

New Stories from Old Buildings:

Revisiting architecture and social organisation in
central Anatolia and the Lake District between
6500 and 5500 BC

Jana Anvari

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Faculty of Education, Humanities and Law
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Summary

This thesis offers a comprehensive re-evaluation of the ways in which archaeology can research architecture in prehistoric Cappadocia, the Konya plain and the Lake District. Based on a content analysis of 222 archaeological publications, it discusses at length the epistemology of recognising social organisation from the study of prehistoric architecture. Originally inspired by the wish to investigate the formation of socioeconomic status differences in southcentral Anatolia, this thesis demonstrates that archaeology can more successfully contribute towards answering such essential debates in Europe and the Eastern Mediterranean archaeology if it has an appropriately evaluated tool kit for reading social organisation from material culture; and therefore concentrates on the development of such a toolkit specifically for architecture, and for the cultural context of Cappadocia, the Konya plain and the Lake District (southcentral Anatolia). It focuses on the Late Neolithic and Early Chalcolithic (6500–5500 BC), which have recently come into research focus as featuring social transformations that could have started the development towards social stratification: increasing household autonomy, social competition, mobility and the appearance of warfare.

Drawing on contextual and reflexive archaeology, this thesis systematically maps the existing scholarly discourse via content analysis. Through this, it also reflects deeply on research practices within southcentral Anatolian prehistoric archaeology with the aim of improving them. This includes scrutinising the chronological and geographical frameworks established by previous research; identifying research biases inherited from the history of research; and reflecting on the specific challenges of architecture research in southcentral Anatolian prehistoric archaeology, for example the handling of legacy data. Alongside the epistemological discussion, this thesis researches the social use of architecture in Neolithic/ Chalcolithic southcentral Anatolia: it describes how communities deliberately shaped built environments in specific ways in order to produce the social interactions they sought to create.

A trial-run application of the ‘indicator package’ to the architectural record of 11

sites in Late Neolithic and Early Chalcolithic indicates that the architectural record does not clearly display developments towards social features that characterise the later Chalcolithic and Early Bronze Age: it suggests an ongoing balance of household autonomy with strong community integration; only few cases of social competition, stratification or mobility; and no clear evidence for the existence of warfare. This application further reveals research biases, and demonstrates some strategies for overcoming these in the future.

Declaration

I certify that this thesis does not incorporate without acknowledgment any material previously submitted for a degree or diploma in any university; and that to the best of my knowledge and belief it does not contain any material previously published or written by another person except where due reference is made in the text.

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Chapter 1 BUILDING NEW STORIES

'X' never, ever marks the spot. (Indiana Jones, in Indiana Jones and the Last Crusade)

1.1 Introduction

In this thesis I research¹ settlement architecture at Late Neolithic and Early Chalcolithic sites in the western-central part of modern Turkey, and the communities and households who built it. This research project developed out of my work since 2008 on the Çatalhöyük West Mound as an excavator and field director. My thesis is part of a concerted effort by the West Mound team to make sense of this less well-known area of the famous site of Çatalhöyük, but it also goes beyond this. From Çatalhöyük West it has grown into a comparative piece of work. It collects and analyses architectural evidence from 11 Late Neolithic and Early Chalcolithic (6500-5500 BC) sites in the Turkish Lake District, the Konya plain, and Cappadocia in order to explore in detail the ways people organised themselves into groups—households, neighbourhoods, village communities—and the ways this changed during the millennium in question. My research aims to contribute towards the reconstruction of larger developments between ca. 6500 and 3000 BC in southcentral Anatolia that fundamentally changed the ways communities organised themselves from the egalitarian village communities of the Early Neolithic to the socially stratified, 'complex' societies of the Early Bronze Age.

This chapter outlines the research aims and questions that motivate this project, and deliberates its significance through a discussion of overarching debates in Anatolian prehistoric archaeology and beyond. My research aims to improve the understanding of the period 6500–5500 BC in central Anatolia and the Lake District by providing a critical and rigorous synthesis of the evidence for social organisation

¹ I have intentionally chosen to use first person occasionally throughout this thesis as a reminder that the results of archaeological research are inherently shaped through the choices that the individual researcher makes during the research process (see Chapter 4.5).

