and site-type variation in coin supply, with coinage divided into periods (Ravetz, 1964; Reece, 1972; Casey, 1980; Reece, 1991; Brickstock, 2004). Reece's division of coins into 21 issue periods or ABCD Phases remains the standard in Britain (Table 11.1; Reece, 1973; 1995). Fifth-century periods have been added in recent studies and by the PAS, though coins from these are relatively scarce (Brindle, 2017; Henry and Moorhead, 2022).

Table 11.1 - Roman Britain divided by Reece period and ABCDEF Phase

Date	Reece period	ABCDEF Phase
Before AD 41	1	A (To AD 260)
AD 41-54	2	
AD 54-68	3	
AD 69-96	4	
AD 96-117	5	
AD 117-138	6	
AD 138-161	7	
AD 161-180	8	
AD 180-192	9	
AD 193-222	10	
AD 222-235	11	
AD 235-260	12	
AD 260-275	13	B (AD 260-296)
AD 275-296	14	
AD 296-318	15	C (AD 296-330)
AD 318-330	16	
AD 330-348	17	D (AD 330-364)
AD 348-364	18	
AD 364-378	19	E (AD 364-402)
AD 378-388	20	
AD 388-402	21	
AD 402-445	22	F (After AD 402)
AD 445-498	23	

While Reece period analysis is a valuable tool, it reflects production rather than how long a coin could remain in circulation. To address this, a modified ABCD phase model is employed alongside it, highlighting broader patterns of deposition (Henry, 2021). Phase A covers periods with fewer coins, while Reece's Phase D is subdivided into D (330–364), E (364–402), and F (post-402) to emphasise regional or site-specific decline after AD 364 (Brindle, 2017; Henry and Ellis-Schön, 2017; Henry and Moorhead, 2022).

Coin profiles based on Reece periods are compared against national or regional means, primarily through

cumulative plots. A flat trajectory suggests alignment with the British mean, while steep inclines or declines signal divergence. This method has effectively highlighted differences in coin loss between 'good' and 'bad' towns (Reece, 1995, fig. 29).

Typological approach used

As part of this study, Roman site finds (excluding hoards) will initially be considered by using ABCDEF Phases, and subsequently individual Reece Periods. The focus will be on the late Roman period and therefore the analysis will primarily consider Phases D, E and F.

Production

The production of late Roman coinage of all denominations have been discussed in Chapter 3. The mint in London closed in AD 326 and subsequently coinage was imported from a range of mints on the Continent. Variation in supply from these mints occurred over time, in AD 348 the principal mint supplying Britain was Trier, but supply had waned by AD 364 and the mint stopped producing nummi in AD 395, as did all of the mints to the north of the Alps.

The production of contemporary copies occurred in the fourth century and was a British phenomenon. They were produced in significant quantities based on prototypes from the years AD 330-348 and AD 353-361. It is uncertain if this production was undertaken by state agents to facilitate the payment taxation cycle or was produced to supplement coinage used in the market economy (Brickstock, 1987; Boon, 1988).

Distribution

There was variation in supply and coin use over time. For example, a reduction in coin use is noted when the coinage from AD 330-348 (Reece period 17) is compared with AD 388-402 (Reece period 21). In the latter period coin loss generally decreases in quantity and distribution, and become primarily focused along sites on the road network – Walton (2012) has demonstrated that these later coins occur in higher numbers at urban sites. Similarly, Reece (1991; 1995) observed the marked difference in coin profiles between the east and west of Britain. In the later Roman period coin loss occurs in significantly higher quantities in the west.

Continuation into the fifth century

Chapter 3 demonstrated the challenges of dating late Roman and post-Roman phases at sites across Britain as the production of coinage and pottery dramatically decreases. This raises questions about how far into the fifth century the circulation of coinage and the monetary economy in general continued. Walton (2012, 114) has, for example, suggested the key denominations (including nummi) perhaps continued in use until c. AD 425. The inclusion of significant quantities of nummi in hoards such as Bishops Canning, Wiltshire similarly supports this (Guest, 1997).

Research questions

With the exception of correspondence analysis, the analysis of coin finds has arguably not progressed since the development of culminative analysis by Richard Reece in 1995. Distribution maps have focussed on the presence of coinage from a particular Reece period from a site on a national scale usually using PAS data (such as: Walton, 2012; Moorhead, 2013), sites double the mean for a Reece period (such as: Walton, 2012; Moorhead and Walton, 2014, 112), the quantity of coins from sites (including some hoards) on a graduating scale (Brindle, 2017) or the kernel density of coins (Brindle, 2014; Henry and Ellis-Schön, 2017; Henry, 2018).

Simply identifying the presence or absence of coinage masks underlying changing patterns of coin loss and supply. This study will plot the upper and lower quartile of sites (with a minimum of 25 coins) per mill rather than double the national average for a period/Phase to consider the spatial patterns. It consists of the number of coins from a particular period divided by the size of the assemblage multiplied by 1000. This has been undertaken in GIS by Reece period or ABCDEF Phase. Can we note variation which is not visible when we evaluate the data using graphs and with the east/west divide noted previously, within this pattern do nuances occur?

Cool (2000) highlighted a range of artefact types which can be used as fifth century indicators, an aim of this study is to see if coin profiles and distribution of silver and gold coinage can be added to this suite of material. Sites which are above the national average for both Reece period 21 and Phase E (the final periods where substantial coin loss occurs) will be considered in greater detail and compared against elements such as the road network and urban centres which have both been linked to high proportions of Theodosian coinage by Walton (2012; Moorhead and Walton, 2014, 104).

The dataset

The dataset here considers a recently published corpus of 489,867 Roman coins used to create a new 'British

Mean', updating those initially created by Reece and Walton. The corpus is primarily divided by parish. The ever-expanding numbers of coins discovered mean that this is now an exceptionally robust benchmark of the kind of distribution which in aggregate was 'normal' in Britain. Separate datasets will be compiled for gold and silver coinage and within the *siliquae* dataset those which have been clipped will also be noted. The dataset is available on the ADS (https://doi.org/10.5284/1106784).

Analysis and Results

The dataset contains 489,867 Roman coins which can be identified to a Reece period including 287,193 fourth and fifth century coins (See Table 11.2). Following Walton's approach, Richborough has been excluded from the national mean. Furthermore certain sites such as the Sacred Spring at Bath and Coventina's Well have been excluded from site type means (See Henry 2024b, 47-53).

The quantities of coins lost at sites across Britain vary drastically, this emphasises the dangers of a simple plot on a distribution map rather than graduating symbols (Figure 11.1). In regions where coin loss in general was less frequent in the countryside, key military, urban and nucleated sites standout such as: Caernarfon, Caerleon and Caerwent in Wales or Exeter in Devon. It is clear that in general the densest coin loss occurred in the south and parts of the South-west, East Midlands, East Anglia, and Yorkshire as well as between Richborough and London or along Dere Street to Hadrian's Wall. The corpus utilised in this study has significantly changed the broad pattern and density for specific regions such as East Anglia.

A total of 37 sites have assemblages of at least 2,000 coins recorded as site finds (Figure 11.2). The assemblage from Richborough is almost five times the size of any other from Britain – explaining why this assemblage distorts the national pattern. In general, larger assemblages occur at military, urban, nucleated sites and temples rather than sites such as villas, although some villa assemblages can be significant.

Comparisons of the British means

Since the development of the British mean by Reece there has been a 290 per cent increase in the size of the corpus available (from 168,828 coins to over 489,167). When the means developed by Reece, Walton and this study are compared we can see that broadly the datasets are comparable (Figure 11.3). The key variation noted between Reece and that of Walton and this study is as Richborough has been excluded from the latter two.

Table 11.2 - The breakdown of coins that can be identified to a particular Reece period (rather than ABCDEF Phase) within a recent corpus (see Henry, 2024a; Henry, 2024b).

Reece period	Total coins (including Richborough)	Total coins (excluding Richborough)
1 (Before AD 41)	4,137	3,953
2 (AD 41-54)	4,041	3,637
3 (AD 54-68)	2,610	2,467
4 (AD 69-96)	13,101	12,712
5 (AD 96-117)	10,484	10,390
6 (AD 117-138)	10,458	10,380
7 (AD 138-161)	13,908	13,795
8 (AD 161-180)	7,710	7,672
9 (AD 180-192)	2,640	2,626
10 (AD 193-222)	7,634	7,581
11 (AD 222-235)	3,068	3,054
12 (AD 235-260)	4,046	4,003
13 (AD 260-275)	66,797	62,032
14 (AD 275-296)	52,080	47,972
15 (AD 296-318)	11,567	11,212
16 (AD 318-330)	22,387	21,518
17 (AD 330-348)	114,935	104,730
18 (AD 348-364)	41,943	38,675
19 (AD 364-378)	58,117	55,220
20 (AD 378-388)	2,522	2,407
21 (AD 388-402)	35,682	12,828
Total	489,867	438,834

This study will principally consider sites where the per mill value for a particular ABCDEF Phase or Reece period falls in the upper or lower quartile. The analysis has been undertaken to identify sites and key areas where coin loss is significantly above or below the national average. Through this can we highlight specific trends which are not visible when considering the per mill in charts (such as Figure 12.8). The per mill breakdown for the corpus from this study as well

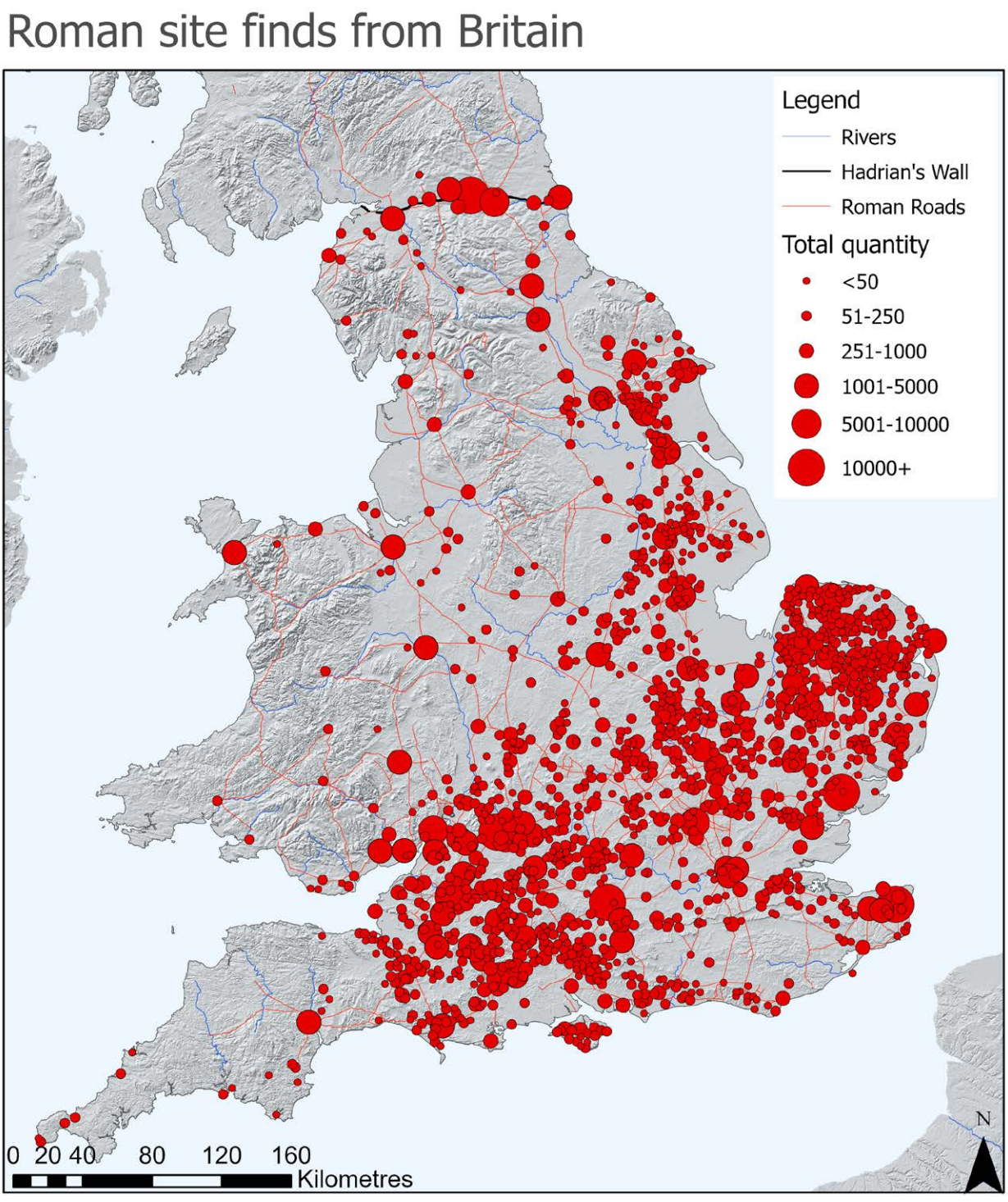


Figure 11.1 - The quantity of coins from parishes where a minimum of 25 coins have been recorded

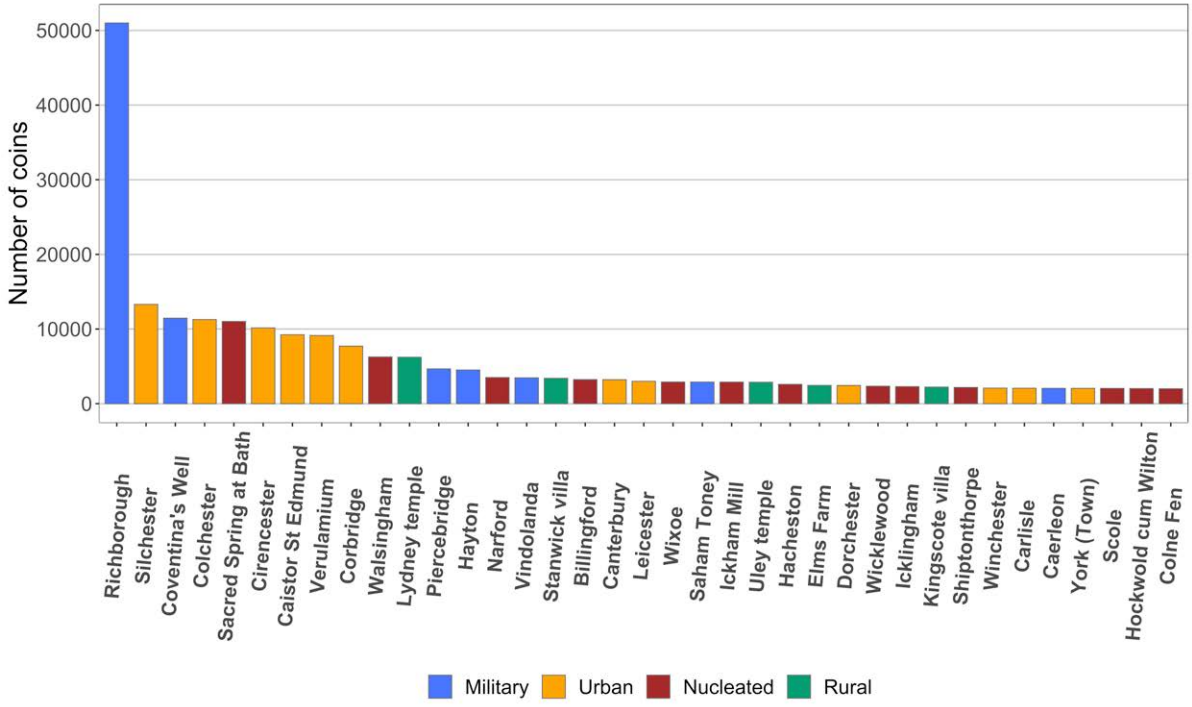


Figure 11.2 - Sites in Britain with an assemblage of at least 2,000 coins. A further 681 coins were recorded from the fortress at York

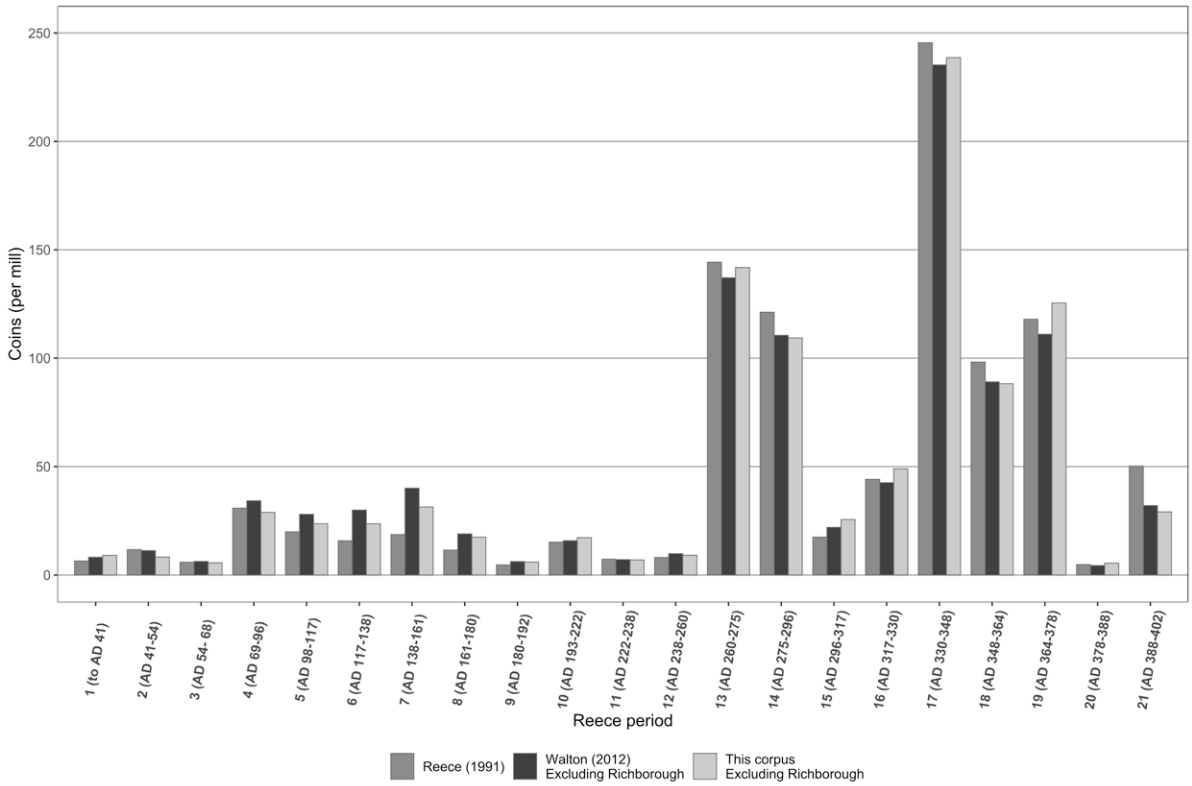


Figure 11.3 - Comparison of the British means developed by Reece (1991), Walton (2012) which excludes Richborough and this study which also excludes Richborough

Table 11.3 - The national mean and the upper and lower quartile for each Phase. The quartiles have been developed as part of the analysis of the top 25 per cent and bottom 25 per cent of sites based on each Phase.

Phase	Lower quartile	Mean	Upper quartile
A (To AD 260)	63.397	192.105	236.559
B (AD 260-296)	153.846	250.599	323.886
C (AD 296-330)	48.611	73.917	127.272
D (AD 330-364)	206.896	324.369	406.250
E (AD 364-402)	63.829	158.937	224.409

Table 11.4 - The national mean and the upper and lower quartile for each Reece period. The quartiles have been developed as part of the analysis of the top 25 per cent and bottom 25 per cent of sites based on each Reece period.

Reece period	**Lower quartile**	**Mean**	**Upper quartile**
1 (Before AD 41)	0	9.037	27.027
2 (AD 41-54)	0	8.272	16.260
3 (AD 54-68)	0	5.627	17.005
4 (AD 69-96)	0	28.914	33.333
5 (AD 96-117)	0	23.667	30.002
6 (AD 117-138)	0	23.642	30.303
7 (AD 138-161)	0	31.389	36.585
8 (AD 161-180)	0	17.456	28.301
9 (AD 180-192)	0	5.950	19.230
10 (AD 193-222)	0	17.240	30.303
11 (AD 222-235)	0	6.963	16.806
12 (AD 235-260)	0	9.108	20.408
13 (AD 260-275)	76.923	141.800	191.419
14 (AD 275-296)	54.770	109.342	144.278
15 (AD 296-318)	9.345	25.579	44.573
16 (AD 318-330)	29.411	48.967	85.106
17 (AD 330-348)	148.148	238.672	306.366
18 (AD 348-364)	41.666	88.230	111.111
19 (AD 364-378)	53.571	125.492	196.078
20 (AD 378-388)	0	5.473	16.949
21 (AD 388-402)	0	29.104	33.333

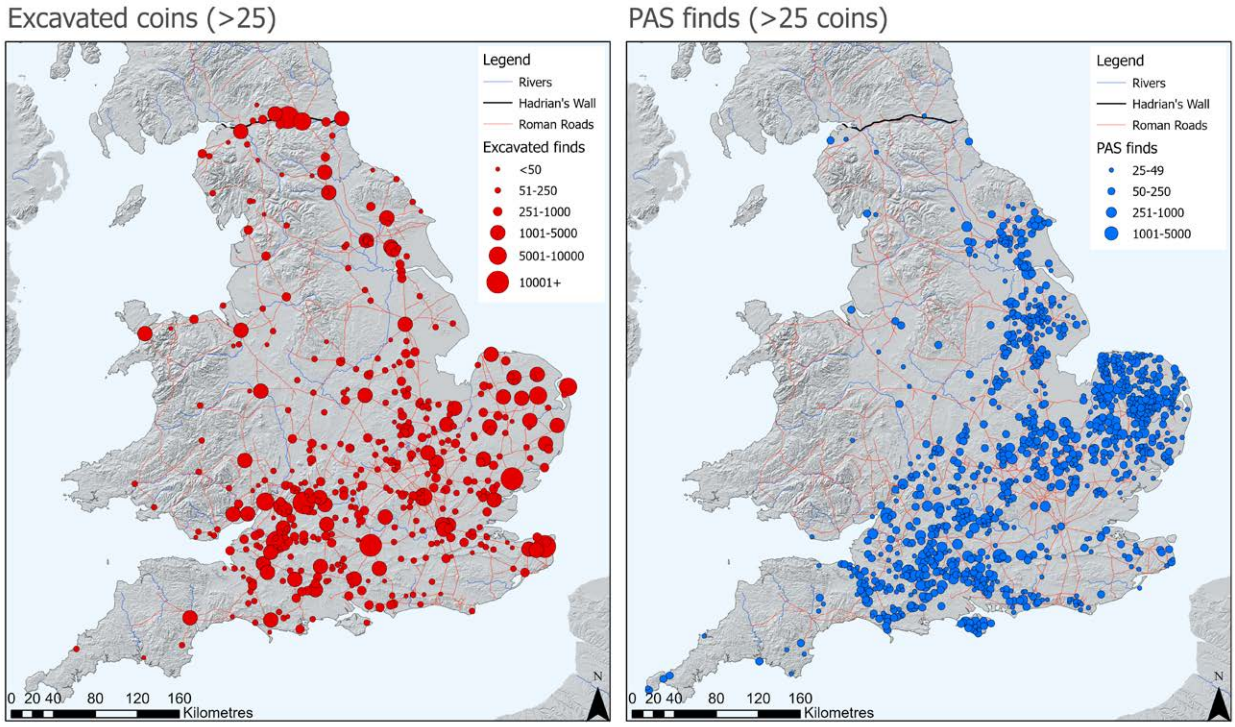


Figure 11.4 - Comparison of the quantity of coins recorded by parish divided by collection method.

as the lower quartile per mill (derived from the 1,412 parishes in ArcGIS) for each Phases A-E and periods 1-21 is included in Table 11.3 and Table 11.4.

PAS finds

A total of 168,543 Roman coins have been included in the corpus from the PAS database or associated paper records for detector finds in Norfolk. In contrast 285,205 have been included from excavated datasets or museum collections. Figure 11.4 emphasises the value of the PAS corpus in fleshing out the distribution of excavated finds in particular East Anglia, Wiltshire, and Lincolnshire. Assemblages of a minimum of 25 coins are uncommon from the South-west of England, the New Forest and the Weald. This is in part a reflection of recovery bias as well as coin supply.

PAS finds are generally a reflection of a range of site types in the rural and nucleated categories as these are the regions where metal detecting is most likely – other site types will be included in the PAS corpus. When the PAS corpus is compared with the data for nucleated and rural sites we can see broad similarities between the profiles, the main variation is the high proportion of coinage of the House of Valentinian from the PAS corpus (Figure 11.5).

Comparison by site type

The various site types are discussed in more detail in Henry (2024b, 53–57). Military sites show significantly above-average coin loss in the first and second centuries, with a marked decline thereafter - a pattern consistent across Hadrian's Wall, the Pennines, and Wales, and previously observed (Reece, 1991; 1995; Walton, 2012; Brindle, 2017). The similarity in profiles from Hadrian's Wall and the Pennines may support Collins' (2012; 2014) argument for a unified late fourth-century supply source. Saxon shore forts, however, peak in the third and mid-fourth centuries before declining.

Large towns and civitas capitals both show peaks in the first and third centuries, followed by a decline from AD 330, echoing Millett's (1990) argument for late urban decline. Walton (2012; 2014) noted high coin loss in Reece period 21 at urban sites, especially large towns, but also at *civitas* capitals.

Defended *vici* and undefended nucleated sites record below-average coin loss in the first two centuries. In the mid-third century, defended *vici* show a marked increase, unlike their undefended counterparts. Defended *vici* also peak in Reece period 21, supporting

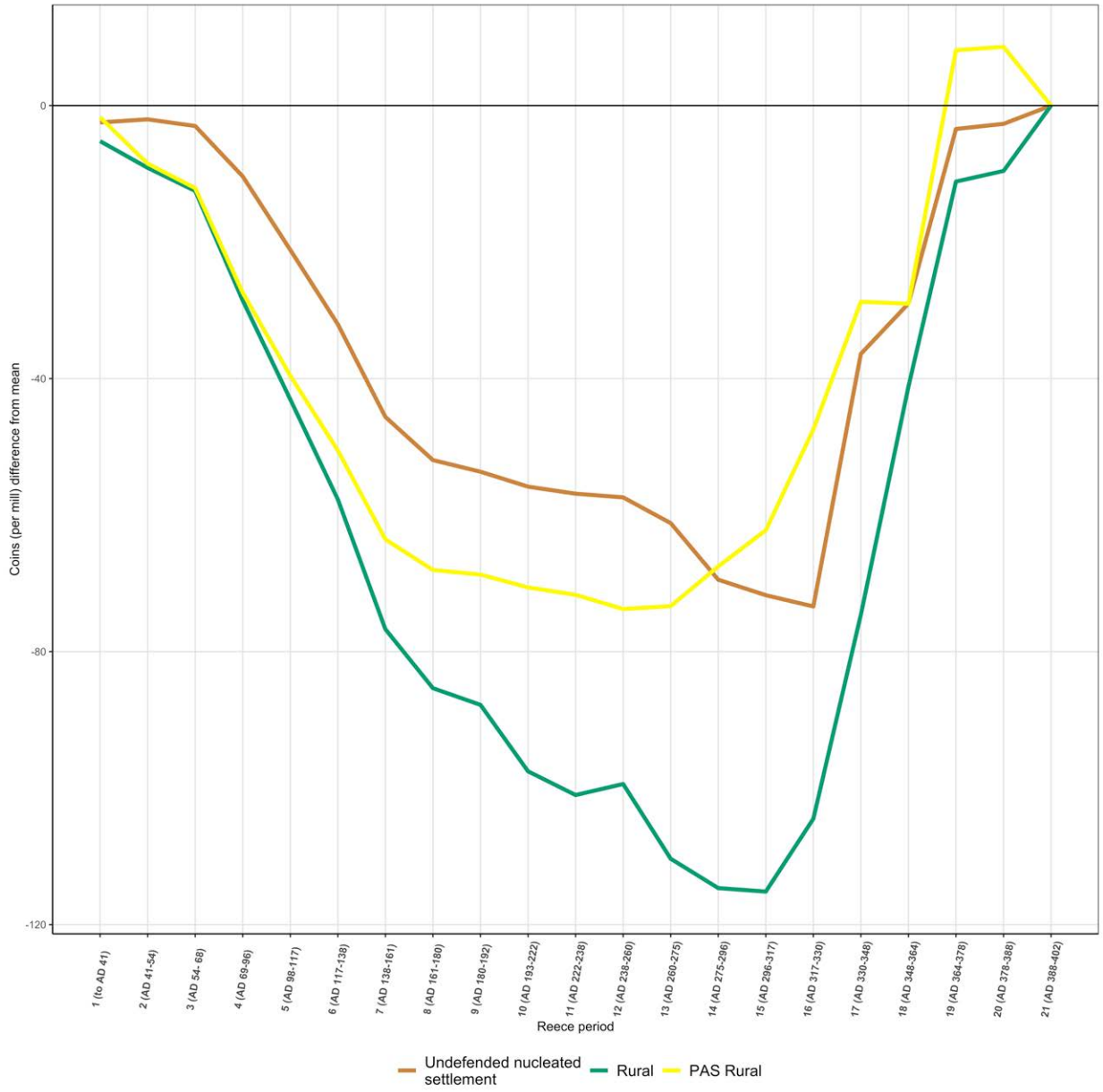


Figure 11.5 - Comparison of the nucleated, rural and PAS rural datasets. The PAS material generally appears to include assemblages from a range of site types

their role in late Roman administration. Undefended nucleated sites peak only in the mid-fourth century, suggesting economic prominence then — though regional variation exists, e.g. fourth-century decline in Wiltshire (Brindle, 2017; Smith and Henry, 2020).

Rural sites remain below average in the first and second centuries, with some increase at villas and farmsteads in the mid-third century. Significant above-average loss emerges only in the fourth century. Temples show strong peaks in Reece periods 18 and 19, key components of fourth-century temple assemblages (Brickstock, 1987; Moorhead, 2001a; Brindle, 2017; Henry *et al.*, 2020).

Correspondence analysis

For the numismatic dataset correspondence analysis plots the means for each social category and subtype along with sites with more than 1,000 coins by their social category against Reece periods (Figure 11.6). The analysis demonstrates variation previously noted

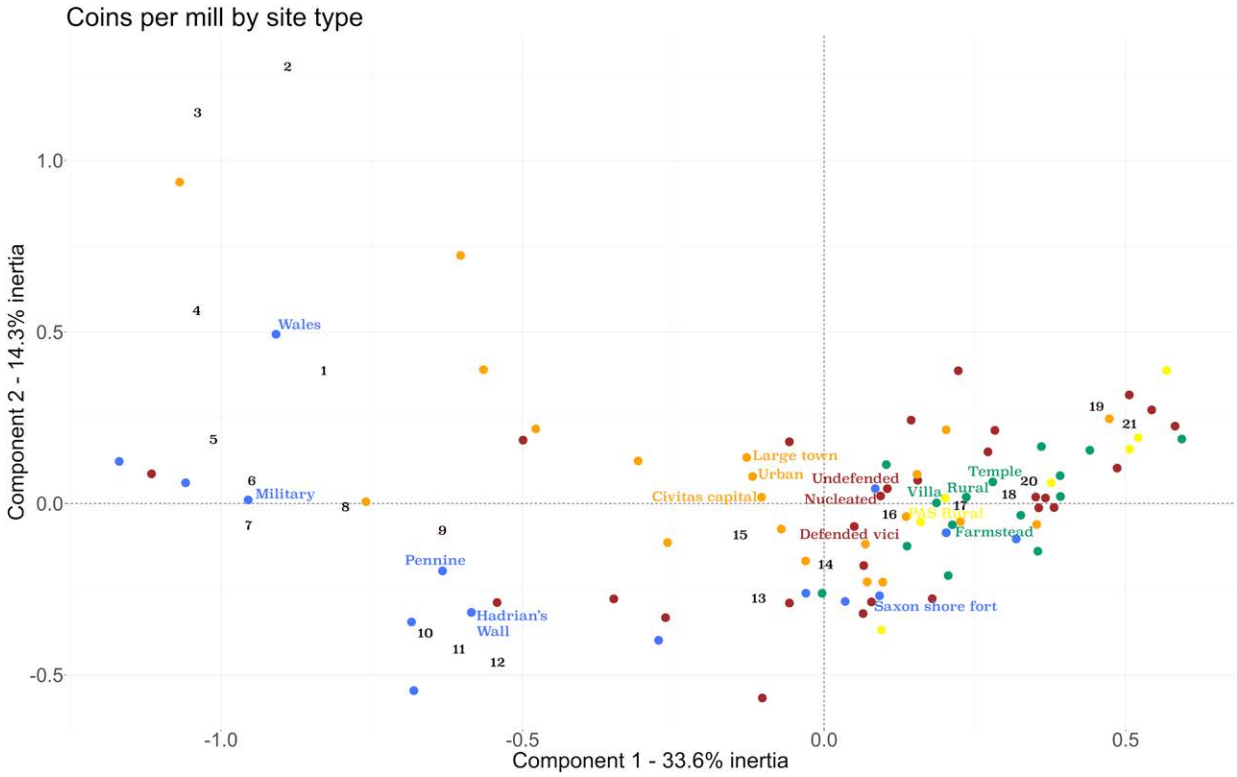


Figure 11.6 - Correspondence analysis of the numismatic dataset divided by Reece period

where military sites and urban centres often have higher proportions of coinage struck before AD 260 (Reece periods 1-12). Greater clustering occurs in Reece periods 13-21, generally these consist of nucleated, rural, PAS rural and some military sites. Generally, the latter consist of the assemblages from Saxon shore forts. Where urban sites are plotted within this cluster they are usually urban sites such as Cirencester with higher proportions of coinage from the House of Theodosius.

ABCDEF Phase analysis

By comparing the quantity of coins or the proportions of coins from Phase D and Phase E we can identity sites which either had increased or decreased coin loss in this period against the national mean (Table 12.3). This in the past has been viewed as a proxy for regions which either prospered or declined in the late Roman period such as the area between Salisbury and Purbeck (Henry and Ellis-Schön, 2017).

Phase D (AD 330-364)

At most sites in Britain coins from Phase D, particularly of Reece period 17, generally comprise the largest elements of coin assemblages. Substantial quantities are recorded across England including the south, East Anglia, in Kent as well as along Ermine Street, Dere Street and the central section of Hadrian's Wall (Figure 11.7, left). In Wales the quantities are lower and occur in most significant numbers at the fort in Caernarfon.

When we consider the per mill value for this phase against each region of England and Wales, the North-east, North-west, Wales, and Greater London all have significantly below average coin loss for this phase (Figure 11.8). The status of London as the diocesan capital should have resulted in a high level of loss of Phase D coins, the lack of which is explained by post-Roman disturbance.

Given that coinage from this phase forms a large part of most assemblages the patterns seen when the upper and lower quartile are mapped are important with a number of notable concentrations in both distributions. Concentrations of sites with high proportions of these coins occur inland in East Anglia, to the south of the Fosse Way and in Lincolnshire (Figure 11.9). A small number of sites are mapped to the north of the river Humber. Sites with low numbers of these coins include the environs of Winchester and Chichester, the eastern

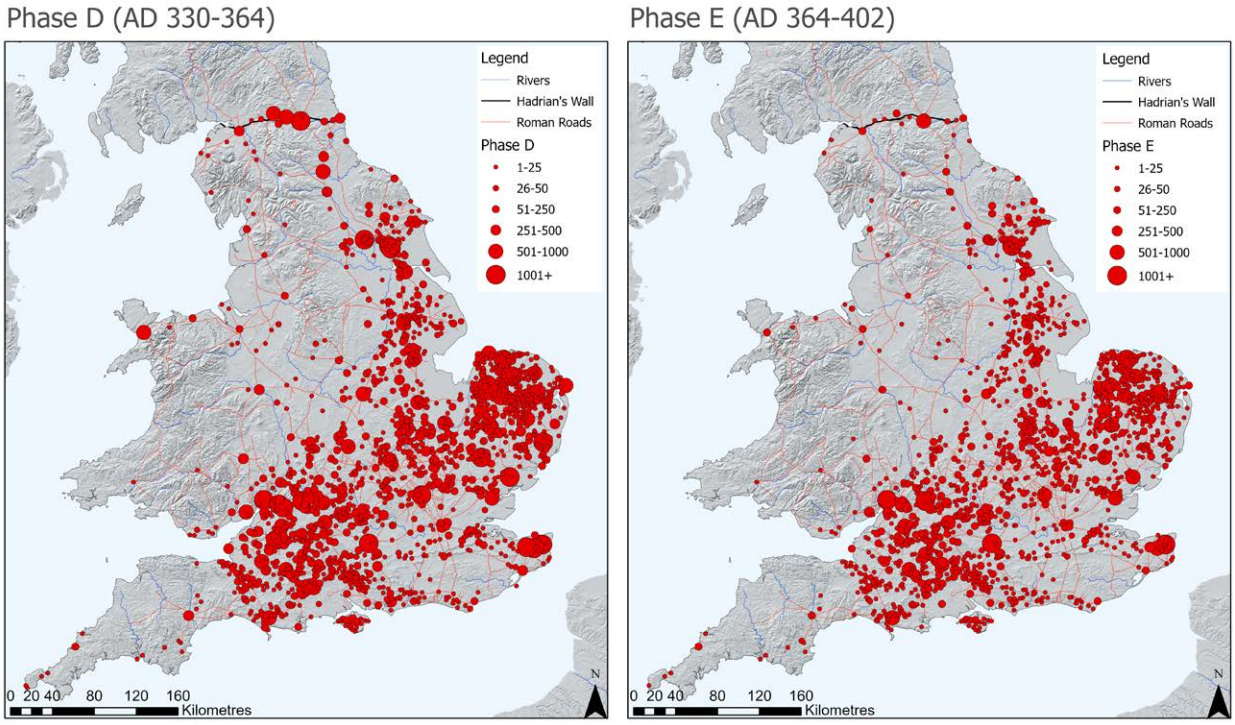


Figure 11.7 - The quantities of Phase D coins (left) and Phase E coins (right) from parishes with a minimum of 25 coins.

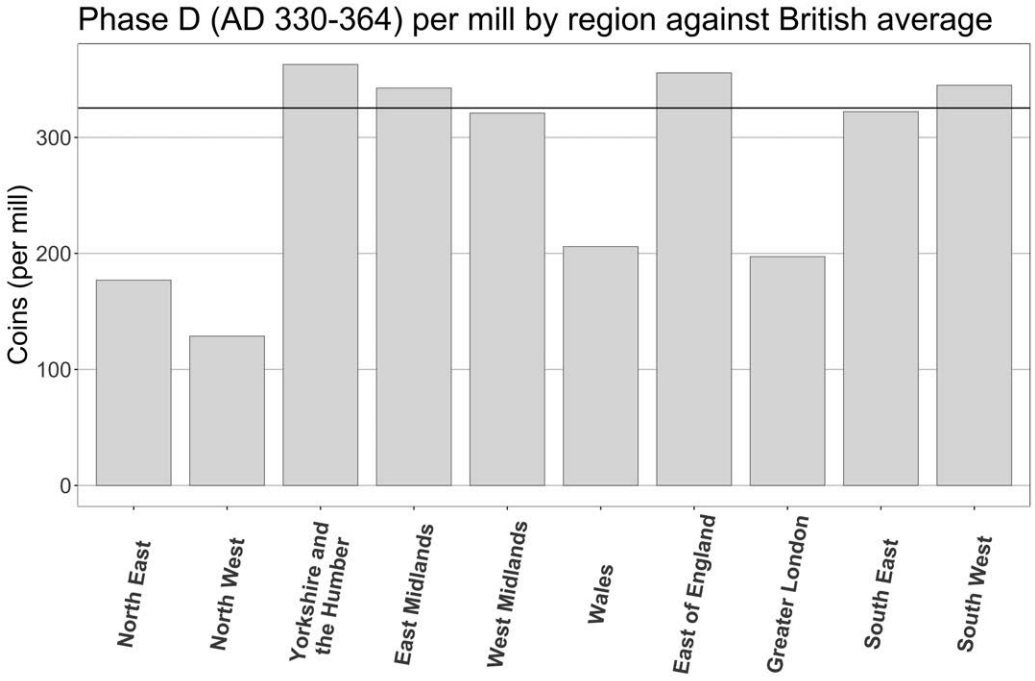


Figure 11.8 - Comparison of the mean for each region of Britain against the British average for Phase D (320.033) denoted with a horizontal line. The results emphasise that some regions of the Diocese have significantly lower coin loss.

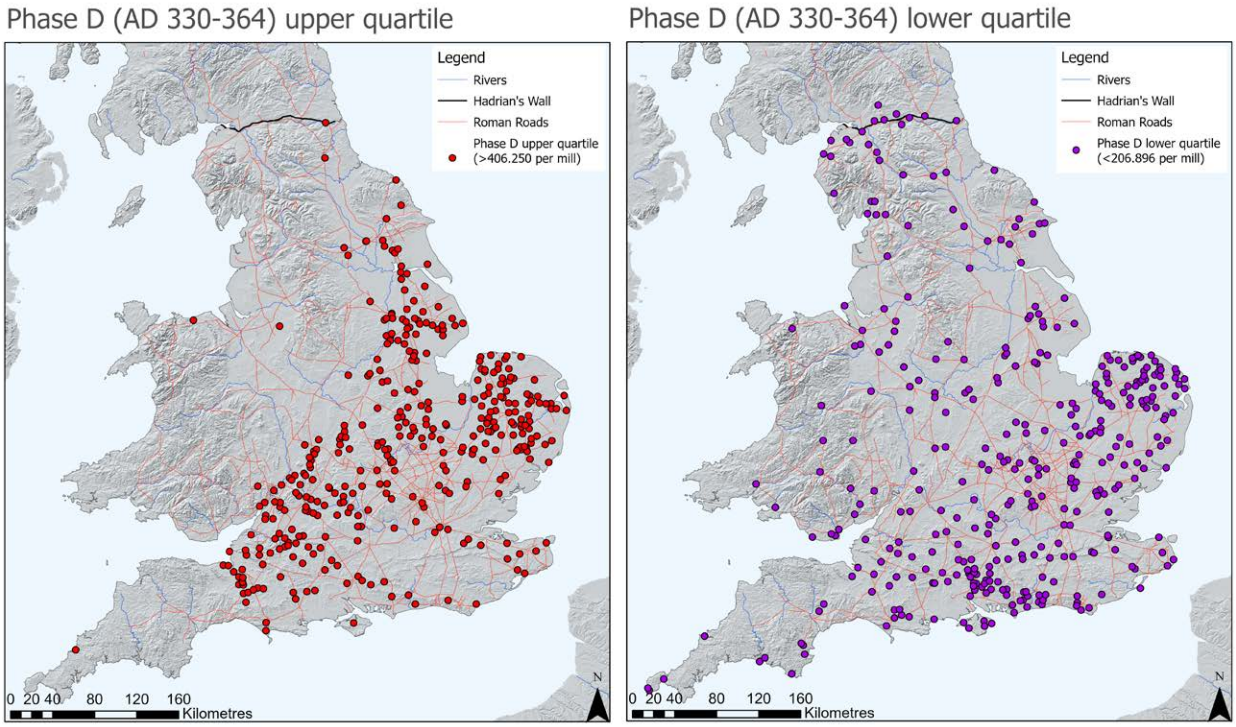


Figure 11.9 - The upper and lower quartile of sites from Phase D (AD 330-364) based on their per mill.

part of the north coast of Norfolk and the North-east of Britain including the eastern half of Hadrian's Wall.

Phase D coin hoards

A total of 286 coin hoards has been recorded from Phase D in Britain. Predominant clusters are identified in the environs of the Severn Estuary, along with notable concentrations in the Saxon shore forts of Burgh Castle and Caistor-by-Sea. Interestingly, these hoards exhibit a broader distribution pattern across the diocese (Figure 11.10, left). However, it is crucial to note that the rationale behind their deposition differs significantly when compared to site finds. Therefore, it is essential not to assume similar distributions between hoards and site-based discoveries (Bland, 2018; Bland *et al.*, 2020). Different factors and contexts likely influenced their deposition.

Hoards of nummi dominate the of Phase D distribution. Very few previous metal hoards or hoards of precious metal and nummi (mixed hoards) are recorded from this Phase (Figure 11.10, right).

Phase E (AD 364-402)

In Phase E fewer substantial assemblages are recorded across Britain, where they do occur the main emphasis is in sites in the south, East Anglia, Kent and in the environs of York (Figure 11.7, right). The size of assemblages from Hadrian's Wall is drastically reduced as is the material from Suffolk and Essex.

When the Phase E per mill value for each region is compared with the British average regions including the north of Britain, Wales and London remain below the national average as does the West Midlands and the East is also slightly below the national average (Figure 11.11).