reflected in settlement architecture. The last few years have seen exciting new research about the Late Neolithic and Early Chalcolithic in southcentral Anatolia² being published (e.g. Arbuckle 2012a; Düring 2011c; Hodder 2013b, 2014a, 2014b; Marciniak et al. 2015b), showing that this period saw important transformations in the development towards complex Bronze Age societies in the region. In the light of this most recent research, existing interpretations about society and architecture in Late Neolithic and Early Chalcolithic Anatolia, some of which were made as much as 60 years ago, are in need of re-evaluation. This thesis will complement and scrutinise existing architectural research by analysing new, and re-analysing existing, architectural data from the Late Neolithic and Early Chalcolithic sites of Canhasan, Çatalhöyük West, Pınarbaşı B, Erbaba, Hacılar, Kuruçay Höyük, Höyücek, Bademağacı, Gelveri, Musular and Köşk Höyük. It employs methods derived from reflexive and contextual archaeology in order to systematically re-evaluate the way Anatolian prehistoric archaeology researches social organisation from architecture. The primary objective is to revision ways in which archaeology has understood the social meaning of architecture excavated at these sites, to review the architectural evidence and its interpretation, so that it can more successfully contribute to the discussion of social organisation within a framework of broader cultural processes between the Neolithic and Early Bronze Age in the centre of Anatolia, specifically the development of traits often summarised as ‘social complexity’.

1.2 Research objectives and significance

This thesis objective can be translated into a primary and a secondary research question, the meaning of which will be clarified throughout the following discussion:

What important processes transformed social organisation between 6500 and 5500 BC in the Konya plain, Cappadocia and the Lake District, and how are they

² see Chapter 2 for a definition of geographic and chronological terms used in this thesis.

related to the formation of social complexity?

What has characterised the archaeological study of social organisation through architecture in Late Neolithic and Early Chalcolithic southcentral Anatolia, and how can it be improved in future research?

This thesis has several elements of significance. First, it was primarily inspired by the objective to research the long-term development and deeper roots of ‘social complexity’ in the centre of Anatolia. Second, it provides a critical synthesis of existing knowledge on architecture in the study area. And third, it has a methodological or epistemological component in that it critically evaluates the ways southcentral Anatolian archaeologists interpret social organisation from a study of prehistoric architecture. One builds upon the other: I review the ways in which archaeology thinks about architecture in order to interpret or re-interpret architecture, in order to rethink the way complexity was formed over millennia in southcentral Anatolia. And although the latter was originally the main motivation when starting this research project, the epistemological discussion eventually became the main focus of the thesis.

Another way to describe the significance of this thesis is to consider a potential audience. The new views on the formation of central Anatolian complexity generated in this thesis is relevant towards the understanding of the long-term formation of European and Near Eastern societies during prehistory; it might therefore be of interest to a wider forum of prehistoric archaeologists or even partially in a public sphere. Many other parts of this thesis might be of interest more specifically to Anatolian prehistoric archaeology: the thesis introduces some new architectural data into the discourse (from the Çatalhöyük West Mound, however a full publication is currently underway in another format); critically reviews existing data; provides updated chronologies of some Late Neolithic and Early Chalcolithic sites; reflects on dominant architectural research practices within Anatolian archaeology in order to improve them; and contributes towards the understanding of an under-researched period of Anatolian prehistory.

1.2.1 The long-term formation of Anatolian prehistoric societies: windy pathways towards social complexity

When did we become we? Where and when did the thing called us begin? [...] Where? And When? Well, of course: in the Near East, about ten thousand years ago. (B, in Quinn 1996:259)

As regards issues of 'grand narrative', I do feel that archaeologists have a duty to contribute to public debates about the 'origin' of 'settled life' or 'civilization' (Hodder, in Hodder et al. 2008:34)

This thesis aims to contribute towards the understanding of social processes between the Neolithic and the Early Bronze Age in central Anatolia and the Lake District. Newer research portrays the millennium between 6500 and 5500 BC (Late Neolithic and Early Chalcolithic) as an important transformative time in southcentral Anatolian prehistory: The Çatalhöyük research team has recently identified 6500 BC as the start of a period of change during which Early Neolithic lifeways unravelled when households became more autonomous, competitive and mobile (summarised in Hodder 2014b). At the same time, the Lake District was neolithised when, nearly 2000 years after the neolithisation of Cappadocia and the Konya plain, Neolithic lifeways reached the lakes (Düring 2011c:125). Arbuckle (2012a) has drawn attention to Early and Middle Chalcolithic sites in Cappadocia, where social stratification started to develop. Düring (2011c:122-199) describes the wider regional context of such changes, discussing southcentral Anatolia as part of a dynamic region of cultural exchange in western Turkey. One possible angle for viewing these developments is that they were factors in the development of social complexity that would be finalised millennia later in the Early Bronze Age.

The formation of early complex societies in Europe and the Near East is an issue that has long fascinated archaeologists and the public alike. In archaeology, social complexity can be defined as “a whole made up of differentiated and interrelated parts: the more parts and the more connections between parts, the more complex the system or society” (Verhoeven 2010:12, similarly Barton 2014:307, Wynne-Jones and Kohring 2007:2). Verhoeven (2010:12) states that Flannery (1972a) was

one of the first archaeologists to explicitly use the concept and term of social complexity, but the archaeological interest in early complex societies is certainly much older (Barton 2014:307) and was one factor that drove interest in European and Near Eastern prehistory, prominently by Childe (1925, 1929, 1934, 1956). There seems to be consensus that social complexity was reached in large parts of the Near East, including Mesopotamia, the Levant and Anatolia, by 3000 BC (the beginning of the Bronze Age), but some publications claim partial complexity for much earlier examples, such as, the Pre-Pottery Neolithic Levant (from 9700 BC, Finlayson et al. 2011; Kuijt and Goring-Morris 2002) or the hunter-gatherer-built Göbekli Tepe (9100-8500 BC, Verhoeven 2010:16) or Early Neolithic Çayönü in south-eastern Anatolia (Pearson et al. 2013). And indeed, based on the definition outlined above, any society made up of units such as households or family lineages (i.e. every society) could be considered 'complex' (Verhoeven 2010:12). However, generally associated with the Bronze Age-form of social complexity in the Near East and Europe are features such as: urban centres, population density, centralised political administration through formalised law, social differentiation and stratification (Barton 2014:307), hereditary ranking, long-distance trade, craft specialisation, centralised production, writing (Verhoeven 2010:12), metallurgy (Düring 2011b:809; Steadman 2011:251), organised religion (Düring 2011c:253) and sometimes irrigation (Flannery 1972a:405). The word 'civilisation' is often used instead of 'complex society' outside of archaeology, and sometimes also within it (e.g. Sagona and Zimansky 2009:172) though it is generally avoided in current archaeological writing (Verhoeven 2010:11-12). Unfortunately, an evolutionary notion inherited from the 19th century is intrinsically engrained in the very term 'complexity', which, much like 'civilisation', is problematic insofar as it suggests that societies who do not fit this category were un-complex (simple) and un-civilised, and therefore somehow less valuable or advanced (Verhoeven 2010:11-13). But since social complexity is essentially a construct made to aid archaeologists conceptualise the workings and developments of past societies (Barton 2014:321; Verhoeven 2010:18; Wynne-Jones and Kohring 2007:3), it will be treated here as such, without any inherent notion of value.

Why does the formation of social complexity matter? Condensed to its essence, the emergence and further development of social complexity is part of the story of how the modern world came to be the way it is. This makes social complexity, although mostly under its alias ‘civilisation’, relevant beyond the ivory tower of archaeological research (Herrero 2013). Jared Diamond’s books (Diamond 1997, 2005), for example—to name just one non-archaeological author whose commercial success is based on the public interest in the emergence, development and ‘failings’ of complex societies—employ explanations that betray his background in evolutionary biology (Correia 2013) to describe social complexity as an adaptive strategy employed by societies to ensure survival and prosperity. Non-archaeological explanations of social complexity, but also some archaeological ones (Düring 2011c:298; Verhoeven 2010:11-12), have a tendency to suffer from a teleological view, which “supposes that ‘pre-civilised’, pre-state, and pre-historic communities and cultures were designed for or directed toward a final result: (modern Western) civilisation” (Verhoeven 2010:11-12). Engrained in this view is the already mentioned evolutionary notion that social complexity—civilisation—is favourable and that history is the story of how humankind worked for millennia to finally achieve its preliminary culmination in the present. Interestingly, the 20th and 21st centuries have witnessed a contrary intellectual movement, from Marx (Tomba 2013:360-361) to an assortment of modern academics, environmentalists, political analysts and nutritionists, that condemns civilisation and its constituents as the primary source of modern evils, such as war, terrorism, genocide, inequality and exploitation, oppression of women and ethnic groups, environmental pollution, climate change, and a range of health conditions, such as heart diseases, obesity and diabetes (Diamond 1987; Jensen 2006a, 2006b; Quinn 1992, 1996, 1997; Sisson 2009), and ultimately the eventual self-destruction of humankind in the near future (Ahmed 2010; Motesharrei et al. 2014).