Sites in the upper quartile occur in greater numbers in Yorkshire and Lincolnshire, along Ermine Street and in the south (Figure 11.12). In contrast to Phase D, a number of sites in the environs of Winchester are in the upper quartile. In Norfolk sites in the north and west of the county also have higher proportions of these coins. This pattern will be discussed in greater detail in relation to Reece period 19. When the lower quartile is considered, sites in Suffolk, Essex, Hertfordshire, Kent, and Sussex all have significantly below average

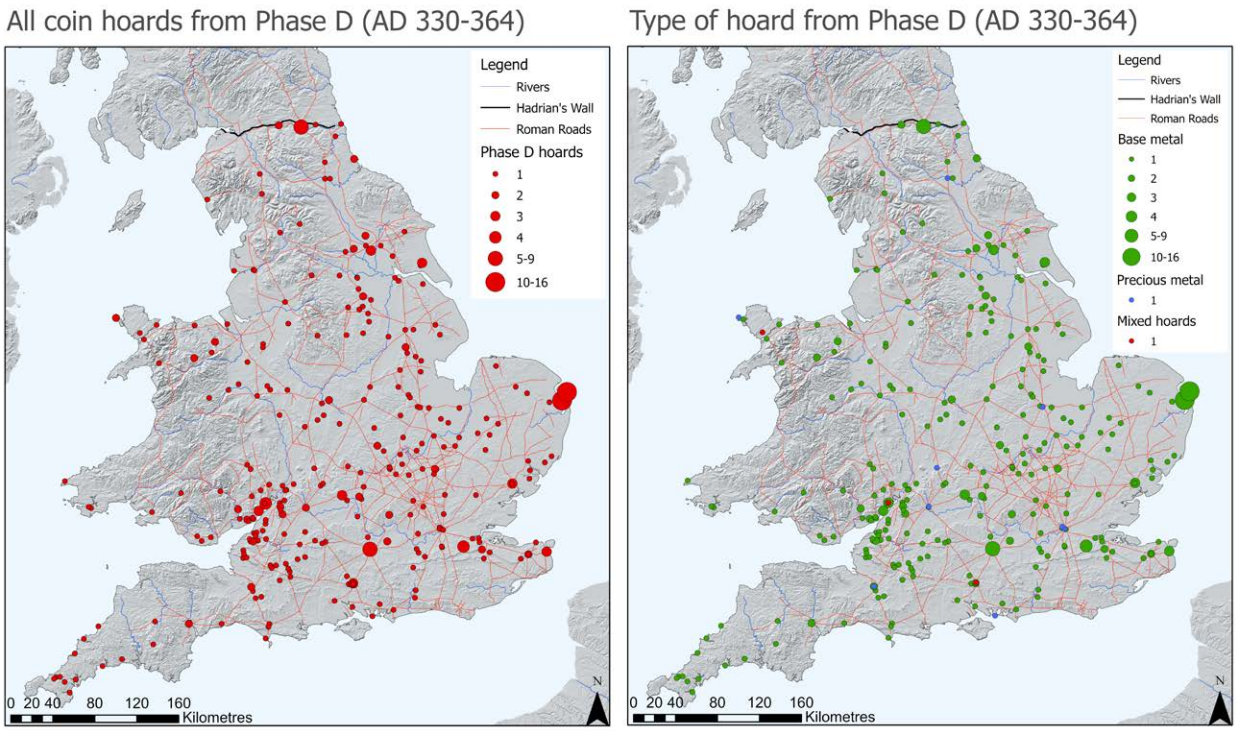


Figure 11.10 - All coin hoards from Phase D (left), the number of nummi hoards, precious metal hoards and mixed hoards of precious and base metal hoards from Phase D (right)

numbers of these coins. Generally, they also occur in smaller numbers in the north and west of the diocese.

Analysis of Phases D and E underlines the differences previously noted between east and west by Richard Reece (1991; 1995; 2012). This pattern though occurs primarily in southern Norfolk, Suffolk, Essex, Buckinghamshire, Hertfordshire, Kent (with the exception of sites such as Richborough and Canterbury) and Sussex. Interestingly groups of sites with above average loss cluster around river valleys such as the Upper Thames or the Great Ouse and River Nene or along key roads such as Ermine Street and Dere Street.

When we compare Phase D and E, we can also discern areas where there is widespread decline in coin loss such as the south of Norfolk or an increase as noted in the environs of Winchester. In Phase E Winchester seems to have become a region where there was potentially significant investment in the later Roman period.

Phase E coin hoards

A total of 308 coin hoards are recorded from Phase E in Britain. Hoards from this phase occur most frequently in the south in a region between Cirencester and the Isle of Wight, in the environs of the Wash, particularly in west Norfolk, in Kent and in Yorkshire (Figure 11.13, left).

Examining the quantity and distribution of hoards based on their composition (base metal, precious metal, or a mix) reveals a notable increase in the number of precious metal hoards during Phase E compared to Phase D. This can be attributed to the reforms initiated in AD 337, which introduced new denominations in the later fourth century, alongside the growing prevalence of these coins after the reforms implemented by Valentinian I and Valens in AD 364.

In this context, distinct patterns emerge. Regions with the highest overall number of hoards in this phase tend to exhibit a prevalence of nummi hoards, particularly in areas surrounding the Severn Estuary, the Upper Thames Valley, the Great Ouse river, the River Nene, and Kent. In contrast, Yorkshire shows a higher concentration of hoards containing precious metal coins, mirroring the trend observed in the southern regions, especially south of Salisbury Plain. There tends to be a prevalence of precious metal coin hoards in the west of Britain compared with an emphasis on

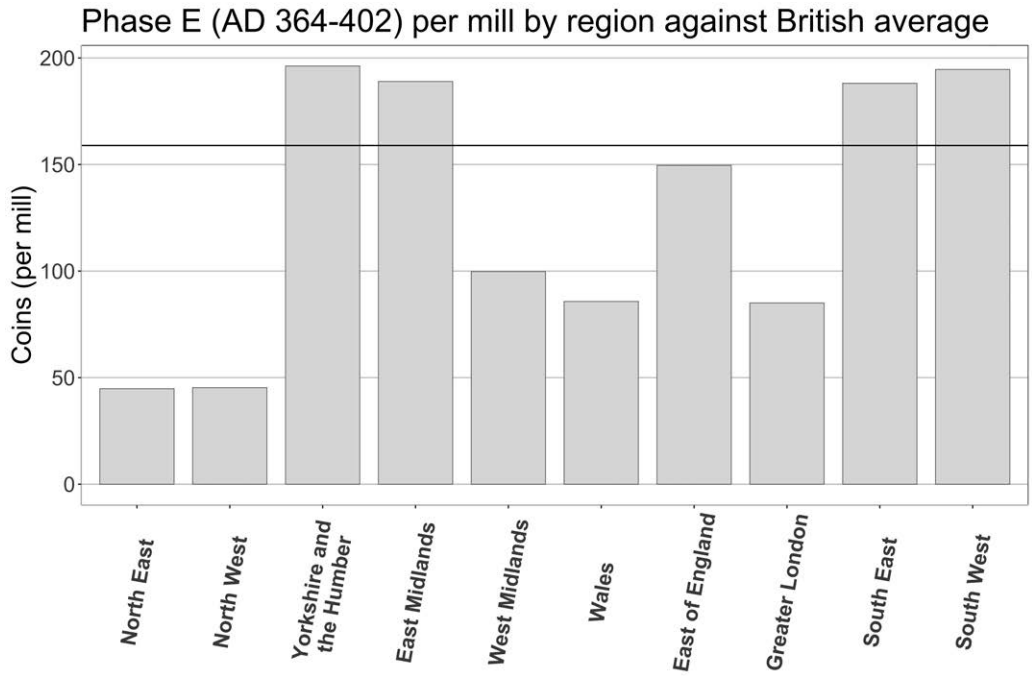


Figure 11.11 - Comparison of the mean for each region of Britain against the British average for Phase E (AD 364-402) depicted with a horizontal line. The results emphasise that some regions of the Diocese have significantly lower coin loss particularly the North of the diocese

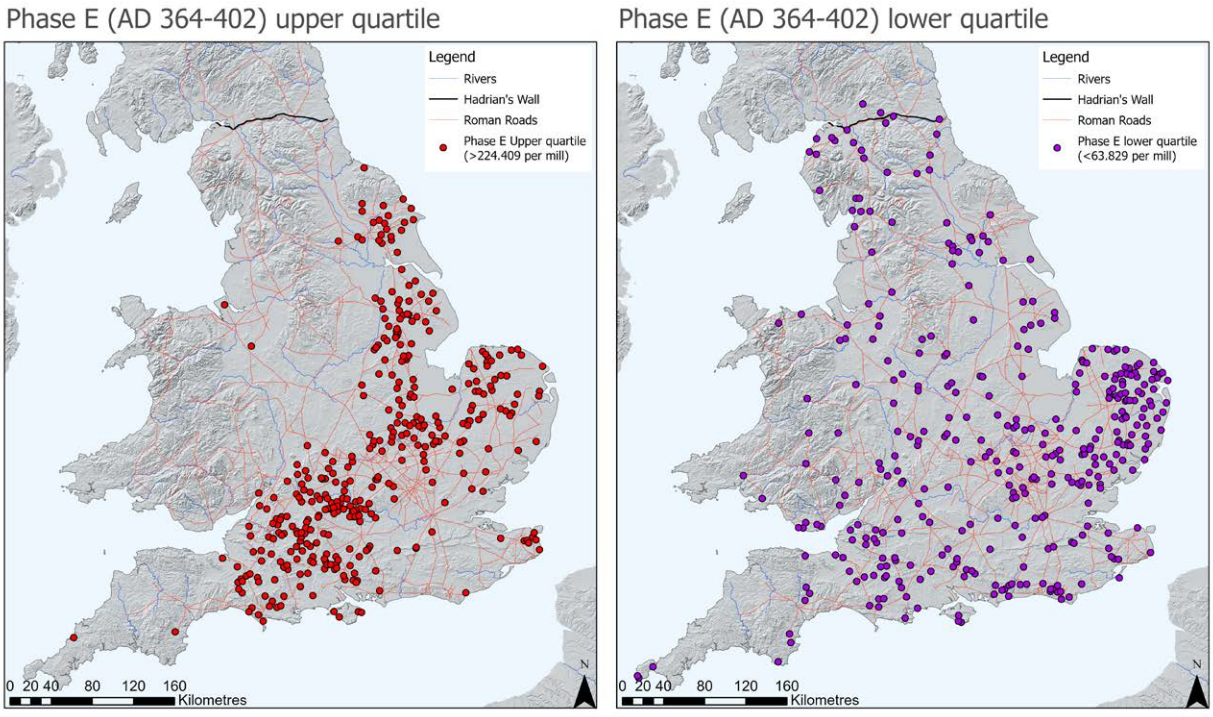


Figure 11.12 - The upper and lower quartile of sites from Phase E (AD 364-402) based on their per mill.

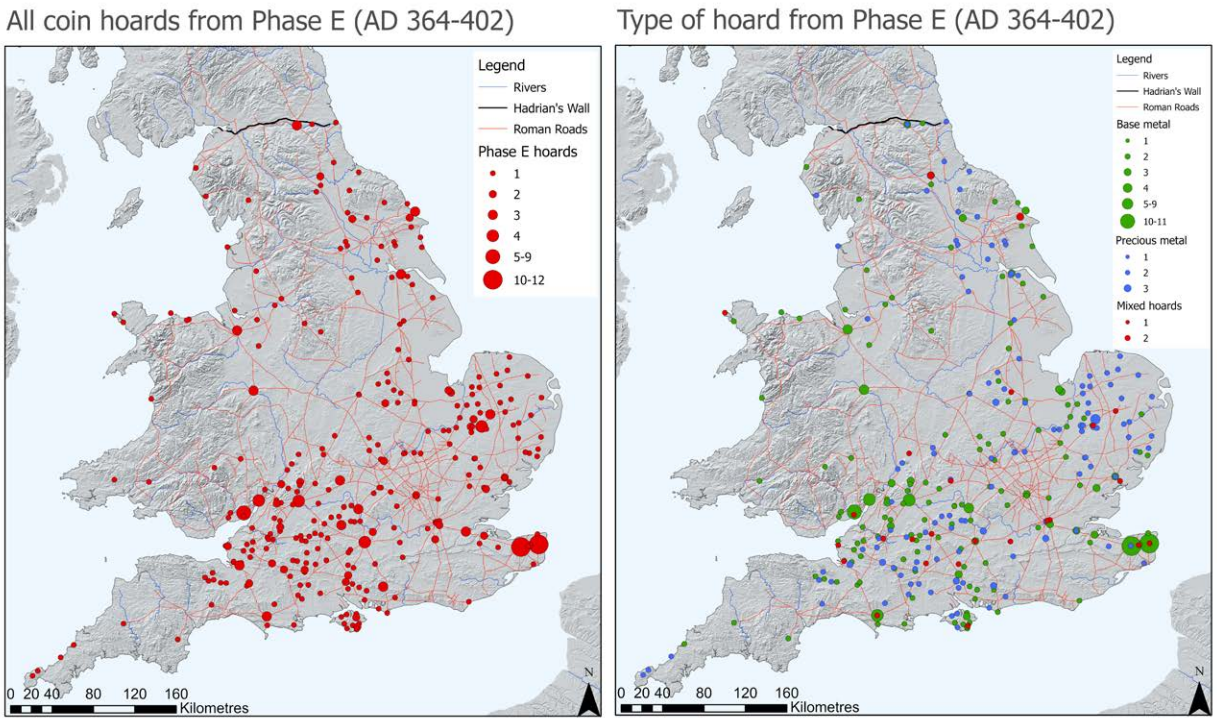


Figure 11.13 - All coin hoards from Phase E (left), the number of nummi hoards, precious metal hoards and mixed hoards of precious and base metal hoards from Phase E (right)

silver plate to the east (Hobbs, 2006; Bland *et al.*, 2013; Bland, 2018; Bland *et al.*, 2020, 276).

Phase F (AD 402-498)

In contrast to Phase E where the corpus includes 96,288 coins, only 70 are recorded for Phase F. These primarily consist of gold coins. The limited quantity of coins is due to a combination of factors, the most significant of which is the social and political changes in the fifth century and cessation of production at the principal mints supplying Britain in the final decade of the fourth century (for bronze) or the start of the fifth century (for silver). During Phase F, the use of coinage ceases and the material appears to be used primarily as bullion. The hoard from Patching for example does not include clipped coinage which suggests that the use of coinage as circulating currency has stopped by the 460s (White *et al.*, 1999; Abdy, 2013).

The spatial distribution of coinage from Phase F primarily occurs to the south of the line between the Severn and the Humber with greatest concentrations in the East Midlands, Suffolk and Essex, Kent and the Isle of Wight (Figure 11.14).

A total of 20 hoards from Phase F have been recorded from Britain (Figure 11.15, left). The distribution of hoards demonstrates the reduction in coin supply and coin use in the country. Three hoards are known to the north of the Humber, the remainder are in the south and east of Britain with an Emphasis in East Anglia. Compared with Phase E, very few hoards are recorded from the South and South-west.

The vast majority of hoards from Phase F are formed of precious metal coinage (Figure 11.15, right). We know of a single hoard of nummi from Hadrian's Wall and two hoards which include nummi. The distribution of hoards from Phase F underlines the decline in the supply of coinage after cessation of bronze and silver production north of the Alps and gold becoming more sporadic after AD 408.

Reece periods

Reece periods 17-21 will also be considered individually to identify any potential short-term trends or anomalies within the dataset (Figure 11.16). For example, assemblages along the Yorkshire coast with substantial peaks in periods 20 or 21 are generally from

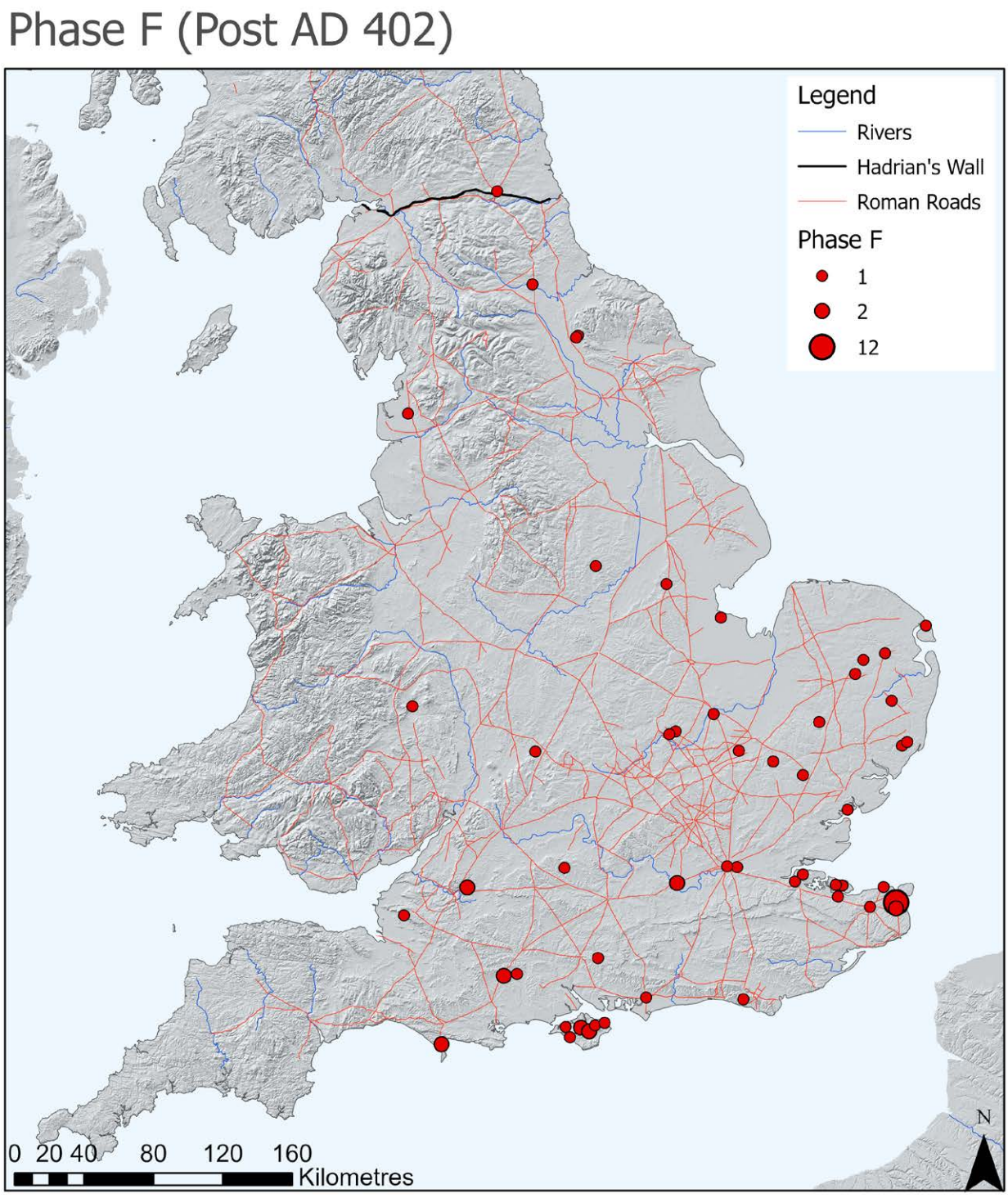


Figure 11.14 - The spatial distribution of coinage from Phase F (AD 402-498).

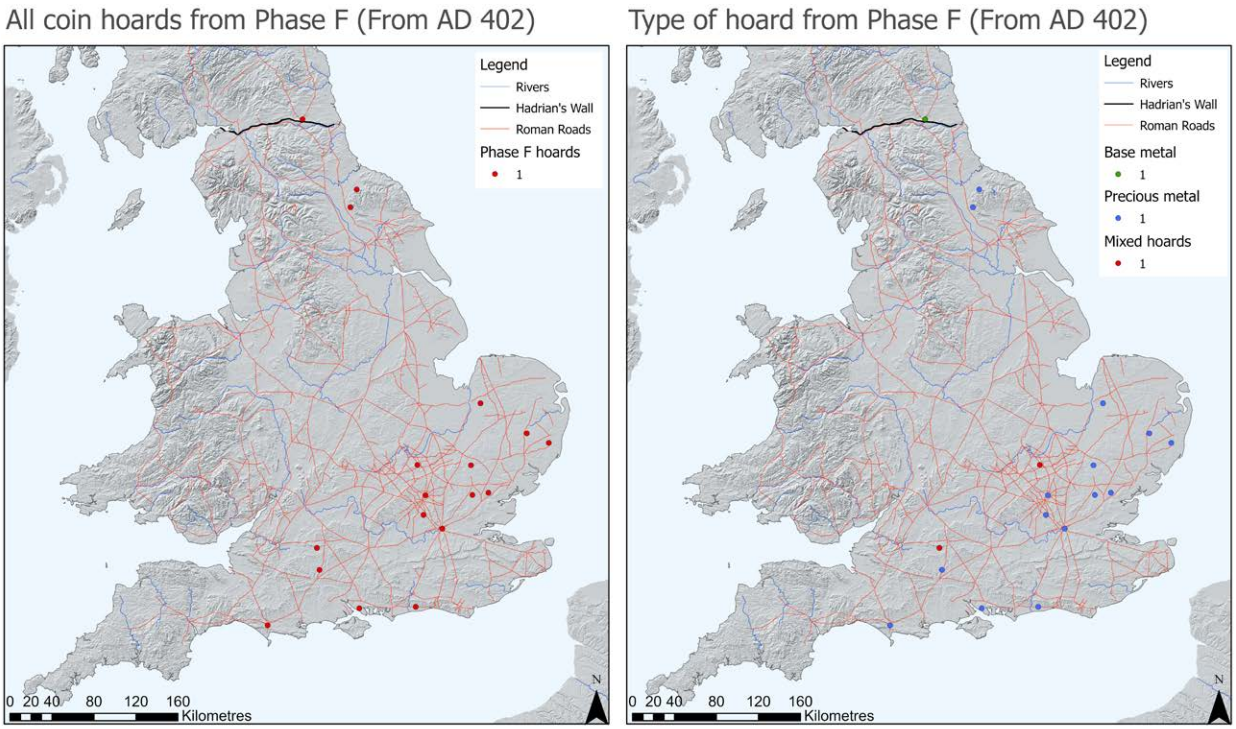


Figure 11.15 - All coin hoards from Phase F (left), the number of nummi hoards, precious metal hoards and mixed hoards of precious and base metal hoards from Phase F (right)

signal stations which have been excavated, or coins from beaches where such sites have been lost through erosion. In Reece periods 20 and 21 as supply in general was retracting (and generally rare for Reece period 20), the lowest quartile consists of all sites where these coins are absent.

Period 17 (AD 330-348)

Coins from Reece period 17 are a regular feature of site assemblages and include both regular issues and contemporary copies (Bland, 2018). When the distribution of coinage from this period considered in Figure 11.16, similar patterns are noted to that from Phase D in general.

London, Wales and the north all have below average coin loss in this period (Figure 11.17). Coin loss per mill occurs in greatest proportions in the Yorkshire and the Humber region and the East of England.

Spatially we can identify a number of variations when compared with the per mill results from Phase D. In the upper quartile from this period concentrations of sites still occur in the South, East Midlands and East Anglia (Figure 11.18). To the north of the Humber few sites are mapped as occurring in the upper quartile which is interesting given that in general the region is above average. In the lower quartile the distribution of sites in the north coast of Norfolk and in Hampshire and Sussex is significant.

Period 17 hoards

In total 163 coin hoards terminate in issues dating from Reece period 17 (Figure 11.19). The distribution of hoards varies when compared with the site find distribution (Figure 11.16). The largest number of hoards occur around the Severn Estuary with concentrations in the northern frontier, North Wales and the South-west. Aside from a large number at the Saxon shore forts at Burgh Castle and Caistor-on-Sea they tend to be uncommon in East Anglia. As was seen with the general breakdown from Phase D (AD 330-364) very few precious metal or mixed hoards terminate in Reece period 17, these examples occur in London and North Wales.

Period 18 (AD 348-364)

The quantity of coins lost in general from Reece period 18 is lower than period 17 although the distribution of

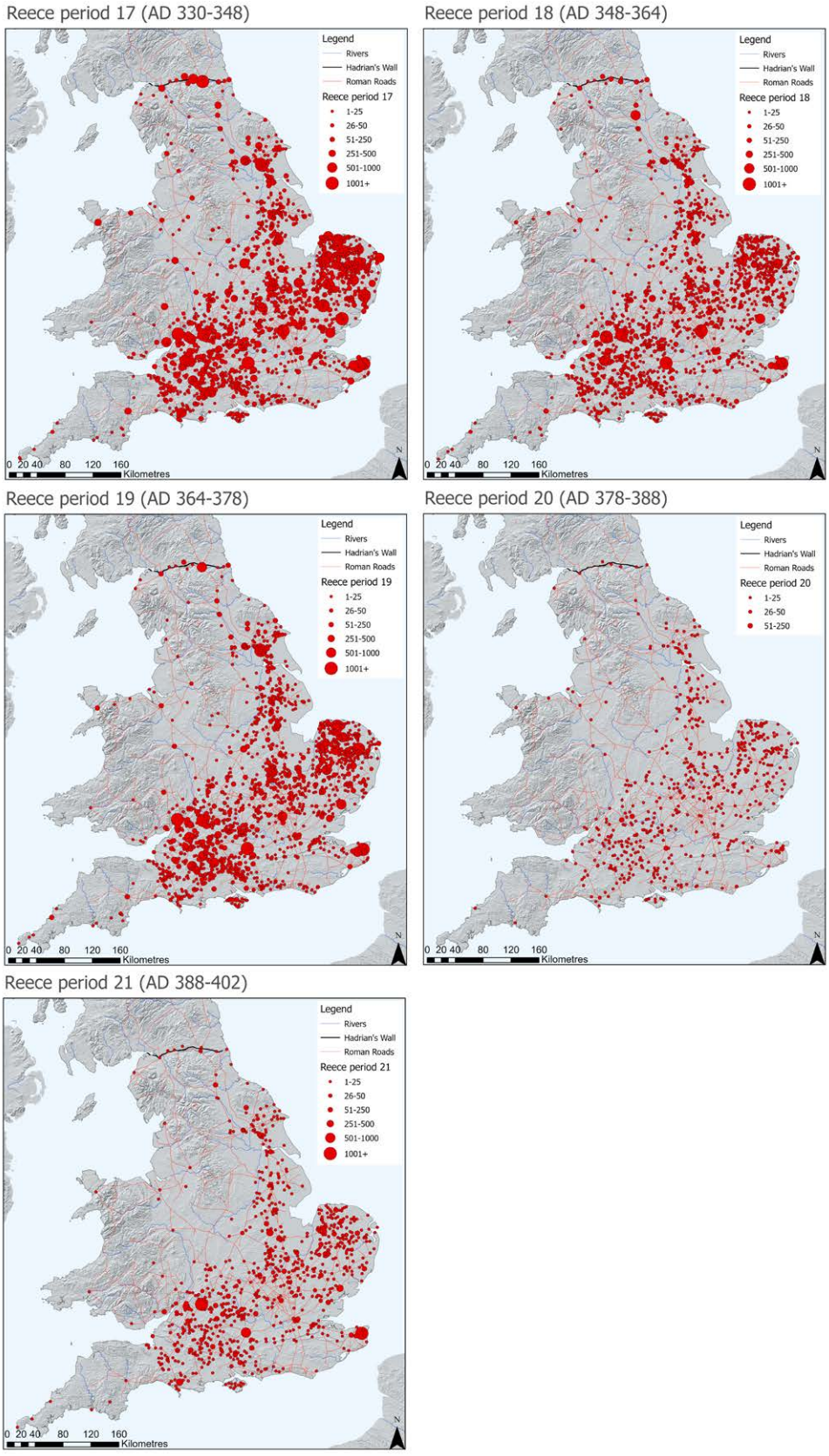


Figure 11.16 - The quantities of coins from Reece period 17-21 from parishes with a minimum of 25 coins.

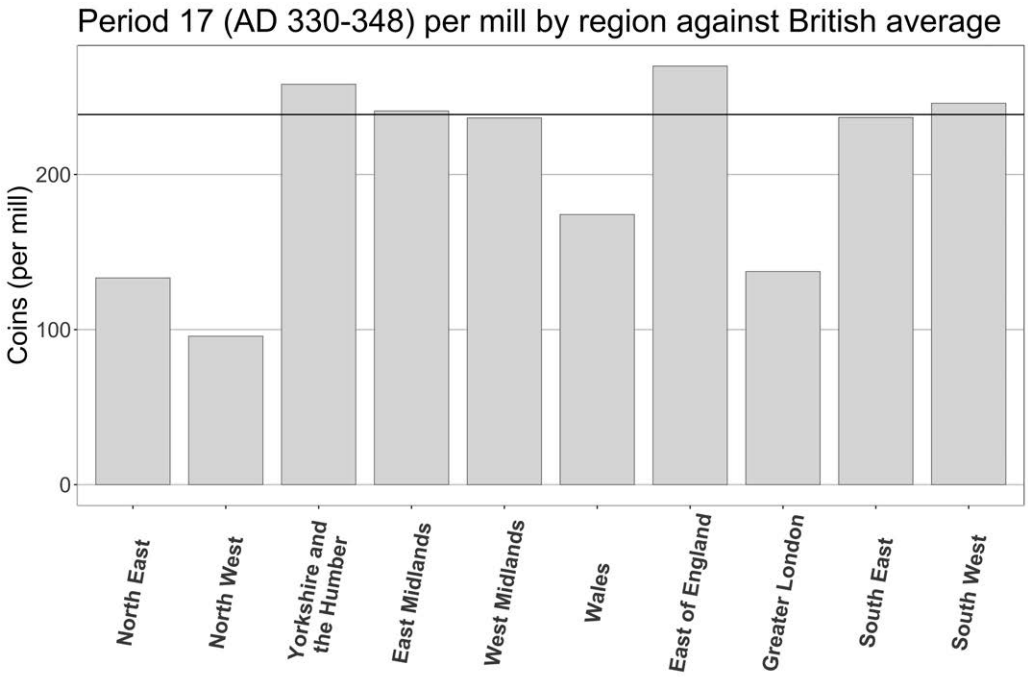


Figure 11.17 - Comparison of the mean for each region of Britain against the British average for Period 17 (AD 330-348) depicted with a horizontal line.

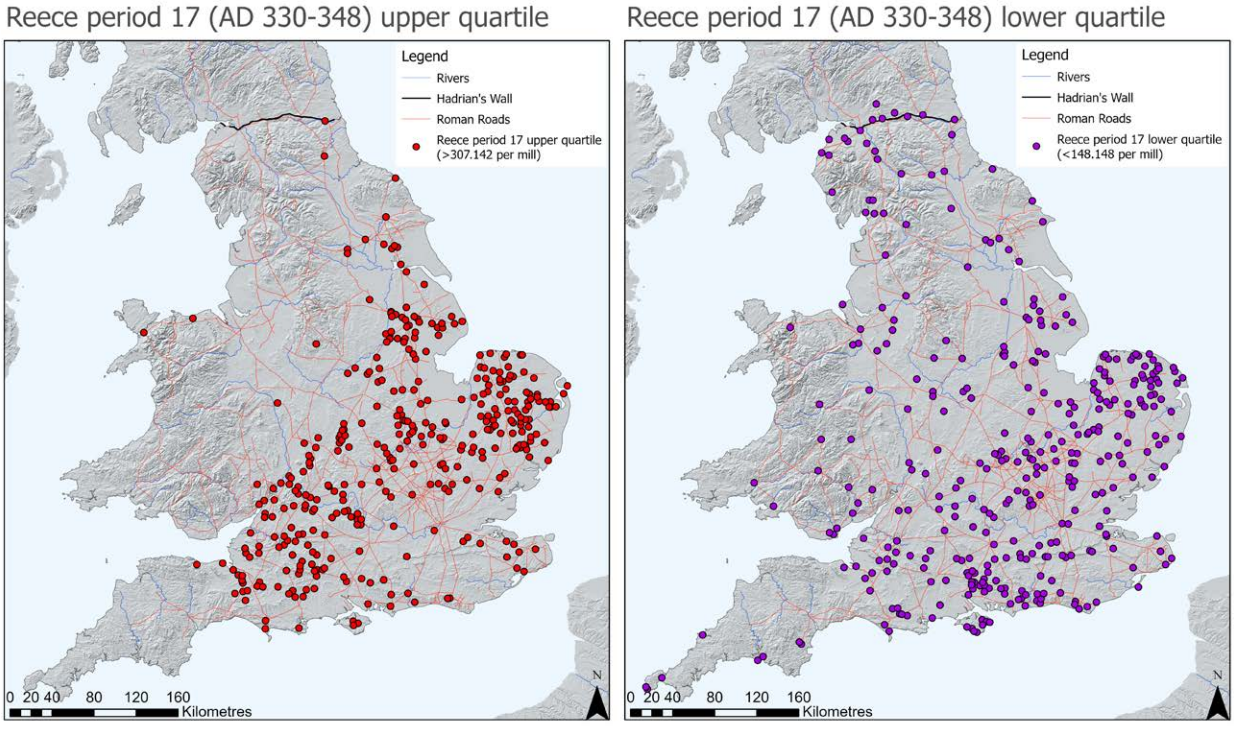


Figure 11.18 - The upper and lower quartile of sites from Reece period 17 (AD 330-348) based on their per mill.

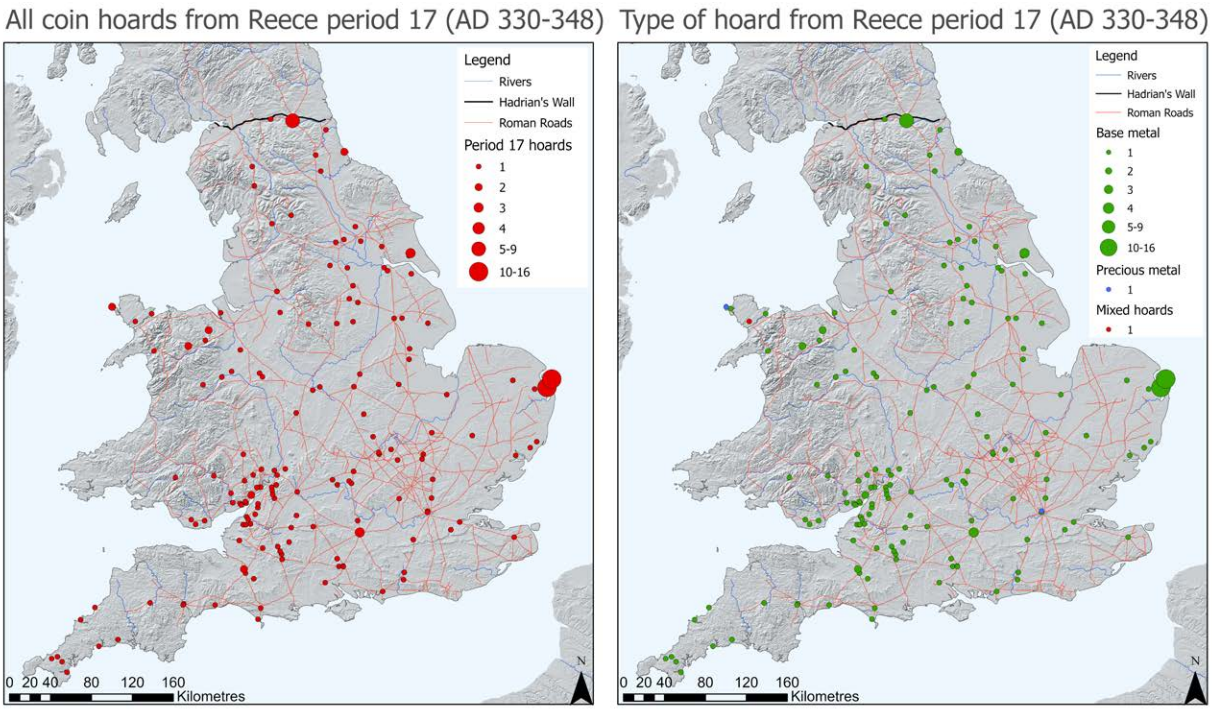


Figure 11.19 - All coin hoards from Reece period 17 (left), the number of nummi hoards, precious metal hoards and mixed hoards of precious and base metal hoards from Reece period 17 (right)

these coins remains widespread geographically across Britain (See Figure 11.16). Coin loss in Wales and the north remains substantially lower than the national average for this period (Figure 11.20). Yorkshire and the Humber, the East Midlands and the South-west are all above the British average.

The South, the East Midlands, East Anglia all have a high proportion of sites in the upper quartile (Figure 11.21). A further cluster north of the Humber broadly reflects a change noted in other distributions such as belt fittings might relate to changes in supply networks around AD 350/370. A higher number of sites in the lower quartile are mapped in the West Midlands as well as the west of Hadrian's Wall and the environs of Winchester.

Period 18 hoards

A total of 139 hoards terminate with coins dating to Reece period 18 (Figure 11.22, left). The main concentrations occur in the environs of the Severn Estuary, the South-east and along Ermine Street and Dere Street. Few hoards are recorded from Wales. While there is a slight increase in the number of precious metal or mixed hoards, the majority continue to be of nummi (Figure 11.22, right). The precious metal hoards follow the broad pattern of hoarding in this period.

Period 19 (AD 364-378)

A significant number of coins from this period are found in East Anglia as well as the south (See Figure 11.16). Aspects of this pattern were previously identified by Moorhead (2009), interestingly such sites in Norfolk are located to the west of the county with few sites to the east coast. Assemblages to the north of York are also generally limited.

Greater regional variation in coin loss occurs in period 19 with the north of England, Wales, the West Midlands, London and East Anglia all having below average coin loss. The quantities of coins per mill in the North and Wales particularly low (Figure 11.23). Coin loss per mill is greatest in Yorkshire and the Humber.

The pattern of increased coin loss in the south and parts of East Anglia is visible when we consider the upper quartile of the dataset (Figure 11.24). Clusters of sites occur north of the Humber which also includes signal stations on the coast. The largest clusters occur in the South-west and includes sites in the Upper Thames

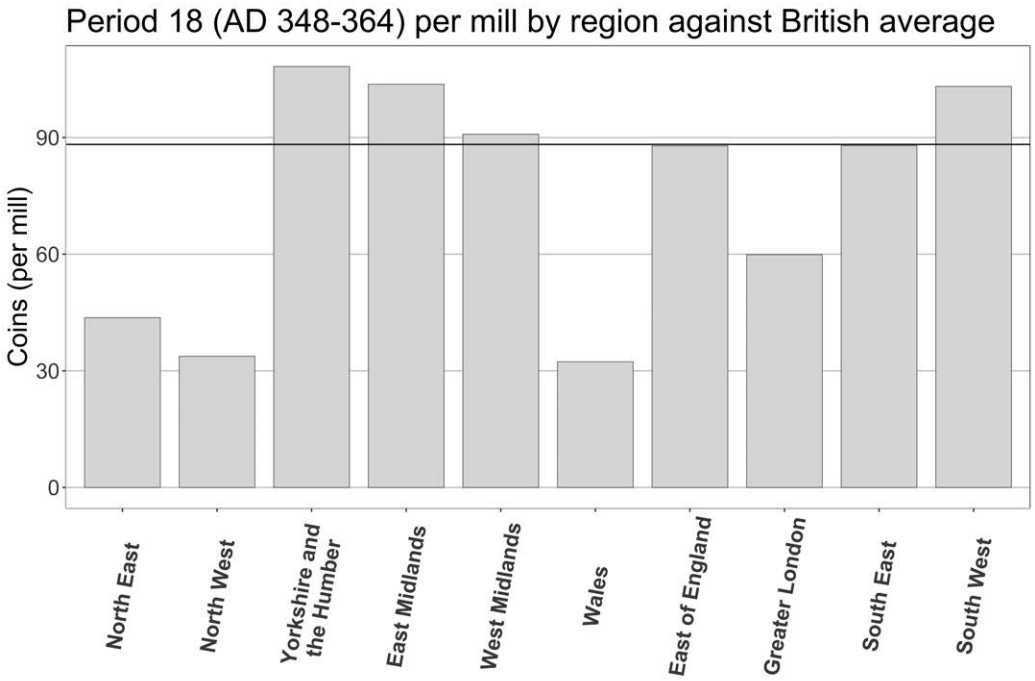


Figure 11.20 - Comparison of the mean for each region of Britain against the British average for Period 18 (AD 348-364) depicted with a horizontal line.

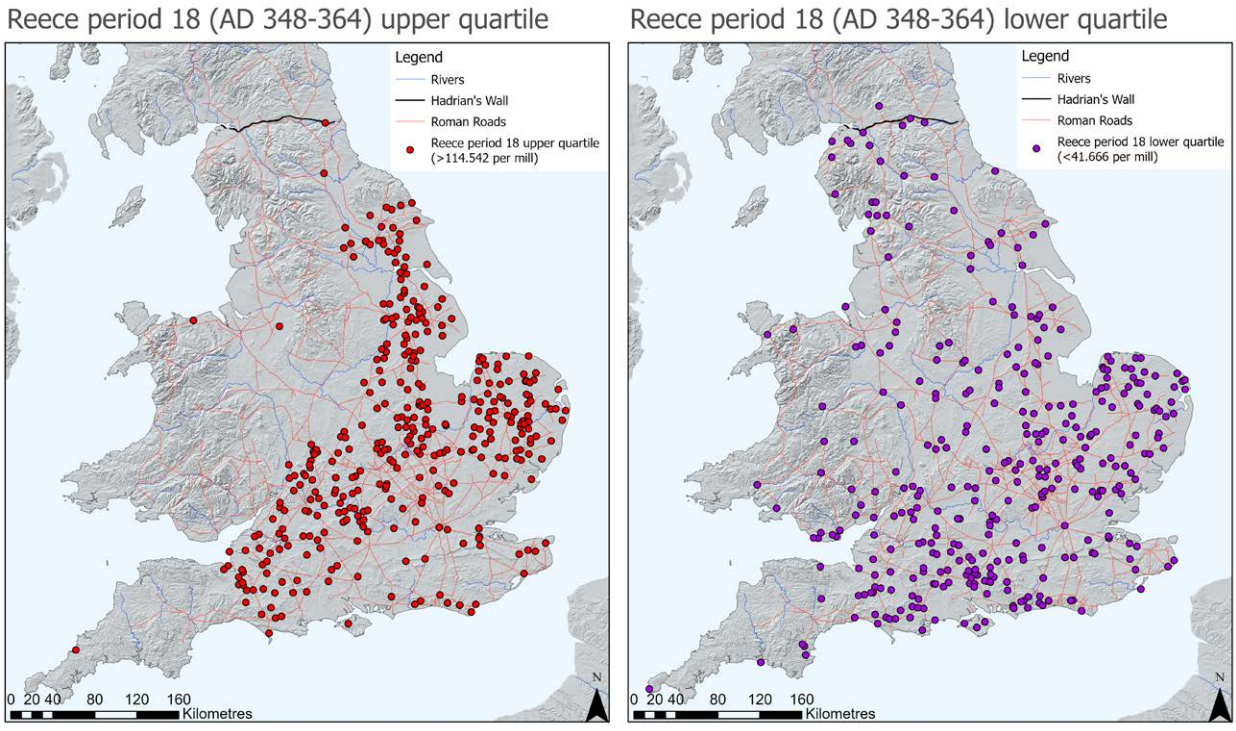


Figure 11.21 - The upper and lower quartile of sites from Reece period 18 (AD 348-364) based on their per mill.

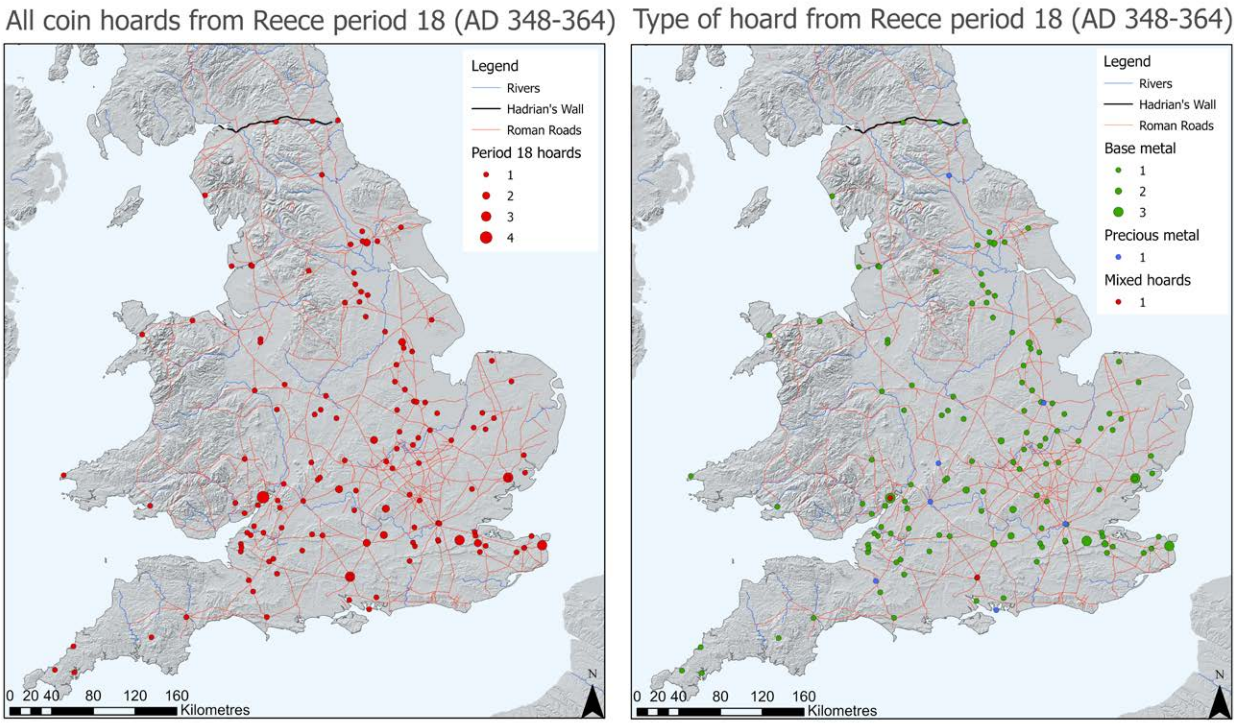


Figure 11.22 - All coin hoards from Reece period 18 (left), the number of nummi hoards, precious metal hoards and mixed hoards of precious and base metal hoards from Reece period 18 (right)

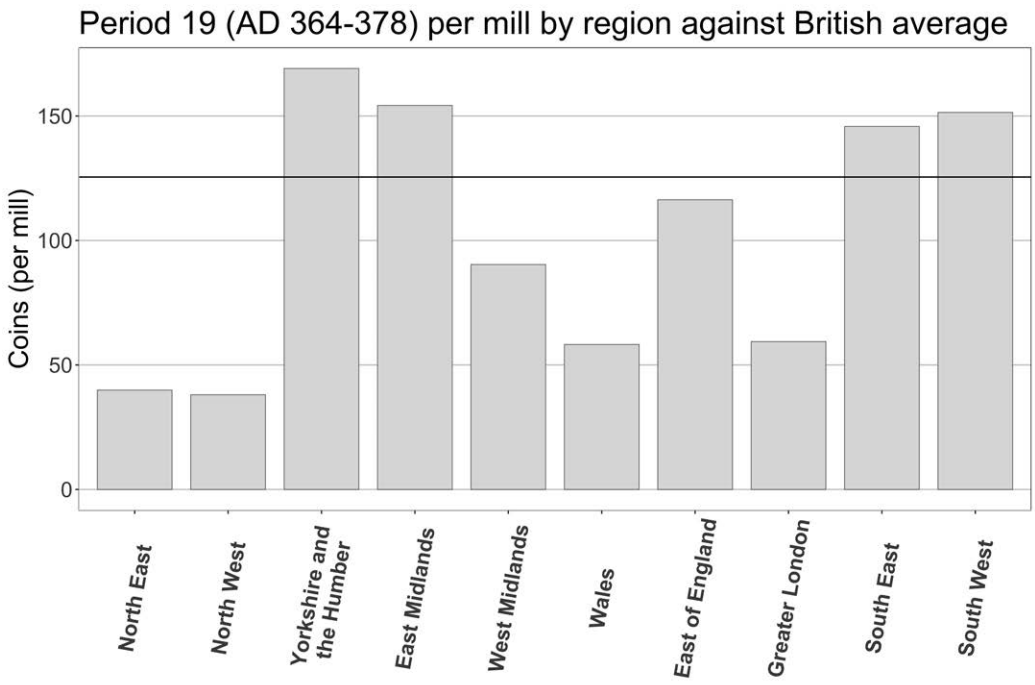


Figure 11.23 - Comparison of the mean for each region of Britain against the British average for Period 19 (AD 364-378) depicted with a horizontal line.