Whether ‘civilisation’ is considered salvation or doom, the public—or at least those living in or originating from Near Eastern, European or European-colonised countries, and in the countries—recognises the emergence of social complexity as the story of ‘us’ and the beginning of ‘our’ world. And southcentral Anatolia is very

much in the centre of such debates. The Konya plain, Lake District and Cappadocia featured some of the earliest pre-Bronze Age research ever conducted in Anatolia, and remain some of the more in depth researched areas within prehistoric Anatolia today (Düring 2011c:28; Özdoğan 1995, 1999:10). This has led to southcentral Anatolia having an exemplary character for the study of prehistory in other areas of Turkey and surrounding regions, both within archaeology (Baird 2012a:432) and outside it, for example in form of the site of Çatalhöyük which has found public interest as an early 'town' (e.g. Hodder 2006; Mellaart 1962a, 1963a, 1963b, 1963c). Interpretations made here therefore have significance beyond the circle of archaeologists directly concerned with the study of southcentral Anatolian prehistory, and Baird (2012a:432) explicitly names the debate around early complexity as one example: "Debates continue about the nature of early social complexity and how much this was a response to the development of sedentary farming communities of scale. The Anatolian evidence allows us to understand whether and how social complexity might have operated in environments that contrast with those where the developments have been more fully studied, especially the Levant, but also northern Mesopotamia." And indeed, Diamond (2005:180) cites Anatolia as the place from where markers of 'civilisation' such as agriculture, metallurgy and "towns and cities, chiefdoms and kingdoms, and organized religions" spread to Europe and transformed this continent. Recent overviews (Ferguson 2013:218-220; Hamblin 2006:24-27) on the history of European and Near Eastern warfare routinely refer to the very sites studied in this thesis, making them part of the larger story of the deeper origins of European modernity.

It is only archaeology, though, that can really provide evidence-based answers to the question of how complexity developed, and archaeology struggles with interpreting the archaeological record to explain its formation. It is my belief that a thorough investigation of the origins of Near Eastern social complexity needs to go back deep in time, to the Neolithic and Chalcolithic periods, to explore the long-term development leading up to the Bronze Age (Düring 2011c:48; Sagona and Zimansky 2009:124). I further agree with recent approaches towards studying social

complexity (e.g. Bolger and Maguire 2010:3) that the question of how, when and why social complexity developed needs to be researched for every region and cultural context of Europe or the Near East individually (a principle also applied by Düring 2011c and Bachhuber 2015), and it is not possible to develop a model that fits all of Anatolia (cf. Yakar 2011b), let alone the entire Near East or Old World, an approach that was popular a few decades ago (Gilman 1981; Paynter 1989; Redman 1978). The diversity of human lifeways would not be adequately acknowledged in a one-fits-all model.

If the research into the origins of social complexity needs to be context-specific and start with the Neolithic and Chalcolithic, then this thesis can contribute a case study to the overall complexity discussion: it is specific to a time period and region, researching one episode in the prelude to the Early Bronze Age in southcentral Anatolia. It further concentrates on a particular aspect of complexity, focusing on researching the development of social stratification, which Chapter 3 will show to be an important factor changing Chalcolithic and Early Bronze Age societies. The intention of being context-specific will become a founding block of the methodology of this thesis (Chapter 4), and therefore after the wider discussion in this section, the remainder of the thesis will be strictly southcentral Anatolia specific. Instead of applying external models of complexity formation onto the Anatolian record (like Eslick 1988; Steadman 2000b), I strive to understand this development by identifying the specific processes that led to social complexity here, and by defining important concepts or terms as specific to the context researched here (Chapter 3), including the question of what exactly social complexity or social stratification meant in the study region, which will be define in Chapter 2.

The issue of social complexity is one factor that motivated this research project, and one way in which it is significant, but this thesis will avoid reducing the long, diverse and complex developments of a millennium of Anatolian prehistory to one of its eventual outcomes, as criticised by Verhoeven's (2010) review of archaeological work on social complexity in the Near East, and Düring's (2011c:200, 253) overview of prehistory in Asia Minor. Chapter 3 will show that social complexity, in Anatolia and probably beyond, can best be understood as the unintended outcome of

various small changes to the social makeup of local communities, and that society in this part of Anatolia moved towards social complexity via previously unperceived mechanisms and pathways, for example through mobile pastoralism. This thesis therefore understands 'social organisation', one of the key words in its title, as the study of people on an intermediate scale between that of the individual and daily household routines and that of larger, supra-regional units persisting for millennia: the study of social groupings such as households, neighbourhoods and village communities. Focussing on groups of an intermediate size also seems to entail researching an intermediate temporal scale, concentrating on the changes and developments that groups of people experienced and affected during one or a few generations (3.3.2). Understanding the formation of societies from such an intermediate seems like a promising starting point for a thesis that strives to understand long-term developments and the formation of social complexity as the unintended outcome of the strategies groups of people choose to deal with the challenges of living together permanently in large groups, changing the social fabric of local and regional social organisation and eventually the course of (pre)history.

1.2.2 A critical synthesis of Late Neolithic/ Early Chalcolithic architectural evidence

The publication of exciting new research on the Late Neolithic and Early Chalcolithic of southcentral Anatolia, as summarised in the first paragraph of the previous section, provides a timely opportunity to re-think existing Late Neolithic and Early Chalcolithic evidence and its interpretation. Synthesis and reflection fits well into current research trends: Düring (2011c:2) perceives that prehistoric archaeology in Asia Minor is currently undergoing a phase of reflection on the results and interpretations of field work, a phase that manifests itself in recent synthesising monographs on the prehistory of Turkey (Bachhuber 2015; Düring 2011c; Duru 2008; Sagona and Zimansky 2009; Yakar 2011b) and an edited encyclopaedia-like volume spanning most of Anatolian prehistory and history BC (Steadman and McMahon 2011). Importantly, these volumes now provide updated views on the greater storylines of Anatolian prehistory that had until recently only been

accessible through now outdated monographs from the 1970s, while newer information remained fragmented between numerous papers and reports and thus not easily accessible to a wider audience outside of the circle of Anatolian researchers (Düring 2011c:2). This thesis is both a product of, and a contribution to this phase of reflection. It uses understandings generated by the latest interpretive publications in order to contribute to such ongoing interpretive work through a synthesis and re-evaluation of new and old field data. I agree with Düring (2011c:3) that, at present, it is of primary importance to review the existing evidence, re-examine interpretations made decades ago, and think about new objectives for future research.

The previous section stated that I seek to research the roots of social complexity, or particularly of social stratification, deep in the Neolithic and Chalcolithic. In Asia Minor, such an approach is being made difficult by a research gap in the timeline spanning the Neolithic to Early Bronze Age. Archaeological interest has been unevenly distributed over the different periods of prehistory in Asia Minor, and the Late Neolithic and Chalcolithic are among the less well researched periods (Düring 2011b:797, 2011c:200). Düring (2011c:200) believes that “this hiatus in our knowledge is a consequence of archaeological research agendas, on the one hand, and is determined by the nature of archaeological remains that have been dated to this period, on the other.” He refers to a Childean view of the past as a series of important thresholds, in which the Late Neolithic and especially the Chalcolithic are between the agricultural and urban ‘revolutions’—revolution-less, these periods received much less attention. Little research into the middle period only perpetuated the impression of its being of little interest (Düring 2011c:200-203). However, without a better understanding of the ‘millennia in the middle’ (Düring 2011b), it is not possible to research the long-term development of social organisation during prehistory. The lack of knowledge about the Late Neolithic and Chalcolithic might be one reason for the poor understanding of the origins of social complexity in Asia Minor.

The region chosen here for study, southcentral Anatolia, differs from Düring’s assessment of the state of prehistoric research in Asia Minor in some respects. In

the study region, it is actually more the Middle to Late Chalcolithic and Early Bronze Age that are poorly researched, with only a small number of excavated sites to draw on (Chapter 3). The Late Neolithic and Early Chalcolithic periods of southcentral Anatolia represent a fortunate exception to many of the shortcomings that Düring (2011b:797, 2011c:27-29), criticises of prehistoric archaeology in Asia Minor in general, and the millennia in the middle specifically. Pre-Bronze Age research in Asia Minor did not start until the 1950s, but it started southcentral Anatolia, and this region therefore still better researched than many other areas (Düring 2011c:28; Özdoğan 1995, 1999:10). The site distribution maps in Chapter 3 demonstrate that, while large parts of 6500-3000 BC Anatolia are indeed virtually unknown, the period between 6500-5500 BC in the Lake District, Konya plain and Cappadocia features more sites excavated on a larger scale. It has more protagonists and a greater variety of research aims and strategies (Düring 2011c:28). The Late Neolithic and Early Chalcolithic of southcentral Anatolia therefore could represent an ideal case study for researching the deeper roots of Bronze Age society.