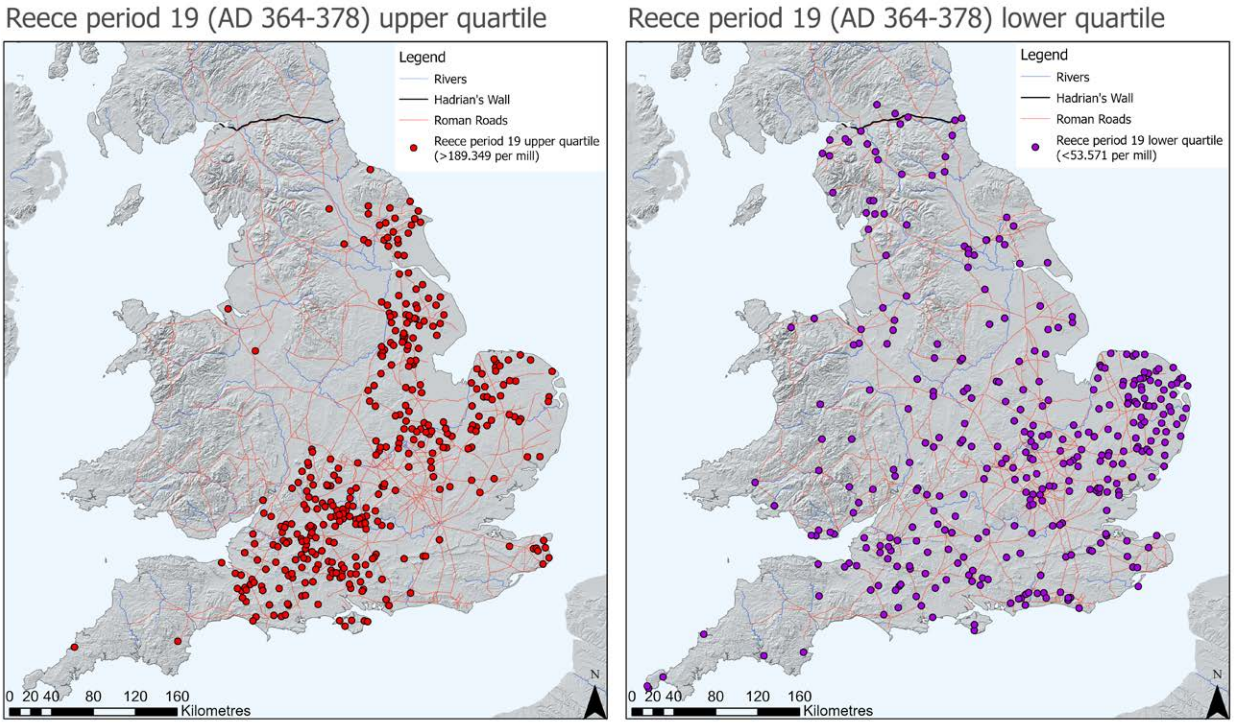


Figure 11.24 - The upper and lower quartile of sites from Reece period 19 (AD 364-378) based on their per mill.

Valley as well as in the environs of Winchester. Where sites in East Anglia have high quantities of period 19 coinage they are situated by the Great Ouse river. Sites falling in the lower quartile become more widespread across Britain with significant quantities in Suffolk, Essex, Sussex, in Wales and the north of Britain.

The existence of sites with significantly above average coin loss from Reece period 19 is a phenomenon previously noted by Sam Moorhead (2001a; 2001b; 2009). He argued that sites in the south of Britain, along Dere Street from Lincoln to York and in the north of Norfolk all had high proportions of Valentinianic coinage and an increased number of coins hoards terminating in the emperor Probus (AD 276-282). These regions have been considered prosperous in the late Roman period due to grain exports to the and high levels of period 19 coinage here perhaps represent an increase in numbers of public servants (Moorhead, 2009; Brindle, 2017; Henry *et al.*, 2019; Henry and Moorhead, 2022).

Period 19 hoards

A total of 91 hoards were deposited in period 19 with an emphasis around the Severn Estuary and the south of the diocese (Figure 11.25, left). A smaller number occur around the eastern section of the Wash and in North Wales. In this period higher numbers of precious coin hoards occur which coincides with the pattern of site finds. The emphasis of these precious metal hoards is to the south of the diocese with few precious metal hoards recovered along the east coast of Britain (Figure 11.25, right).

Period 20 (AD 378-388)

The supply of coinage from period 20 to Britain was generally low and this is reflected in the dataset (See Figure 11.16). There remain similar patterns in the distribution of this coinage including the north of Norfolk, along Ermine and Dere Street and in regions of the south of Britain.

The North, West Midlands and Wales are all below the national average (Figure 11.26), they are particularly low in the North-east. Coins from this period occur in greatest proportions in the East Midlands followed by the South-east.

Across Britain these coins are generally rarer, and this is reflected with the lowest quartile where all sites

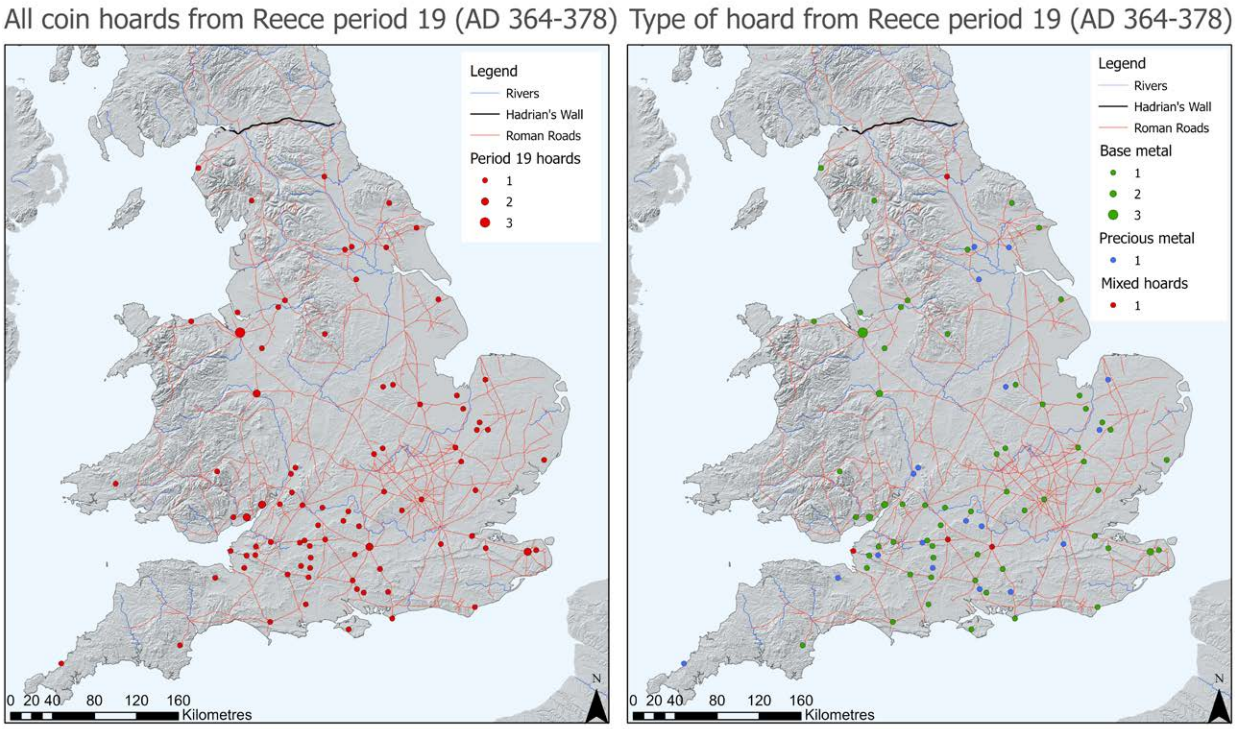


Figure 11.25 - All coin hoards from Reece period 19 (left), the number of nummi hoards, precious metal hoards and mixed hoards of precious and base metal hoards from Reece period 19 (right)

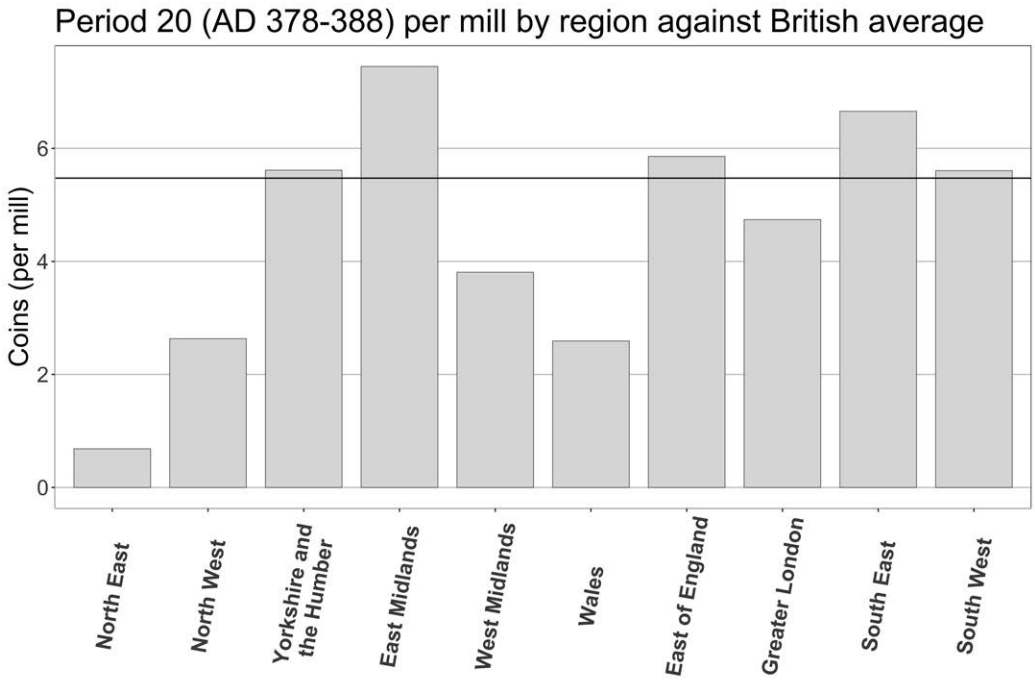


Figure 11.26 - Comparison of the mean for each region of Britain against the British average for Period 20 (AD 378-388) depicted with a horizontal line.

where they are absent are mapped (Figure 11.27). Consequently, only the upper quartile is discussed here. Clusters occur along Dere Street, in the East Midlands and in the South. A number of sites are visible along the coast including the signal stations in Yorkshire and a number of Saxon shore forts. It is possible that some other sites along the coast could represent such sites lost through coastal erosion.

Period 20 hoards

A total of 36 hoards are recorded that terminate in coins from period 20 (Figure 11.28, left). Given the quantity little can be said in many aspects of the distribution. Interestingly while the Severn Estuary is not a region which sees many sites in the upper quartile it is a region where hoards from this period occur in highest numbers. The majority of the hoards from the environs of Severn Estuary are comprised of nummi which follows patterns previously seen with other periods (Figure 11.28, right). Of the remaining hoards aside from six further nummi hoards these consist of precious metal hoards.

Period 21 (AD 388-402)

The production of nummi at sites north of the Alps ceased in AD 395 and Reece period 21 is the last point where Roman coins are brought to Britain in large numbers (See Figure 11.16). In the south-east and south-west these coins occur in greater numbers than the national average – excluding Richborough (Figure 11.29). The north of the diocese and the West Midlands are all substantially below the national average but interestingly the number of coins from this period from Wales is greater than preceding periods.

As with period 20 the lower quartile includes all sites where coins from period 21 are absent. In the upper quartile the distribution has contracted with concentrations along Dere Street in the East Midlands and the South as well as in Kent (Figure 11.30). This distribution could be considered a proxy for the regions that the state felt were significant at the very end of the fourth century or into the fifth. Areas such as the north of Norfolk, north of the Humber or in Kent include sites which cluster around key strategic

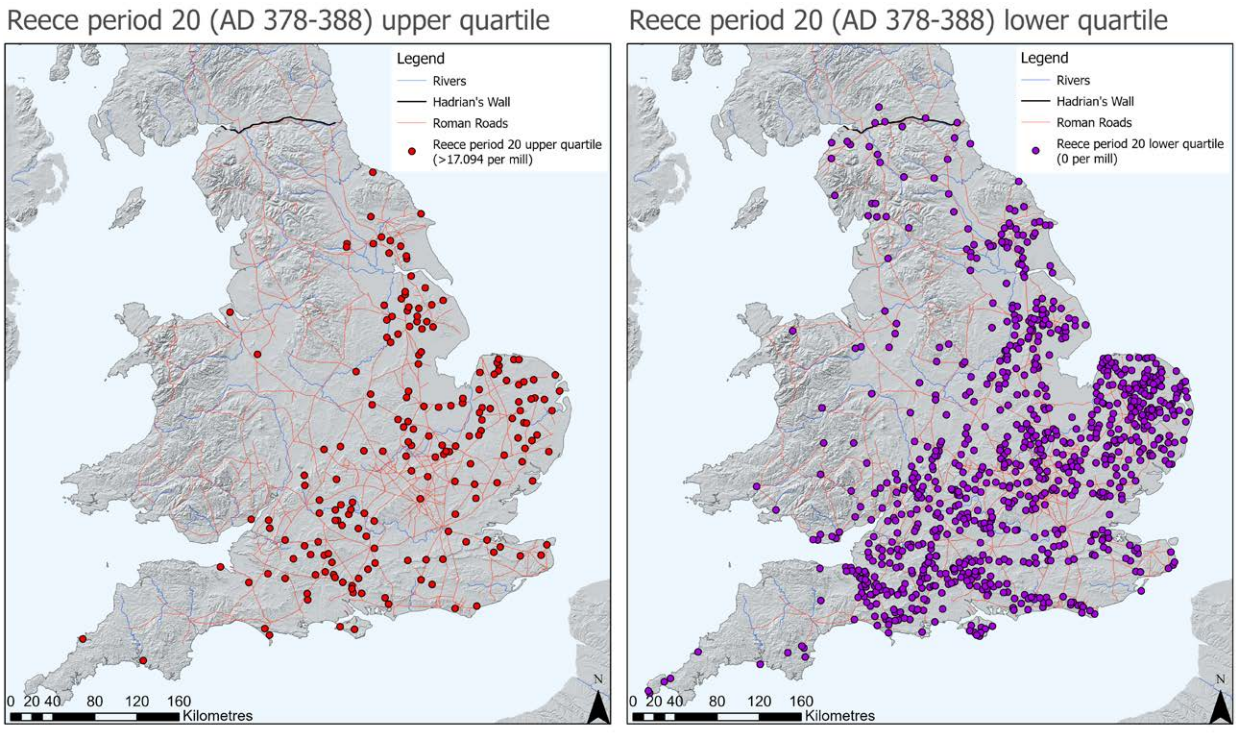


Figure 11.27 - The upper and lower quartile of sites from Reece period 20 (AD 378-388) based on their per mill. The lower quartile is 0 for this particular period and in general the coins are rare as site finds.

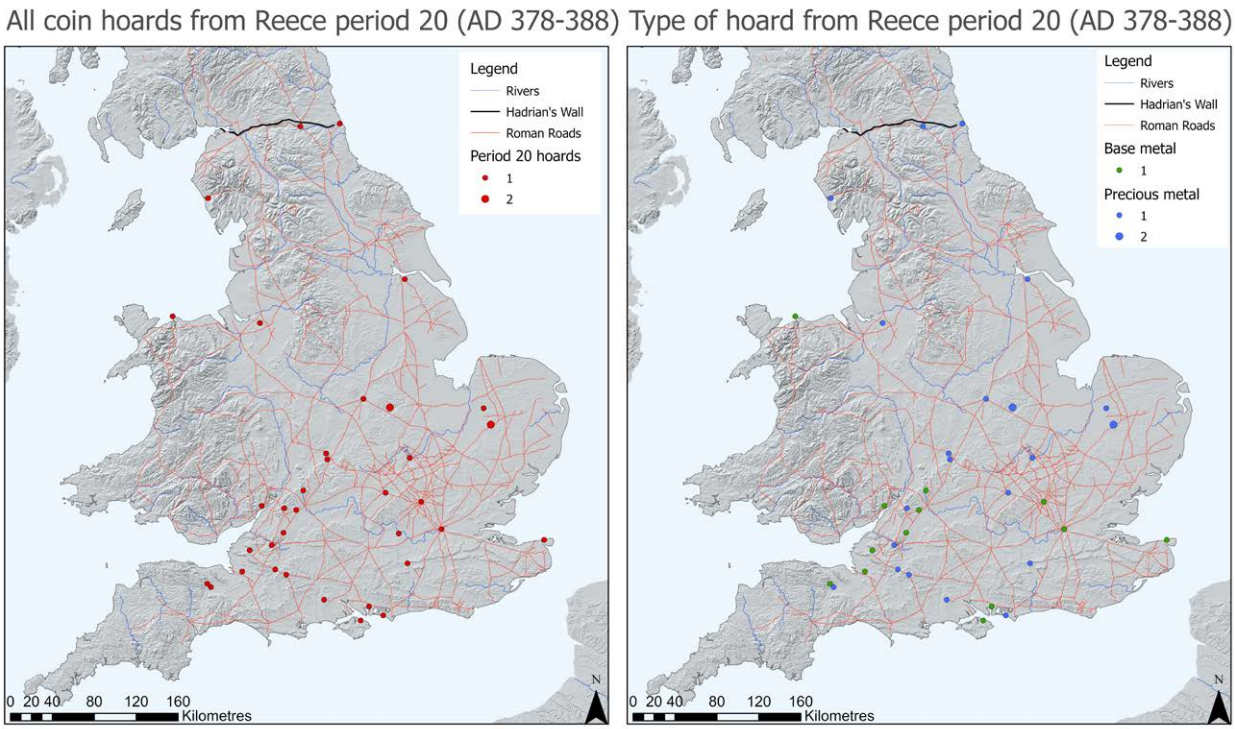


Figure 11.28 - All coin hoards from Reece period 20 (left), the number of nummi hoards, precious metal hoards and mixed hoards of precious and base metal hoards from Reece period 20 (right)

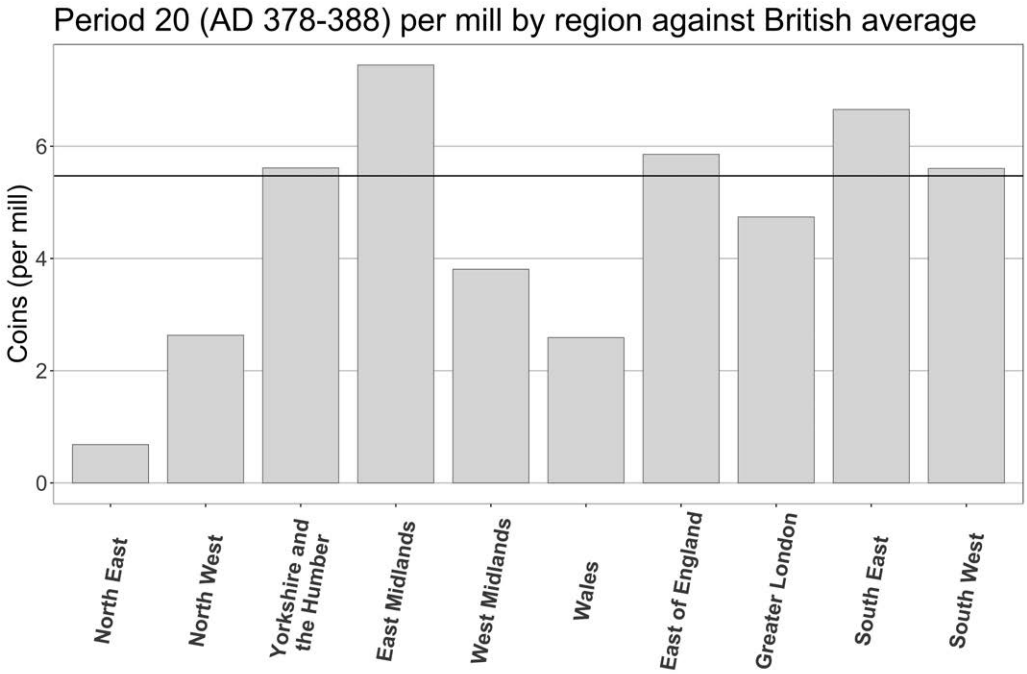


Figure 11.29 - Comparison of the mean for each region of Britain against the British average for Period 21 (AD 388-402) depicted with a horizontal line.

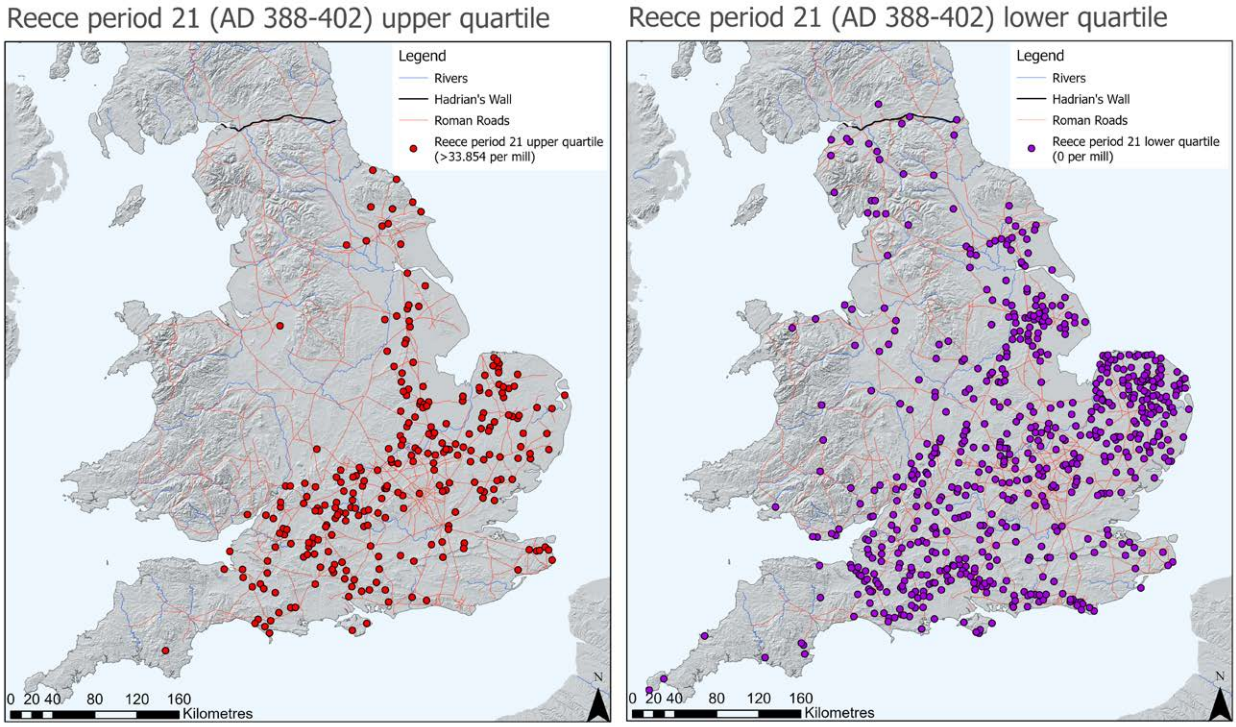


Figure 11.30 - The upper and lower quartile of sites from Reece period 21 (AD 388-402) based on their per mill. The lower quartile is 0 for this particular period, these coins are more common than those struck in Reece period 20.

locations such as the Saxon shore forts or signal stations. In other regions as Walton (2012) noted the distribution is found along the road network but specific rivers retain key importance. Interestingly Suffolk and Essex have greater coin loss in this period than in periods 17-19. Might this hint at significant changes occurring here at the turn of the fifth century.

Period 21 hoards

A total of 179 hoards have been recorded from Britain that terminate with coins of Reece period 21 (Figure 11.31, left). This significant increase in hoarding in this period is much higher than in other regions on the continent and the number of silver hoards from this period has also been considered notable (Bland, 1997, 39; Robertson, 2000; Hobbs, 2006; Bland *et al.*, 2013; Bland, 2018; Bland *et al.*, 2020, 276). Significant numbers of hoard still occur in the south of Britain as well as between London and Richborough, East Anglia and around the Wash as well as in Yorkshire. Few hoards are known from Lincolnshire in this period which is notable and will be considered further in the discussion chapters.

When we consider the types of hoards deposited from period 21 some significant distributions can be identified (Figure 11.31, right). As with previous periods a number of nummi hoards occur in the environs of the Severn Estuary as well as in the environs of Richborough. Interestingly, there seems to be a link between nummi hoards and key rivers such as the Severn, the Thames, the Great Ouse and the Nene. Precious metal hoards occur predominantly to the South of Salisbury Plain, in East Anglia and along Dere Street in Yorkshire.

Discussion

The analysis of site finds above has confirmed a number of significant trends which occur in the later Roman period including a clear east/west divide (Reece, 1995; Hobbs, 2006). The analysis of this substantial corpus emphasises much greater variation than previously noted, and we can see much of East Anglia has below average coin loss for the later Roman period which is masked in previous analysis. Where above average coin loss occurs in the later fourth century it is in concentrated regions primarily around the Wash or the Great Ouse. This river appears to be a key factor

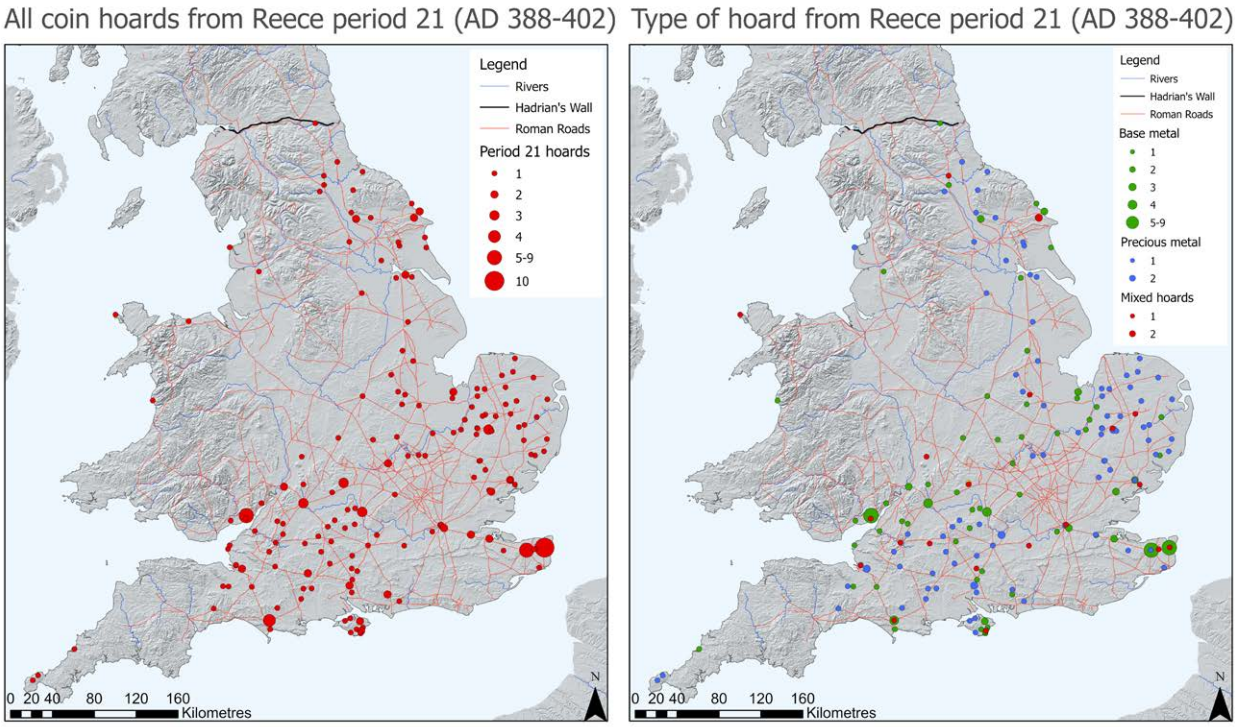


Figure 11.31 - All coin hoards from Reece period 21 (left), the number of nummi hoards, precious metal hoards and mixed hoards of precious and base metal hoards from Reece period 21 (right)

in the distribution pattern, potentially supporting the argument of coin loss representing regions which were prosperous due to grain exports (such as Moorhead, 2009).

Over time the supply and use of coinage contracts across the diocese – a trend previously emphasised (Walton, 2012; Moorhead and Walton, 2014, 104ff; Esmonde Cleary, 2017, 11). Consideration of parishes per mill further emphasises this contraction over the period of c. 50 years although coins still permeated a swathe of the diocese. The reduction of supply and the cessation of production of nummi has implications for taxation in the later fourth and early fifth century. It has been argued that coinage can be used as a proxy for regions that should perhaps be considered important to the state in terms of taxation. If this is indeed the case regions such as the northern frontier and large parts of the southern and eastern coast appear to be less important. This pattern bears a number of similarities with the distributions of belt sets (compare Type II belts with Phase D coinage for example).

Work by Gurney (1995) and Plouviez (1995, 74) considering artefactual and numismatic evidence from 'small towns' in Norfolk and Suffolk demonstrated that coin loss in urban and nucleated centres are exaggerated patterns seen in their environs. The ebb and flow of one was a significant influence on the other. This dataset further demonstrates this pattern. In the late Roman period the most significant example of this perhaps is the patterns seen around Winchester or Chichester.

Systematic analysis of coins from this corpus also emphasises that by AD 450 the coin using economy of Britain had ceased. This has implications for both the market economy as a whole – primarily through bronze nummi – as well as the taxation cycle. These questions will be further explored with the *siliquae* and *solidi* datasets, key denominations for the taxation cycle.

Key observations

In this study a substantial corpus of coinage from sites across Britain has been mapped and considered using a variety of techniques. We can see that coin loss in the fourth century is substantial and the vast majority of the diocese had access to, and utilised, coinage as

part of the taxation/pay cycle as well as through the monetary economy. This over the course of the second half of the fourth century retracted and ceased by the mid-fifth century. Mapping the upper and lower quartiles for each phase offers new insights compared to a consideration of sites where coins from a particular period as present as it informs us of the ebb and flow of settlements across the diocese.

- The analysis has demonstrated clear divergence between military sites and other sites in the settlement hierarchy in Britain. This is emphatic in the late Roman period and emphasises the settlement forms which remained of vital importance to the state. Often this is represented with a significant peak in coinage of the House of Theodosius noted at large towns and defended *vici.*
- Cumulative analysis demonstrates different coin patterns noted at the military sub-groups. Similarities are noted in the profile from the Pennines and Hadrian's Wall. Variation can be identified at Saxon shore forts, this is chronological as these sites were constructed at a later date.
- The profiles for urban centres, defended *vici* and undefended nucleated settlements varies highlighting the changing roles of these centres. As has been noted by Millett (1990) there is a general decline at *civitas* capitals and an increase in coin loss at undefended nucleated sites (described as small towns by Millett). The key difference occurs at defended *vici*, this appears to signify their importance to the late Roman state.
- The analysis for the fourth century has shown regional variation with the majority of coin loss occurring to the south of the Fosse Way, in East Anglia or along Dere Street from Lincoln to York. There is a reduction over the final decades of the fourth century which correlates with the changing distribution of late Roman belt sets.
- Spatial and social analysis of numismatic datasets in a similar fashion to this chapter has not been undertaken based on the continental material. We can identify some clear trends such as significantly higher proportions of fourth century coinage occurring in Britain compared with Northern France, Southern France and Italy based on research by Richard Reece (1973). The scale of the data available is lower than that available for Britain, partially due to PPG16 as well as the PAS. As a comparator c. 5,000 coins (site finds) have been recorded with the Portable Antiquities of the Netherlands (PAN).

12. *Siliquae* and *Solidi*

Although included in the general distribution above silver *siliquae* and gold *solidi* are also considered separately due to their specific role in the taxation cycle and to evaluate the continued use of currency (rather than coin as bullion) in the fifth century. The typological studies and production of coinage was discussed in Chapter 3.

The watersheds in coin production affecting the North-western provinces (c. AD 395 for bronze, AD 402 for silver and AD 408 for gold) led to drastic changes in supply of coinage to Britain during a period of turmoil in general for the North-west provinces culminating with Barbarian incursions in AD 405/406 and the usurpation of Constantine in AD 407. Detailed analysis of *siliquae* and *solidi* can shed light on coin use and the phenomenon of clipping in the fifth century. This chapter will culminate in the consideration of both datasets of site finds by Reece issue period and Phase followed by a discussion of both datasets and key observations noted in the patterns.

Categorising clipped *siliquae* – clip factor

The phenomenon of clipping of silver *siliquae* appears to coincide with the decline in supply. While some fraudulent activity seems to have occurred from the 380s onwards, in the early fifth century *siliquae* become heavily clipped (Guest, 2005; Abdy, 2013; Guest, 2014, 119-123; Abdy, 2020). Clipped *siliquae* potentially remained in circulation for decades, making definite conclusions difficult at present.

As part of his analysis of the coins from the Hoxne hoard Peter Guest (2005, 111) defined four categories of clipping described as clip factors 1-4 (Figure 12.1 and Table 12.1). This enabled analysis of the temporal variation in the proportions of coins clipped to different degrees in the hoard.

Identifying the level of clipping based on photographs can be challenging as with CF 1 and CF 2 in particular the edges could be lightly clipped and subsequently filed down. While the *siliquae* corpus will be divided by clip factor, it will be argued as part of this study that the simpler categorisation of unclipped, lightly clipped and heavily clipped is as informative and removes some of the subjective elements.

Distribution

In contrast to the Continent, there are many silver hoards and site finds in Britain, and these *siliquae* are also regularly clipped. The date clipping occurred is debated and appears to have occurred in two phases: light clipping from the 380s onwards (CF 1 and CF 2) and intense clipping in the early fifth century (CF 3 and CF 4). The latter may have occurred after AD 406 as the large hoard from Stanchester, Wiltshire had no clipped coins (Guest, 2005; Abdy, 2013; Guest, 2013, 123; Abdy, 2020). While *solidi* are recorded as site finds they remain less numerous than *siliquae*. This in part is due to their substantial value.

Siliquae

The number of *siliquae* recorded as site finds in Britain has vastly increased thanks to the PAS database. With the exception of Richborough, *siliquae* are generally rarely found on excavations, only a handful were recorded as part of the RRS project (Reece, 1972; Brindle, 2017, 261). The last major study of these coins was undertaken by Bland *et al* (2013) who considered a corpus of 700 examples recorded from the PAS. They noted challenges in identifying the degree to which a coin had been clipped based on images and an absence of photographs of these coins in some regions of Britain. Attempts were made to mitigate this through mapping clipped *siliquae*, against the whole dataset including examples without photographs.

Spatial analysis was undertaken on their complete corpus as well as Reece periods 18, 19, 20 and 21. The analysis emphasised that these coins were far more common as site finds than had previously been recognised. The main concentrations occurred in the South, East Midlands, East Anglia, and Yorkshire and the Humber (Figure 12.2).

Analysis of clipped coinage demonstrated that during the fourth century the quantity of clipped coins recorded with the PAS increases (Bland *et al.*, 2013, 117). For Reece period 18 (AD 348-364), 63 of the 237 regular *siliquae* were clipped (26.6 per cent). In contrast from Reece period 21 (AD 388-402), 138 of the 173 *siliquae* were clipped (79.8 per cent). This has broad similarities with hoards such as Hoxne which emphasise the high

Figure 12.1 - The clip factors developed by Guest (2005, 111)

Table 12.1 - The clip factors defined by Guest (2005, 111) and the three categories used within parts of this study

Clip factor	Description	Category
CF 0	Unclipped	Unclipped
CF 1	Edges lightly clipped leaving obverse legend largely intact	Lightly clipped
CF 2	Some of the obverse legend clipped away	
CF 3	Legend almost entirely removed by clipping	Heavily clipped
CF 4	Coin is heavily clipped, leaving only the obverse bust and no traces of the inscription	

numbers of clipped coinage in circulation in the early fifth century.

Solidi

The distribution of gold coins and hoards have been considered by Bland and Loirot (2010, Figures 33 and 34) from the fourth and fifth centuries. They highlight that gold Roman coins from the fourth century occur across the diocese while in the fifth century there is a marked concentration in East Anglia and the South-east (Figure 12.3). They emphasise that gold coinage in particular has clear associations with particular sites of sites: major urban centres and military sites, particularly the Saxon shore forts (Bland and Loriot, 2010, 54).

Continuation into the fifth century

Resolution of the question of the longevity of *siliquae* and *solidi* remains a challenge given their value as potential bullion. The crucial question is how long this material remained in circulation as part of a tri-partite currency following the Roman form. This has been an area of debate, the general consensus appears to suggest that after AD 410 a Roman currency system remained in place perhaps until c. AD 425 (Walton, 2012). When the Patching hoard was deposited after c. AD 461 the absence of clipped *siliquae* suggests coinage by this time was bullion (White *et al.*, 1999; Abdy, 2013).

Research questions

The question of longevity of the Roman currency system is central to the overarching narratives of the end of Roman Britain that focus on continuity, rupture and transformation. To explore this in greater detail the corpora will be considered spatially and statistically using Reece period and Phase analysis.

Can detailed and systematic analysis of these corpuses offer insights into the regions where a currency-based economy continued? Depending on when clipping occurred, and who undertook it, we might expect different patterning in the regions of Britain.

The dataset

The corpus of *siliquae* will consist of PAS finds as this dataset generally includes photographs allowing analysis of the degree of clipping which occurred (Available on the ADS - https://doi.org/10.5284/1090416). It is recognised that in contrast to other datasets this will lead to higher levels of bias in the corpus, particularly relating to supressing the number of coins from areas liable to metal detecting constraints. Clipped *siliquae* will be recorded following the clipping factor developed by Guest (2005).

The *solidi* dataset combines the single finds of gold coins recorded by Bland and Loirot (2010) with more recent PAS additions (Available on the ADS - https://doi.org/10.5284/1090416). Some examples recorded by the former have been excluded if uncertainties

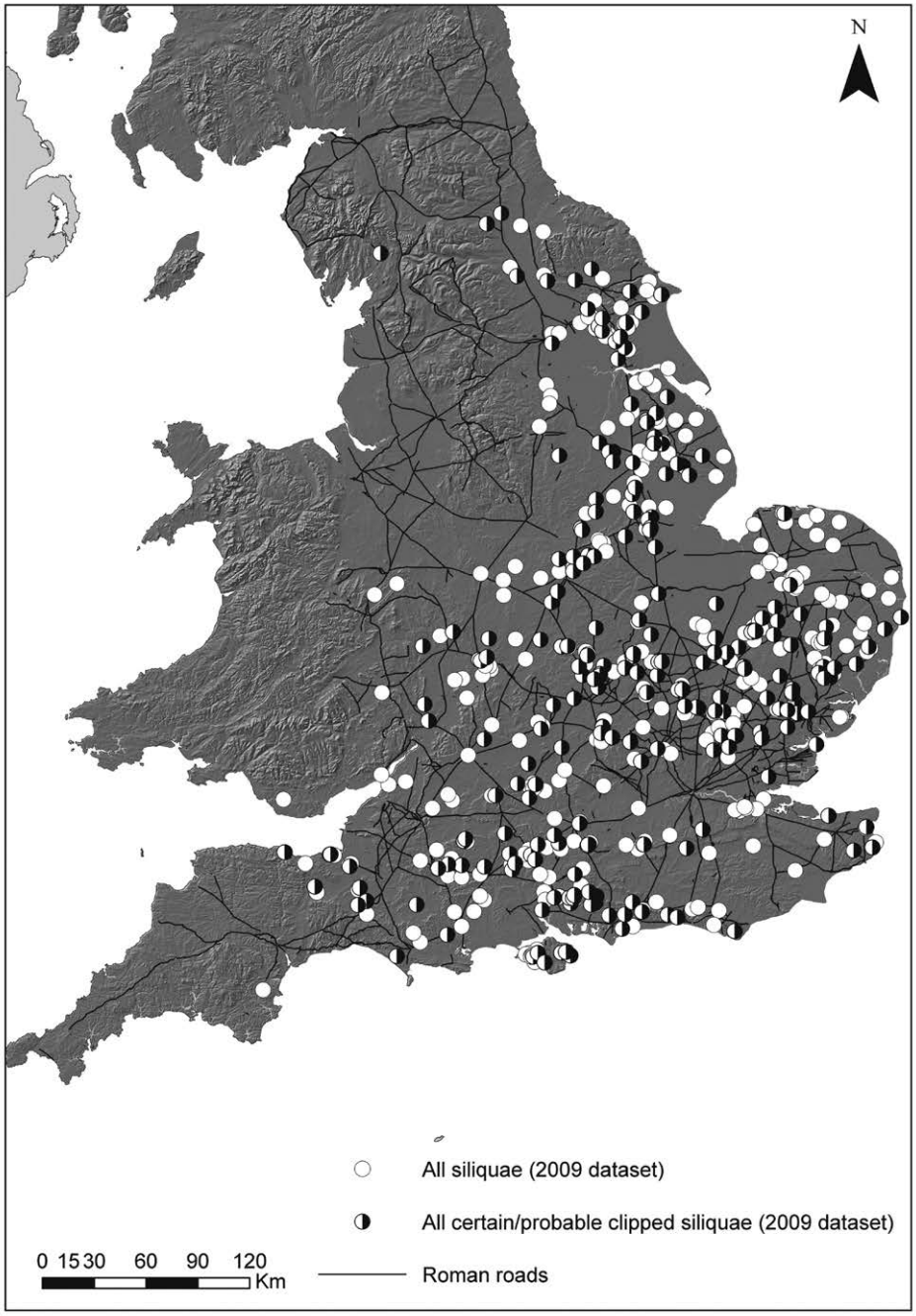


Figure 12.2 - The distribution of 700 *siliquae* analyses by Bland et al (2013, Illustration 10.1)

regarding the provenance were noted, for example entry 284 which either came from Reculver or Richborough (Bland and Loriot, 2010).

Results

A total of 2,344 *siliquae* and 248 *solidi* have been considered as part of the analysis here. The results are presented differently to the coin corpus as a whole due to the sample size. Here the primary foci will be on evaluating how these coins were used in the fourth and the fifth century, as well as the phenomenon of clipping. When considered in combination, these datasets can emphasise the regions which continued to use coinage as part of a monetary economy or through taxation. This can be used as a proxy to highlight regions which

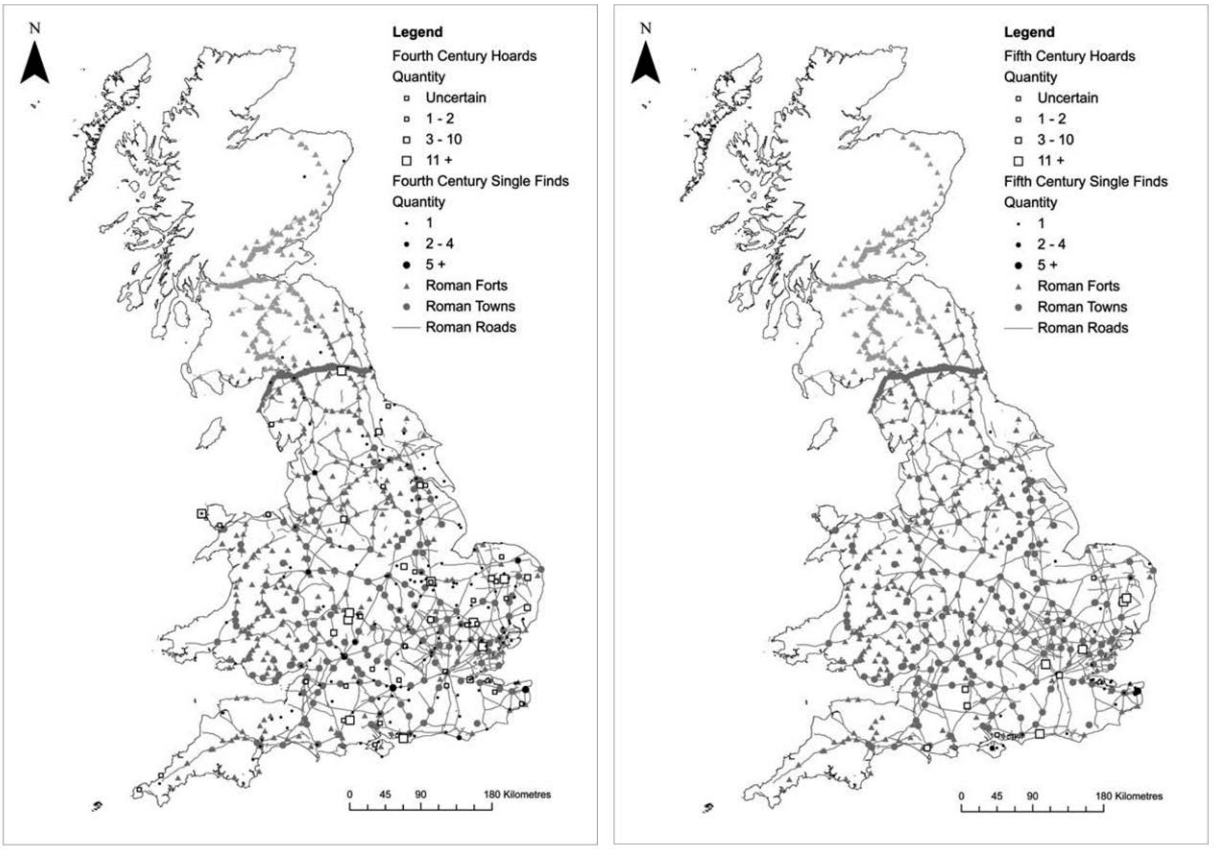


Figure 12.3 - A comparison of fourth and fifth century hoards and single finds by Bland and Loriot (2010)

continued to follow Roman forms of state control into the fifth century. As has been presented, this is likely to have ceased by the 460s, yet the results of the analysis below support the argument that a central system remained in place.

Siliquae

The *siliquae* corpus of 2,344 coins is derived solely from the PAS. Significant quantities occur in the south, east Midlands, parts of East Anglia and Yorkshire and the Humber (Figure 12.4). While some absences of evidence should be treated with caution due to constraints to metal detecting such as on Salisbury Plain in Wiltshire or in the New Forest in Hampshire; the limited number of *siliquae* in the environs of Cirencester is notable given the high quantity of House of Theodosius nummi from the region.

The quantity of *siliquae* recorded by region varies drastically with greatest quantities occurring in the South-east, East Anglia, East Midlands, South-west and Yorkshire and the Humber (Figure 12.5). These regions will form the majority of the subsequent analysis.

ABCDEF Phases

The spatial analysis of *siliquae* will focus on Phases D (AD 330-364) and E (AD 364-402) due to the limited number of *siliquae* from Phase F (AD 402-498) in the PAS database. A total of 834 *siliquae* are recorded from Phase D and 1,406 from Phase E. The increased quantities in Phase E are partially reflected in the rarity of *siliquae* from AD 330-348 as well as changes in the taxation system and an increase in production after the reforms of Valentinian and Valens.

When the two phases are compared, we can see that in Phase D *siliquae* occur in greatest numbers in the south (primarily Wiltshire and Hampshire), the Isle of Wight, the East Midlands, along Ermine Street and in in parts of East Anglia (Figure 12.6, left). Limited numbers are recorded from the north of Norfolk and in the environs of Cirencester. There are few examples recorded in

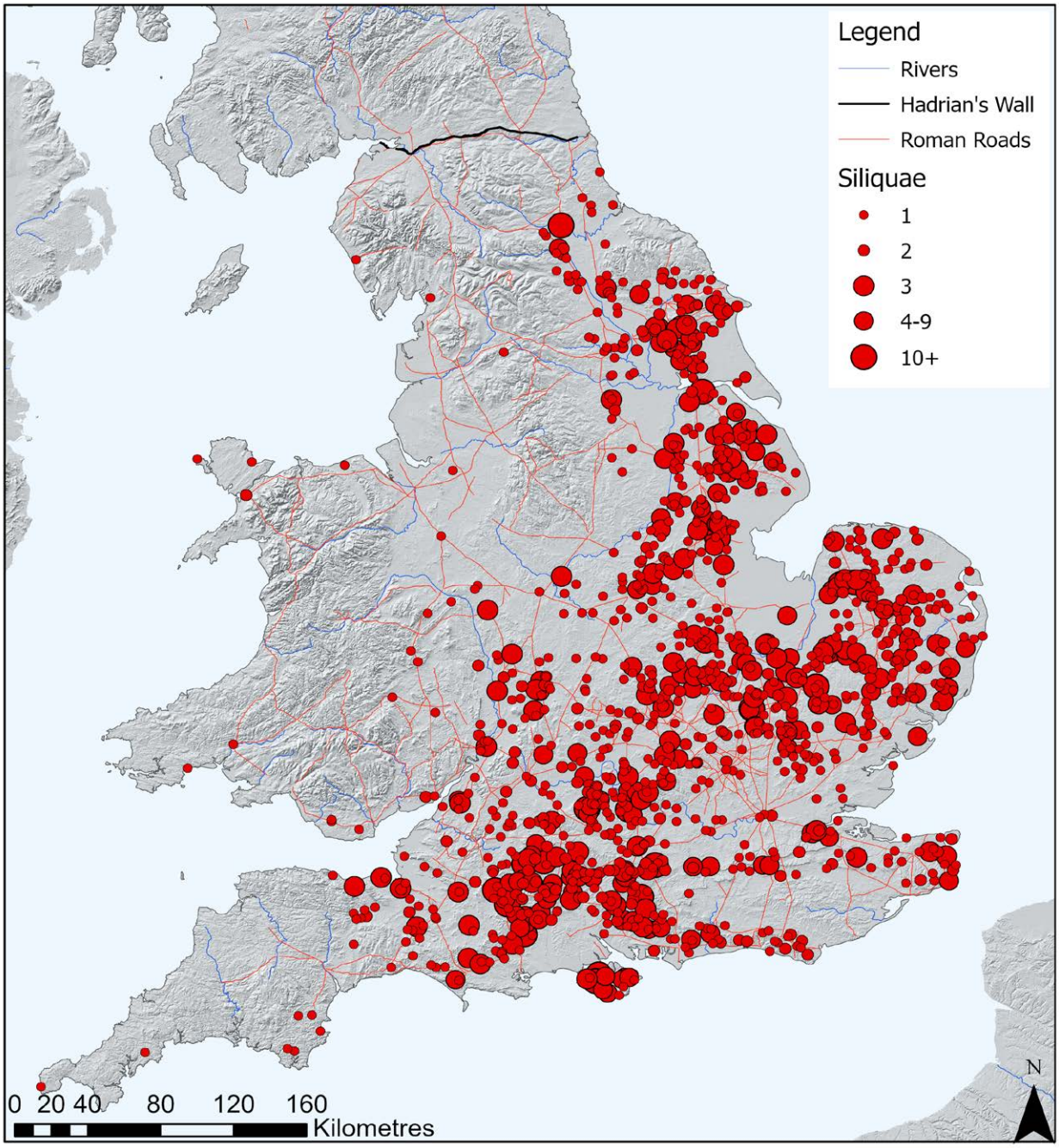


Figure 12.4 - The distribution of all *siliquae* from the PAS database

the North-east and North-west. This partially reflects the distribution of metal detecting finds as a whole, but late Roman coinage in general is not recorded in large quantities in these regions. In Phase E the picture is similar but there is a more even spread in coin deposition in the main coin using regions of the diocese (Figure 12.6, right). The highest quantities still occur in the south, the east midlands and Yorkshire and the Humber along Ermine Street. *Siliquae* also occur in higher numbers in the environs on Cirencester, albeit they remain limited.

Reece periods

As part of this analysis Reece periods 17-21 are mapped to consider potential changes in the distribution. This

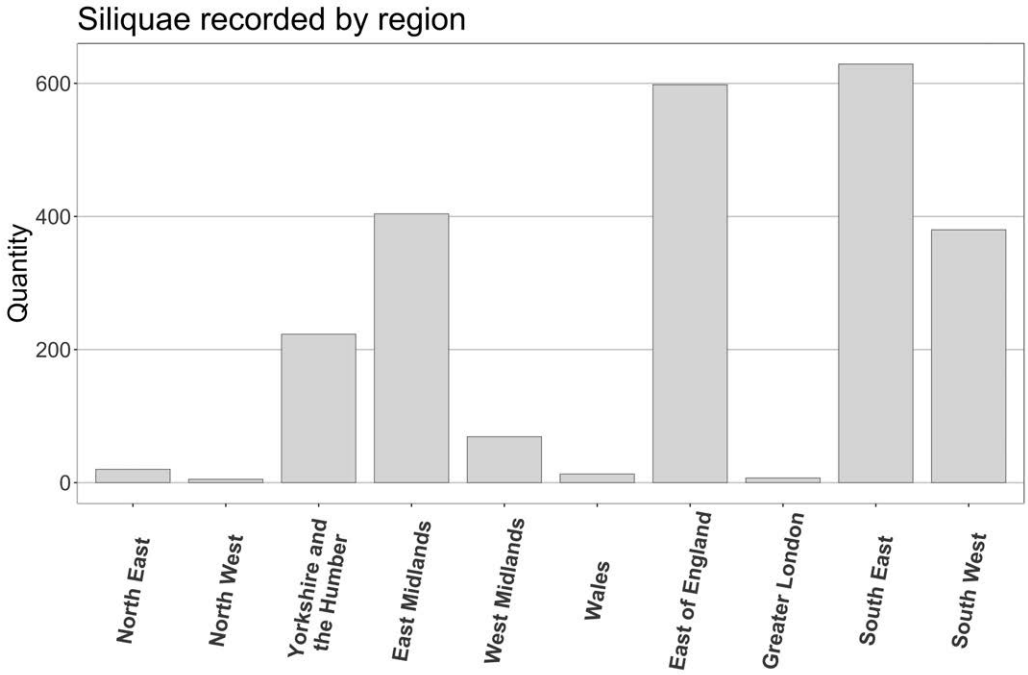


Figure 12.5 - The quantity of *siliquae* recorded with the PAS by region

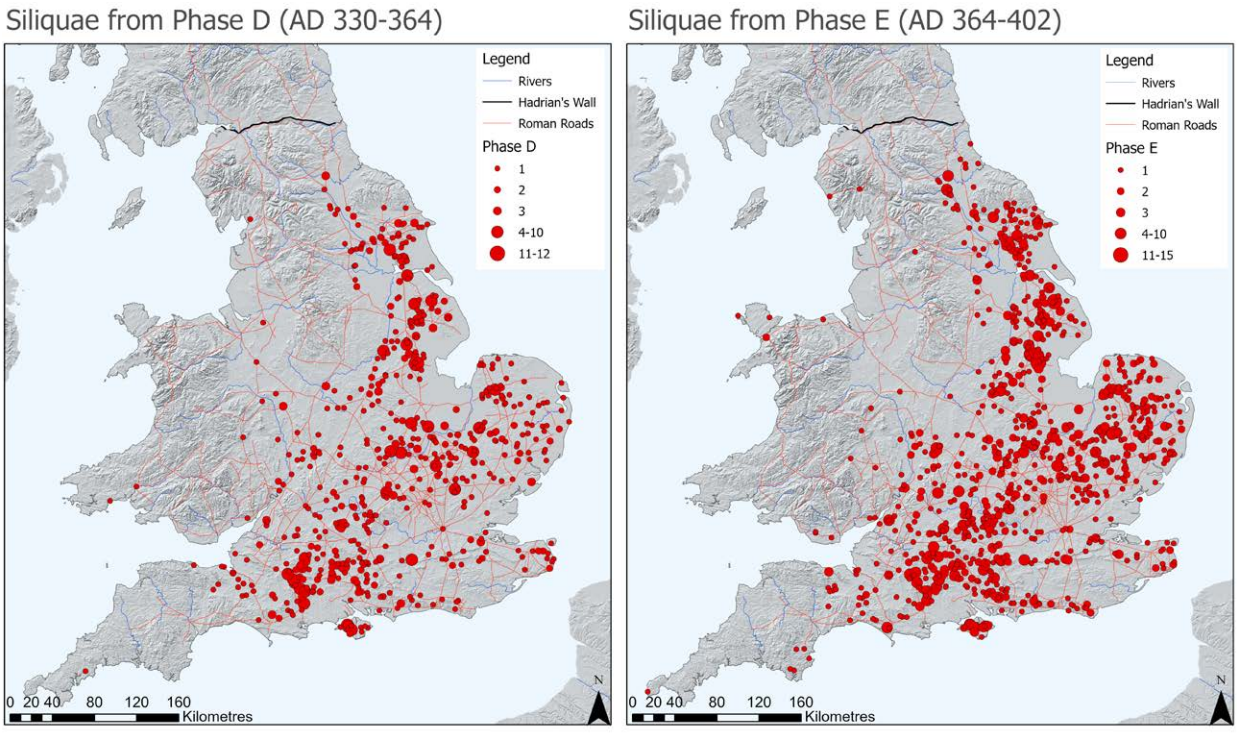


Figure 12.6 - Comparison of the distribution of *siliquae* from Phase D (AD 330-364) with Phase E (AD 364-402)

has been undertaken as there is general increase in the number of *siliquae* lost as the fourth century progresses. The distribution of the *siliquae* from periods 17-21 against the complete dataset is mapped in Figure 12.7. The patterns seen in each period will be discussed in turn.

Siliquae from Reece period 17 are rare finds in Britain with only 15 examples recorded on the PAS. They form a widespread distribution, distribution, mostly occurring to the south of the diocese. The majority of *siliquae* from Phase D were produced in Reece period 18 with 819 examples. Strong concentrations occur in Hampshire and Wiltshire as well as the East Midlands and along Ermine Street.

Reforms increased the fineness of *siliquae* under Valentinian and Valens. A total of 562 coins are recorded from Reece period 19, the reduced quantity could perhaps be reflected in part with changes to the taxation system. A similar spatial emphasis can be noted with slightly higher numbers in the environs of Gloucestershire.

A reduction in the numbers and density of *siliquae* during Reece period 20 occurs with 286 examples recorded. The distribution of *siliquae* from this period in the East Midlands and East Anglia is much reduced when compared with earlier periods. Examples occur in greatest numbers in Lincolnshire.

Similar patterns can be noted when we consider the coinage from Reece period 21 with a more limited distribution remaining in areas of the East Midlands when compared to periods 18 and 19. Fewer examples also occur to the north of the Humber. *Siliquae* occur in larger numbers in the south, particularly Wiltshire, Hampshire and the Upper Thames valley. In the spatial analysis of *siliquae* by Reece period we can identify changes which occur over time such as a reduction in the number of coins in the East Midlands when periods 18 and 21 are compared. In the environs of Cirencester, they occur in highest numbers in Reece period 19.

The phenomenon of clipping

Figure 12.7 plots these coins based on their date of production rather than evaluating when they were lost. To consider how long these coins might have remained in circulation we need to consider the phenomenon of clipping. The reasons that clipping occurred and the date of its proliferation have been debated (Guest, 2005; Abdy, 2013; Guest, 2014, 123; Abdy, 2020).

Previous studies have noted challenges in using PAS data to evaluate clipped *siliquae* on a national scale as the level of detail recorded varies significantly and they tended not to be photographed in specific regions such as Norfolk (Bland *et al.*, 2013). The same challenge arises here when we consider the corpus based on categories of unclipped, clipped or unclassified coins in Figure 12.8. Initially, the apparent absence of clipped *siliquae* in Norfolk might seem noteworthy; however, it is partly attributable to a substantial portion of coin records lacking accompanying images.

The spatial distribution of clipped *siliquae* is greater than that of the unclipped examples, presumably as clipped coinage remained in circulation for a longer period. Given it has been noted there is a contraction in coin supply in the last quarter of the fourth century this does not appear to be reflected in this particular dataset. Figure 12.9 demonstrates that over 65 per cent of the corpus of *siliquae* are clipped. This is a substantial proportion and emphasises that many of these coins remained in circulation after AD 402 when the scale of production at mints in the North-west provinces vastly diminished.

The number of *siliquae* in the regions of Britain varies (See Figure 12.5). As part of the more detailed analysis of the proportions of the various clipping factors only coinage from Yorkshire and the Humber, the East Midlands, East of England, the South-east and the South-west will be considered. The proportion of clipped *siliquae* of each of these regions is greater than 60 per cent (Figure 12.10). The variation occurs with unclipped and uncertain *siliquae*. The quantity of uncertain examples in Norfolk is visible, in the South-east and South-west higher proportions of unclipped coinage occurs, accounting for over 20 per cent of the corpus in both regions

When the proportions of unclipped and clipped coins are divided by clip factor and Reece period we can discern a number of interesting trends (Figure 12.11 and Figure 12.12). Across all the regions the majority of *siliquae* from Reece period 18 are unclipped or lightly clipped, with limited numbers of CF 4. Over time the proportion of unclipped coins reduces across all regions. By Reece period 21 the majority of coins are either CF 3 or CF 4 across Britain.

This analysis has major implications for how we interpret clipping in the fifth century. The consistency in clip factors across Britain strongly supports the argument that these regions had continued access to circulating currency into the fifth century and

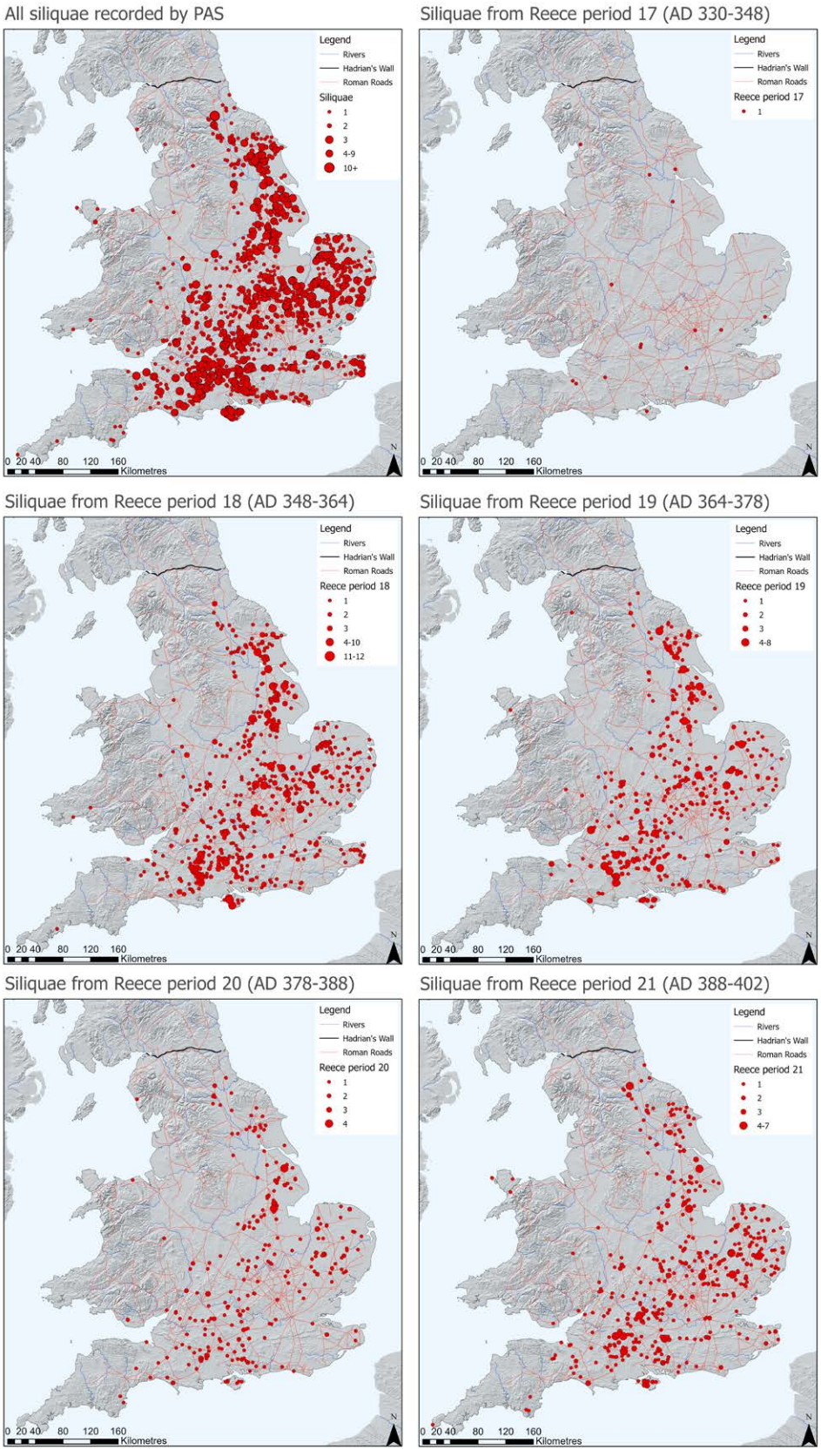


Figure 12.7 - The distribution of all *siliquae* mapped against the distribution of Reece periods 17-21

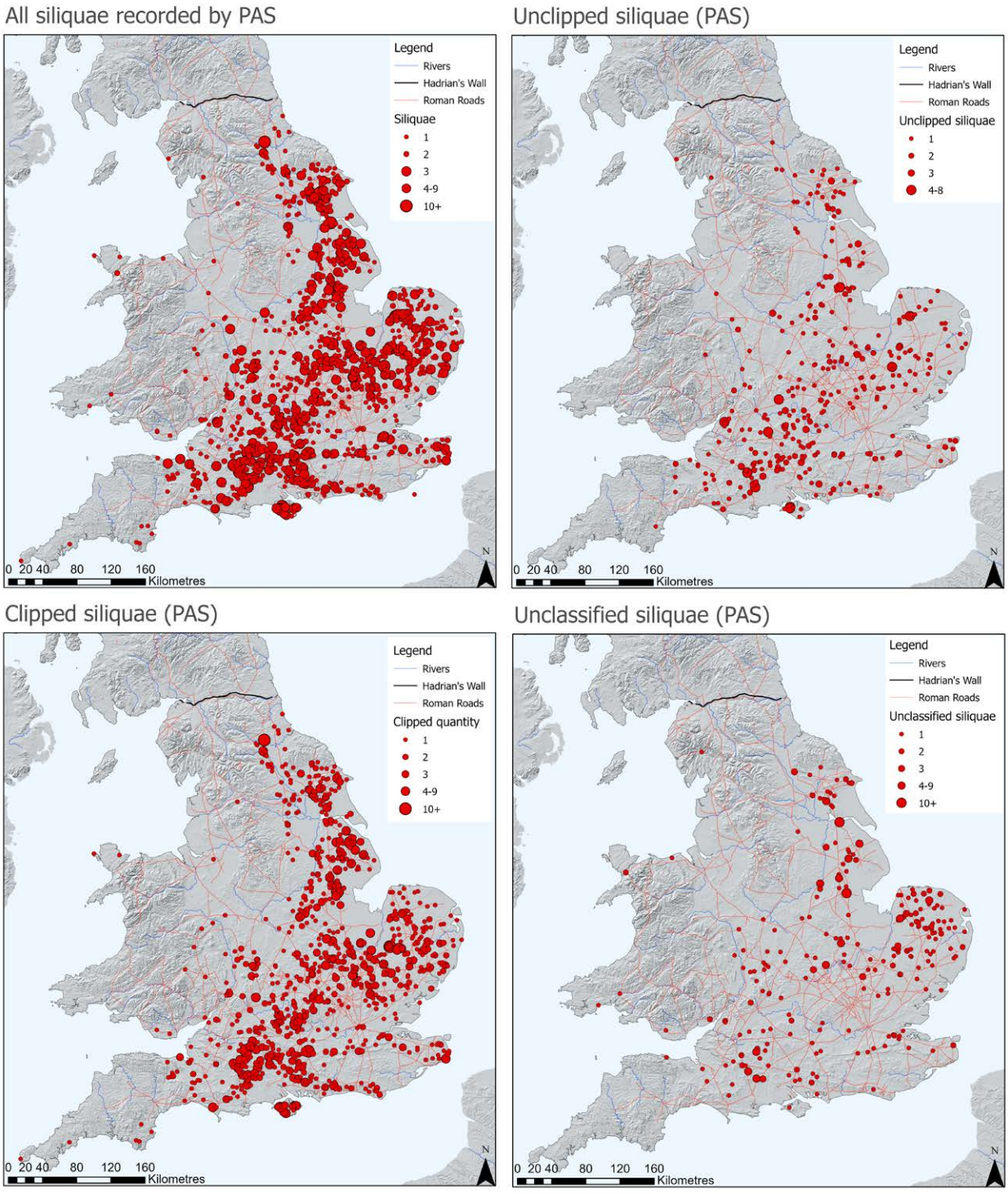


Figure 12.8 - Comparison of the spatial distribution of all *siliquae* against unclipped, clipped and uncertain examples. The majority of the latter consist of fragments where it is not possible to state with any certainty if a coin has been clipped or records without images

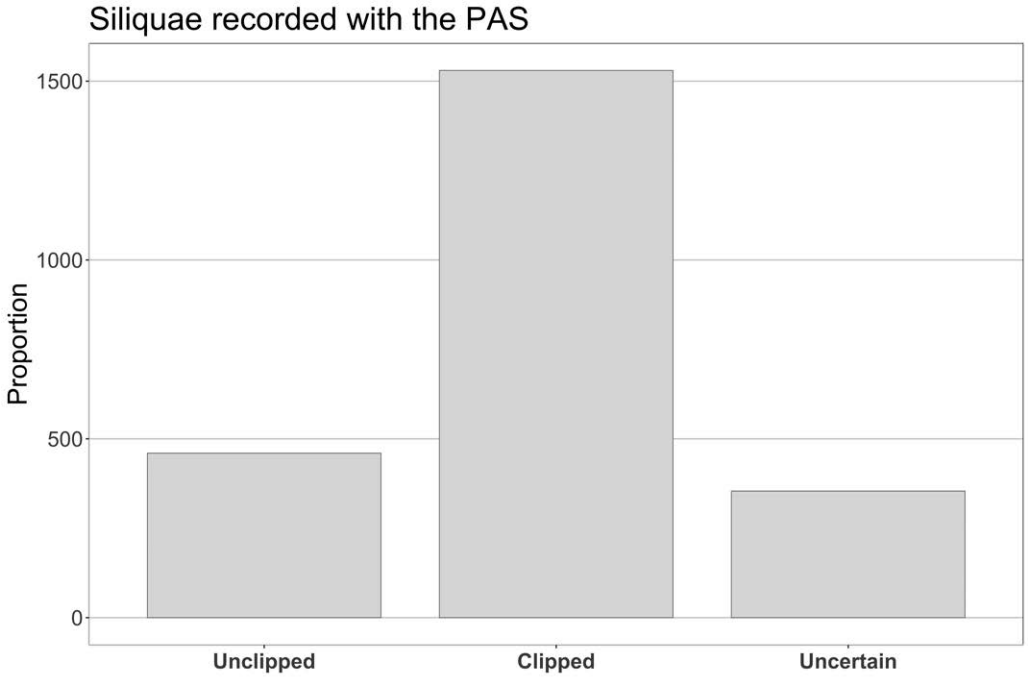


Figure 12.9 - The quantity of PAS *siliquae* divided by clipped, unclipped, and uncertain categories

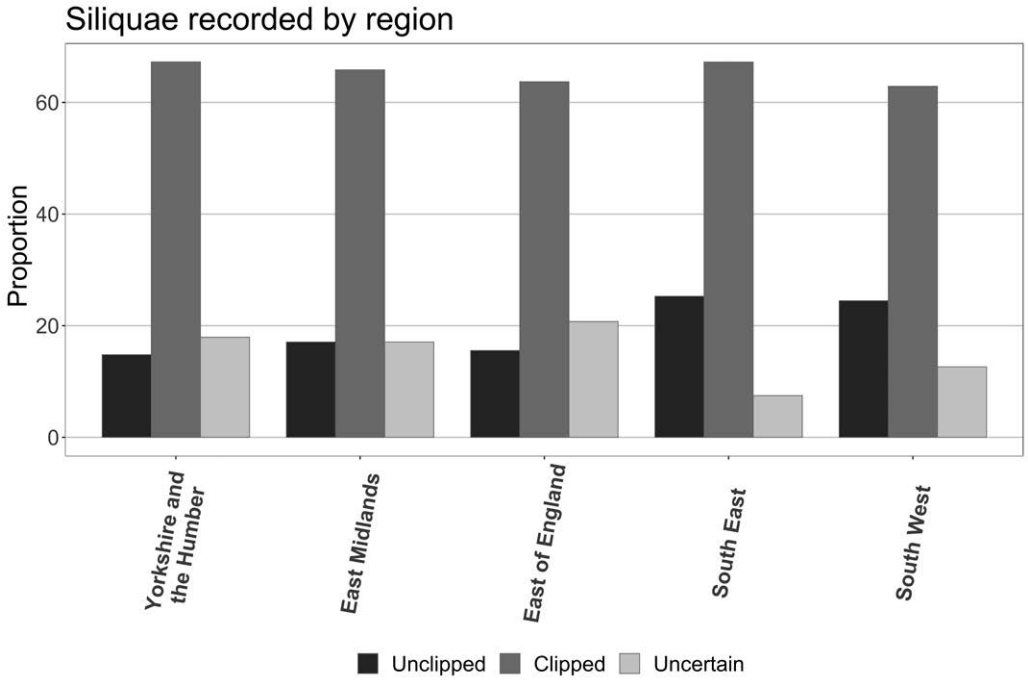


Figure 12.10 - The proportion of unclipped, clipped and uncertain *siliquae* by region

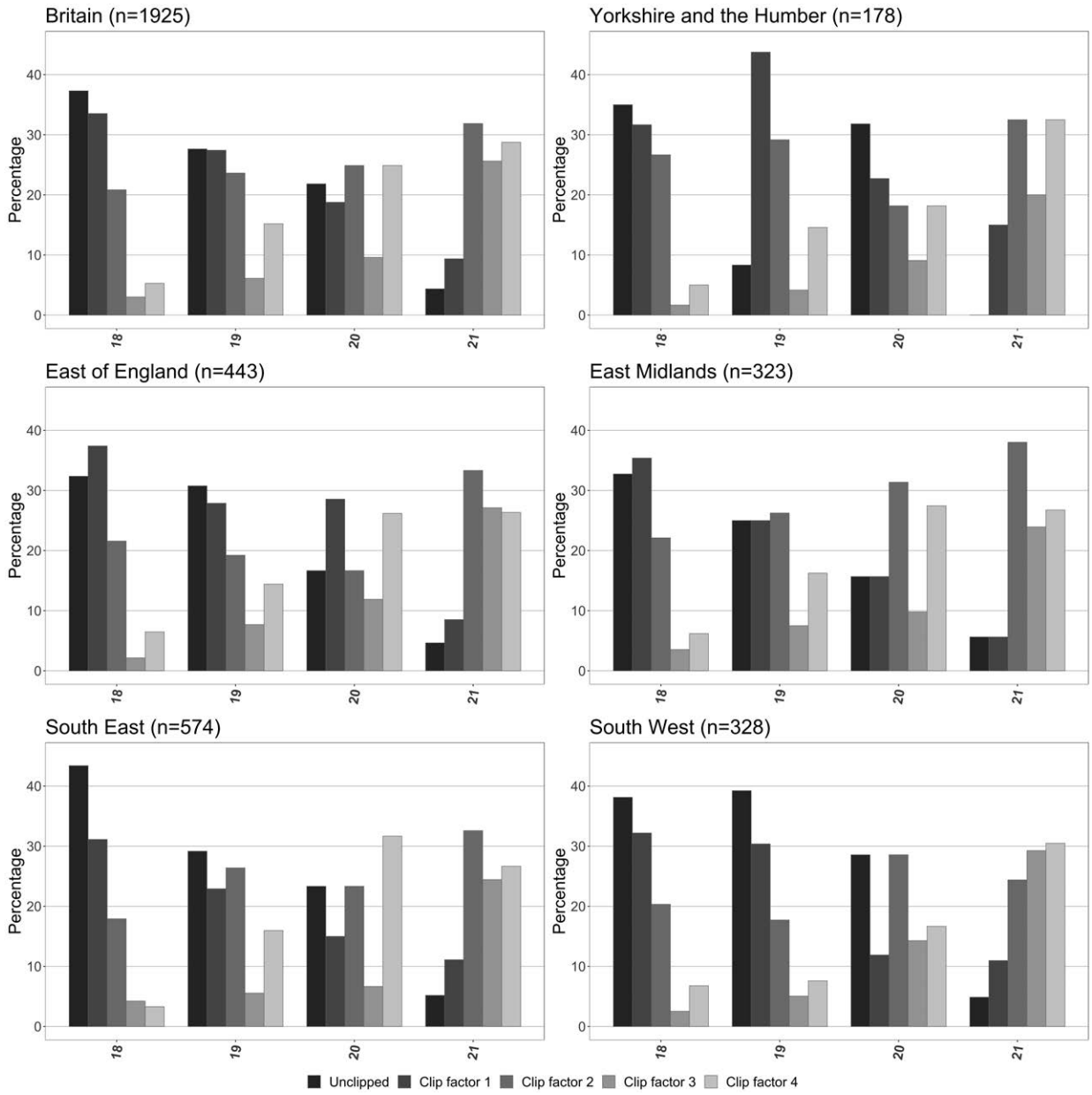


Figure 12.11 - The proportions of *siliquae* divided by region and clip factor for Reece periods 18-21

potentially that this heavy clipping of coins was undertaken at a central level – potentially by the state or the local administration who were central to the smooth running of the imperial bureaucracy.

If clipping represents continued use of circulating currency, the distribution might indicate the regions where coin use continued longest into the fifth century. As has been noted there is a general paucity in the region of Cirencester, a trend previously highlighted (Henry and Moorhead, 2022) which contrasts with arguments for continuity of *Romanitas* in *Britannia Prima* (Dark, 1994; Dark, 2000a; White, 2007). This will be explored further in the subsequent chapters.

The results of this analysis suggest that although Clip factors 1-4 are useful for detailed numismatic analysis of coins on a macro scale the two key groups seem to be unclipped coins or lightly clipped coins (CF 0-CF 2) where the clipping seems to be an attempt to defraud

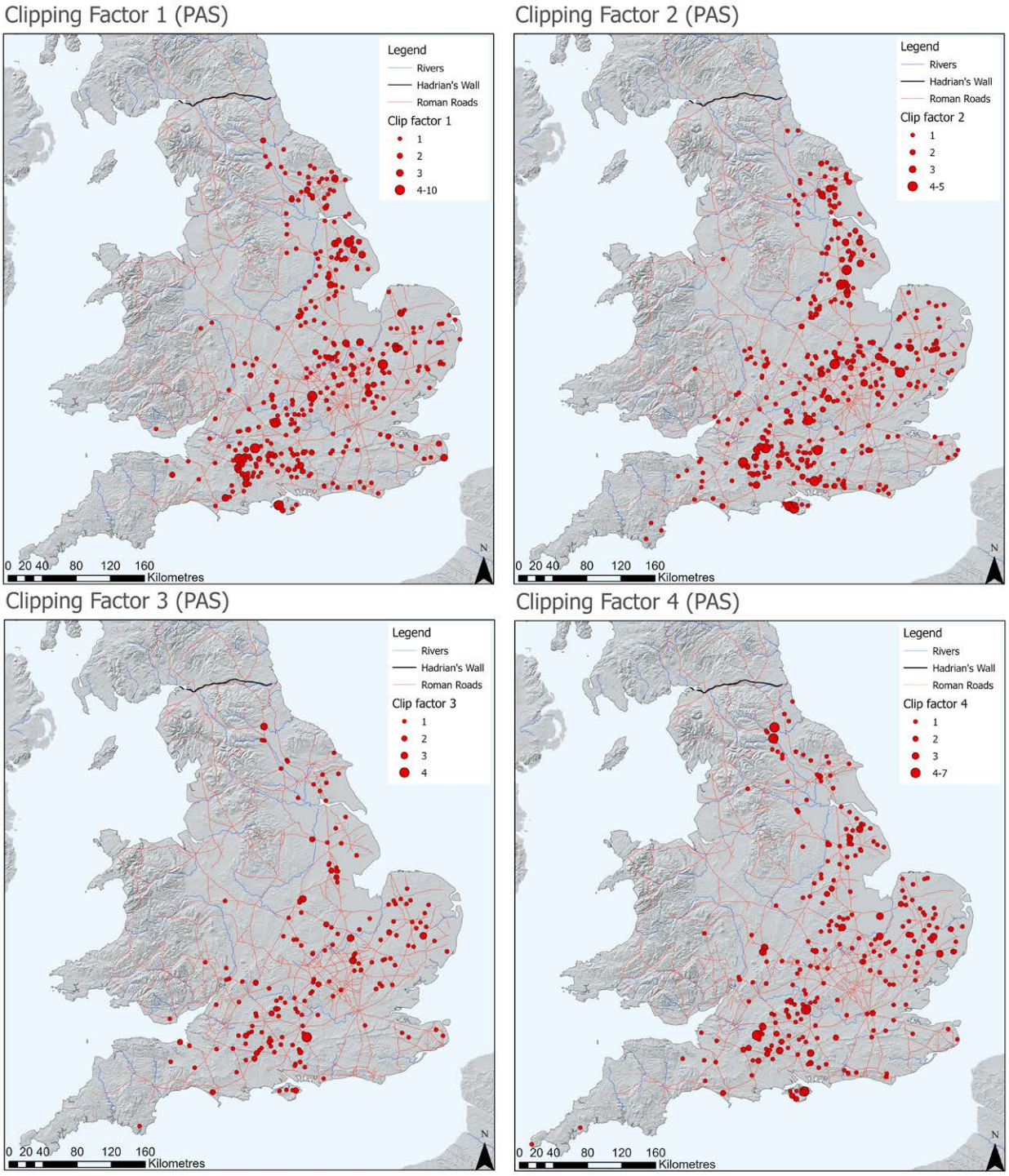


Figure 12.12 - The spatial distribution of clipped *siliquae* divided by Clip factor

and the heavily clipped coins (CF 3-4) when clipping was endemic and undertaken at a central level. The distribution of heavily clipped (CF 3 and CF 4) suggests these are the regions where circulating currency and by proxy a coin using economy continued the longest.

The hoarding of clipped coins

When we compare the distribution of clipped coins illustrated in Figure 12.8 with late Roman precious metal coin hoards (Figure 12.13; the yellow dots) we see a broadly comparable distribution. Unexpectedly, the distribution of coin hoards which include clipped coins is much more limited (Figure 12.13; the blue dots) and bears similarities with the distribution of coin hoards from Phase F (Figure 11.15). Some of the regions where clipped coins occur in larger numbers such as Lincolnshire have very few hoards that include clipped coins. There is also an absence of hoards with clipped coins in the environs of Cirencester.

While clipped coins may not have been noted in some antiquarian hoards, this pattern appears to be a genuine reflection of contracting coin use. This is due to Gresham's Law, where bad money drives out good and the good quality unlipped coins would fall out of circulation sooner than the heavily clipped ones. Consequently, it seems likely that the regions with dense deposition of coin hoards with clipped coins are those where the continuation of coin use persisted the longest, perhaps as part of a coin using economy or that coinage continued to be used for taxation.

Interestingly, it is usually in these regions (such as Wiltshire where a key hoard was found at Bishops Canning) that hoards occur that are a mix of precious and base metal. As Walton (2012, 114) has suggested, we cannot rule out nummi continuing to be used along with silver and perhaps gold until at least AD 425.

Solidi

Unsurprisingly, given their high value, the number of *solidi* recorded as part of this analysis of site finds is limited, with 248 gold Roman coins dating to after AD 330 recorded from the diocese, excluding those from hoards (Figure 12.14). The distribution is widespread across Britain, these coins occur in higher quantities at Richborough, Silchester and Cirencester. As part of this analysis *solidi* will be considered spatially and through the changing proportions of coin loss by region over time.

ABCDEF Phase

Of the 248 site finds of gold Roman coins struck after AD 330, 38 were struck in Phase D (AD 330-364), 151 in Phase E (AD 364-402) and 45 in Phase F (AD 402-498). They occur in greatest quantities at Cirencester, Silchester and Richborough. The distribution of Phase D examples is interesting with a concentration in the Pennines, along the east and the south coast (Figure 12.15). The distribution in Wales and the West of England is very different to other distributions seen as part of this study. Generally, few are recorded from inland sites in southern Britain.

In contrast the material from Phase E has a large number of finds from such sites particularly from the Gloucestershire, Hampshire and the East Midlands. In Phase F, the distribution generally focusses on the south and east coast, particularly Kent and the Isle of Wight.

When the proportions of each Phase are compared by region, we can see a significant increase in the proportion of coins from the South-east from 31 per cent in Phase D, 36 per cent in Phase E and 62 per cent from Phase F (Figure 12.16). Although this in part is influenced by Richborough it also reflects the changing patterns noted, particularly of coins from the middle of the fourth century onwards when coinage appears to have ceased as circulating currency in Kent and the Isle of Wight. While regions such as the South-west form 11 per cent of gold coins from AD 330 onwards, the vast majority occur in Phase E.

Reece periods

Reforms in the later fourth century led to an increase in the number of *solidi* deposited as the century progressed due to increased production. In Figure 12.17 and Figure 12.18 the dataset has been mapped to consider changes in distribution over time. The quantity of coinage from Reece periods 17 and 18 is limited, in Reece period 18 there is a greater focus of the distribution on the south and east coast of Britain. In Reece period 19 there is a significant increase in the number recorded as site finds with a focus in the South-west and the East Midlands.