At the same time, these data have never been subject to a critical synthesis of a longer format. This thesis is similar in objectives and scope to theses by Düring (2006) and Cutting (2005a), but for the first time it puts this time period and geographical scope specifically into the focus, and can therefore more deeply reflect on the architecture and society of the Late Neolithic and Early Chalcolithic specifically. Without such a synthesis, the data body appears quite heterogeneous. The sites studied here have been excavated by teams with different research aims, theoretical backgrounds, nationalities and resources over a period of nearly 60 years since 1957. The research history has created fault lines that complicate comparative research, and research of larger social processes such as that of the origins of social stratification. For example, the three regions researched here were excavated by different sets of people, and this might impact perceptions of regional differences: The existing impression of Lake District prehistory is to a large degree the opus of Refik Duru and Gülsün Umurtak from Istanbul University, while the Konya plain has been dominated by British and international teams, and excavations in Cappadocia have been carried out by several teams from Istanbul

and Ankara University (Table 1). The time of excavation and theoretical focus of the directors also had a major impact on how sites are reconstructed, for example the material from the 1950–1960s excavations at Hacilar has various methodological issues that complicate its use for current research (Reingruber 2008:420-426; Rosenstock 2010a). The nearly contemporary excavations at Canhasan were remarkably different from the Hacilar approach, but also different from more recent excavations (Schoop 2010; Steadman 2000a; Wright 2002). Field work at Çatalhöyük, with its unique small-scale research focus, has been producing a body of data that is of very different quality and quantity to that of other sites, thus complicating comparisons. Teams have further used very different methods of dating sites, and presenting the chronological development of sites (Chapter 2). Together, these issues have created a research landscape that is not conducive to research that compares and contrasts sites in order to researcher bigger issues, because it presents researchers with an array of sometimes contradictory chronologies, architectural reconstructions and their social interpretation. Such a fragmented research landscape requires what I call here a ‘critical synthesis’, a re-processing of data so that it can more successfully contribute towards larger debates, such as complexity: Using already existing critiques of architectural data and its interpretation and my own critique, I attempt here a research synthesis specifically of data from the LN and EC of southcentral Anatolia, specifically of information relating to the formation of social stratification.

| | site | director | duration |
|---------------|---------------------|--|-------------------------|
| Lake District | Beycesultan | Seton Lloyd and James Mellaart, Eşref Abay | 1954-1959, 2007-current |
| | Hacilar | James Mellaart | 1957-1960 |
| | Kuruçay | Refik Duru | 1978-1988 |
| | Hacilar perimeter | Refik Duru | 1985-1986 |
| | Höyücek | Refik Duru | 1989-1992 |
| | Bademağacı | Refik Duru and Gülsün Umurtak | 1993-2010 |
| | Hacilar Büyük Höyük | Gülsün Umurtak and Refik Duru | 2011-current |
| Konya plain | Çatalhöyük | James Mellaart, Ian Hodder | 1961-1965, 1993-current |
| | Canhasan I | David French | 1961-1967 |
| | Süberde | Jacques Bordaz | 1964-1965 |

| | | | |
|-----------|----------------|--|-------------------------|
| | Canhasan III | David French | 1969-1970 |
| | Erbaba | Jacques Bordaz | 1969, 1971, 1974, 1977 |
| | Pınarbaşı | Douglas Baird | 1994-1995, 2003-2005 |
| | Boncuklu Höyük | Douglas Baird and Andrew Fairbairn | 2006-current |
| Capadocia | Pınarbaşı-Bor | Uğur Silistreli | 1982 |
| | Köşk Höyük | Uğur Silistreli, Aliye Öztan | 1981-1992, 1996-2008 |
| | Aşıklı Höyük | Ufuk Esin, Nur Balkan-Atlı, Mihriban Özbaşaran | 1989-2003, 2006-current |
| | Gelveri | Ufuk Esin, Sevil Gülçur | 1990, 2007 |
| | Musular | Mihriban Özbaşaran | 1996-2004 |
| | Kaletepe | Nur Balkan-Atlı and others | 1997-2001 |
| | Güvercinkaya | Sevil Gülçur | 1996-current |
| | Tepecik | Erhan Bıcağcı | 2000-current |

Table 1 Excavations of Neolithic to Early Bronze Age sites in southcentral Anatolia (compiled from Belli 2002; Düring 2011c; TAY 2016).