A similar albeit slightly contracted distribution can be noted in Reece periods 20 and 21. In the latter the main concentrations occur in the Thames valley and at Kent centred on Richborough. Small clusters occur in Lincolnshire in Reece period 21 and in Yorkshire in Reece period 21. In Reece periods 22 and 23 the

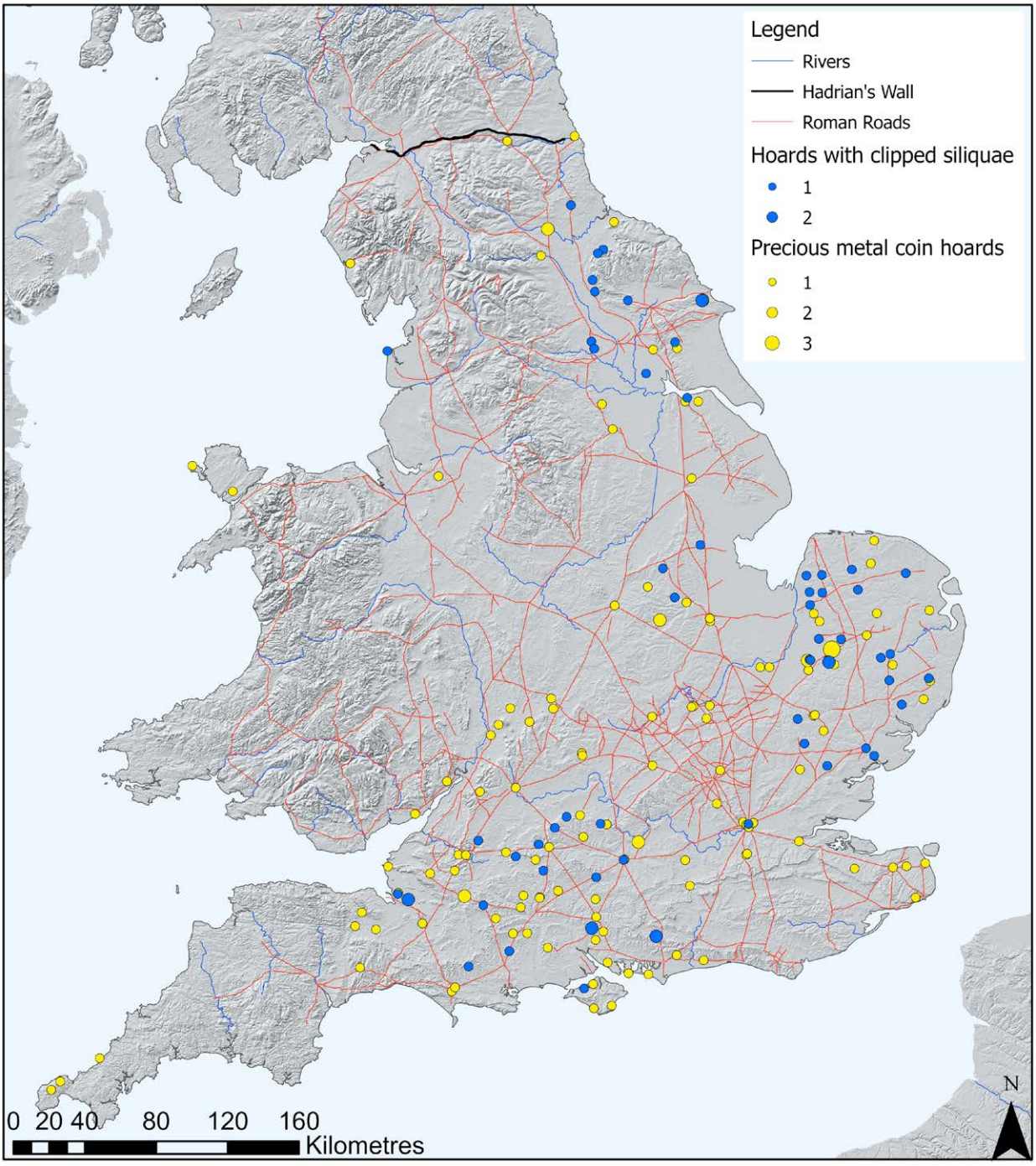


Figure 12.13 - Coin hoards which include clipped coins mapped against all coin hoards deposited after AD 364

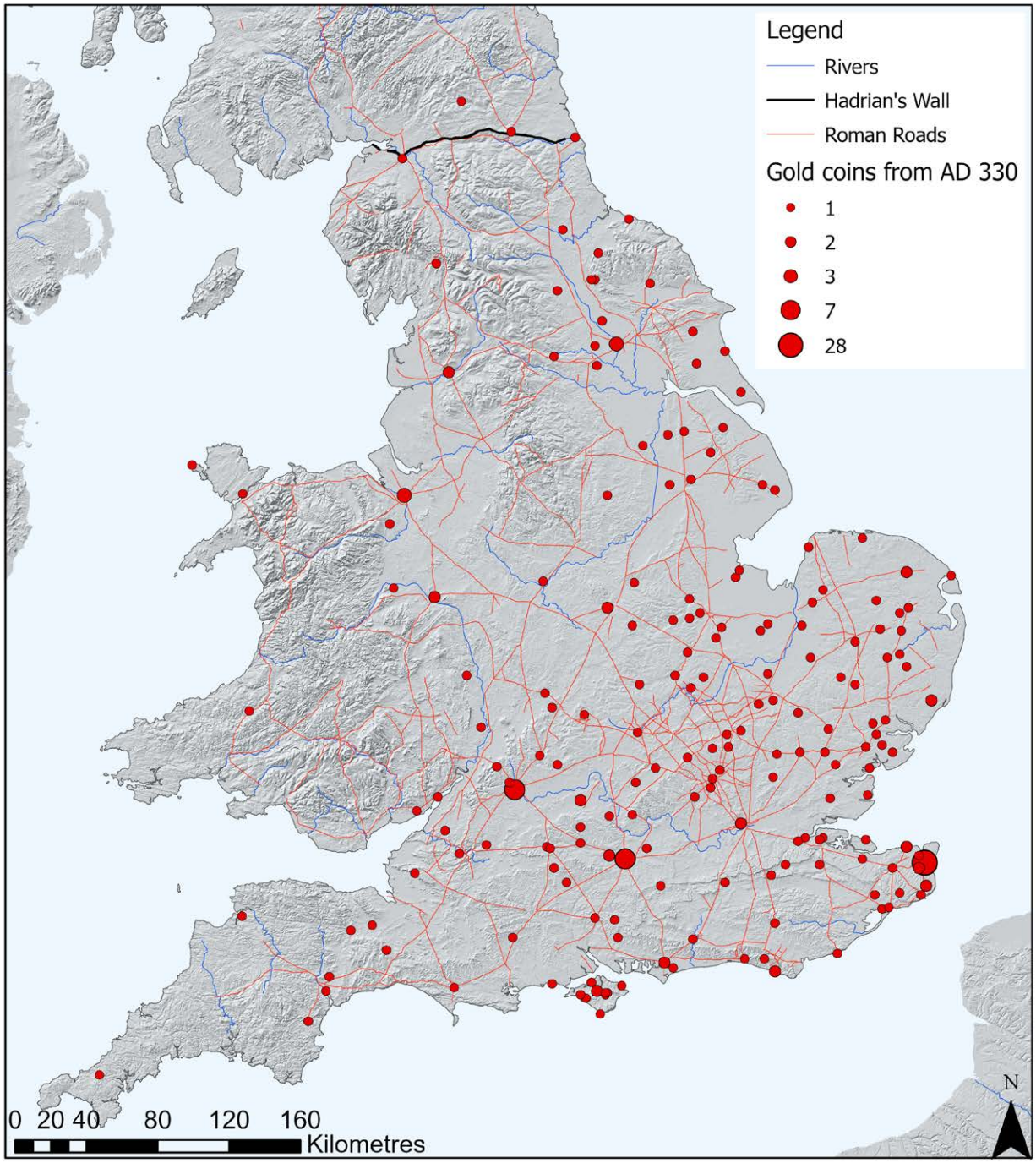


Figure 12.14 - The distribution of gold coinage from AD 330 in Britain

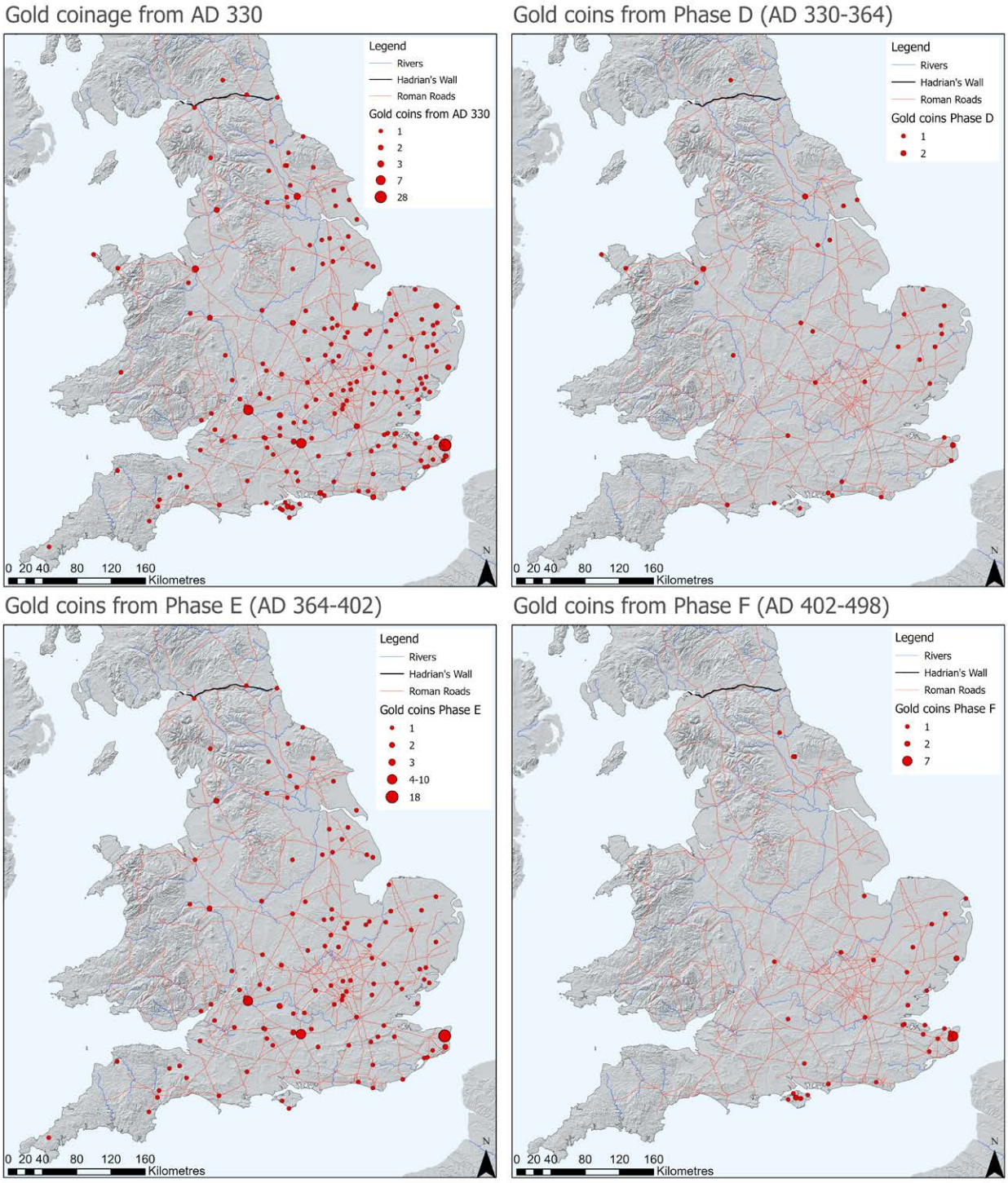


Figure 12.15 - The distribution of gold Roman coins struck after AD 330 compared with the distribution from Phases D-F

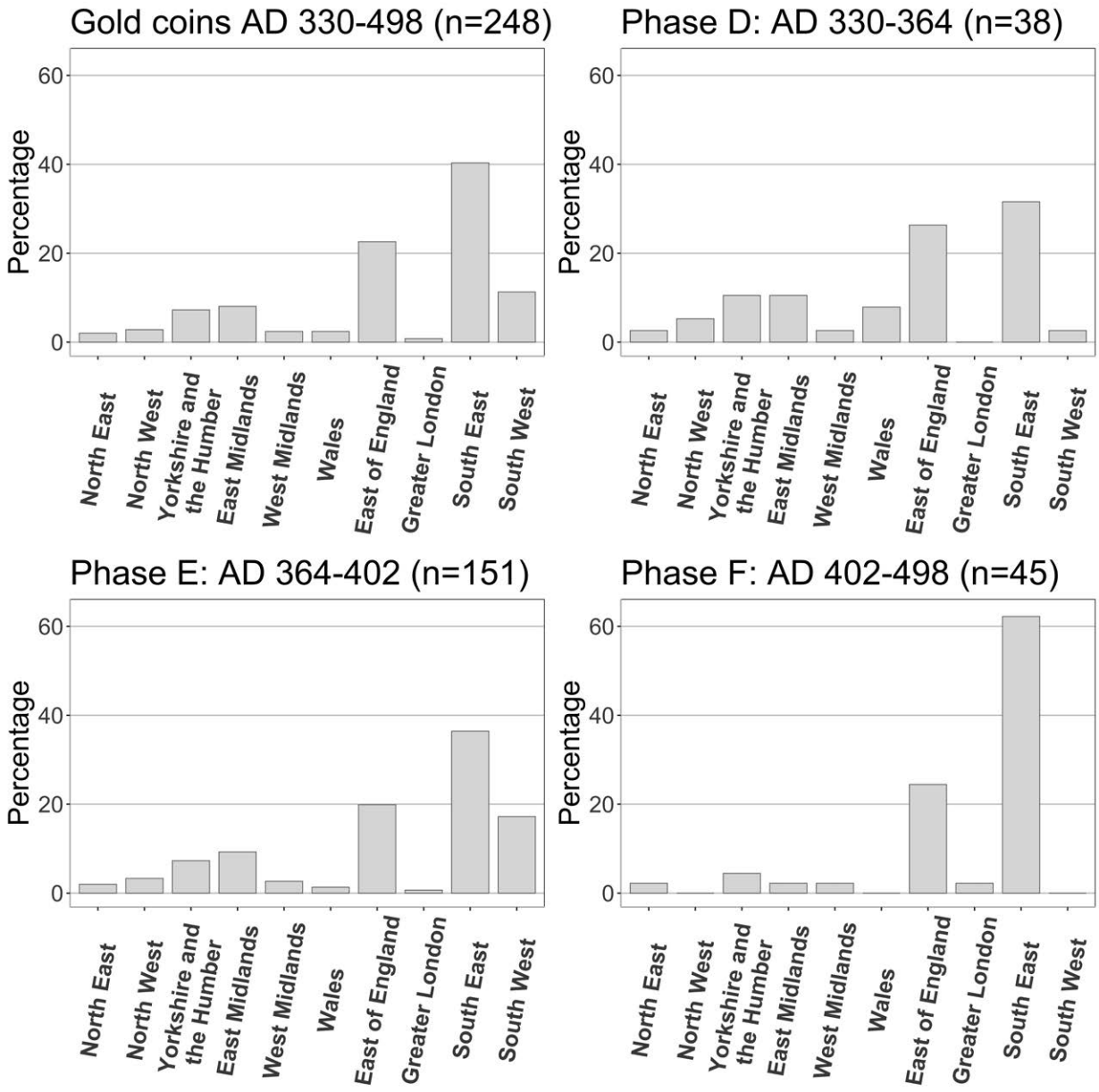


Figure 12.16 - The proportion of gold coins by region from AD 330 and from Phases D-F

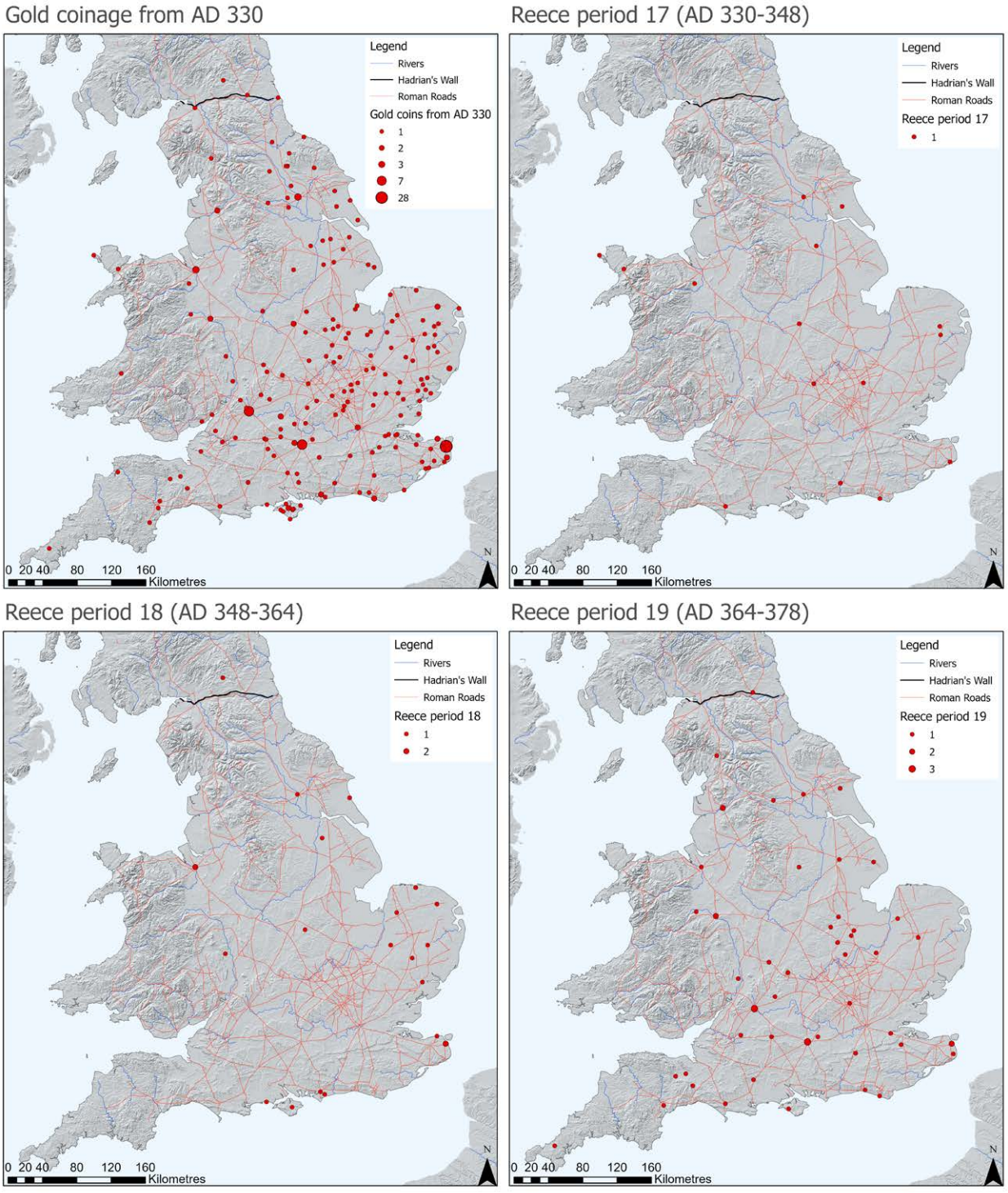


Figure 12.17 - The distribution of all gold coins and coins from Reece periods 17-19

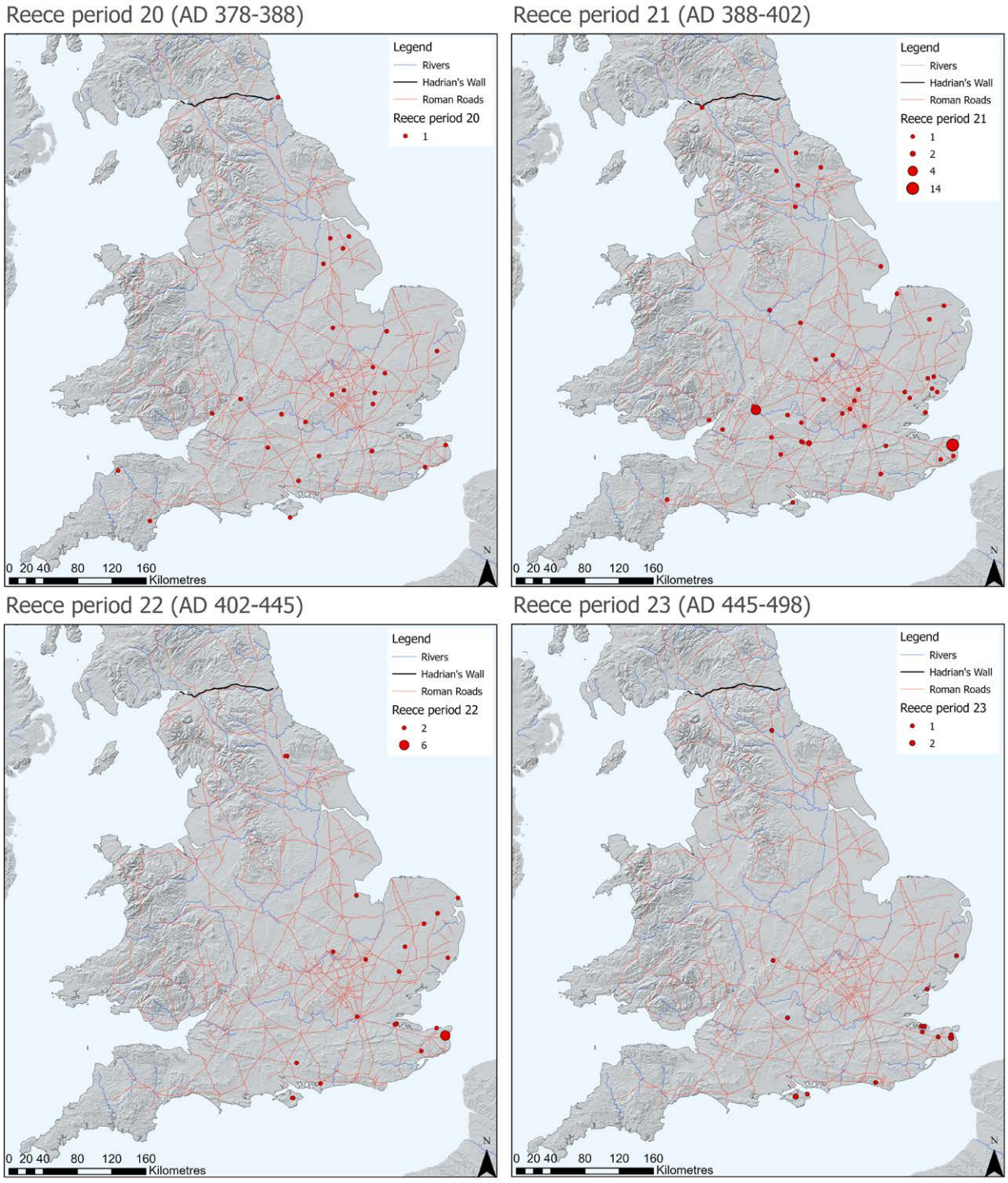


Figure 12.18 - The distribution of gold coinage from Reece period 20-23

distribution has an emphasis on the eastern and southern coast. By Reece period 23 the distributions support the argument that the coin using economy had ceased and finds were used as bullion.

Discussion

The cessation of production of coinage at the North-western mints at the turn of the fifth century presents significant challenges in understanding how and when the coin using economy and the late Roman taxation in coin system ceased. Gold and silver coinage played a crucial role in the latter and presumably silver *siliquae* in particular were used as part of commercial transitions given their widespread distribution.

Unlike nummi (where a contraction can be noted when we compare the distributions of Reece period 17 with those of periods 19-21) there is a substantial increase in the number of silver and gold coins recorded in this corpus. This is in part due to increases in production as well as supply along with the reforms of these coinages under Valentinian I and Valens. There still remains a contraction and ultimately the distribution of coinage from Reece period 23 in particular demonstrates that by this time, these coins were not being used as part of a currency-based economy and instead simply held intrinsic bullion value.

A complicating factor is the phenomenon of clipping which has been linked to the continuation of the coin using economy into the fifth century until c. AD 425 or perhaps a little later. The results of the analysis of the clip factors of these coins emphasise that the circulating currency in the key regions of Britain was consistent. This could suggest that there remained a central administrative presence after AD 410 or there remained a strong local administration and coin using economy.

Key observations

When compared with the sheer quantity of coins as site finds after AD 337, the size of the corpora of *siliquae* and *solidi* is limited. This underscores the various roles each denomination played in the coinage taxation cycle. The analysis of these two datasets is primarily focussed on spatial distributions of the level of clipping or by Reece period/phase. While the reliance on PAS data for *siliquae* to ensure a standard analysis of clipped *siliquae* limits the discussion that can be made on changing distributions in the social categories, the results reveal a number of significant spatial patterns.

Significant changes in coin production occurred around the turn of the fifth century leading to watersheds in coin production after AD 395 for bronze, AD 402 for silver, and AD 408 for gold. These changes affected the availability and distribution of coins, impacting all provinces north of the Alps, not just Britain.

- During the fifth century, spatially, there was a shift towards coin loss in coastal regions, diverging from previously dominant coin-using areas.
- Clipping of coins was a significant phenomenon during the early fifth century, occurring in stages. Heavy clipping, which became more prominent after AD 406, is central to understanding the political changes of the period.
- Analysis of the proportions of clipped coinage shows the makeup of this material across Britain is very similar suggesting clipping was undertaken at a central level rather than undertaken by different regional groups or individuals.
- Certain regions, such as Yorkshire, East Anglia, and the South to the south of Salisbury Plain, continued to use clipped *siliquae* for an extended period.
- However, some areas with significant quantities of clipped coins do not show evidence of hoarding, suggesting complex patterns of coin use and that cessation of coin use across regions was not uniform.
- The majority of gold coinage is best considered as stray losses aside from the larger assemblages at Richborough, Cirencester and Silchester. Only three gold coins are recorded from Hadrian's Wall.
- The comparison of the distributions from Reece period 21 and Reece period 23 and the distribution of clipped *siliquae* suggests the Roman coin using economy and taxation in coin had ceased by the 460s at the latest, after which time any coinage coming to Britain should be considered bullion.

13. A Chronological and Geographical Overview of the Evidence

The preceding studies (Chapter 7 – Chapter 12) have reviewed the earlier work on material culture, extended the chosen datasets, and subsequently analysed the data in a consistent, unified manner, examining their spatial and social distribution (introduced in Chapter 6). Key observations have already been drawn out from each analysis, but it is the role of this section to draw these threads together, to evaluate previous hypotheses about later Roman and sub-Roman Britain, and to formulate and test new hypotheses in the following chapter.

To synthesise the results from this study, this chapter will consider the regional patterns noted in the varying datasets by dividing Britain into fifteen regions and three main phases (the mid-fourth century, the later fourth century and the fifth century). The regions have been selected based on the varying patterns of coin loss in Phase D (AD 330-364) and are highlighted in Figure 13.1. Object types have been allocated to each of these different phases to provide an overview, though obviously some examples might have had an individual prolonged life in use, while a few other categories are imprecisely dated (for example Type 6 crossbow brooches may be a fifth century type). Nonetheless, these regional and material divisions help draw back from the detail of Chapters 7-12 to provide an overview of the key transformations seen in Britain at a diocesan and regional level

This acts as a fundamental structure for identifying patterns in the diocese and provides a reference point for comparing particular datasets or regions, as well as trends that may emerge over time. Rather than creating fifteen distinct narratives, the aim is to see how these regions compare when varying forms of material culture are evaluated. Some regions seem to support a narrative suggestive of a decline in material culture and limited availability of coinage, which could either reflect a gradual and steady trend indicating an absence of the state, or a more abrupt pattern supporting the idea of a rupture. What emerges from this comprehensive analysis is a general ebb and flow – a rhythmic pattern where the areas surrounding urban, nucleated, or military centres act as amplified reflections of the central settlement within the landscape.

One of the most noteworthy revelations in this overarching narrative is the absence of strong evidence for continuity of *Romanitas* into the fifth century in regions where it might have been anticipated, based on the corpora considered here such as in the environs of Cirencester. Moreover, the study of post-Roman material culture, particularly the 'Germanic' brooches, which are dated from the start of the fifth century onwards supports the argument that this new influx of material signifies the protracted decline of Roman material culture in regions like Suffolk and Essex and mass movement of population in Lincolnshire and East Anglia (Martin, 2015, 174).

The three phases have been built around the numismatic analysis and the broad date of manufacture for a specific form of object (Table 13.1). It has been shown that material culture and coinage could remain in use for a prolonged period after production. This study has moved forward our understanding of the

Table 13.1 - The material considered as part of the main chronological phases

Mid-fourth century	Phase D (AD 330-364) upper quartile sites Phase D (AD 330-364) lower quartile sites Phase D (AD 330-364) nummi hoards Type 1, 2 and 3/4 crossbow brooches Type II belt sets
Late fourth century	Phase E (AD 364-402) upper quartile sites Phase E (AD 364-402) lower quartile sites Phase E (AD 364-402) nummi hoards Phase E (AD 364-402) precious metal coin hoards Type 5 and Type 6 crossbow brooches Type M penannular brooches Type I belt sets Type III-IV belt sets Spurs
The fifth century transition	Phase F (Post AD 402) coins Phase F (Post AD 402) coin hoards Clipped *siliquae* in hoards Clipped *siliquae* Supporting arm brooches Early forms of cruciform brooch Quoit Brooch Style Roman belt fittings in Anglo-Saxon burials

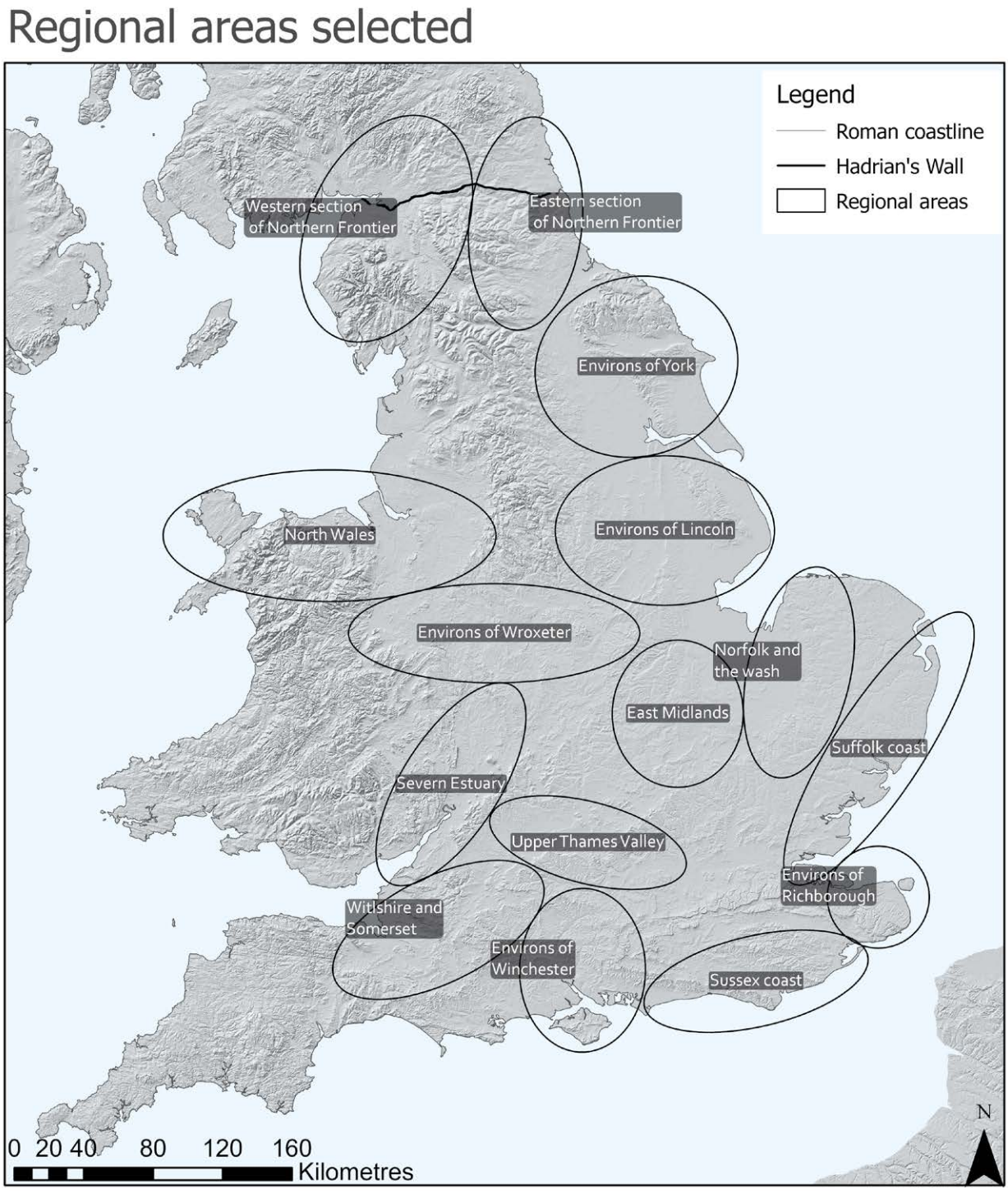


Figure 13.1 - The fifteen regions selected to considering the changing regional patterns observed in the late Roman period

chronological dates of some material culture such as belt sets, but the dating remains limited in some areas.

Each phase will be discussed sequentially, examining the coin site finds, coin hoards and the relevant chronologically-diagnostic object types in turn.

The mid-fourth century

Previously, a divergence in coin loss has been noted in the mid-fourth century, with differences between eastern and western regions as well as those to the north and south of the Fosse Way (Reece, 1995; Hobbs, 2006; Walton, 2012). However, this study presents findings that challenge these observations. Analysis of patterns of coin loss in this study suggests the Fosse Way does not appear to have been one of the primary overland supply routes of that era – unlike Ermine Street and Dere Street. Instead, sites in the environs of the Fosse Way seem to be closely tied to the prosperity of the central belt of the diocese, a region that enjoyed economic growth throughout the fourth century (Walton, 2012; Smith *et al.*, 2016).

The mid-fourth century presents patterns of higher relative levels of coin loss across different regions of Britain (Figure 13.2). Notably, areas experiencing higher coin loss are primarily concentrated in the central belt of Britain, the regions encircling the Wash, as well as in Somerset and Wiltshire. This study has revealed lower relative levels of coin loss in both the Western and Eastern sections of the northern frontier, the frontier in North Wales, the environs of Wroxeter, along the Suffolk coast, and in the environs of Winchester. This general pattern of lower coin loss in these regions persists into the later fourth century with the exception of the environs of Winchester.

However, it is crucial to note that the intense hoarding of nummi during this phase does not completely align with these regions. Instead, a significant emphasis is observed in the corpus of hoards along the east coast of Britain, spanning from the northern frontier down to the East Midlands along Dere and Ermine Street, and in the west from North Wales to the Upper Thames Valley. One particularly remarkable area for the distribution of nummi hoards is the Severn Estuary, a pattern that continues throughout the fourth century.

Shifting the focus to artefacts, the distribution of Type 1 crossbow brooches reveals a strong correlation with military sites. In contrast, Type 3/4 brooches are found in higher numbers at urban, nucleated and rural sites suggesting the presence of the state-run administration across various regions of the diocese. The northern frontier and East Anglia stand out, boasting more than 15 examples of cast crossbow brooches (Types 1, 2 and 3/4), while fewer instances are found in the East Midlands, the Sussex coast, the Upper Thames Valley, Wiltshire, Somerset, and North Wales (Figure 13.3, left). The decline of coin loss at sites along the Sussex coast region from AD 330 might explain the limited quantity there. Still, the scarcity of such brooches in the Upper Thames Valley, Wiltshire, Somerset, and the East Midlands raises intriguing questions, especially when considering other indicators of the presence of the late Roman state, such as the Type II belt sets.

Significant numbers of artefacts linked with Type II belt sets, exceeding 20 of both continental and insular forms in each region, have been unearthed in areas such as the environs of Lincoln, the East Midlands, the Suffolk coast, the environs of Richborough, Winchester, and the Upper Thames Valley (Figure 13.3, right). However, a distinct pattern emerges in regions like Western Hadrian's Wall, where propeller mounts dominate (partially influenced by the assemblage from Maryport), while they are notably absent in areas like the Severn Estuary. This intriguing contrast suggests that propeller mounts are likely associated with continental forms of belt sets and were possibly worn predominantly by individuals in the service of the state, rather than being indicative of elite attire.

This connection gains strength when considering the social distribution of continental forms, revealing that propeller mounts associated with zoomorphic fittings from Type II belt sets are prevalent at military sites. Whereas non-zoomorphic fittings linked with Type II belt sets are predominantly found at urban, and nucleated sites as well as at Richborough. The evidence suggests that this represents state personnel predominantly situated away from key military sites and underscores a link between certain forms of continental Type II belt sets and the state-run administration.

An intriguing aspect is the correlation between the absence of specific forms of belt fittings with the continued use of various forms of penannular brooches in certain regions during the late Roman period. Regions like the Severn Estuary and the East Midlands, where these specific belt fittings are lacking, coincide with the main areas where late Roman penannular brooches are recovered in greatest numbers. This unexpected correlation requires further investigation to unravel the underlying reasons for this pattern seen in the material culture.

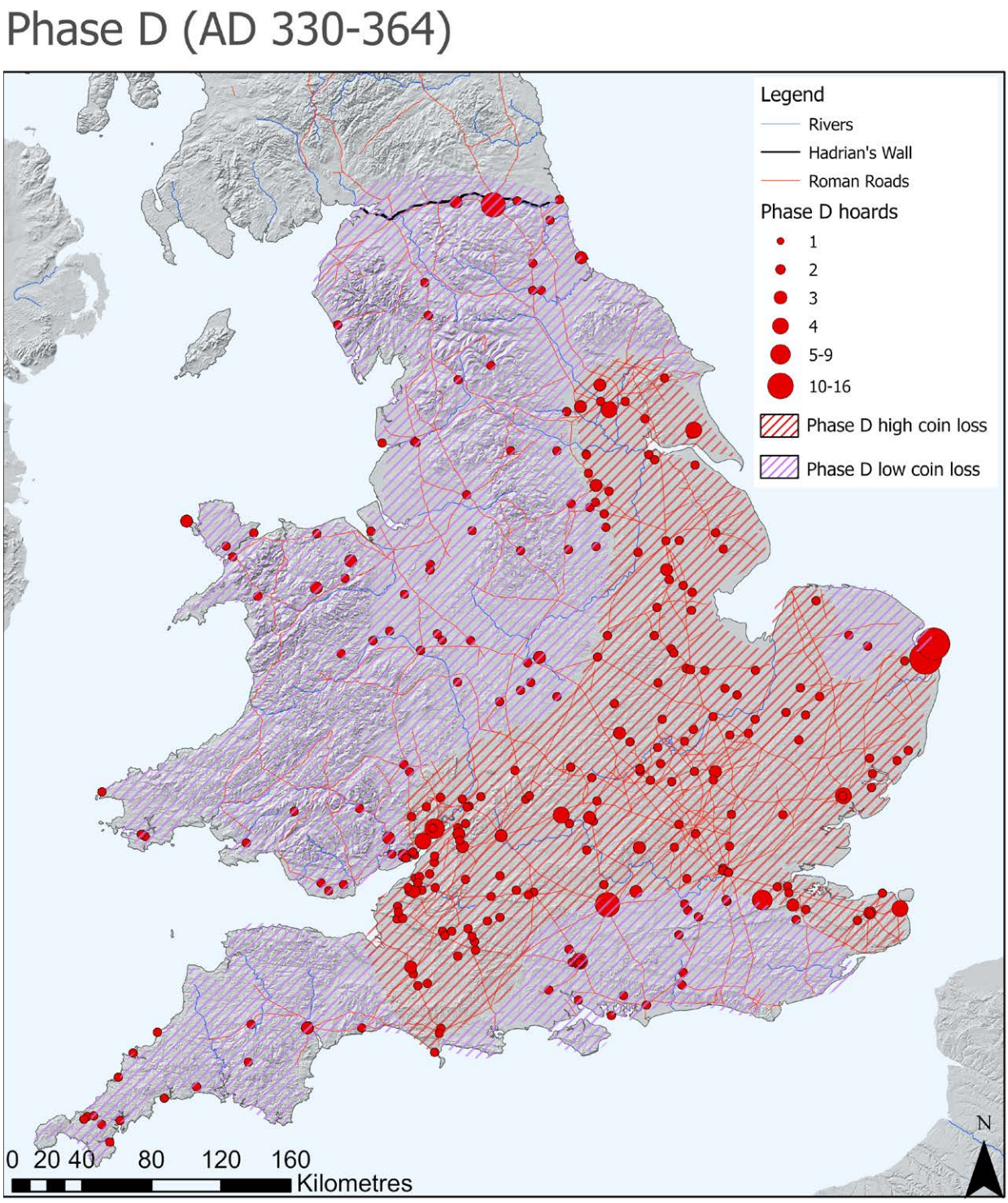


Figure 13.2 - Regions where high coin loss from Phase D occurs (red hatching) compared with regions which tend to have lower coin loss (purple hatching) mapped against coin hoards from Phase D (AD 330-364).

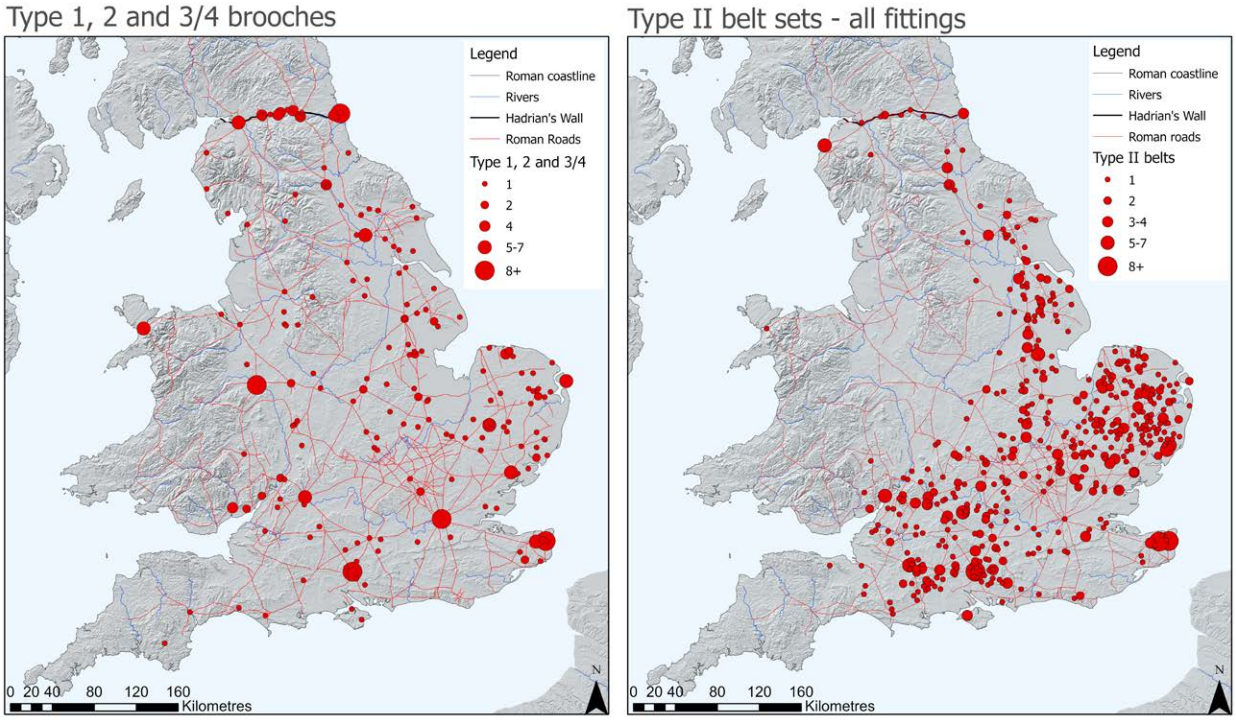


Figure 13.3 - The distribution of all belt fittings linked with Type 1, 2 and 3/4 crossbow brooches (see Chapter 7) and Type II belt sets (See Chapter 8).

When the various strands considered as part of the mid-fourth century elements are evaluated in combination in Figure 13.4 and Table 13.2 we can identify some significant regional trends. Coin loss is below average along the Northern Frontier as well as in areas along the southern and eastern coastline of Britain and the coast of Wales. In a number of regional case studies along these coastlines we can see higher numbers of coin hoards and objects linked with military activity (the Sussex coast is the key exception). While this has been used to emphasise the existence of threats to the diocese, such as raiding, at this time (Frere, 1978, 289 for example), the reasons for hoarding are much more varied and the patterns we see reflect longer term economic processes and change (Bland *et al.*, 2020, 313ff). With the exception of the environs of Winchester these patterns are the continuation of patterns seen in the preceding and succeeding economic coin phases (Henry, 2024c). Of greater importance appear to be the changes seen in sea-based supply along the eastern and western coasts that occur by AD 370 and the emphasis placed on land based trade routes (Evans, 2000, 40-41; Bidwell and Croom, 2010, 26-30; Bidwell, 2017, 292).

In these areas, particularly those where coinage does not seem to be a significant part of the economy, the evidence suggests that if there are individuals linked with the state they tend to be military, rather than bureaucratic, personnel. The regions where coin loss is densest appear to be of greatest interest to the state and emphasise the presence of those linked with the state in some form, either the army/bureaucracy or the local elite. The regions with the widest suite of material tend to be the most significant in terms of arable and textile production underscoring the demands placed on the diocese by the empire. This ultimately led to the accumulation of significant wealth in specific areas and sets a baseline for the furthering of these trends in later fourth century.

The later fourth century

The later fourth century ushered in a period of profound social and economic transformation in the diocese. While historians continue to debate the impact of events such as the Barbarian Conspiracy (such as: Esmonde Cleary, 1989; Gerrard, 2013), there is consensus among scholars about the significant

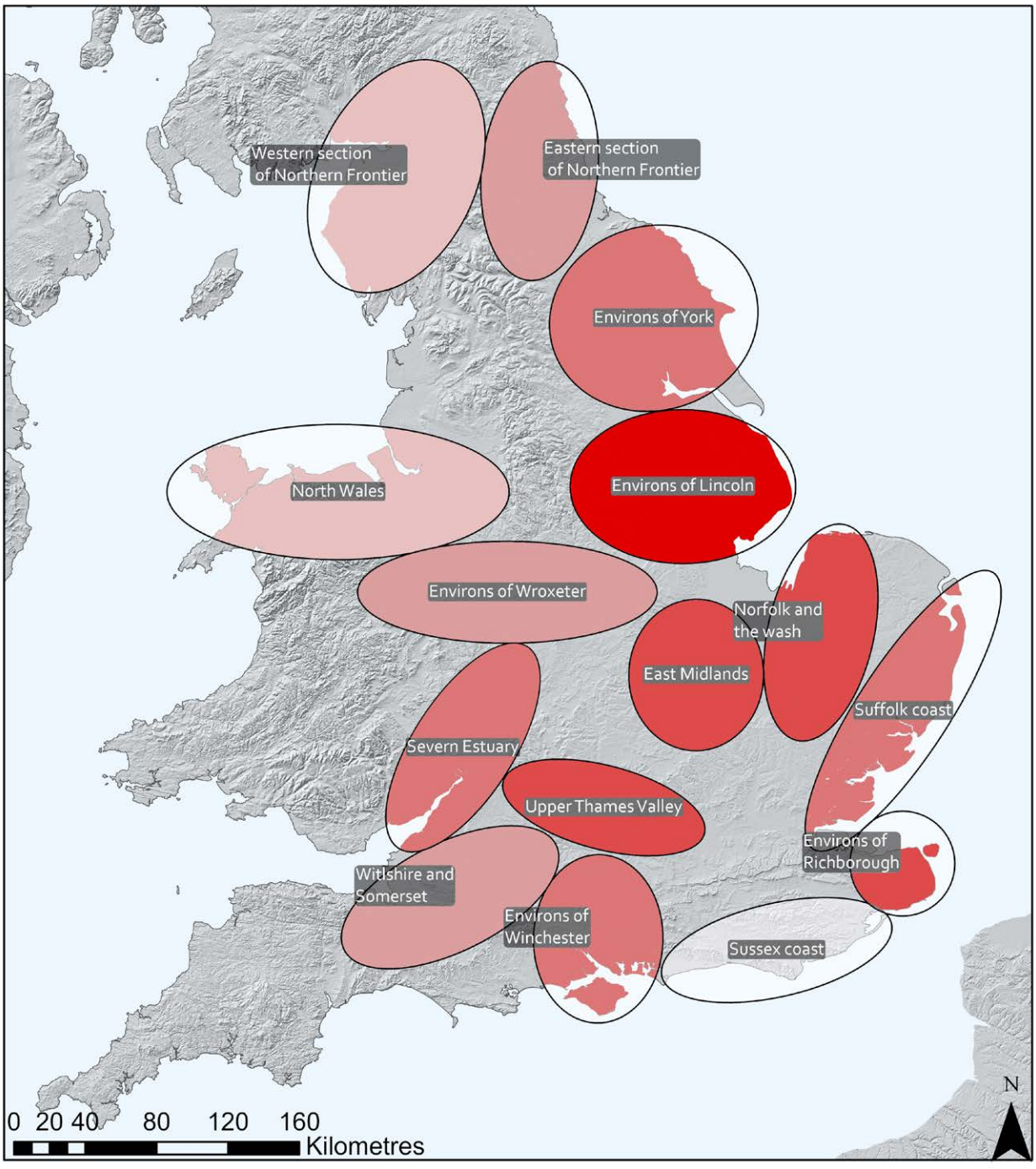


Figure 13.4 - Heatmap of regions considered as part of this study based on the number of elements present or absent in Table 13.2

Table 13.2 - The presence (green) or absence of different classes of material in the mid-fourth century from the regional study areas

Region	Western section of northern frontier	Eastern section of northern frontier	Environs of York	Environs of Lincoln	East Midlands	Norfolk and the Wash	Suffolk and Essex coast	Environs of Richborough	Sussex coast	Environs of Winchester	Upper Thames Valley	Wiltshire and Somerset	Severn Estuary	Environs of Wroxeter	North Wales
More sites in coin Phase D upper quartile			P	P	P	P		P			P	P	P		
More sites in coin Phase D lower quartile	×	×					×		×	×				×	×
Emphasis on nummi coin hoards in Phase D		P	P	P	P						P	P	P	P	P
>15 Type 1, 2 and 3/4 Cross-bow brooches	P	P	P	P		P	P	P		P			P	P	
>20 Type II Insular fittings				P	P	P	P	P		P	P				
>20 Type II Continental fittings				P	P	P	P	P		P	P				

changes that transpired during this phase, which potentially led to a recession (Esmonde Cleary, 1989; Mattingly, 2007; Gerrard, 2013; Esmonde Cleary, 2017; Fleming, 2021). Moreover, the cessation of bronze coin production at mints north of the Alps in AD 395 had far-reaching consequences. Consequently, the transformations identified in the fifth century find their roots in this pivotal period.

In terms of coin loss, the trends observed in the mid-fourth century persist in many regions in the later fourth century (Figure 13.5). The region which bucks the trend is the environs of Winchester which had below average coin loss in the mid fourth century but above average coin loss in the later fourth. Winchester experienced significant development during this time, including major alterations to the city's layout and organization (Biddle and Kjølbye-Biddle, 2007; Booth *et al.*, 2010, 523; Morris and Biddle, 2023). This switch in trajectory correlates with the evidence of increased activity at *Clausentum*, the nearest sea port, highlighting the region's importance for the *annona militaris* which is the likely cause to the increase in coin loss in the later fourth century (Booth *et al.*, 2010, 525; Henry, 2024c; Henry and Russel, In press).