1.2.3 Methodology, epistemology and the building blocks of society

I approach this critical synthesis by rethinking deeply the methodological and epistemological basis of architecture interpretation. Within the diverse research landscape described before, I attempt a comprehensive summary of the archaeological discourse of four social processes or factors that in Chapter 3 will be identified as central to the formation of Late Neolithic and Chalcolithic societies: the increase or emergence of household autonomy, social competition and stratification, mobility, and warfare. The analysis of this discourse is a product in itself, providing a thorough reflection on the ways archaeology makes sense of architecture in the study region—but it is also used here to construct an interpretational framework, a tool kit for recognising these above named social processes from the architectural record. This tool kit is intended for use by myself in the final part of the thesis, when I apply it to the archaeological record, but also for use by other researchers in the future; and this tool kit, or maybe more precisely the research and rationale behind the toolkit which is discussed at length in Chapter 6-9, can probably be seen as the main contribution of this thesis. The following application of this toolkit to the architectural record (Appendix 12) counts as more of a trial run to evaluate the toolkit itself, the results of which are described in Chapter 10.

This thesis, then, is focused on re-evaluating the epistemology of architecture research in pre-Bronze Age southcentral Anatolia. The title of the thesis, *New Stories from Old Buildings*, refers to its clear epistemological or methodological focus. Questioning how we know what we know about these buildings and settlements, and the people who built them, was originally a minor aim when I started this research project, but then became a major one. This refocusing resulted from my realising that some of the architectural evidence from the sites studied here is precarious; and that there are a number of gaps, disagreements and unquestioned assumptions in the way these date are interpreted towards social organisation; and that this eventually has an effect also outside of the realm of Anatolian prehistoric archaeology. To pick one example, the Section 1.2.1 cited publications on the origins of warfare that use the evidence from Aşıklı Höyük, Çatalhöyük, Kuruçay, Hacilar, Höyücek, Bademağacı and Güvercinkayası (Ferguson 2013:218-220; Hamblin 2006:24-27) to argue that warfare emerged at least with the start of settled life; Clare et al. (2008) use this evidence for warfare towards creating a larger storyline about the influence of climate change on Neolithic/ Chalcolithic societies in the Near East and Europe (see other publications by the same research group: Clare 2010; Clare and Weninger 2010, 2014; Weninger et al. 2014). At the same time, the evidence basis for Neolithic/ Chalcolithic warfare in the region, much of it based on architecture, is very ambiguous (Düring 2011a; Rosenstock 2010a; Selover 2015). The discrepancy between the low confidence specialists of southcentral Anatolian prehistory have in the evidence, and the way in which it is used, outside the ivory tower of this discipline, towards arguing ideas that are also of relevance in the present (human responses to climate change, the question of whether warfare is human nature) is worrying. Far-reaching interpretations need to be founded in secure archaeological data precisely because they are of interest in a wider forum.

This systematic rethinking of epistemology is based on a content analysis of 222 archaeological publications on the prehistory of southcentral Anatolia with the aim of identifying from previous research features of architecture (here named 'architectural indicators') indicative of household autonomy, social stratification,

mobility or warfare. In Chapters 6-9, I extensively discuss the results of this content analysis, thereby exploring and evaluating the ways past and current research has understood the social meaning of prehistoric architecture in the study region. Through this discussion, I create 'indicator packages' and then apply them to the architectural data. I thus use archaeological research itself as an object of study, but also as a source to create a tool kit for architecture research specific to the cultural context I research (prehistoric southcentral Anatolia), in accordance with the contextual approach taken by this thesis (Chapter 4). This thesis is therefore the analysis of an academic discourse, but not a discourse analysis in the most common definition of this term, which refers to an analysis technique that studies language, diction and grammatical structures (Fairclough 2013; Gee 2014).