Conversely, certain regions, such as the northern frontier, the Suffolk and Essex coast, and the southern coast within the Sussex region, continued to see a general decrease in coin loss. Intriguingly, nummi

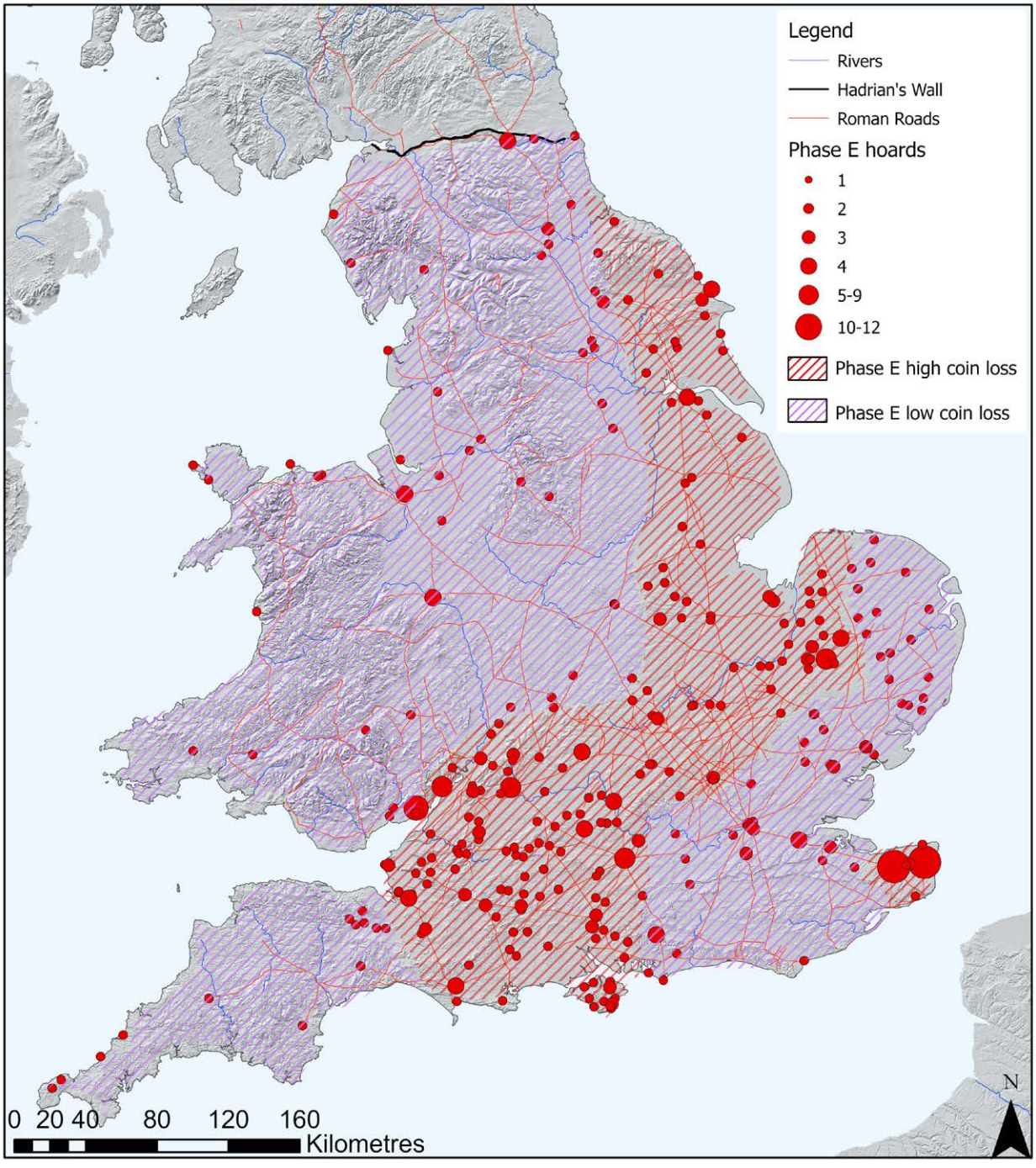


Figure 13.5 - Regions where high coin loss from Phase E occurs (red hatching) compared with regions which tend to have lower coin loss (purple hatching) mapped against all coin hoards from Phase E (AD 364-402). The environs of Richborough has high coin loss from this Phase.

hoards no longer exhibited the same prevalence in some of these areas compared to the mid-fourth century, with higher numbers of nummi hoards found only in the environs of Richborough, Winchester (particularly the Isle of Wight), the Upper Thames Valley, Wiltshire, Somerset, and the Severn Estuary (See Figure 11.13). This coastal concentration of nummi hoards is particularly notable.

Phase E (AD 364-402) marked a notable shift towards an emphasis on precious metal coin hoards, especially silver, a trend distinctive to Britain (Bland, 1997; Bland *et al.*, 2013; Bland, 2018; Bland *et al.*, 2020, 276). This was particularly prominent in the environs of York, the Suffolk and Essex coast, the environs of Winchester, the Upper Thames Valley, as well as in Wiltshire and Somerset.

The sheet metal crossbow brooches of Type 5 and 6, previously associated with high-status elites, have a reduction in their distribution compared to the more abundant Type 3/4 brooches (Swift, 2000; Mackreth, 2011; Henry, 2022b). While examples of these artefacts were found in various regions such as the northern frontier, the environs of York and Wiltshire to Somerset they are less numerous. They tend to occur in highest numbers in the environs of Wroxeter, Winchester and Richborough as well as the Severn Estuary, the East Midlands and Norfolk and the Wash (Figure 13.6, top left). Notably, these brooches were often used in combination with luxurious fabrics like silk, offering valuable insights into clothing elements that might not be well-preserved in the archaeological record (Mackreth, 2011).

The use of Type M penannular brooches alongside other forms of dress accessories associated with the military has been suggested (Collins, 2010, 70ff). Although these brooches have been linked to the military, their distribution differs from that of earlier types of crossbow brooches. Type M penannular brooches were found in the northern frontier, the environs of York, Lincoln and the East Midlands, Suffolk, the environs of Richborough, and North Wales (Figure 13.6, top right). This distribution generally displays an eastern focus, suggesting that while there might be a military association, this type may not have been widely used by state-run or local administration on a national scale. Regions like the Severn Estuary seem to have continued using types with a longer chronology, such as Type D brooches.

Concerning Type I belt sets, distinct patterns and chronologies have been identified (Henry, 2022b). Type IA emerges around AD 370, aligning with regions experiencing significant Valentinianic coin peaks. Conversely, Type IB emerges later, its production likely began in the 390s extending into the fifth century. As part of this discussion of regional patterns, Type I belt set fittings have been grouped to consider regions with at least three of the earlier continental forms (Type IA buckles), five of the earlier insular forms (Type IA and prototype Tortworth) and 10 of the later insular forms (Type IB buckles and Tortworth strap ends).

We tend to see consistency within these regions when the three divisions are compared. Areas with concentrations of Type IA buckles and prototype Tortworth strap ends had higher quantities of the later types. The distribution patterns are generally consistent, with the earlier Type I fittings prevalent in the environs of York and Lincoln, the East Midlands, Norfolk, and the Wash, as well as the environs of Winchester, the Upper Thames Valley, Wiltshire and Somerset and the Severn Estuary (Figure 13.6, centre left).

The noteworthy abundance of the continental Type III and Type IV fittings from Richborough, in contrast to the relative scarcity of Type I belt fittings (especially the insular forms), raises intriguing possibilities given the number of belt fittings recorded from the fort (Figure 13.6, centre right). The assemblage could represent the presence of a continental unit and further support the argument that insular fittings from Type I belt sets tended to be linked to civilians or signify a potentially fragmented diocese during the turn of the fifth century, with different regions undergoing diverse transformations. There is also a relative scarcity of Type I belt sets in Suffolk, especially considering significant sites such as Rendlesham which would ultimately become a royal residence that is situated inland from the Saxon shore fort at Walton Castle which has been argued to be pivotal in both the late Roman and post-Roman periods (Scull *et al.*, 2016).

The later Type IB buckles and Tortworth strap ends exhibit a slight reduction in their distribution compared to those from the mid-fourth century; although they are recorded from the environs of York, it is in smaller quantities. The uncertain chronology of their use, coupled with similarities in their distribution to that of clipped *siliquae*, hints at a possible fifth-century date. This material has been associated with an insular form of *cingulum*, and while interpretations by Laycock (2008; 2010, 213ff) that it represents the existence of militias operating in a power vacuum after the collapse of Roman Britain, this conclusion

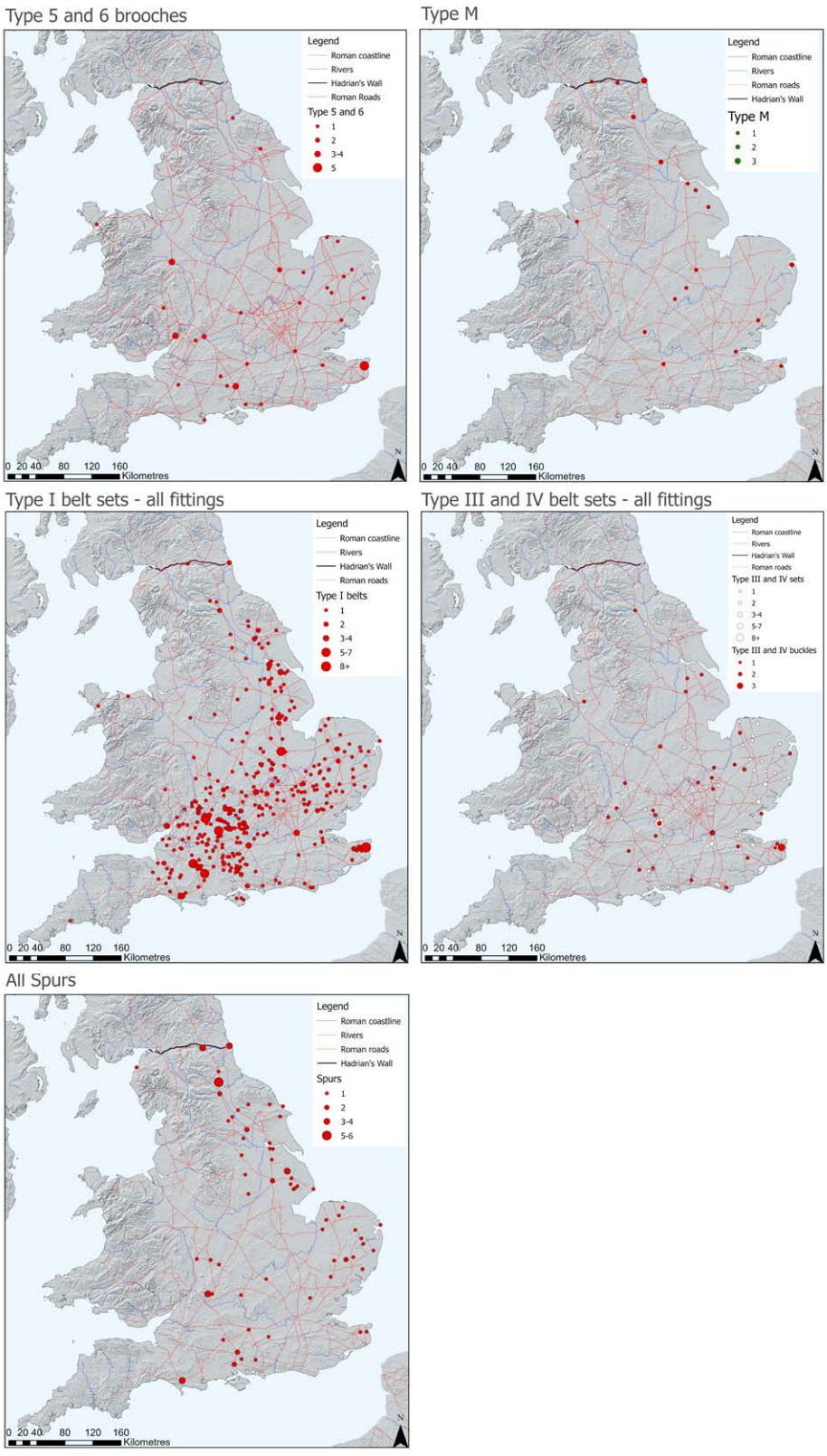


Figure 13.6 - The distribution of sheet metal crossbow brooches Type 5 and 6, top left (See Chapter 7), Type M Penannular brooches, top right (See Chapter 10), all fittings associated with Type I belt sets, centre left (See Chapter 8) all fittings associated with Type III and Type IV belt sets in white with solely buckles mapped in red, centre right (See Chapter 8) and rivet spurs, bottom (See Chapter 9)

has been challenged (Cool, 2010a; Swift, 2010; Gerrard, 2013). Nonetheless, the distribution does indicate that specific regions within the diocese clung to Roman notions of *Romanitas* well into the fifth century.

Generally, the various forms of material culture which have been discussed in this section that date from the later fourth century all follow a similar distribution pattern that tends to reflect the underlying patterns of coin loss from the diocese. In contrast, the distribution for spurs is different. The key emphasis is along the eastern coast, specifically along Dere Street and Ermine Street from the Eastern section of Hadrian's Wall through the environs of York and Lincoln towards Norfolk and the Wash (Figure 13.6, bottom left). This distribution and its implications will be discussed further in Chapter 14.

In contrast to the mid-fourth century, we can see a reduction in the extent of the areas where high coin loss continued until the beginning of the fifth century, this tends to correlate with the distribution of the various forms of material culture discussed as part of this section. While this has been used in the past to suggest a declining sphere of Roman influence (Esmonde Cleary, 2017, 200), the reduced area where coinage is supplied centres on the key areas of arable crop production. Interesting questions emerge including the reason why the fortunes of environs of Winchester change when compared to the mid-fourth century and what the distribution of spurs signifies.

The later fourth century has been viewed as a period of prosperity, particularly in the central belt of Britain, a corridor of empire that was central to late Roman state supply as part of the *annona militaris* (Brown, 2012, 187; Fleming, 2021, 17-23). While discussions of sites with high coin loss have often focussed on supply of foodstuffs particularly grain (Moorhead, 2009; Moorhead and Stuttard, 2012), wool should also be emphasised. We can see an ebbing tide across all suites of material culture, yet it is clear that the influence of the Roman state was significant and substantial wealth remained in the diocese. This principally centres on the road network or the key rivers leading to the emphasis seen in the environs of York and Lincoln, the East Midlands and Norfolk and the Wash as well as the Upper Thames Valley. Links have been made previously between regions with substantial late Roman coin loss and the exportation of grain and other goods. Some of the regional trends highlighted in the previous section continue to become exaggerated (Figure 13.7 and Table 13.3). If we assume that high coin loss correlates with regions where prosperity did occur, it continued to become much more concentrated around the key areas of production across the diocese. Generally, the northern frontier, Wales, east and southern coasts continue to suggest a decline in fortunes and changing supply networks. While Richborough often is a major site in terms of the quantities of objects and coinage, Kent in general is part of this wider transformation and a decline in fortune.

The fifth century transition

The early fifth century marked a significant watershed for the Western Roman Empire, carrying far-reaching consequences. For Britain, the loss of the Rhine frontier and the usurpation of Constantine III were pivotal. One of the major repercussions lay in the disruption of crucial supply networks which had previously made the central belt of Britain prosperous during the later fourth century. These areas have been described as "corridors of empire," vital for the supply of foodstuffs as part of the *annona militaris* (Brown, 2012).

As previously discussed, the significant changes at the turn of the fifth century pose substantial challenges in terms of dating coinage and pottery. The alterations in coin production in AD 395 for bronze, AD 402 for silver, and AD 408 for gold meant that the key chronological indicators ceased to arrive in Britain in significant numbers (Kent, 1994). This shift impacted not only Britain, but all the North-western provinces of the empire (Esmonde Cleary, 2013; Esmonde Cleary, 2017, 182ff).

During the early fifth century, Britain underwent major social and political transformations, transitioning from a Roman diocese to smaller polities (Esmonde Cleary, 1989; Gerrard, 2013; Fleming, 2021). Previous analyses of this evidence often focused on specific time frames for these transitions: whether they were brief ruptures, continuity into the fifth century, or a series of gradual changes occurring over time. The manner and timing of these changes varied across regions; certain areas may have abandoned Roman norms even before the turn of the fifth century, as suggested in the case of Wales, for instance (Faulkner, 2000; Breeze and Guest, 2022, 80-81).

Coin evidence is a key piece of evidence to enable us to comprehend the shifts that took place in the early fifth century. When comparing the distribution of coin loss and hoards between the late fourth and early fifth centuries, a substantial decline in the availability of coinage becomes evident. Spatially, there is a notable shift towards coastal regions, diverging from

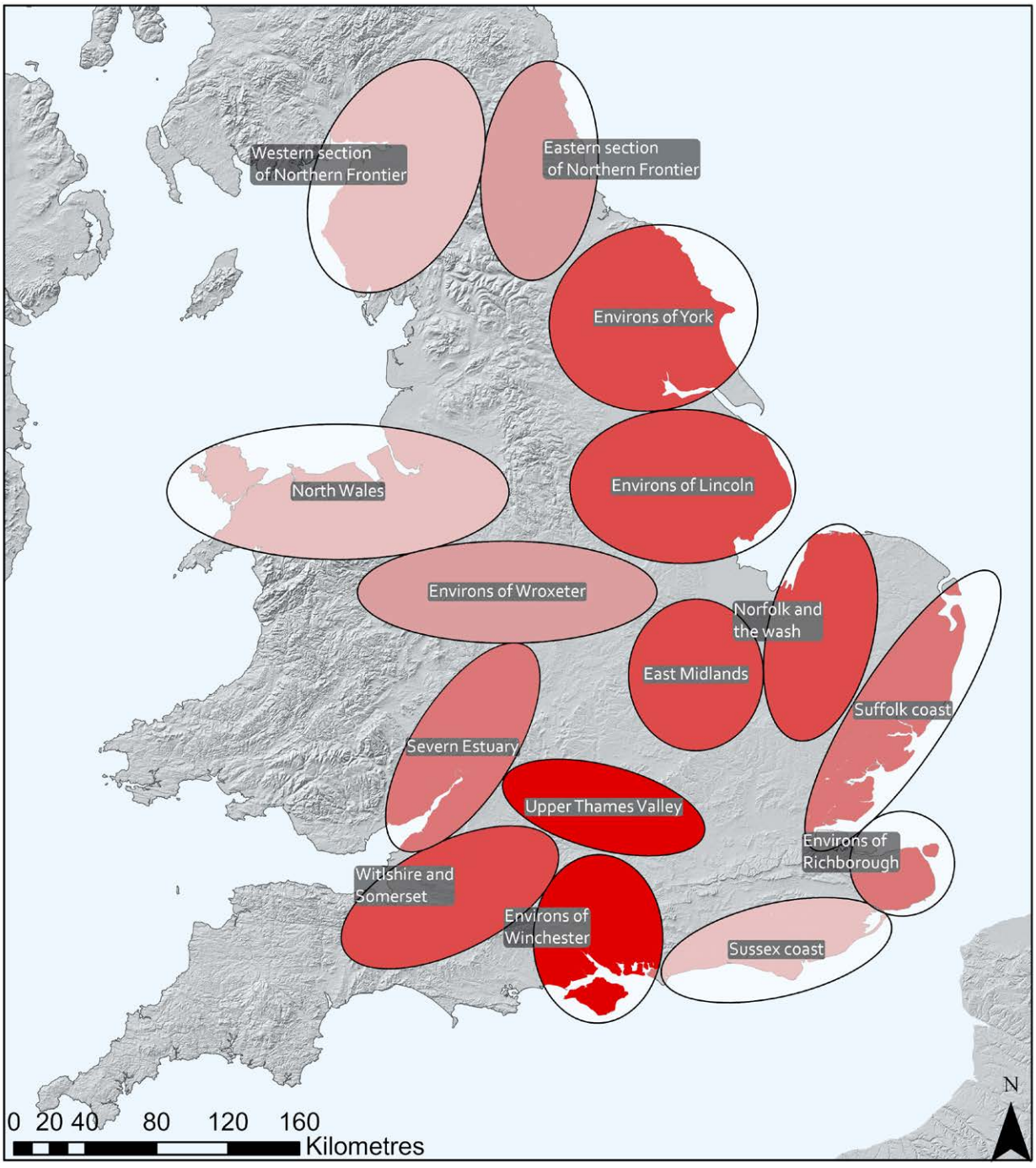


Figure 13.7 - Heatmap of regions considered as part of this study based on the number of elements present or absent in Table 13.3

Table 13.3 - The presence or absence of different classes of material in the later fourth century from the regional study areas, aside from the lower quartile, orange represents an absence of a particular object type from a region.

Region	Western section of northern frontier	Eastern section of northern frontier	Environs of York	Environs of Lincoln	East Midlands	Norfolk and the Wash	Suffolk and Essex coast	Environs of Richborough	Sussex coast	Environs of Winchester	Upper Thames Valley	Wiltshire and Somerset	Severn Estuary	Environs of Wroxeter	North Wales
More sites in coin Phase E upper quartile			P	P	P	P		P		P	P	P			
More sites in coin Phase E lower quartile	×	×					×		×				×	×	×
Emphasis on nummi coin hoards in Phase E								P		P	P	P	P		
Emphasis on precious metal coin hoards in Phase E			P				P			P	P	P			
Type 5/6 Crossbow brooches		P	P		P	P	P	P		P	P	P	P	P	P
Type M Penannulars	P	P	P	P	P		P	P							P
>3 Type IA Continental			P	P	P	P				P	P	P			
>5 Type IA insular and prototype Tortworth			P	P	P	P				P	P	P	P		
>10 Type IB and Tortworth				P	P	P				P	P	P	P		
Type III-IV belt sets		P		P	P	P	P	P	P	P	P	P	P	P	
Type V strap ends			P		P	P	P	P	P	P	P		P	P	
>3 Spurs		P	P	P		P	P			P	P				

the previously dominant coin-using areas of Britain, such as the South, the East Midlands, East Anglia, and the region between Lincoln and York (Figure 13.8). This shift broadly aligns with the hoarding patterns observed after AD 402, where the highest numbers of hoards are recorded in the southern part of East Anglia. However, analysing coins from Phase F only tells part of the story due to the British fifth-century phenomenon of clipping.

The analysis highlighted two main groups of *siliquae* further developing the clipping factors assigned by Guest (2005) discussed in Chapter 12: unclipped or lightly clipped coins (CF 0-CF2) and heavily clipped examples (CF 3-4). Clipping occurred in stages, with the second stage of heavy clipping occurring after AD 406, making it central to understanding the political changes in the fifth century (Burnett, 1984; Bland *et al.*, 2013; Abdy, 2020). Chapter 12 demonstrated uniform proportions of clipped coins by Reece period in all regions where they occur in large numbers suggesting that clipping was a centralised event and that silver coinage was widely used and rapidly circulating. This transformative analysis enables us to trace regional trajectories and chronologies associated with this phenomenon.

Crucially, a comparison between the distribution of clipped *siliquae* and hoards containing clipped *siliquae* suggests that the environs of York, East Anglia, the environs of Winchester and Wiltshire and Somerset were regions that continued to use these coins for an extended period. Interestingly, some regions where clipped coins are found in significant quantities do not show evidence of hoarding such finds. Gresham's Law, whereby inferior coins drive out superior ones, suggests that these regions represent the last areas of the diocese of Britain where coinage continued to be used following Roman patterns were the environs of York, Norfolk and the Wash, the Suffolk coast the environs of Winchester and Wiltshire to Somerset. The Severn Estuary region is interesting given the significant peak in the number of nummi coin hoards from the end of the fourth century, this combined with the absence of clipped *siliquae* as site finds and in hoards might suggest that if coin use continued, it followed previous norms as part of a tripartite currency system.

Intriguingly, certain areas of East Anglia, particularly Suffolk and Essex, lack late Roman insular forms of metalwork, including Eastern British types of penannular brooches, a pattern observed in other materials like late Roman double sided combs (Figure 13.9). Similarly, the analysis of the lower quartile per mill for Phase E (See Figure 11.12) suggests lower coin loss at the end of the Roman period in this region. However, despite this, the area boasts some of the highest numbers of late Roman coin hoards and metalwork hoards suggesting an emphasis on a precious metal economy (Hobbs, 2006; Bland, 2018; Sycamore, 2019; Bland *et al.*, 2020, 276).

While the absence of evidence cannot definitively support conclusions, it is particularly noteworthy that the regions lacking late Roman insular material and with below average loss of bronze coinage, often align with some of the earliest forms of post-Roman material in the fifth century. As part of our examination of early fifth-century artefacts, we will delve into the distribution of the earliest cruciform brooches, supporting arm brooches and Quoit Brooch Style as well as a consideration of the distribution of Roman belt fittings in Angle-Saxon burials.

In a recent analysis of cruciform brooches, Toby Martin documented 191 Group 1 cruciform brooches dated to approximately AD 420-475 (Martin, 2015, 128). Within this group, two subgroups were identified: sub-group 1.1, likely limited to the first half of the fifth century is continental and a good indicator of an incoming population. In contrast sub-group 1.2, likely produced until around AD 475 and perhaps even later appears to be an insular development. Consequently, the distribution in Figure 13.10 has been segmented by sub-type. Both subtypes are predominantly concentrated in Lincolnshire and East Anglia in the environs of Lincoln, Norfolk and the Wash and Suffolk coast regions discussed here. While a few examples are documented in the region south of the Wash, their numbers are significantly fewer and might suggest the mobility of individuals.

Supporting arm brooches represent another distinct type that emerged during the early to mid-fifth century. Previously considered rarities in Britain, with only 50 recorded by MacGregor and Bolick (1993); a recent survey has expanded the list to 95 (Gerrard, in press). These brooches are broadly categorised into two types based on their width: the Mahndorf type (25-30mm) and the Perlberg type (12-22mm), with some featuring more intricate ornamentation (Böhme, 1977; Evison, 1977). Their dating spans from the early fifth century to the mid-fifth century or slightly later. The highest concentrations of this type are found in East Anglia primarily in the Suffolk coast region discussed here, with additional notable occurrences in the Upper Thames Valley and the environs of Winchester (Figure

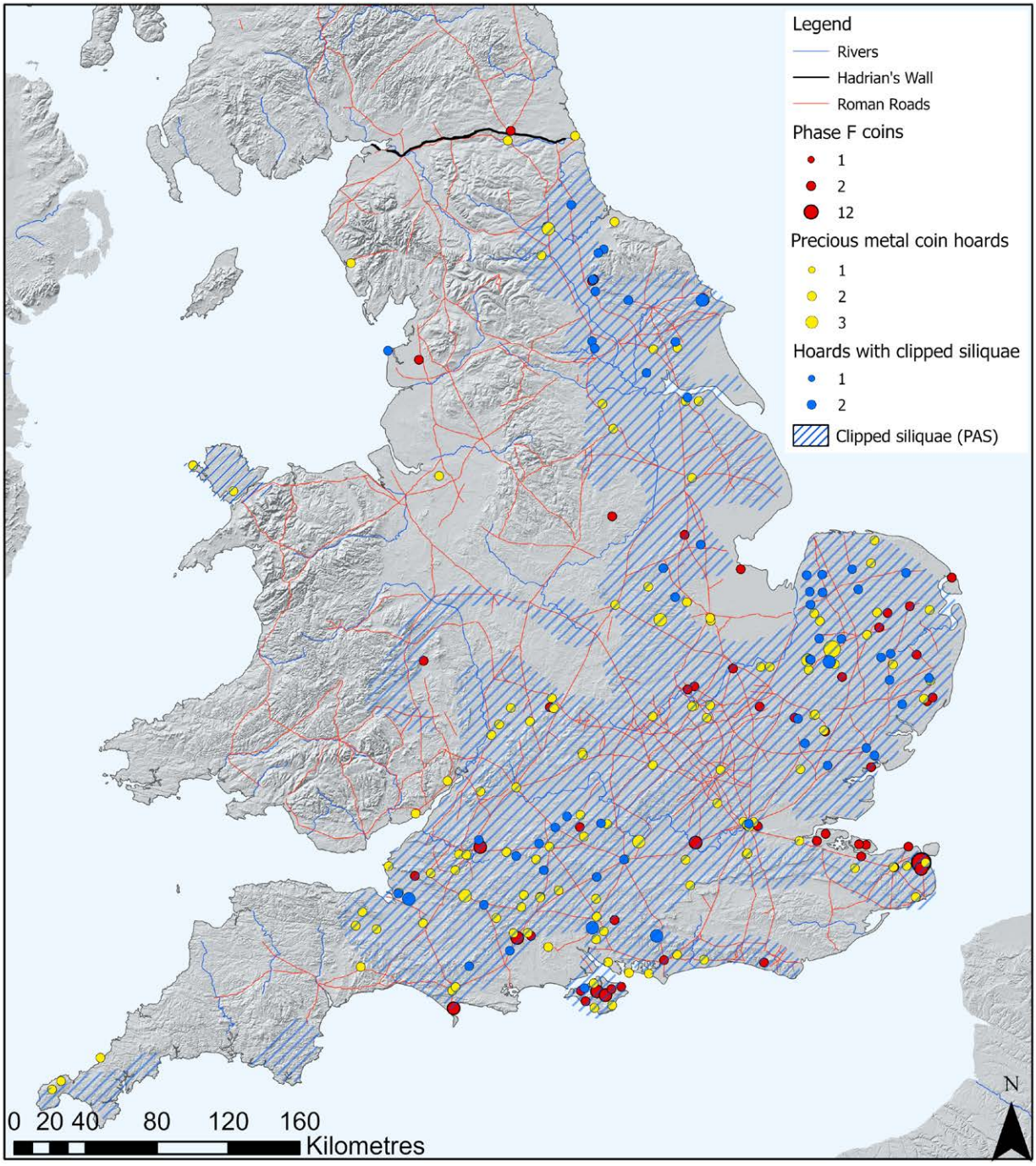


Figure 13.8 - The distribution of coins struck in Phase F compared with precious metal coin hoards after AD 364, hoards with clipped coinage and the regions where clipped coinage circulated (blue hatching). While the hoard and clipped *siliquae* both demonstrate widespread circulating currency, in contrast clipped coins within hoards is much more limited to three key regions suggesting the last areas that coinage remained in use. The coastal emphasis of single coins after AD 402 emphasises the pattern seen where by the 460s coinage had become simply bullion.

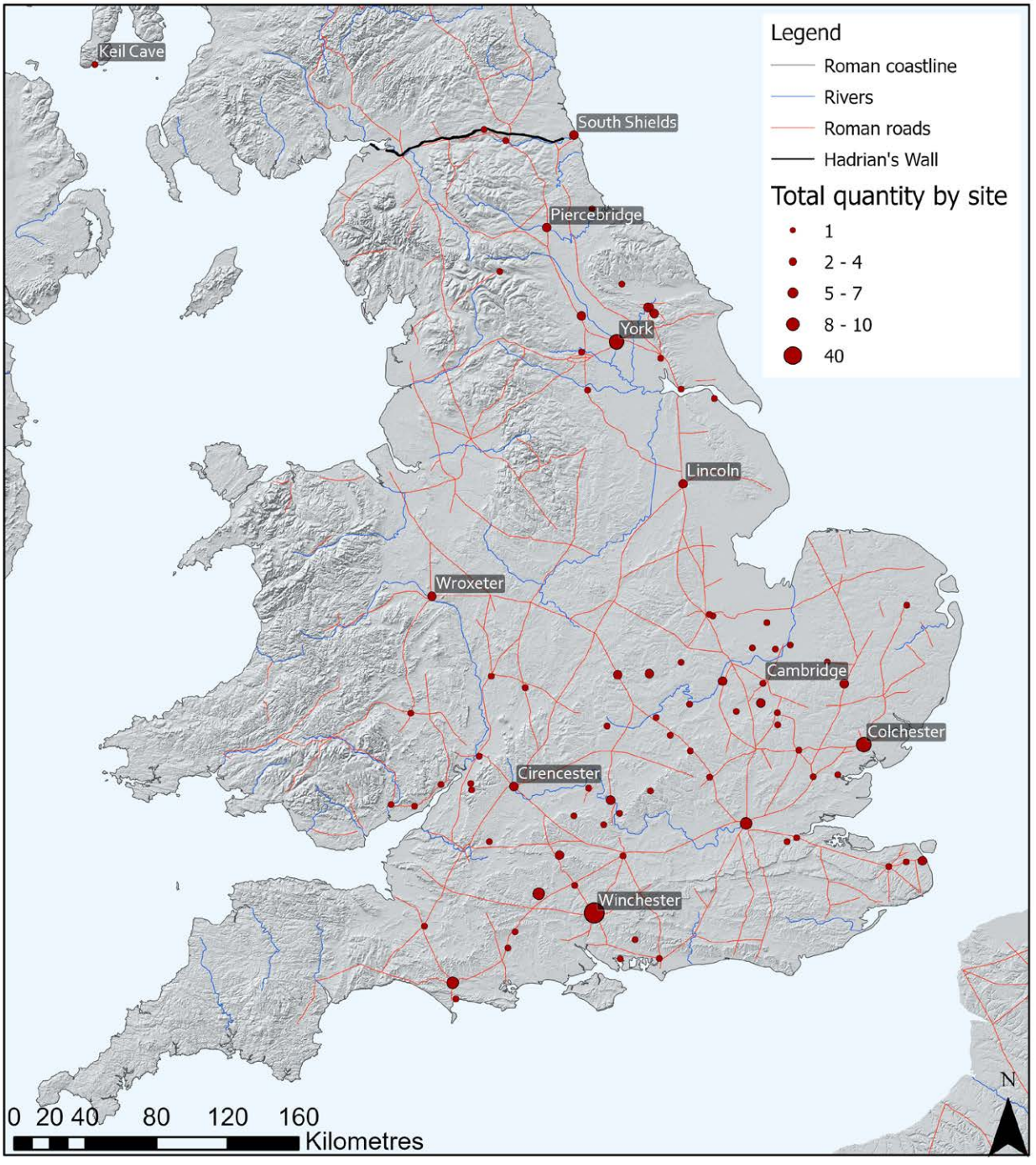


Figure 13.9 - The distribution of late Roman double sided antler combs in Britain (After Crummy and Henry, 2024, Figure 6.1). While it was suggested that some of the patterns were geological and relate to artefact recovery, note the absence of the material around Lincoln is a pattern seen with clipped *siliquae* hoards. Similarly, absences of material in parts of East Anglia appears significant.

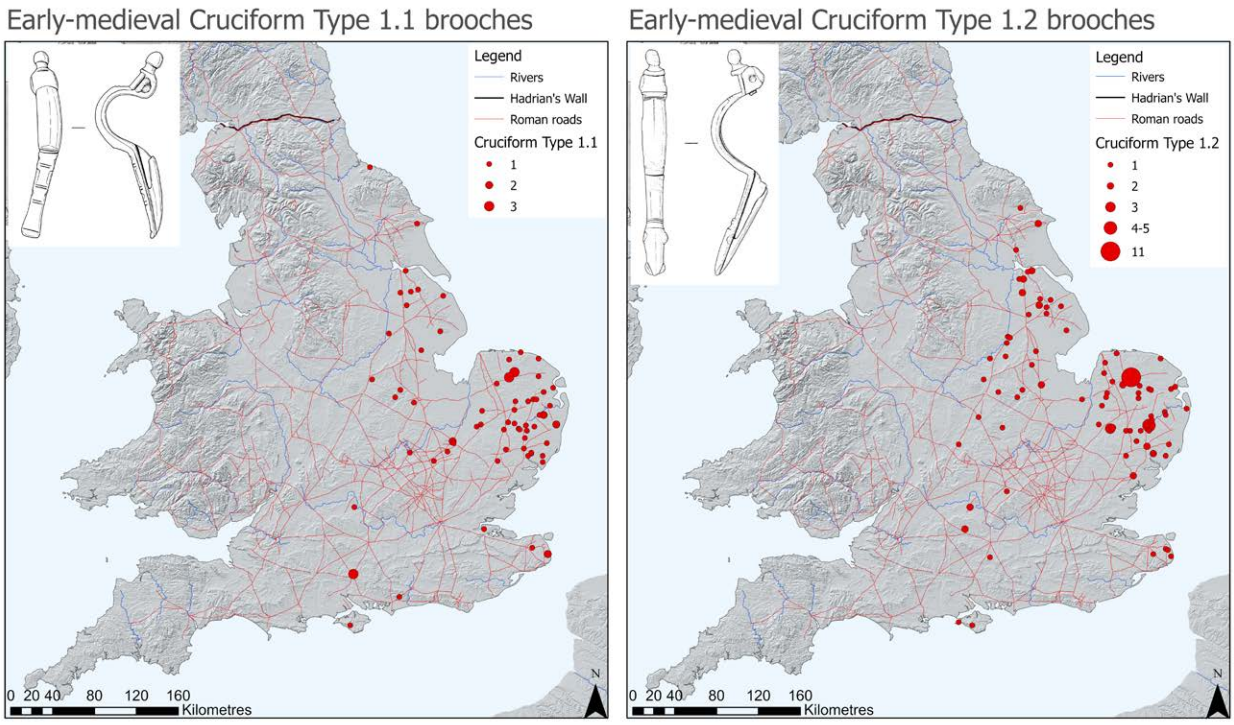


Figure 13.10 - The distribution of the earliest forms of fifth century Cruciform brooches based on data provided by Toby Martin (2015)

13.11). Conversely, few examples are documented in the environs of Lincoln.

The final fifth century introduction that will be considered here is Quoit Brooch Style (QBS). It has significant elements of both insular and continental craftsmanship and is considered to be partly of British origin (Evison, 1968; Evison, 1978; Swift, 2019). The non-Germanic elements seen on this decorative style derive from exposure to late Roman forms of decoration (Eagles, 2018, 18). As part of this study 82 QBS fittings have been considered derived from work by Swift (2019). She argued that D shaped QBS tubes were chronologically later potentially continuing into the sixth century, consequently they have been excluded from the distribution highlighted in Figure 13.12. The distribution of QBS fittings differs from those of cruciform brooches and supporting arm brooches with a greater emphasis on the southern coast particularly in the environs of Richborough and Winchester, the Upper Thames Valley and the East Midlands.

These three distributions are intriguing when contrasted with Roman material culture patterns from the mid fourth and late fourth century (such as Figure 13.3 and Figure 13.6). The distribution of the early fifth century brooch forms varies significantly when compared with that of Roman belt sets found in Anglo-Saxon graves Late Roman belt fittings in Anglo-Saxon burials form a distinctive band, stretching from Kent to the Severn Estuary (Figure 13.13). Remarkably, this pattern demarcates the two regions where the highest number of clipped coin hoards have been discovered. A broadly similar distribution can be seen with QBS fittings.

Consideration of these four groups is significant as they provide a window into the social and political changes occurring in the fifth century. We might expect predominantly Germanic material in specific regions such as Lincolnshire and East Anglia based on previous research, a pattern which remains evident (Figure 13.14). Yet in other regions such as between Winchester and the East Midlands the picture remains significantly more complex. It could be suggested that the region and the complex distribution reflects the transitions from Roman *civitates* to post-Roman polities and the expansion of certain groups that occurred during the fifth century. The results signify transformations that took place arguably over a period of perhaps 50 years, as these high status goods seem to represent an elite changing over time and a transition from an elite that

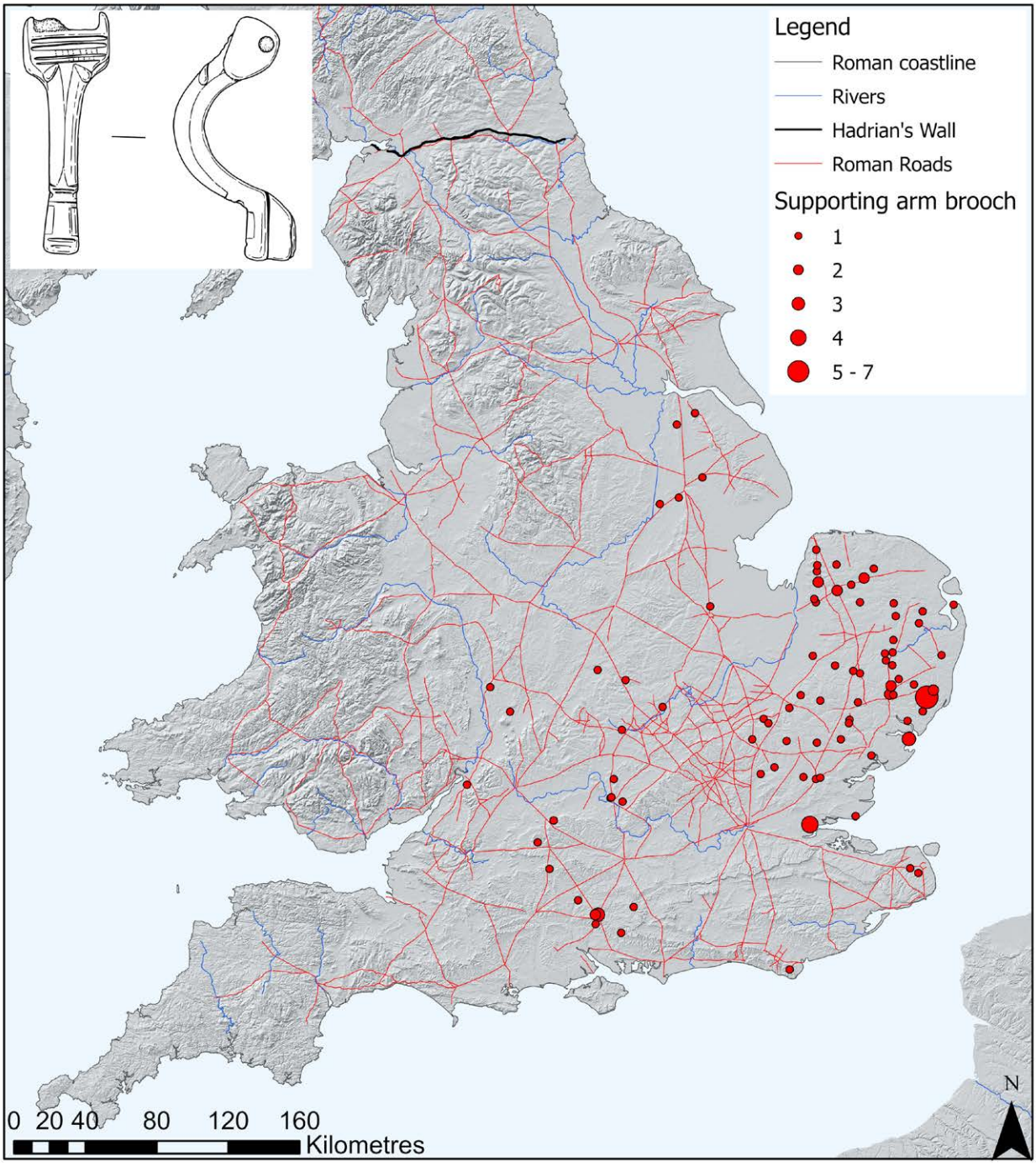


Figure 13.11 - The distribution of fifth century supporting arm brooches based on data provided by Gerrard (In press)

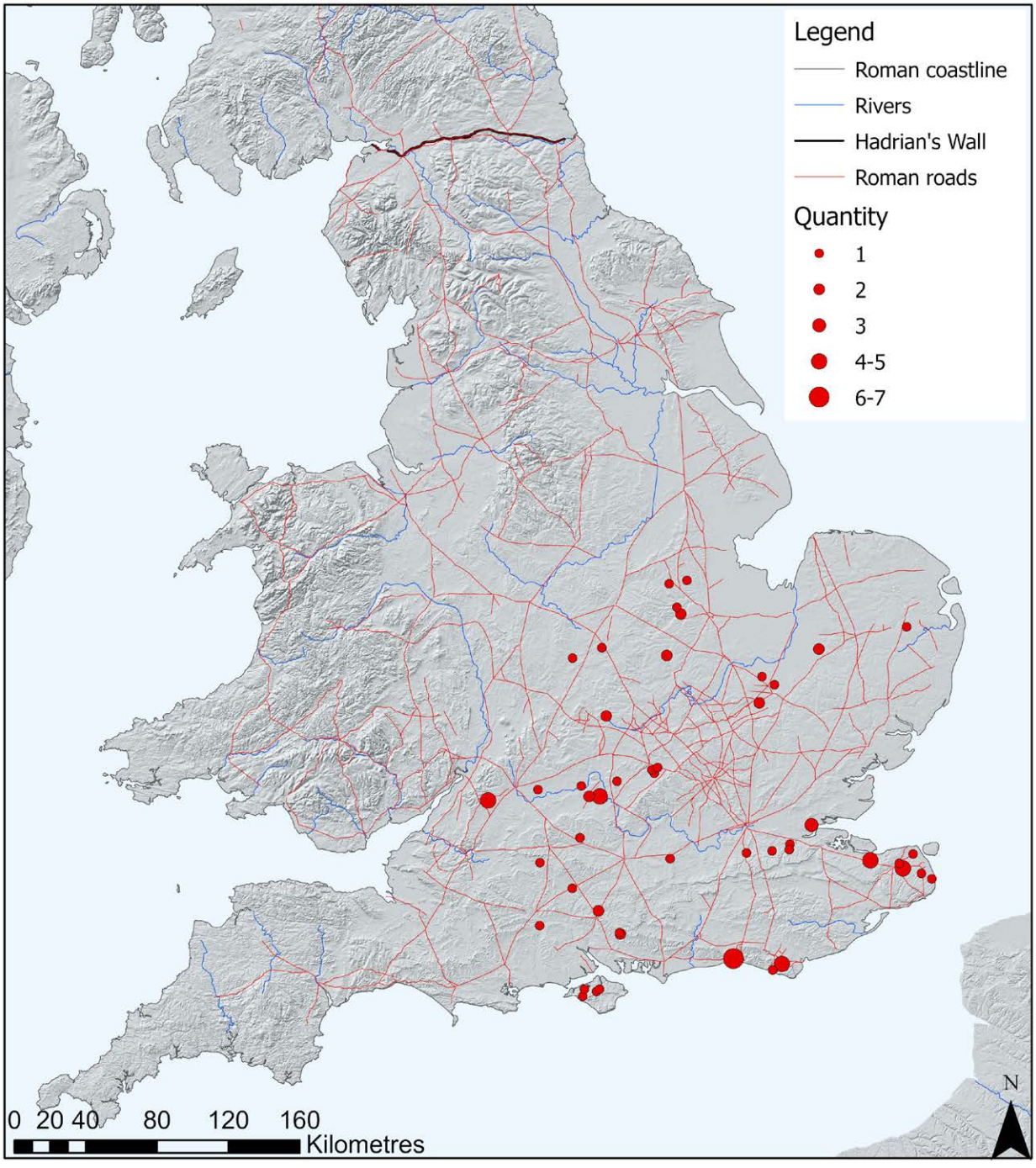


Figure 13.12 - The distribution of QBS fittings in Britain excluding D shaped tubes (Swift 2019)

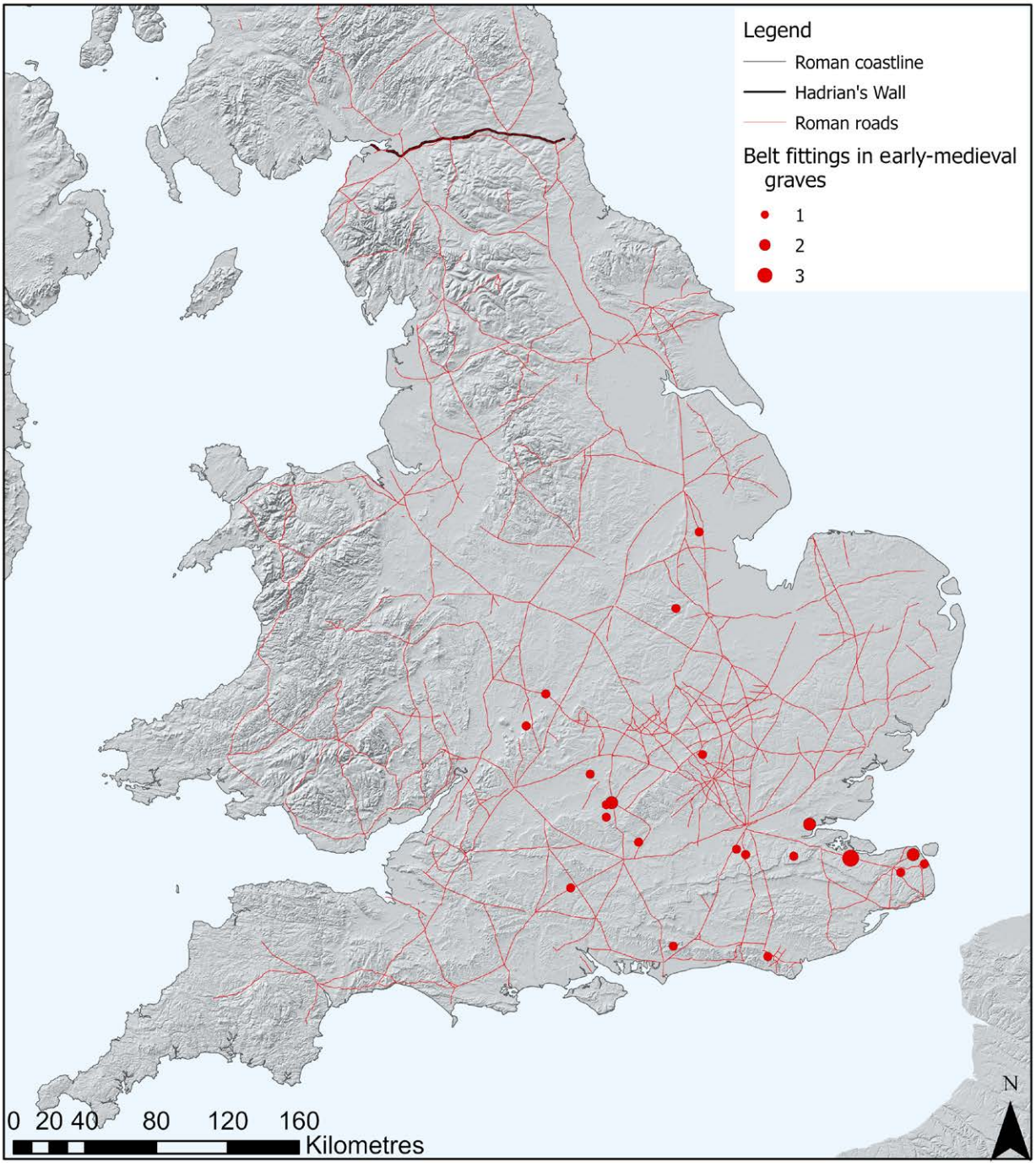


Figure 13.13 - The distribution of Roman belt fittings in early-medieval graves

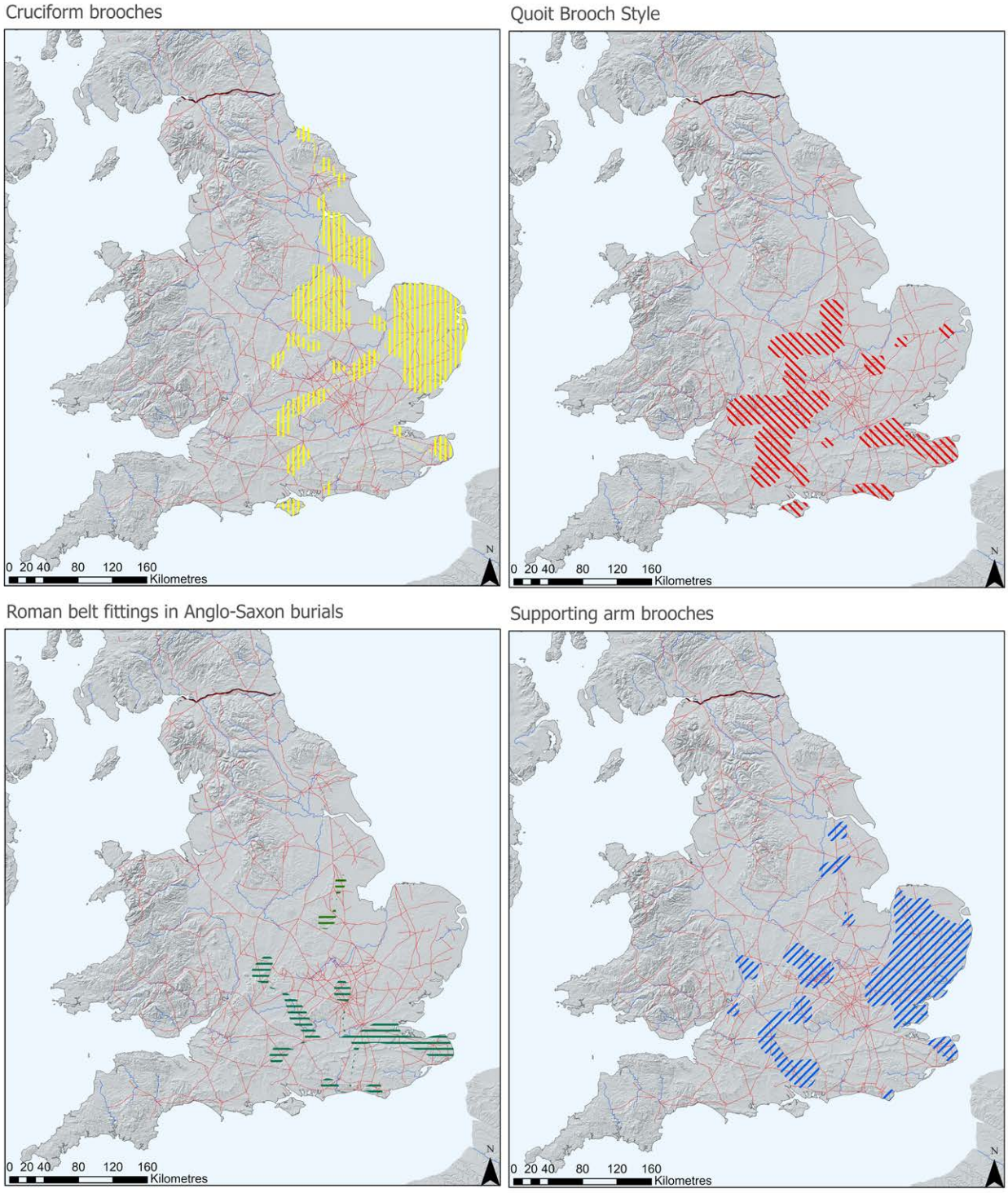


Figure 13.14 - The core distributions of Group 1.1 cruciform brooches (yellow), Quoit Brooch Style objects (red) supporting arm brooches (blue) and late Roman belt fittings in Anglo-Saxon burials (green). The results demonstrate that in particular areas a complex pattern emerges with all object forms found such as the environs of Winchester, whereas in the environs of Lincoln or in Norfolk and the Suffolk Coast the material considered here is primarily Germanic in origin.

followed Roman fourth century norms to a greater emphasis on military force in the fifth century – we should remember life within the empire was always a violent place with a thin line between predation and protection (Bang, 2008, 203-205).

Chronological challenges in the fifth century present difficulties for understanding significant social and political changes in this period as part of a regional overview. In the data we can see two patterns which appear to potentially overlap chronologically but the poor refinement in date leads to two patterns within Figure 13.15 and Table 13.4. The first group could be considered as a continuation of late Roman norms of elements such as taxation and the circulation of currency as part of a coin using economy and the taxation pay cycle during a period of change. A good example of this is the phenomenon of clipping where heavy clipping occurs towards the end of the first decade of the fifth century. These coins are widespread across the main coin using area of the diocese and suggest rapid circulation and that the clipping was undertaken at a central level due to the uniformity. Yet not all areas which used clipped coins contain clipped coin hoards allowing us to identify three core areas of deposition in Britain: parts of the South-west, East Anglia and Yorkshire. We can also see similarities in certain distributions such as those of QBS objects and Roman belt fittings. The Sussex coast, which in the preceding periods was generally absent in the heatmaps, becomes more prominent with the later suite of objects and coinage which is best considered bullion deposited from the 460s onwards.

Conclusions

The three broad chronological phases were selected to highlight regional variation, and a number of the patterns observed build on previous narratives focussing on the contraction of evidence of state involvement. This overview underscores the complex (and changing) socio-dynamics of late Roman Britain. Within this picture are national and regional patterns that demonstrate a significant number of regional trajectories. We see changing fashions of elite dress, the mobility of members of the state and variation in the economic prosperity of different regions and ultimately the cessation of Roman norms and the creation of new identities.

In the mid-fourth century on the whole we see a pattern where regions which witnessed a decline in coin loss tend to have fewer instances of the suite of material culture linked with the state and late Roman elite. These regions include the northern frontier, Wales and the Sussex coast. Where it does occur, the material in these regions tends to be chronologically earlier such as Type 1 crossbow brooches (the most prevalent type in the northern frontier) or fittings from Type II belt sets. The continued pattern of lower coin loss combined with fewer examples of later object types such as Type 3/4 crossbow brooches and Type I, III or IV belt sets supports the argument by Cool (2010a) that by the mid-fourth century the key frontier was along the east coast. This coincides with major changes in other aspects such as the changing supply networks around the same time (Bidwell and Croom, 2010, 26-30; Bidwell, 2017, 292).

In the mid-fourth century, regions with relatively high coin loss in Phase D also tend to feature the greatest number of belt sets, with few found north of the Humber or along the south coast. The distribution of insular forms suggests a potential link between a specific form of insular belt without all associated fittings and the highest numbers of late Roman penannular brooches. These regions also tend to have the highest number of nummi hoards.

The shift that can be seen in the mid-fourth becomes more pronounced in the later fourth century. This divergence is seen within the datasets and variation between regions is perhaps clearest through coinage and hoards. Silver coinage predominates in hoards to the South whereas silver plate is a significant proportion of hoards in the East. The analyses in this study suggest divergence might have begun as early as AD 370, indicating that inhabitants in specific regions, especially in East Anglia (away from the eastern section of the Wash), no longer wore insular forms of metalwork and placed a far greater emphasis on silver bullion. This coincides with an increase in sites falling in the lower quartile of coin loss per mill but an increase in the quantity of gold and silver hoards recovered. While using artefacts alone for definitive conclusions requires caution, these patterns, when considered alongside early forms of post-Roman metalwork, suggest a changing population in the later fourth century.

In the later fifth century, an absence of Roman insular forms of material culture has been noted where a concentration of Anglo-Saxon cremation cemeteries occurs along the river and road network. A correlation between the distributions of these cemeteries and the chronologically later insular forms of Type I and G penannular brooches has been noted and suggested as evidence of culturally distinct groups living side by

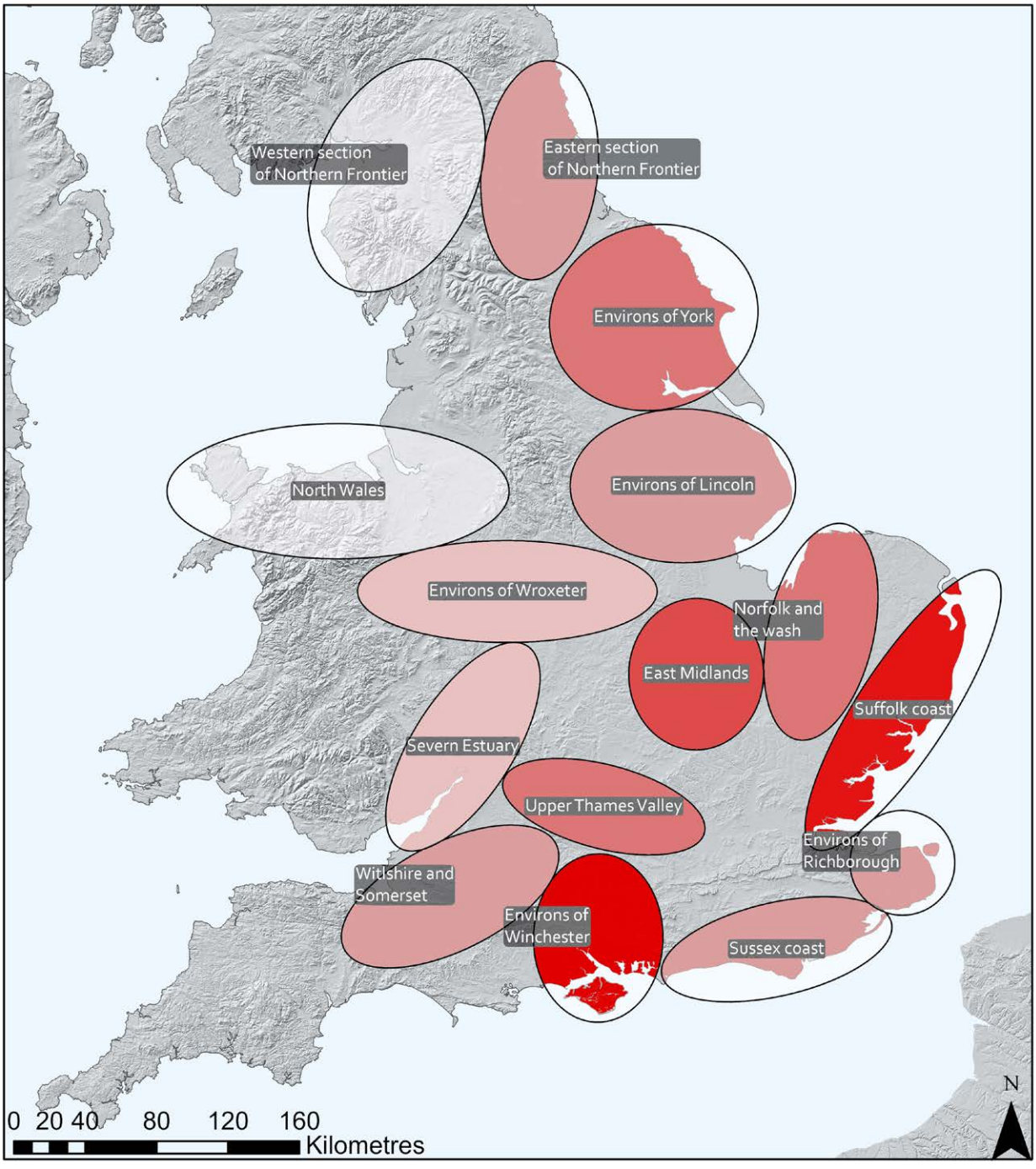


Figure 13.15 - Heatmap of regions considered as part of this study based on the number of fifth-century elements present or absent in Table 13.4

Table 13.4 - The presence or absence of different classes of material during the fifth-century transition from the regional study areas. Where material is totally absent from a region it is highlighted in orange.

Region	Western section of northern frontier	Eastern section of northern frontier	Environs of York	Environs of Lincoln	East Midlands	Norfolk and the Wash	Suffolk and Essex coast	Environs of Richborough	Sussex coast	Environs of Winchester	Upper Thames Valley	Wiltshire and Somerset	Severn Estuary	Environs of Wroxeter	North Wales
Phase F single gold coins		P	P		P	P	P	P	P	P	P				
Phase F coin hoards		P	P		P		P	P	P	P		P			
Clipped *solidi* in coin hoards		P	P	P			P			P	P	P			
>50 Clipped *siliquae* (PAS data)			P	P	P	P	P			P	P	P	P	P	
>5 Supporting arm brooches				P	P	P	P			P					
>3 Early forms of Cruciform brooch			P	P	P	P	P	P		P	P				
>3 Quoit Brooch Style objects					P	P	P	P	P	P	P				

side (Green, 2020; Walker, 2021). Of particular interest for this study was the absence of these insular forms in the environs of Lincoln itself which it has been suggested is evidence that by this time the polity that had existed had lost power or that cultural distinctions had disappeared (Walker, 2021). Given the absence of late Roman high status material such as combs from the environs of Lincoln and the absence of clipped coinage in the latest hoards, perhaps this political change occurred sooner than previously allowed.

To fully evaluate these changing trajectories in the post-Roman period, evidence for settlements, cemeteries and other forms of material culture should be considered in combination.

In some other regions of the diocese the overview has demonstrated different patterns emerge, suggesting that certain areas continued to adhere to Roman norms and use insular forms of Roman metalwork into the fifth century. I would link several of these material culture groups to the local elite. These areas include the region between Cirencester and Winchester, as well as parts of the East Midlands and Yorkshire. These regions also feature a high number of hoards with clipped coins, indicating they might be some of the last areas where coins continued to be used.

The distribution of some of the latest forms of metalwork linked with the state, such as Type III and IV belt sets, Type 5 or 6 crossbow brooches, and spurs,

shows a different pattern, suggesting these forms were utilised by distinct groups. As noted by Swift (2000), Type 5 and 6 crossbow brooches seem to be worn by high-status elite groups with a rural emphasis. In these regions, the patterns often align, indicating regions of utmost significance to the state. Generally, this distribution appears to be the central belt of England, parts of East Anglia, and the area between Lincoln and York. The rest of the country, for the most part, seems to be on the periphery of distributions from AD 364 onwards.

Richborough and *Clausentum* emerge as key entrepots in the final decades of the fourth century, rather than crucial sites in the Saxon shore fort system (Drinkwater, 2023; Henry and Russel, In press). Several distributions emphasise strong coastal or riverine links, particularly in the Severn Estuary, the Thames, the Great Ouse, and the Nene. It is intriguing that a decline in coastal trade from the east of England to the northern frontier correlates with an increase in road-based trade from pottery kilns such as Crambeck in Yorkshire (Evans, 2000, 40; Bidwell and Croom, 2010, 29; Evans, 2015; Wood, 2016; Bidwell, 2017, 292). This decline coincides with a growing emphasis on supplying the Rhine frontier from the mid-fourth century onwards, linked to sites with peaks in coin loss from Phase E, particularly Reece period 19 (Moorhead, 2009; Moorhead and Stuttard, 2012).

Specific regions retained their economic importance in supplying the continent. Higher levels of coin loss are observed in the central belt surrounding the Wash, Somerset, and Wiltshire, indicative of prosperous economic activity. Conversely, regions like the northern frontier and North Wales exhibit comparatively lower levels of coin loss. Notably, the hoarding of nummi coins along the east coast and the Severn Estuary presents a distinct deviation from the wider pattern. This suggests different economic dynamics in these areas, perhaps hinting that things continued as normal in some regions potentially into the second quarter of the fifth century when currency in other regions consisted of heavily clipped *siliquae.*

The transformations seen after the turn of the fifth century are due to a myriad of political and economic changes and generally, the prosperity of various regions follows that seen in the preceding periods. The cessation of bronze coin production and the emergence of silver hoards signify shifting economic landscapes, while the decline in the use of certain artefacts suggests evolving social norms and fashions. In the early fifth century, further transformations unfold, characterised by disruptions in supply networks and political upheavals. Widespread coin clipping and the emergence of new artefact types signal the transition towards post-Roman identities and economies.

14. Peeling Back the Layers: Roles and Regalia in Late Roman Society

The preceding chapter demonstrated that we can identify regional changes that occurred chronologically with a contraction in many of the distributions of different artefact types over time. A difference has also been observed between the distribution of fifth century Roman coinage and metalwork, and a number of post-Roman object types.

This chapter now shifts focus to consider if we can associate specific forms of material culture with particular roles in Late Roman society, and also the degree to which this material and practice was integrated into continental Europe or shows Britain increasingly going its own way. The concept of boundary change (introduced in Chapter 5) is central to this discussion particularly boundary shift and boundary drift. We are essentially evaluating what material culture can tell us about if different social or political groups or regions of Britain redefined their identity *from within* (Boundary shift) or if change was driven by *outside influences* (Boundary drift).

The first two parts of this chapter evaluate who used particular high-status objects, and what they signified, and if the material can help us identify any specific military units or roles. It will be argued that the results of this study suggest links between different object types and the military, the administration, and the local elite. It is also suggested that some objects, notably spurs, can be linked to the *comitatenses*.

The third part considers what the corpora can inform us about the degree that the diocese was integrated with the wider empire and how deeply engrained this was in society.

When regions stopped being Roman varies significantly, it could occur in the later fourth century, at the start of the fifth century or potentially a number of decades after the supposed end of Roman Britain in AD 410. It will be argued that we can identify attempts by the local elite to maintain power and influence in the fifth century which appears to have succeeded for a decade or two before significant social and political change. At this stage Britain followed a different path to that seen on the continent where the local elite also faced similar transitions. This sets the scene for the key discussion looking at how, why and when Roman Britain began to disintegrate in the next chapter and if this change was from within or as a consequence of outside influences (Chapter 15).

High status, high stakes; artefacts and the dynamics of power.

The artefacts examined in this study raise intriguing questions about power dynamics and the social and political groups that wielded them to signify status. It is commonly assumed that a significant portion of these objects were worn by late Roman military personnel or those in the state-run administration (who were ranked as soldiers). This study generally supports such a conclusion but further elements are also at play, for example the insular material reflects the militarisation of elite attire and changing fashion during the fourth century (Esmonde Cleary, 2013, 89).

Traditionally, the frontiers of Britain and major urban centres have been focal points for evaluating evidence of the military and the state-run administration (Esmonde Cleary, 1989; Collins and Allason-Jones, 2010; Cool, 2010a; Collins and Breeze, 2014; Esmonde Cleary, 2017). However, the emphasis on the frontiers and towns risks overlooking the mobility of these groups and the widespread distribution of state personnel across the diocese of Britain. The vastly expanded datasets considered in combination in this study have made a significant contribution. The situation is further complicated by the existence of insular material, such as belt fittings and penannular brooches, which have often been associated with different groups: the local elites, the *limitanei*, and militia forces (Leahy, 1984, 24; Collins, 2010, 71; Esmonde Cleary, 2013, 89; Esmonde Cleary, 2017). This study, which has evaluated the archaeological evidence across various object types, underscores that individuals wearing key markers linked with the Roman state were present across large parts of the diocese.

Typological, spatial, and social analyses were employed in this study to highlight spatial variations and differences by site type to evaluate previous interpretations in light of additional data and methods.

This section will assess the outcomes of the typological, spatial, and social analyses employed in this study to

explore the possibility of identifying three key groups: the military, the state-run administration, and the elite.

Military

At military sites, the most prominent marker of status which survives in the archaeological record is the crossbow brooch. Swift's (2000) analysis of brooch types by region highlights a distinctive feature of Britain: a higher prevalence of Type 1 brooches (produced between c. AD 290-320) compared to other North-western provinces. This pattern reflected a military emphasis in her corpus as significant percentages of Type 1 brooches come from military sites across Britain (See this study Figures 7.5, 7.9 and 7.10 in particular). Consequently, the occurrence of a substantial proportion of Type 1 brooches at a site can be seen as a strong indicator of military influence within its artefact assemblage.

In contrast, on the Rhine and Danube frontiers, Type 3/4 crossbow brooches (produced between c. 325-410) occur in higher proportions. However, these brooches are not as prevalent on the northern frontier or at the Saxon shore forts in Britain. This discrepancy contrasts sharply with the distribution patterns observed at urban, nucleated, and rural sites. A similar trend emerges with late Roman belt sets, especially along the northern frontier, where both crossbow brooch and belt fitting assemblages tend to feature earlier chronological forms. Apart from a Type 6 crossbow brooch found at the urban centre of Corbridge, sheet metal crossbow brooches and the latest continental belt set forms are notably absent from the northern frontier and most Saxon shore forts (exceptions include examples from Richborough and Portchester).

These distribution patterns signify major transformations coinciding with the decline in sea-based supply along the eastern and western coasts of England and Wales from around AD 350/370 onward (Evans, 2000, 40-41; Bidwell and Croom, 2010, 26-30; Evans, 2015; Wood, 2016; Bidwell, 2017). Following this shift, there's a heightened reliance on the road network to supply the northern frontier. By the later fourth century, it has been suggested that inland forts along Hadrian's Wall had greater flexibility to adopt local practices, a possibility reflected in the material culture explored here (Bidwell and Speak, 1994; Wilmott, 2000, 17; Gardner, 2007, 182; Birley, 2014).

While stone-built forts across the diocese serve as enduring symbols of Roman imperial authority, the scarcity of later artefact types at obvious military sites when compared with the presence of these objects elsewhere prompts consideration of alternative users for many of these objects. Across the diocese, a greater prevalence of Type 3/4 brooches at urban, nucleated (both defended *vici* and undefended sites), and rural sites aligns more closely with patterns observed in continental material studied by Swift (2000). This material could potentially signify military garrisons stationed in towns, or alternatively, these objects may have been associated with the state-run administration, given Britain's crucial role as a supplier of food and other products.

The diversity of belt fittings (both insular and continental) found at urban, nucleated, and rural sites contrasts starkly with their scarcity at military sites, with Richborough being a notable exception. This diversity suggests either that members of a broad range of social or political groups wore these objects or indicates the presence of troops in towns and other settlements, thereby posing challenges in evaluating patterns across the settlement hierarchy.

Urban

Urban sites exhibit a notable prevalence of continental belt sets, particularly Type III and Type IV, along with sheet metal crossbow brooches. Additionally, insular forms of belt fittings are also abundant across a wider range of urban sites. Rather than indicating evidence of tribal militias or a power vacuum at the end of Roman Britain, the correlation between these insular forms and the distribution of coinage lends weight to the argument that these are civilian pieces associated with the local elite (Esmonde Cleary, 2013, 89). These elite groups played essential roles in facilitating the efficient functioning of the late Roman state and its taxation system.

While pinpointing the specific social or political groups linked with the use of insular and continental belt fittings poses a challenge, the presence of continental forms at sites such as London, Lincoln, and Winchester strongly suggests that these objects were worn by higher-ranking officials stationed at these strategic locations. Consequently, this material should arguably be associated with the late Roman administration, given its distribution pattern predominantly focusing on the key arable areas of the diocese.

Nucleated

The patterns revealed by the analysis of corpora at defended *vici* closely mirror those observed in urban centres, indicating the pivotal role defended *vici* played in the administration of the diocese. It can be argued that their primary function revolved around supply and taxation in kind, underscoring their significance in facilitating the logistical aspects of the late Roman state (Allen and Lodwick, 2017; Shoemark and Henry, In press). Additionally, the importance of these sites to the *cursus publicus* enabling the movement of officials by providing lodgings and equids should not be underestimated (Black, 1995; Laurence, 2024).

Examining the proportions of belt sets and crossbow brooches in nucleated settlements highlights a similar diversity of individuals and groups inhabiting or interacting with these sites. Compared to other types of settlements, the corpora suggest that the composition of inhabitants in undefended nucleated settlements displays a higher degree of potential heterogeneity than in defended *vici*. This diversity can be attributed to the multifunctional nature of these settlements, which served not only as economic and administrative centres but also potentially as religious or industrial sites. Consequently, nucleated settlements attracted individuals who made distinct contributions to the economic, social, and political dynamics of the settlement itself. Moreover, their influence extended beyond the settlement boundaries to both the broader *civitas* or regional level and the wider province.

When considering patterns of coin loss, proportions of crossbow brooches, and the presence of continental and insular belt fittings, it is plausible to link the trends observed in urban and undefended nucleated settlements within the diocese to the activities of the state-run or local administration, rather than the direct presence of the late Roman military in urban centres. While caution must be exercised in identifying specific units or groups solely based on material culture and coinage, the examination of spurs may provide valuable insights into the presence of the *comitatenses* discussed in Chapter 15.2.

Particularly noteworthy is the focus on nucleated settlements, revealing a vibrant social landscape characterised by a higher prevalence of insular forms of belt fittings. These settlements, often regarded as the lifeblood of the late Roman economy within the diocese, played crucial roles in facilitating trade, supply, and taxation in kind (Burnham and Wacher, 1990; Millett, 1990; Mattingly, 2007; Brindle, 2017, 236).

Rural

Previous discussion has predominantly centred on material found at military, urban, and nucleated sites. However, it is notable that significant quantities of crossbow brooches, as well as continental and insular belt fittings, are also found across a diverse array of rural sites. This raises intriguing questions: does this material represent specific societal groups such as the rural elite, militias, or does it signify a more widespread presence of the state than previously acknowledged?

At rural sites, a significant presence of sheet metal crossbow brooches, particularly Types 5 and 6, stands out, constituting nearly 40 percent of the entire rural assemblage. Traditionally associated with high-status elites rather than the military, these brooch types align with such associations, as revealed by correspondence analysis showing distinct patterns for rural sites (Figure 7.14). While many of these brooches are found in villa contexts, their frequent occurrence at religious sites suggests possible mobility of individuals as well as potentially votive deposits rather than the exclusive presence of high-status groups at these locations.

Belt fittings are recorded across various settlement subtypes in the wider rural category, with insular forms prevailing. Continental examples are predominantly found in villa contexts, indicating their association with high-status elites. Notably, regions where the complete accoutrement of belt fittings appears less utilised correspond with areas where the use of fourth-century penannular brooches was widespread, such as the environs of Cirencester and the East Midlands. If there was an insular form of *cingulum* as argued by Hawkes (1974) it is clear there were regional fashions or differences in material used for belt construction, for example using textiles instead of leather which we tend to assume was used.

The majority of the material considered here provides insights into the elite class in the countryside who were central to local administration, rather than the broader population. The distributions highlight that in rural sites, especially villas, a range of high-status material culture is present, particularly insular forms, underscoring that the elite in large parts of the diocese embraced new fashion trends originating from military dress. These objects generally exhibit similar distributions to the main regions of the coin-using economy in the later fourth century. Regions where a significant number of parish assemblages fall into the lower quartile of coin loss for the diocese often

have fewer instances of the latest insular forms of belt fittings.

Analysis of the corpus of late Roman penannular brooches across the diocese further underscores the regional patterns highlighted in the discussion of insular belt fittings from rural sites. A link between the emergence of the Type M brooch and the decrease in the number of late crossbow types on Hadrian's Wall led Collins (2010) to conclude that penannular brooches were utilised to convey status. Analysis of the corpus of late Roman penannular brooches does emphasise a link between key areas and patterns seen in the belt fittings suggesting variations in elite dress at a local level in particular in regions such as in the environs of Cirencester and in the East Midlands. They tend to be absent in other areas such as East Anglia (particularly significant for Type C which is a considered an eastern type) perhaps further underscoring the likelihood that there was a changing population in some regions of Britain in the last decades of the fourth century.

Unveiling roles and decoding authority

We have seen in the previous section that links can potentially be made between different social and political groups based on detailed artefactual, spatial and social analysis. Efforts have been made to refine these connections further to identify specific military units or officials. For instance, Mackreth (2011, 240) used the distribution of various types of crossbow brooch to suggest links with the *limitanei* and *comitatenses*. Through the systematic approach taken here, can we suggest any links between specific material and different military units or officials?

The *Notitia Dignitatum* identified three commands in Britain during the late Roman period. The *Dux Britanniarum* who held authority over the northern frontier, the *Comes Litoris Saxonici* who managed the coastal defences along the southern and eastern coast, and the *Comes Britanniarum* who commanded the mobile field army (the *comitatenses*). However, the physical location of the latter command and the duration of its presence in Britain remain uncertain, as no permanent forts have been identified. It has been suggested that they might have been based in the major towns or other urban centres such as Winchester (Southern and Dixon, 1996, 83; Sarantis, 2013; Brulet, 2017, 43; Morris and Biddle, 2023, 81).

Citing the distribution of the various types of crossbow brooch Mackreth (2011, 240) linked Types 1 and 2 with the *limitanei,* and Type 3/4 to the *comitatenses.* This statement was made with little supporting evidence due to the lack of distribution maps in the publication. This current study has underlined the link between Type 1 and 2 with military forts but has demonstrated that Type 3/4 actually has a stronger link in Britain to urban and nucleated settlements. While this may be used to suggest evidence of the late Roman field army, the chronology of these brooches is much greater than the suggested length of time the field army was based in Britain. This may therefore indicate the presence of the state run administration.

The distributions and distinctions noted in the analyses in this study suggest the patterns are not simply influenced by the location of various garrisons and the changing political landscape with the removal of troops to the continent but also significant logistical changes. Here we shall evaluate what material culture might possibly be linked with the *limitanei* and the *comitatenses* before setting this in the wider patterns noted in the archaeological record.

One of the strongest links made in the suite of material culture to the *limitanei* on the northern frontier, forts in Wales and in the Saxon shore forts is the Type 1 crossbow brooch which is recorded in large numbers. Yet, as has been noted there is not a corresponding abundance of late Roman belt fittings. This observation carries implications for understanding the use of material culture by the military. It appears that there was a shift in practices in specific regions, including the forts along Hadrian's Wall, indicating the presence of localised customs (Collins and Allason-Jones, 2010).

The relatively lower numbers of certain forms of material culture on the northern frontier, such as Type 3/4 crossbow brooches, have been used to dismiss the area as a cultural backwater, and suggest its garrisons had been depleted. However, it is worth noting that at specific centres, such as the suggested *civitas* capital of Corbridge, these finds do occur in similar proportions to other urban centres. Other forms of high-status material culture like glass artefacts are also recorded (Price, 2010). The variation along Hadrian's Wall and its environs may support arguments proposing the existence of a distinctive local form of material culture, possibly characterised by a greater emphasis on penannular brooches (Collins, 2010, 70-73). However, one challenge lies in the fact that penannular brooches would have been worn on tunics rather than cloaks, potentially indicating that they may not have served as visual markers of particular status and identity in the way crossbow brooches did (Booth, 2015, 322).

Based on my analysis, it seems that a notable change in material culture occurred around the middle of the fourth century. The general absence of insular forms of belt fitting demonstrates that the militarisation of elite dress was not widespread in the environs of the northern frontier. Where these objects, such as strap ends from Type I belts and sheet metal crossbow brooches (both produced after AD 390), do occur perhaps they emphasise the movement of individuals rather than a high level of interconnectedness with the continent.

These findings suggest a complex interplay between standard military and local practices. While the presence of certain late Roman artefacts demonstrates movement and interaction, the relative scarcity of late Roman belt fittings implies that the emphasis we see elsewhere on using specific forms of material culture to demonstrate status varied across the diocese of Britain. The divergence of the inland sections of the northern frontier and Hadrian's Wall from what was standard military practice and dress remains particularly intriguing.

While the analysis of crossbow brooch types reveals consistent patterns across the northern frontier, it is important to consider the suitability of Type 3/4 brooches for tracing the *comitatenses*. When we examine the distribution of Type 3/4 brooches in this study, it becomes problematic to assert a strong link between these brooches and the *comitatenses*. Instead, I would argue that they appear to have a stronger connection to the late Roman administrative sphere.

The emergence of spurs in the final decade of the fourth century has sparked debates about the status of their users. They have been regarded as equivocal, potentially associated with high-status elites engaged in hunting activities, or with the military. However, when we consider their chronology, it aligns with the presence of the *Comes Britanniarum* command. The distribution of spurs, particularly along the eastern coast, specifically along Dere Street and Ermine Street, is remarkable and distinct from that of other forms of material culture with a similar late Roman chronology (See Figure 9.3). If we seek to establish strong links between any form of material culture in Britain and the *comitatenses* of the field army, spurs would be a compelling candidate. Their distinct distribution patterns set them apart from other contemporaneous artefacts.

The examination of various artefacts, spatial distributions, and social contexts provides a nuanced understanding of military material culture suggesting a more complex picture than that presented by Mackreth (2011). The association between Type 1 brooches and the *limitanei* is plausible and I would argue that the prominence of this type is at least partly caused by major changes in supply from c. AD 350 to the northern frontier with a significant emphasis on land based trade routes. After this date later material including Type 3/4, 5 and 6 brooches as well as belt fittings are less prominent in the archaeological record in the north of Britain. This supports the argument that there were localised customs and practices.

While links have been made between Type 3/4 brooches and the *comitatenses,* these brooches appear to have a stronger connection to the late Roman administrative sphere. A stronger case can be made for an association between the field army and the distribution of spurs in the diocese particularly along Dere Street and Ermine Street.

We have seen that we can make broad links between certain artefact types and the wider spheres of the military, the administration and the elite. While it is possible to suggest potential links between specific types of units and material culture, this seems most likely with Type 1 crossbow brooches and spurs. The majority of the material could potentially have been utilised by a range of groups within the military and the administrative sphere that will remain indistinguishable based on the current evidence we have.

An integrated diocese or a veneer?

The two previous sections have underscored the level of imperial activity in Britain and demonstrate the extent of the military and administrative presence as well as the various regional patterns that suggest different local elite groups who would have been responsible for much of the administration of taxation such as tax in kind. These sections and the overview of the evidence in Chapter 14 have also underscored significant regional variation across the diocese with many insular forms of dress demonstrating significant difference from the norms on the continent.

These regional patterns have been used in the past to question whether the diocese was fully integrated with the broader Roman Empire or if the material of which they are composed only represents a superficial level of involvement in late-Roman Britain, a skin deep veneer as suggested by Reece (1980; 1983). Through the analyses considered as part of this study this

section will evaluate two key elements, firstly was the diocese integrated? This considers factors such as patterns of supply, the location of key groups and the distribution of goods. Secondly, in these patterns, is there good evidence of integration, this includes standard practices and divergences from what we see on the continent that might indicate distinct patterns of dress or distribution for example. The evidence will be considered based on the social categories used as part of this study, military, urban, nucleated and rural.

Military

The previous two sections have touched upon major changes in military supply that occur from the mid-fourth century which affect the various distributions of material culture seen within this study. From the 350s onwards there was a decline of coastal trade and a greater emphasis on land- based trade routes (Evans, 2000, 40-41; Bidwell and Croom, 2010; 26-30 Bidwell, 2017). This combined with the evidence of coin profiles led to the argument that the forts on Hadrian's Wall had a single supply centre by the end of the fourth century (Collins and Breeze, 2014, 68).

These changing patterns coincide with modifications at a number of forts on Hadrian's Wall including Housesteads, Vindolanda and Birdoswald which reduced the size of the granaries in the fourth century, indicating a reduced garrison (Wilmott, 1999; Wilmott, 2000, 17; Collins, 2015; Collins and Weber, 2015). These alterations indicate a shift in the requirements and capabilities of the military presence in the region, supporting the argument that the key frontier was along the east coast (Cool, 2010a). When considered in combination with outmoded defences it was argued that the northern frontier, in particular, had become a cultural backwater by the end of the fourth century (Gerrard, 2013).

When we compare the material culture from the first and second centuries with that from the fourth, material culture linked with the military at forts is noticeably diminished and there is a greater presence of what has been described as civilian activity at sites such as Portchester as well as forts in Wales (Cunliffe, 1975; Bishop, 1991, 25; Cool, 2000; Bishop and Coulston, 2006; Breeze and Guest, 2022).

The prominence of earlier types of crossbow brooch (particularly Type 1) as well as the majority of belt fittings dating to the mid-fourth century in the norther frontier is partly a consequence of the major changes noted relating to how the army in Britain was supplied with goods through the *annona militaris.* What implications do these results have for how we interpret the *limitanei* in the later fourth century in Britain and their level of connectivity with the wider empire?

Despite being dismissed as local militias in the past, these troops were renumerated by the state underlining their official status and importance. They had strong local roots and played a crucial role in maintaining regional security. Their activities seem to be primarily localised and the general absence of later forms of crossbow brooches and belt sets across large areas of the northern frontier seems to reflect this reduced mobility but this should not be used to dismiss their importance. The courtyard houses at sites such as Binchester and South Shields which continued to be maintained into the fifth century indicate the presence of influential commanders and officers who did have access to high status material (Esmonde Cleary, 2000; Price, 2010; Wilmott, 2010; Fleming, 2021, 29).

When we examine coin profiles from military sites throughout Britain a decrease in coin loss is consistently noted during the later fourth century (excluding Richborough). This pattern was noted by Collins and Breeze (2014, 68) who argued that in the north, when considered in conjunction with changes in the supply networks noted through the ceramic distribution, supply occurred from a single source. In contrast, the coin assemblages from the Saxon shore forts suggest that if there was a unitary system it had ceased by AD 320, contra to the situation indicated in the *Notitia Dignitatum*, perhaps supporting a view that the Saxon shore was only a unified frontier on paper (Reece, 2011; Drinkwater, 2023). Unlike Hadrian's Wall where goods such as Crambeck ware were distributed over 100km, the pattern of supply at Saxon shore forts exhibits similarities with that in the areas surrounding the forts, characterised by high proportions of local wares (Esmonde Cleary, 1989; Evans, 2000, 40-41; Pearson, 2002).

The exception to the general trend of the occurrence of lower quantities of late Roman coinage and material culture at military sites is the Saxon shore fort at Richborough. Here significant quantities of coins of the House of Theodosius were recovered along with large assemblages of crossbow brooches and continental belt fittings many of which dated to the final decade of the fourth century onwards. These continental belt fittings generally have an eastern or a southern distribution broadly in line with the distribution of Saxon shore forts. Across Britain, military sites generally also exhibit a limited presence of insular belt

fittings. At Richborough, late insular types represent a tiny proportion of the overall assemblage. This pattern strongly suggests a correlation between these belt sets and the local elite rather than an association with the military.

Richborough was not simply a shore fort, it performed a number of roles with a sizeable town that continued in use until at least the end of the fourth century (Wilmott, 2017). I would argue that the prominence of Richborough in the corpora considered here is not due to its role as a fort, but its importance as an entrepot into and out of the diocese for significant individuals such as Count Theodosius as well as for the movement of physical goods to and from the continent.

Despite the evident changes in the military supply chains and the shifting patterns of material culture and coinage observed throughout the diocese the military's significance continued to be paramount. They remained effective enough for major incursions to be once in a generation events and the changing local practices signify a nuanced response to regional security needs to enable them to remain effective.

Urban

It has been observed that many large towns and civitas capitals experienced a decline during the fourth century which coincides with the increasing activity observed at other nucleated settlements. However, the findings of this study underscore the continued significance of these larger towns and *civitas* capitals to the late Roman state. While some of their functions might have been shared with smaller nucleated settlements, the material from the large towns and *civitas* capitals remained qualitatively different. Despite the changes and the challenges they faced, these urban centres remained crucial sites in late Roman Britain.

As we move through the fourth century we can see the patterns previously noted that highlight there is a decrease in coin loss at many urban centres. The analysis in Chapter 12 revealed two distinct trends in coin loss where many undefended nucleated settlements had a peak in Reece period 19 (AD 364-378) and urban centres had a peak in Reece period 21 (AD 388-402). This period 21 peak was identified by Walton (2012) who noted a reduction in period 21 coin loss focussed around the road network and urban centres. This study has shown that while the period 21 peak occurs at both large towns and *civitas* capitals it is most prominent in the large towns. This peak in coin loss could indicate the heightened presence of servants of the state, whether through administrative (which I would argue) or military activities. Historical sources, including Zosimus, support the idea that during this period, troops such as the *comitatenses* were stationed in towns. A similar peak in coin loss is visible at defended *vici* emphasising their important role in the administration of the diocese.

I would argue that regions which exhibit one or both of these two peaks in coin loss along with the suite of continental metalwork evaluated in this study can be identified as regions of most interest to the state for taxation either in coin or in kind. When considered in combination we can further expand the argument of Plouviez (1995, 74) who highlighted that the hinterland of key settlements in East Anglia had an exaggerated version of coin loss. In Chapter 13, the evaluation underscored that the economic trends identified in a particular region that occurred in the mid-fourth century such as a decline in coin loss tended to continue into the later-fourth and into the fifth. The exception to this in the fifteen regions considered was the environs of the *civitas* capital of Winchester. Here coin loss increased after AD 364, a pattern that also occurs in the environs to the port of *Clausentum* (Southampton). The quality and importance of the grave goods deposited at Lankhills, Winchester, further supports the notion that this region held significant importance for the late Roman state, the potential presence of a *fabrica* might explain the inclusion of these objects as grave goods. It has been suggested that the increased coin loss in these areas represents heightened bureaucratic activity and the exportation of grain, particularly following Julian's policies (Moorhead, 2009). The diocese remained integrated in the wider empire and was crucial to the supply of the Rhine frontier.

Nucleated sites

Among the various sub-type divisions utilised in this research, the division between undefended nucleated settlements and defended *vici* stands out as the most distinct in the results. This division was implemented to assess the variations between sites that were previously classified as "small towns". These settlements served different purposes, including industrial, commercial, religious, and state functions, with the latter being particularly evident in the case of defended *vici*.

The paucity of material culture such as belt fittings has led to the suggestion that the defended *vici* were not permanently garrisoned (Hawkes, 1974).

This combined with a regular absence of stone built structures has led to the interpretation that they acted as secure compounds and viewed as a key element of the infrastructure supporting the *Annona militaris* (Liddle, 1995, 93; Allen and Lodwick, 2017). This study demonstrates that in terms of material culture, while we cannot suggest a permanent garrison, there was intense activity in the later Roman period at defended *vici*. Similarly, analysis of coin profiles indicates these sites often display the distinctive peak in coin loss from AD 388-402 (Reece period 21).

Interestingly, despite the significant number of defended *vici* located along the Fosse Way and Watling Street, the general patterns of high coin loss in Reece period 21 are not observed at these sites. This discrepancy is likely due to a combination of factors, including the changing importance of certain roads in the wider network and the lack of extensive excavations at many sites. The distribution maps of various artefact types and coins indicate a lower level of activity at sites along the Fosse Way after AD 364 for example. This corresponds to an increase in coin loss at sites situated along the river networks, particularly in the Upper Thames Valley and Great Ouse regions.

The patterns identified in the results highlight the intricate connection between these defended *vici* and the late Roman state, as well as their fulfilment of specific functions. The size of the assemblages found at many of these sites suggests that while some of them served as particularly important centres, for example Catterick, North Yorkshire, many others are best seen as secure compounds, most likely for the transportation of goods acquired through taxation in kind.

The distribution of nucleated settlements throughout the diocese of Roman Britain displayed a generally uniform pattern, with many strategically positioned along the extensive Roman road network, effectively facilitating their economic functions (Millett, 1990; Millett, 1995, 31-33; Smith *et al.*, 2016). Detailed analysis of various artefacts, including crossbow brooches, belt sets, and coinage, sheds light on the significant administrative roles played by these settlements. While previous studies such as Black (1995) have primarily emphasised their involvement in the *cursus publicus*, it is crucial to acknowledge that they also held a central position in the collection of taxes in kind. This additional function could potentially explain why nucleated settlements exhibited comparable proportions of crossbow brooches when compared to urban centres and defended *vici*, underscoring their vital role in the broader administrative and economic framework of the late Roman state.

The occurrence of a significant peak in coin circulation at undefended nucleated sites slightly earlier, with high levels of issues of the House of Valentinian (AD 364-378 – Reece period 19), compared to the pattern in the defended *vici*, has been cited as evidence for an increase in rural activity (Moorhead, 2009; Henry and Moorhead, 2022). While previous studies have underscored the economic functions of these sites, their extensive distribution and the diverse nature of the assemblages examined in this research highlight that individuals utilising these sites hailed from a wide range of backgrounds.

It is important to note that excessive emphasis has been placed on the decline of major administrative centres (such as: Faulkner, 2000 121-127; Faulkner and Reece, 2002). These urban centres undoubtedly played significant roles; equally, however, the widespread presence of, and diverse activities observed in the undefended nucleated settlements cannot be overlooked. These settlements formed an integral part of the socio-economic fabric, catering to the needs of diverse communities and contributing to the vibrancy of late Roman Britain.

Rural

The corpora considered in this study primarily focus on material culture that is linked with elite groups rather than the wider population. While this prevents a discussion of the majority of the population, especially in areas where the material studied here tends not to occur, it still offers important insights into how integrated the countryside of the diocese was to the wider empire.

For rural sites in particular the distribution of late Roman coinage is important as it acts as a baseline for the discussion of the dress accessories. In the mid- to later fourth century there is prolific coin loss at many sites in the key agrarian regions of the diocese (the red hatching in Figure 13.2 and Figure 13.5). While these regions of high coin loss do contract over time, it is these areas which the results from this study suggest were the regions of greatest interest to the state who imposed their power to extract goods to supply the Rhine frontier – the 'corridors of empire' (Brown, 2012, 187). The regions with high coin loss tend to be those which also have significant wealth demonstrated architecturally, in material culture and by the density of hoards. This is the wealth of the few (the rural elite)

rather than the many. While this economic activity likely contributed to the heightened coin loss, it has not always been viewed as a positive development for the population of Britain.

The distribution of belt fittings correlates with the main coin-using areas of the diocese in the later fourth century, which were of particular interest to the state for taxation purposes (Henry, 2022b). The rural emphasis of insular forms of belt fitting, along with their correlation with the distribution of late Roman coinage, supports the notion that this material should be associated with the militarisation of elite dress rather than tribal militias as suggested by Laycock (2008).

The challenge we face in this material is the paucity of evidence in other regions where the pastoral economy dominated. The collection (or 'generation') of tax in kind is arguably harder to identify archaeologically as we do not see the corresponding level of display in wealth through Roman norms such as architectural splendour. Instead we are reliant on detailed analysis of assemblages such as faunal remains to suggest large scale movement of these resources (Allen and Lodwick, 2017). While we see lower levels of high status goods linked with the state or the elite they do occur outside these key coin using regions. This implies a high level of mobility and the regular presence of certain social or political groups such as the state run administration across the diocese, albeit in fewer numbers.

The peak in coin loss observed with issues of the House of Valentinian (AD 364-378 – Reece period 19), has been linked to a relatively brief surge in rural activity. In contrast, the peak in coin loss during the reign of Theodosius (AD 388-402 – Reece period 21) is predominantly observed at sites with a link to the state such as defended *vici*. While many rural sites in Britain demonstrate high coin loss in Reece period 21, particularly villas, it is notable that large areas of the east coast and south coast exhibit a serious decline post AD 350 (See Figure 11.12). This peak in period 21 coin loss at villas in particular highlights the importance of the rural elite and their role in the successful administration of the diocese.

In conclusion, the analysis conducted throughout this study indicates that at a minimum large areas of the diocese were fully integrated in the empire. While the changing distribution of high status goods at military sites has been used in the past to dismiss the frontier troops as a militia, these patterns seem to be a product of significant alterations to the late Roman military supply chains. The material culture distribution illustrates the nuanced response to regional security needs in the diocese. While changes in military presence and supply routes suggest a degree of adaptation to local conditions, the military's significance remained paramount in maintaining regional security, despite the localised activities and reduced mobility observed in certain areas.

While a decline has been noted in major urban centres in the fourth century, they retained their administrative importance serving as crucial sites for state activities and taxation. The increased bureaucratic activity and the exportation of goods from these centres emphasises their ongoing integration into the late Roman state infrastructure. In a similar vein defended *vici* acted as secure compounds supporting the *annona militaris.* Smaller undefended nucleated settlements played essential roles in the late Roman administrative and economic framework serving as vital economic hubs catering to diverse communities and contributing to the region's economic vitality.

The examination of rural sites, primarily focusing on elite material culture, provides insights into the socio-economic dynamics of agrarian regions. The correlation between late Roman coinage distribution and the presence of high-status goods suggests the influence of the rural elite and the extraction of resources for imperial purposes, particularly in areas of heightened state interest. Lower coin loss in regions where there was a greater emphasis on the pastoral economy may not suggest lower integration, but simply that we cannot identify it so clearly within late Roman material culture and coinage. It is important to emphasise that in these regions high status goods linked with the state do occur.

Regional trends in insular fashion and chronological change can be identified over time in various distributions in the corpora studied here such as belt fittings and penannular brooches. Diversity in how distinct groups displayed their status can be discerned, along with potential differences in the presentation of insular forms of the *cingulum militare*, perhaps not all were constructed of leather. While these trends are significant and can help us understand how different elite groups might have navigated the social and political changes of the fifth century, objects manufactured in Britain do not support the argument that state involvement was superficial.

Overall, while regional variations and challenges such as declining coin circulation and economic shifts

are evident, the diocese of Roman Britain remained integrated in the wider Roman Empire. The intricate connections between military presence, urban centres, nucleated settlements, and rural areas highlight the complex dynamics of governance, economy, and society during the late Roman period in Britain. The transformations at the turn of the fifth century have been used to suggest this integration was a veneer. This appears contradictory to the evidence and isolates Britain from the wider empire. I would argue that the key catalyst for change in the fifth century was the collapse of the Rhine frontier and the social and political changes it wrought. Britain's importance in supplying the Rhine frontier was a central cog which allowed substantial wealth accumulation for the elite. The removal or ending of this link was an important catalyst to the disengagement from the empire and the transition to smaller polities that occurred in the fifth century.

15. Dissolving Threads, the Transformation from a Roman Diocese to Emerging Post-Roman Polities

In the last chapter we explored how the corpora studied as part of this study allow us to understand the diverse transformations which occurred sometime in the early to mid-fifth century. The preceding sections have underscored that these transformations are the culmination of longer-term trends, many of which started in the late third or early fourth century. Consequently, we cannot consider the early fifth century evidence alone to explore these dissolving threads.

In the fourth century the diocese of Britain was fully integrated into the later Roman empire although changes in the structures of power and how different regions such as the northern frontier were supplied can be identified in the archaeological evidence. In the space of a generation or two the disappearance of the majority of the object types considered here emphasises the scale of the collapse of the power networks which followed Roman norms. The results demonstrate a number of regional trajectories which accelerate into the fifth century that need to be teased apart. This section looks to evaluate the major social and political changes that occurred and how the key groups considered as part of this study looked to navigate these waters.

The first strand will consider the evidence for servants of the state from the turn of the fifth century onwards. We have seen strong evidence for an imperial presence across the diocese in the later fourth century through the distribution of material culture and coinage. Coinage has shown which regions were key to the state that were vital to the success of the taxation and payment cycle. What are the implications of the evidence from the fifth century for both state officials and soldiers and the payment and taxation cycle after the major watershed in coin production? The collapse of the Rhine frontier and the subsequent eventual disintegration of the political framework of Roman Britain resulted in the development of a number of power vacuums which we can potentially trace in the transformations of material culture.

The second strand of investigation will delve deeper into the evidence concerning the elite. It is essential to recognise that the sweeping social and political changes witnessed in Britain were not isolated occurrences; similar upheavals transpired across the Western Roman Empire. These included the collapse of the Rhine frontier and the emergence of new kingdoms in the fifth century. This sets the stage for the final aspect of this section, which aims to probe why the local elite seemingly struggled to maintain elements of *Romanitas* into the fifth century, especially when compared to the evidence from the continent depicting changes in the various early fifth-century barbarian kingdoms.

Like the soldiers stationed on the frontiers, we can envision a local elite deeply entrenched in their regions. The overall findings of this study highlight the persistence of the later Roman elite well into the fifth century and a shift from intellectual refinement (*paideia*) to a focus on military prowess. Can we discern regional transformations and pinpoint regions where these changes occurred more rapidly, as well as those where evidence of continued Roman influence persisted?

While the evidence suggests an attempt to uphold Roman traditions, the notable difference compared with evidence elsewhere in the North-western provinces lies in its apparent failure. Can we ascertain when this failure occurred, and what insights does it offer about Britain in the early fifth century?

An imperial presence

In AD 409 Zosimus recorded that the people of Britain expelled Roman officials; while this has been heavily debated it has been considered as the potential departure of the Roman administration (Frere, 1978; Halsall, 2007). As we have seen in the late fourth and fifth century there were a spate of usurpations so whether this event signifies the end of Roman administration in Britain should be questioned. While troops would have left Britain to support the usurpations of Magnus Maximus, Eugenius, or Constantine III they were also redeployed to support Stilicho (Blockley, 1997; Faulkner, 2000, 169; Mattingly, 2007; Collins and Breeze, 2014, 65). It is generally suggested that the field army (under the *comes Britanniarum*) would have been withdrawn at this time as they were the highest quality troops.

As we have seen the number of objects associated with the state from the fifth century is limited in Britain with only a small number from military sites. On the northern frontier one Type IV buckle is recorded from Catterick and one sheet metal crossbow brooch from the urban centre of Corbridge. This paucity is a continuation of a trend where we see fewer of these objects after the changes in supplying the frontier from c. AD 350/370. Consequently an emphasis has been placed on the introduction of other object types such as Type M penannular brooches (Collins, 2010, 71). Although Type M brooches date from the later fourth or early fifth century at present we lack the chronological refinement to evaluate them in the same detail as crossbow brooches, belt fittings or spurs. While at first glance all of the object types considered here occur in higher numbers from Saxon shore forts, is this is a consequence of the significant quantity of belt fittings and crossbow brooches recorded from Richborough?

The trajectories seen in the fifth century on the northern frontier and the Saxon shore forts differ. On the northern frontier archaeological sequences have revealed ongoing activity and structural modifications during the post-Roman period at sites such as Birdoswald and South Shields (Bidwell and Speak, 1994, 45; Wilmott, 2000, 13-14). They have been interpreted as evidence of a changing political structure and a shift from traditional military units to warbands stationed along Hadrian's Wall (Wilmott, 2000, 19-24; Collins, 2012; Collins, 2013, 39; Gerrard, 2013).

In contrast, there is limited evidence of continuity in the Saxon shore forts and the military establishments in the western part of the diocese (Dark, 2000b). At least half of the Saxon shore forts were abandoned by the end of the fourth century and it has been suggested they ceased to be a unitary system much earlier in the fourth century (Reece, 2011; Collins and Breeze, 2014, 67; Drinkwater, 2023). Collins and Breeze (2014, 68) proposed a model in which Constantine III reduced the garrisons along the Saxon shore in the fifth century leading to a power vacuum. Questions remain about such a model if it is correct, who exactly is waiting to move in? One assumes new incoming groups rather than local elites when we consider see a decline in certain object types such as Type I belt sets.

At the start of the fourth century there were as few as five forts occupied in Wales, and the last troops could have been withdrawn in the 380s under Magnus Maximus or the 390s under Eugenius (Faulkner, 2000, 169; Breeze and Guest, 2022, 80-81). While no forts were listed in the *Notitia Dignitatum,* there does seem to have been continued occupation (whether it was military or civilian) at Caernarfon and Caerhun (Wilkes, 2005; Gardner, 2007; Collins and Breeze, 2014, 67; Collins and Weber, 2015; Whately, 2015). The meagre total of one Type 6 crossbow brooch, several Type E penannulars, and a couple of later insular Type I belt fittings highlight the general paucity of finds linked with the military, administration and the local elite in Wales. Yet, their presence even in limited numbers is significant.

The taxation cycle

At the turn of the fifth century, political changes significantly impacted the elite of Britain. Gratian's decision to move his court from Trier diminished Britain's ties with the emperor and the associated patronage. By the reign of Honorius, the imperial court had firmly established itself in Italy (Heather, 2017, 28). Moreover, the relocation of the Praetorian Prefect of the Gauls from Trier to Arles further widened the gap between state and regional interests, eventually leading to rupture.

This period of political upheaval coincided with alterations in coin supply to Britain during the fifth century, prompted by shifts in production that began in AD 395 when nummi were no longer produced in the north-west provinces, followed by the cessation of silver production from AD 402 (Esmonde Cleary, 2013, 349). Gold also became scarcer, with no significant flow of coinage into the diocese after AD 406 (Bland and Loriot, 2010; Bland *et al.*, 2020). These developments had extensive ramifications for the Roman provinces north of the Alps. In Britain, they ultimately gave rise to the widespread practice of clipping.

Nummi are an important strand of this analysis as they played a crucial role in the taxation pay cycle allowing the populace to acquire gold to pay tax in coin. The limited supply after AD 395 combined with the absence of copies of issues of the House of Theodosius underscores a profound change and has been interpreted as evidence of the absence of need of fresh coin (Reece, 1973). Whether this signifies the end of commercial transactions using coins (Esmonde Cleary, 1989; Mattingly, 2007) or the end of the tax system (Millett, 1990, 227) remains debated.

The clipping of silver *siliquae* is linked with the decline in supply and the phenomenon is crucial to interpreting the first decades of the fifth century. Clipping occurred in two stages, fraudulent light clipping which occurred from the 380s onwards and heavy clipping after AD

407. The latter phase has been linked to Constantine III or local authorities continuing to raise funds using similar methods (Guest, 2005; Abdy, 2013; Guest, 2014, 123ff; Abdy, 2020). This study has underscored the similarity in patterns of clipped coinage throughout the coin using regions of Britain emphasising that the practice was undertaken at a central level and that clipped coins circulated seemingly quickly across the diocese (See Figure 13.12). I would suggest that this at least initially was an attempt by the late Roman administration or the local elite to maintain the taxation payment cycle. Perhaps the former instigated the system which continued to be used by the latter.

This study has also highlighted the regions where coin use potentially continued for the longest period based on the distribution of clipped hoards. It supports the argument presented by Guest (1997; 2005) that we can discern hoards deposited later than their *terminus post quem* based on their structure. These hoards occur primarily in the South, East Anglia and Yorkshire (Figure 13.14). These later hoards can include a significant quantity of nummi such as the Bishops Canning hoard (Guest, 1997; Henry and Moorhead, 2022) that potentially supports the argument that a tripartite system of gold, silver and bronze may have continued until c. AD 425 (Walton, 2012). A significant aspect of the results from this study is the identification of the absence of clipped *siliquae* as site finds and hoards from certain regions such as *Britannia Prima* around Cirencester where arguments for continuity have been presented (Dark, 1994; Dark, 2000a; White, 2007; White, 2013; White, 2014, 158-161). While we cannot guarantee that an absence of some forms of evidence equates to continuity, it is important to highlight that this is a region where there is a substantial number of Theodosian nummi hoards – perhaps there was an attempt to continue as normal much longer than in other regions.

Considering the complexities of coinage use and coin loss in the early fifth century, simplistic models relying solely on declines in coin numbers as evidence of a catastrophic collapse may be inadequate (such as Faulkner, 2000). A more nuanced approach, especially concerning regional variations, suggests that bronze coinage, if still in use, implies continued exchange or adherence to Roman norms and taxation, possibly until c. AD 425 or later (Dark, 1994; 2000a). However, reaching definite conclusions remains problematic.

Divided paths: Rome's twilight in Britain and on the continent

This study has underscored the point that many of the changes in production did not simply affect Roman Britain but the North-western provinces as a whole highlighting the dangers of considering Britain in isolation. Throughout these regions we can see attempts by the local elite to continue Roman norms including elite display utilising high status material culture and goods and architecture. The key difference is that unlike Britain, the late Antique world continued to exist on the continent, Roman forms of display persisted well into the second half of the fifth century, such as in Gaul. Here the elite maintained their status during the transition from dioceses to 'barbarian kingdoms' (Goffart, 1980; Esmonde Cleary, 2013, 437-438; Goffart, 2013). This section will explore models developed for this transition on the continent and evaluate if we can see similar attempts by the elite in Britain to redefine the political landscape (which ultimately failed). In this context, what can the corpora considered as part of this study tell us when utilised in combination with post-Roman metalwork.

As we have seen local administration was conducted by the elite, if they knew a major change was occurring they would have sought a smooth transition to safeguard their continued prosperity and influence. On the continent, these groups managed to uphold their social standing and influence even amidst the emergence of new barbarian kingdoms which has led to varying models in how this new structure was developed in Germany and Gaul (Goffart, 1980; Liebeschütz, 1997, 136-141; Gerrard, 2013; Goffart, 2013).

The significance of understanding how these transitions unfolded cannot be overstated. It is perplexing to reconcile the popular imagery of barbarian hordes rampaging and pillaging their way through the empire with the seemingly smooth transition from Roman provinces to post-Roman kingdoms, devoid of apparent resistance (see Halsall, 2007, 422-447 for an excellent review of the various proposed models). The transformative work leading to new avenues of thought was Gaupp's (1844) work which proposed a division of land based on Visigothic and Burgundian laws where a third of landed estates were passed to these new rulers. The absence of contemporary evidence of opposition to this significant imposition led to arguments that this was not a division of land but the products of the land – taxation in kind (Goffart, 1980; Durlait, 1988).

Goffart's thesis suggested that rather than the breakup of large landed estates, instead, a third of the tax revenues that once went to the Roman state now went to the new barbarian kingdoms (Goffart, 1980). Durlait (1988) proposed that this levy continued to be collected by the cities, which retained the remaining revenue. While these models have been extensively critiqued based on their interpretation of late Roman texts and legislation (Liebeschütz, 1997), they offer a model to explain the mostly peaceful transition. Retaining ownership (while shifting who the tax revenue went to) allowed the elite of regions such as Gaul to maintain power and continue Roman norms of projecting status.

Halsall's (2007, 447) review of the issues culminated with a brief consideration of Britain where he highlights the paucity of documentary evidence; by contrast it is through the archaeological evidence that we first see evidence of incoming settlers in regions such as Lincolnshire and parts of East Anglia. Citing Gildas, who records a rebellion of the Saxons in the 420s/430s seizing land after the Britons were unable to continue to pay their *annona* and the consequence collapse of post-Roman power structures in lowland Britain, Halsall suggests we might have evidence of a forced conversion from Roman systems to the outright occupation of Roman estates.

This section will examine what the corpora from this study might reveal about the incoming settlers, followed by a discussion of the transition that occurred sometime before AD 445. The aim is to assess whether there is evidence that the elite sought to maintain their status and influence in a manner similar to developments on the continent, particularly in light of shifting social and political boundaries. This period saw both *boundary shift*, where elite identities and power structures were redefined in response to changing circumstances, and *boundary drift*, as traditional markers of status became less distinct, blending into emerging post-Roman power structures and Germanic influences. Ultimately, this transition contributed to the gradual collapse of the Roman way of life in Britain, which unfolded in a series of stages throughout the fifth century.

The chronological overview of the regional trends discussed in Chapter 14 highlighted the point that regions of East Anglia, particularly Suffolk and Essex, stood out as having an unusual trajectory. The distributions of the corpora underscore a general absence of the latest insular forms of material culture, including fittings from the *cingulum militare*, double sided antler combs, and also penannular brooches, especially Type C. The latter is significant as it is considered an eastern type. Furthermore, analysis of coinage demonstrates that there is below average coin loss in this area from AD 364-402 (Phase E).

While this evidence could be used to suggest a general decline in prosperity in parts of East Anglia from the mid-fourth century onwards other patterns emphasis prosperity and significant activity. The area boasts some of the highest numbers of late Roman coin hoards and metalwork hoards suggesting an emphasis on a precious metal economy (Hobbs, 2006; Bland, 2018; Sycamore, 2019; Bl*and et a*l., 2020, 276). Furthermore, these regions tend to have some of the strongest distributions of post-Roman fifth century material, such as the earlier forms of cruciform brooch and supporting arm brooches (Evison, 1977; Martin, 2015; Gerrard, In press), which has been argued to represent evidence of the presence of incomers. Instead of declining prosperity the patterns of material culture, low coin loss and precious metal economy perhaps indicate that the date at which incoming settlers came to Britain might be pushed forward into the last quarter of the fourth century.

Fifth century transformations

This section looks to evaluate how the local elite navigated the transition from a Roman diocese, patronage and *paideia* to smaller regional polities, martial strength and warlordism. At the turn of the fifth century Britain society was intensely hierarchical, forming an intricate web of patronage (Esmonde Cleary, 1989, 14; Whittaker and Garnsey, 1997). The elite remained steeped in the late Roman vocabulary of power and continued to display aristocratic markers. They occupied pivotal roles in various administrative functions, including tax collection, highlighting their centrality in the daily affairs of the diocese. Their status and power were manifested through material culture, such as crossbow brooches and the *cingulum militare*. Within a couple of generations these objects had lost their power, the Roman system of taxation and coin use had collapsed and little of the structure of Roman Britain remained.

As part of his exploration of the transformations in lowland Britain from the fourth to sixth centuries Gerrard (2013, 245-262) proposed a model which involved three key actors in the fifth century: the elite, Germanic migrants, and the peasantry. This model emphasised the stability and civilian ideology based on paideia in the fourth century, followed by the disintegration of Roman Britain and subsequent

changes. Each group faced different choices in a fluid and changing environment. As power shifted from a centralised state level to a local level, there was a transition from the civilian ideology of *paideia* to martial elements.

This transformation away from a civilian ideology coincided with changes in land use and a reduction in production due to the removal of the tax burden and the decline of urban centres (Esmonde Cleary, 1989, 158; Gerrard, 2013). This shift is crucial, considering prosperity in the late fourth century was thought to have been primarily derived from monocrop production exported as part of the *Annona militaris* (Allen and Lodwick, 2017, 170-172; Lodwick, 2017, 16-32; Lodwick *et al.*, 2020, 23). After the collapse of Roman Britain and the western Roman empire, farming practices underwent significant changes (Van der Veen, 2022, 144).

It has been proposed that after the collapse of the Roman taxation system the elite likely received a greater share of surplus (Gerrard, 2013, 100). Yet, with the collapse of the Rhine frontier, this quantity of agricultural surplus as part of the taxation system as well as forced purchases would not be required and converting this surplus into gold and silver was challenging given the limited supply of freshly minted coin. Clipping could therefore indicate that the local administration still upheld some form of taxation and a coin using economy for perhaps a generation or two.

Gerrard's (2013, 253) model divides the elites into traditional and reactionary groups at the end of Roman Britain. Traditional elites adhered to the ideology of the fourth century, which heavily relied on socially embedded exchange. Conversely, reactionary elements might have included the recruitment of armed groups to serve the elite. The vulnerability of the elites in the power vacuum of post-Roman Britain has been explored in studies by authors such as Faulkner (2000 170-180; 2014), who proposed a possible peasant revolt. In this context, militias were potentially of increasing significance, and military attire became acceptable and fashionable among civilians (Esmonde Cleary, 2013, 89; Gerrard, 2013; Esmonde Cleary, 2017, 199).

Here we shall explore how the evidence from corpora collated as part of this study can inform us about some of these transformations in the fifth century. By far the largest corpus considered here is the coinage. Coin loss continued to occur in significant numbers across many sites in Britain until the watershed in coin production in AD 395. This presents significant challenges for us when attempting to determine the precise timeframe when coins from Reece period 21 (AD 388-402) were actually lost. The Bishops Canning (Wiltshire) hoard, for example, indicates that nummi continued to be hoarded even into the fifth century, suggesting their ongoing circulation. The absence of clipped *siliquae* from regions such as the environs of Cirencester combined with the proliferation of nummi hoards from Reece period 21 suggests that in specific regions coin use may have continued as normal for longer than we might expect.

Similar evidence is observed with *siliquae*, indicating the persistence of coin use well into the fifth century. These coins are primarily found on rural sites from metal detecting and are much less common on military and urban sites (Reece, 1972; Bland *et al.*, 2013; Brindle, 2017, 261). The paucity of site finds, prior to the advent of the PAS, led Moorhead (2001a) to suggest they were only ever found in hoards. The analysis of the corpus of *siliquae* in this study emphasises that clipping was undertaken at a central level and the material circulated across the diocese quickly (See Figure 13.12).

Comparing clipped *siliquae* hoards to all *siliquae* hoards provides further insights, indicating that heavily clipped coins tended to drive unclipped coins out of circulation. Considering the deposition of clipped *siliquae* hoards, they likely represent the latest phase, pointing to regions where these coins continued to circulate into the fifth century. It is important to note that records related to clipped coins in hoards recovered before the 20th century vary in quality, but recent discoveries, particularly due to metal detecting, have significantly increased their numbers (Bland, 2018; Bland *et al.*, 2020).

The concentration of these hoards in specific regions like Wiltshire, Somerset, Hampshire, East Anglia (especially north Norfolk), and the environs of York is intriguing. This distribution might reflect the final regions in Britain that maintained the use of this form of coinage as part of their economic system, possibly with local elites striving to continue Roman taxation practices after AD 409/410 perhaps for a few decades.

These elite groups wielded significant local power and influence, administering aspects such as local governance and taxation. Britain's situation appears unique compared to other regions where a transition into the more recognisable Late Antique world occurred. The reasons for this discontinuity have been attributed to events like a peasants' revolt leading to the collapse of Roman power structures. However,

the surviving material culture does not necessarily support such a sharp rupture. Instead, phenomena like *siliquae* clipping suggest centralised action.

At the heart of this intricate narrative lie the elites, wielding significant influence over local governance, taxation systems, and social hierarchies. Examination of *siliquae* provides compelling evidence of a concerted effort to perpetuate Roman conventions in regions such as parts of the South, East Anglia and the environs of York. This appears to have ceased by c. AD 445; after this point precious metal coinage is purely used as bullion and no clipped coins are included in the mid fifth century Patching hoard (White *et al.*, 1999; Abdy, 2013).

In this context late Roman belt sets retained a crucial role as social signifiers. Unlike other artefacts closely associated with the state, such as spurs or crossbow brooches, belt sets have also been discovered in Anglo-Saxon burials. Analysis of those deposited as grave goods offer insights into the evolving late Roman and Anglo-Saxon elites' social dynamics as their users appear to change over time with an emphasis of deposition with women as grave goods.

When examining later forms of Type I belt sets, specifically the Type IB and the Tortworth strap end, which I argued date from around AD 390 into the fifth century, their distribution patterns closely mirror those of the clipped *siliquae* (Henry, 2022b, 86). These belt sets retained significance well into the fifth century, at which point they were worn by both men and women. The continued use of these belt sets also aligns with the persistence of coinage. However, after the mid-fifth century, they lost prominence and were repurposed, as seen in instances like the reuse of a fragment of a Type IV buckle plate from Blacknall Field, Wiltshire (Annable and Eagles, 2010).

The enduring use of these objects suggests elite efforts to maintain some form of continuity in particular regions of Britain while navigating the transition from the Roman diocese to a new model, perhaps akin to developments observed on the continent. These regions include parts of Wiltshire, Somerset, Hampshire, East Anglia (especially north Norfolk), and the environs of York (See Figure 14.6). Ultimately, these attempts were not entirely successful, marking the end of key features characteristic of Roman Britain, including the taxation model, the use of coinage, and urbanism. However, the evidence compiled in this study supports the idea that either an attempt was made to sustain these systems for a certain period in the fifth century or that the diocese persisted slightly beyond the traditional timeline of AD 409. While the main administrative body might have been displaced, it is plausible that the number of individuals holding such positions was minimal, given the diocese's reduced bureaucracy.

Similar efforts to maintain the *status quo* could be suggested for other regions of Britain. For example, in the environs of Cirencester there was a marked absence of clipped *siliquae*, but there were a significant number of hoards ending in Reece period 21 nummi, which may, of course, have been deposited later, just as the clipped *siliquae* elsewhere were. It could be that while some areas adapted to the lack of new coinage by continuing with clipped silver, others sustained the use of bronze currency for some time into the fifth century. This area around Cirencester tends to have higher occurrences of insular material such as Type IB buckles as well as higher density of later Roman penannular brooches as well as indications that the form of the *cingulum militare* differed due to an absence of the full suite of possible fittings.

As has been noted, in regions where the pastoral economy dominated, coin use tends to be less prolific, and wealth and status were presented in a different manner. This leads to challenges in utilising objects such as crossbow brooches and fittings from the *cingulum militaire* to understand the social and political changes which occurred in the fifth century. These regions include the South-west, Wales and the West Midlands as well as parts of northern Britain. Where relevant objects do occur, they should be viewed as evidence of mobility and the movement of individuals rather than firm evidence of similar displays of status to those seen in the key coin using regions of Britain. Examples include a Type IB buckle recorded in Cornwall and clipped *siliquae* in Devon and Cornwall (Henry, 2022b, Figure 8.118; Henry, 2024c, Figure 18). Dark (1994; 2000a; 2014) using forms of material culture not studied here and epigraphic evidence argued that such regions became more Roman and emphasised strong links with the late Antique world. While the importance of these trade links have been questioned (Such as: Millett, 2014; Petts, 2014, 73), the evidence compiled as part of this study adds little further to the debate as all forms of material collated within the corpora are unusual in these areas.

Examining late Roman material culture alongside specific fifth-century artefacts weaves a rich tapestry, providing insights into how diverse social and political groups navigated the shifting landscape while striving

to preserve their status and influence. These objects offer a window into a society in flux, where economic and cultural transformations occurred on a scale that challenges our full understanding.

At the core of this intricate narrative are the elites, pivotal in shaping local governance, taxation systems, and social structures. Their concerted efforts to sustain established norms amid the tumultuous backdrop are evident in the artefacts examined. Aspects such as clipped *siliquae* demonstrate that there continued to be some form of central administration and evidence of continued forms of Roman structures potentially into the second quarter of the fifth century, it had certainly ceased by AD 445. This is when the diocese of Britain has a clear divergence from the transformations seen on the continent and the balance of power between incoming groups and the local elite changed.

Some objects continued to symbolise influence and power, but their users were changing over time, while the significance of other objects such as crossbow brooches gradually waned. This dynamic interplay between objects and the elite illuminates the complex story of a society grappling with transition and transformation leading to a cessation of many aspects of Romano-British culture by the middle of the fifth century. Even fundamental aspects of daily life, such as cooking practices, underwent profound change during this period (Evans *et al.*, 2017; Fleming, 2021, 72).

Conclusion

The various corpora compiled for this study have often been considered in isolation. This research systematically analysed the corpora before conducting a comprehensive evaluation, critically assessing previous hypotheses. It revealed that the twilight of Roman Britain was a period of significant socio-political and cultural transformation. The transition from Roman to post-Roman Britain was characterised by a complex interplay of continuity and change, driven by long-term socio-political trends rather than sudden disruptions.

A diverse array of material culture and coinage was examined to understand how key groups - particularly the military, state-run administration, and local elites - adapted to these changes. Some markers of status persisted into the fifth century, while others, such as spurs and crossbow brooches, seem to have disappeared before AD 425. This change underscores that the trajectories of the new smaller polities of post-Roman Britain diverged from those seen on the continent. Some were a consequence of the removal of military units and the state run administration, but I have argued that the key difference between Britain and the continent was the failure of the local elite to maintain their power and status. As part of this conclusion the key observations for each object class will be presented followed by a broader discussion of the implications of this study.

Crossbow brooches were potent markers of status and identity in late Roman Britain. Type 1 brooches were prevalent at military sites across the diocese, particularly along the northern frontier. A comparison by Swift (2000) revealed a higher proportion of Type 1 brooches in Britain compared to the continent, attributed to the numerous military sites included in her study. This present research, which integrates PAS data recorded since 2000 and the corpus collated by Mackreth (2011), has shown that Types 3/4 brooches were more common at urban, nucleated, and rural sites, reflecting the presence of the state-run bureaucracy. The later sheet metal Types 5 and 6 brooches were associated with high-status civilian activity, primarily among local elites. The concentration of brooches at urban and nucleated settlements suggests a link to the *annona militaris* supply network and tax in kind, which were essential for the state's survival.

This study underscored the complexity of the corpus of belt fittings associated with the *cingulum militare* in Britain, encompassing both continental and insular fittings that vary chronologically, regionally, and by user groups. These fittings were categorised into four broad belt types to facilitate spatial and hierarchical analysis across settlement types.

Continental fittings, found in urban centres including Cirencester and some military sites such as Richborough, indicated the presence of high-ranking officials and military commanders, reflecting their administrative and strategic roles in the imperial system. The distribution of these fittings suggested an association with urban elites maintaining direct ties to Roman administration and military command.

Conversely, the widespread distribution of insular belt fittings across rural areas indicated their adoption by local elites and landowners who sought to emulate Roman fashions and militarize elite dress while asserting regional identities. This was particularly evident in regions like the environs of Cirencester, where variations suggested different materials used for belt construction such as fabric. The findings underscore the necessity of metallurgical analysis to determine if variations can be identified, thereby validating the conclusions of this study.

Spurs, primarily recorded along major roadways such as Dere Street, signified an association between Roman military installations and key economic networks. Their widespread distribution reflected the strategic importance of cavalry units in the *comitatenses* for maintaining imperial control. The absence of spurs in post-Roman contexts mirrored broader shifts in military deployment and the reconfiguration of political authority in Britain following the Roman withdrawal.

Penannular brooches were included in this study due to arguments that specific types, such as Type M, might have had a military link. Many penannular brooch types show little change from the Iron Age to the early medieval period. This study focused on changing patterns in the settlement hierarchy when comparing the early and late Roman periods to evaluate changes in user groups or distribution. An interesting finding was that regions with variations in the composition

of the cingulum militare, such as the South-west and East Midlands, recorded more prolific numbers of penannular brooches.

Coinage was selected to provide a baseline against which to measure patterns of activity in specific periods. Distinct variations were observed when comparing the north, south, east, and west of the diocese. Southern regions, characterized by higher levels of coin loss in the late fourth century and hoarding practices with a greater focus on coinage rather than silver plate, were judged to indicate economic vitality or state interest in taxation. Divergence was evident when comparing areas like the environs of Cirencester with Winchester. In the west around Cirencester, bronze coin hoards in the late fourth century were more prevalent, suggesting the possible continuation of Roman power structures longer than expected in *Britannia Prima.* By way of contrast, the east of Britain saw a reduction in coin loss towards the end of the fourth century, and a rising focus on silver bullion. Combined with metalwork distributions and the absence of insular forms, this suggests that incoming groups may have settled in parts of East Anglia around AD 375.

Stray finds of silver and gold coinage were evaluated separately due to their different roles in the pay and taxation cycle. A spatial analysis of gold coinage shows a shift from major urban or military centers in the fourth century to coastal regions with coinage struck after AD 408, indicating a transition from a coin-using economy to a bullion economy before the death of Valentinian III in AD 445. The analysis of silver *siliquae* and the phenomenon of clipping suggests that clipping occurred centrally towards the end of the first decade of the fifth century. This has significant implications for understanding how the British population managed the dwindling supply of coinage in the fifth century. Comparing the distribution of clipped *siliquae* and hoards containing these coins helps identify the regions where coin use persisted the longest into the fifth century.

The results of this study have demonstrated that during the fourth century, Britain remained integrally tied to the Roman Empire. These links were no superficial veneer but much more deeply engrained. The fourth century was primarily a period of stability which also witnessed strategic adjustments in governance, military strategy and changes to supply networks. These adjustments were responses to internal challenges and external threats, showcasing the Empire's capacity to adapt pragmatically. The diocese of Britain, fully entrenched within the imperial system, navigated these changes, maintaining robust administrative structures and a dynamic military presence. Many of the objects considered in this study, and high peaks in coin loss, might be considered as evidence of prosperity and a 'Golden Age' in the fourth century. However, we must also acknowledge that the Roman state was primarily interested in its own survival, the same body of evidence could also indicate a firm grip on the resources of the diocese and exploitation of the rural/subaltern populations.

The dawn of the fifth century ushered in significant upheavals, not just for Britain but for many regions of the empire north of the Alps. The system of governance in these regions was heavily affected by the collapse of the Rhine frontier leading to the usurpation of Constantine III and in AD 409 the departure of the administration from Britain. These events traditionally mark the beginning of the end for Roman Britain, often viewed as a clear demarcation of the Empire's retreat. Yet, the evidence examined in this study suggests a more nuanced scenario where elements of Roman administration and cultural practices persisted beyond conventional historical endpoints.

The phenomenon of coin clipping, prevalent in the early fifth century, supports the existence of some centralised authority that attempted to continue the taxation and pay cycle through systematic alterations to the coinage. This practice, coupled with the continued use of Roman material culture across different regions, indicates adaptive strategies to maintain order and economic stability. Different areas of Britain, utilising the same suite of material culture, responded distinctly to these challenges, reflecting localised approaches to governance and societal organisation. I would argue that while Constantine III may have been the catalyst in clipping, as suggested by Abdy (2020), the continuation of this material and its widespread circulation is due to the continued structures of governance at a local level.

By AD 445, the societal focus had shifted markedly from intellectual and civic pursuits with an emphasis on *paideia* and patronage, reflecting broader changes in the power dynamics within Britain. The elite's continued use of Roman military and status symbols, such as the *cingulum militare*, into the early fifth century underscores a concerted effort to maintain Roman identities amidst increasing external pressures. Many of these Type I belts were baldrics worn on the shoulder rather than a principal waist belt, they were unlikely to have formed part of the official military kit, instead they appear to be evidence of a militarisation of elite

dress. However, the individuals who wore these objects had changed, as these objects are buried with both men and women in the fifth century. The meaning and use of these symbols of power had transformed, signalling the adaptation of Roman elements into new socio-political contexts. As significantly, this adaptation did not occur with other objects linked with high status individuals such as crossbow brooches or spurs. This further underlines the point that the majority of these items would have been worn by servants of the state. I would argue that the majority of crossbow brooches should be linked with the administration and spurs to the *comitatenses.*

This study has highlighted distinct regional responses to the transformations. For instance, East Anglia and Lincolnshire displayed unique trajectories characterized by the early integration of new cultural elements and the absence of later forms of insular material culture and reduced coin loss in the late Roman period. The appearance of cruciform brooches and other early fifth-century artefacts in these regions suggests the presence and (eventual dominance) of incoming groups from around AD 375.

Conversely, the results of this study have demonstrated that other regions of the diocese followed different trajectories. When examining the environs of Cirencester (the suggested capital of *Britannia Prima*) the evidence indicates a region where the full suite of objects linked with the *cingulum* were not utilised, suggesting a distinct local identity. This might suggest less state control in the region as well. Analysis of coinage and hoards suggests that clipped *siliquae* did not circulate in great numbers here. While this might at first glance suggest the failure of governance in this region earlier than we might expect the density of coin loss from the final decade of the fourth century (Reece period 21) and the sheer density of base metal coin hoards from this region suggests that in many aspects life continued as normal in this area.

Clipped *siliquae* in general offer an important insight into the level of circulating currency in Britain in the first quarter of the fifth century. The proportions of clipped coins support the conclusion that a centralised authority survived and their widespread distribution suggests that the currency circulated reasonably quickly across the diocese. Gresham's Law suggests that the areas where clipped coinage is included in hoards are those where this coinage continued in use longest, particularly in the south of England, East Anglia and to the north of the Humber. By AD 445, the distribution of coins suggests that the coin using economy had certainly ceased and any material was purely used as bullion.

The analysis of the corpus of clipped *siliquae* examined in this study has revealed significant trends, indicating that clipping was centrally orchestrated. Further investigation into similar materials from coin hoards is warranted, and could not only enhance our understanding of these patterns but also address the pivotal question of when coin usage ceased altogether. While this study suggests that this cessation happened around AD 425-445, pinpointing more precisely the moment when circulating currency disappeared is crucial for our comprehension of the decline and ultimate collapse of Roman Britain.

It is evident that additional forms of Roman and post-Roman object types as well as analysis of settlements and burials could enrich this framework of systematic evaluation. From a material culture perspective this could include items of personal adornment such as Brancaster finger rings (Gerrard and Henig, 2017) or objects associated with female attire such as hairpins or bracelets (Cool, 1983; Cool, 1990). Furthermore, the incorporation of further classes of objects, such as late Roman double-sided antler combs or broader collections of materials including hacksilber and fourth and fifth-century object hoards, could significantly augment our understanding (Hunter *et al.*, 2013; Hunter and Painter, 2017; Crummy and Henry, 2024). Notably, the work by Manning (1972) highlights regional and chronological patterns within the distribution of various base metal hoards from this era, encompassing ironwork, bronze, and pewter hoards. Integrating these insights would undoubtedly enhance the richness and depth of our analyses.

This study has only made a cursory examination of the introduction of new object types in the fifth century, primarily as a point of comparison within the discussion chapters. However, the findings have highlighted significant patterns that warrant further scrutiny against the extensive corpora compiled here. Exploring the diverse patterns observed when comparing early and late Roman penannular brooches opens up fresh avenues for similar analyses in the Iron Age and post-Roman periods.

The comparison with Gaul has been particularly instructive. Unlike Gaul, where Roman social structures and elite status were maintained well into the fifth century amidst the transition to 'barbarian' rule, Britain experienced a more rapid decline in traditional administrative and urban frameworks.

This differential pace of transformation suggests that the disintegration of Roman authority in Britain was not uniform but occurred at different times and rates across the diocese, with the last major transformations likely happening around AD 425-445. This marks the most significant change and the point where the local elite failed to maintain status and influence with the influx of new groups and changing dynamics in power.

The evidence from this study significantly advances our understanding of the end of Roman Britain by illustrating how regional variations and the adaptability of local elites influenced the trajectory of decline and transformation. These findings challenge the narrative of a sudden collapse, instead portraying a gradual and regionally diverse reconfiguration of socio-political structures. The twilight of Roman Britain was not marked by an immediate and uniform breakdown but was a complex, drawn-out process that varied significantly across different regions. This nuanced view helps to explain the archaeological data and historical evidence more effectively, highlighting the roles of local agency and the interplay of internal dynamics and external influences in shaping the transition from Roman to post-Roman Britain. The persistence of certain Roman practices, such as the use of specific types of material culture and coinage, alongside the introduction of new cultural elements, underscores a period of profound transformation marked by both continuity and change.

This analysis not only contextualises the end of Roman Britain within the broader narrative of the Western Roman Empire's transformation but also contributes to our understanding of how communities adapt to systemic collapses and reconfigure their social, political, and economic structures in response to shifting power dynamics and emerging identities. The transitions observed in Britain, from the enduring use of Roman administrative practices to the adoption of new cultural elements, reflect a society in flux, dynamically responding to the challenges of its time.

The systematic examination of various aspects of material culture and coinage has revealed significant patterns on a national level. By making the dataset accessible on ADS, researchers can delve into the data at a micro level, allowing for a more detailed analysis of the regional patterns that have been identified. This study has not only shed light on existing patterns but has also underscored several areas for future inquiry and materials warranting further evaluation.

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How did objects of dress and coinage shape power and identity in late Roman Britain?

Fractured Britannia provides an in-depth examination of the distribution of coinage and elite items of Roman dress in later and sub-Roman Britain, offering new perspectives on a period of profound social and political change. While previous research has sought to distinguish groups serving the Roman state, identifying them in the archaeological record remains challenging.

The military and the civil administration relied on hierarchical structures and used similar objects to indicate rank and status. At the same time, local elites, responsible for much of the practical administration of Britain, began to adopt military styles of dress. These changes led to a clear evolution in dress accessories over the fourth century.

Five extensive datasets on crossbow brooches, belt fittings, spurs, penannular brooches, and coins are examined systematically in combination. Previously studied in isolation, these objects reveal insights into social identity, regional variation, and the persistence or abandonment of Roman material culture.

The evidence shows that while some regions continued relatively unchanged into the fifth century, others abandoned recognisably Roman forms as early as AD 375. By assessing existing methodologies, revising typologies, and mapping artefact distributions, this book highlights key patterns across sites and regions and makes large datasets publicly available.

Ultimately, the study provides a chronological and geographic framework for understanding how Roman Britain transitioned into smaller post-Roman polities. It analyses the differential use of material culture across site types and compares patterns with the continent, shedding light on the transformation of Britain's society and identity in the sub-Roman and early medieval world.

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