Another reason why the epistemological focus eventually became the backbone of this thesis is that it actually fulfilled two purposes. It provided me with a research framework and indicator list for an architectural analysis, but also with a structure to describe the social use of architecture in the past. Epistemology is about how archaeologists make sense of architecture, but Chapters 6-9 will show that it overlaps very much with achieving an understanding of how people in the past used architecture to construct the kinds of communities and societies they wanted to create. The indicators and themes identified in the content analysis are building blocks for an archaeological understanding of architecture and the social processes behind it, and were building blocks also for how people in the past built the societies they wanted to create, for example 'building' social hierarchies by constructing built environments that produced, communicated and reinforced differences in social status. The indicators and themes identified through content analysis therefore also tell the story of important factors, processes, and architectural styles that transformed societies during Anatolian prehistory. These are discussed in great detail in Chapters 6-9 and summarised in Chapter 10 into a story of how complexity was built. The main contribution of this thesis is therefore less a re-sorting of data on a basic level (e.g. reconsidering site stratigraphies, the layout of houses), although that is also done to a degree (Appendices 1, 12), but more a rethinking of their interpretation in a larger regional and chronological

framework. This is what allows me to create new perspectives of looking at architecture that has already been interpreted and re-interpreted, in some cases for decades. Before setting out to challenge interpretations made by other archaeologists, it is necessary to state my profound respect for all those who brought the fascinating lifeways of prehistoric southcentral Anatolia to light over the last 60 years, often under challenging conditions. My respect for their achievements is in no way compromised by my conviction that, as new data emerge, passed-down beliefs need to be challenged to allow research to progress.

1.3 Chapter outline

Chapter 1 has defined the objectives and significance of this research project. Chapter 2 defines the geographical and chronological scope examined in the thesis, including a review of the chronology of each site in question which is provided in Appendix 1. Chapter 3 reviews the current state of knowledge on the development of society and architecture between 8500 and 3000 BC in the Konya plain, the Lake District and Cappadocia, and the research gap this thesis is aiming to overcome. Chapter 4 reviews theory relevant to an interpretation of social organisation from architecture and previous applications in southcentral Anatolian archaeology, and Chapter 5 summarises this review into a research methodology for Chapters 6-10. Chapters 6 (Household autonomy and community integration), Chapter 7 (Social competition and stratification), Chapter 8 (Mobility) and Chapter 9 (Warfare) research four individual, but interrelated processes that transformed Late Neolithic and Early Chalcolithic societies. They each provide a discussion of how societies were built and changed through architecture alongside an epistemological debate of how to recognise such processes from the architectural record; they also create a set of indicators for future architectural studies. Chapter 10 discusses the results of the application of those indicators created in Chapter 6-9 to the archaeological record, the details of which are summarised in Appendix 12; and this chapter also offers a final reflection on research methodology.

Chapter 2 TIME AND PLACE

Like other fields, archeology [sic] is cursed with terms so vague and ambiguous that they tend to obscure more than they clarify. (Flannery 1972a:400)

This chapter delineates the geographical and chronological scope of the thesis, defines key terms and touches on issues and debates within Anatolian archaeology that are relevant to this research project. The geographical and chronological boundaries of cultural units during the Neolithic and Chalcolithic in southcentral Anatolia are incompletely understood; for this reason, debates on prehistoric geography and chronology in southcentral Anatolia are evaluated here to determine, as best as currently possible, a reliable temporal and spatial framework of reference. Chapter 4 will discuss the significance of choosing a clearly circumscribed research sample; but the research scope needed to be clarified here in preparation for the literature review in Chapter 3. The comparative aspect of this thesis has a focus on the temporal (observing developments over time), not the geographical (establishing differences in architecture and social organisation between regions); chronology is therefore discussed more extensively.

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Figure 1 Map showing regions in Anatolia as traditionally referred to in prehistoric archaeology, and the border between Asia Minor and the Fertile Crescent (Düring 2011c:Fig.1.1).

2.1 Place: Geographical scope

This thesis researches three adjacent regions in southcentral Turkey that share certain geographical characteristics, but that are distinct in others. This section will demonstrate that the Lake District, Konya plain and Cappadocia are not clearly separated from each other and from surrounding regions either by geographic features or through cultural differences throughout prehistory; and define more or less arbitrary borders to be used throughout the remainder of this thesis. For reasons of convenience the term ‘southcentral Anatolia’ will be used in this discussion and throughout the thesis to refer collectively to the Konya plain, Cappadocia and the Lake District.

‘Anatolia’ (Turkish: Anadolu) refers to the Asian part of modern Turkey (Matthews 2011:35; Schachner 1999:1). ‘Asia Minor’ is used by Düring (2011c)—as in this thesis—to denominate Anatolia minus the eastern part of modern Turkey (east of a line between the modern cities of Trabzon and Iskenderun) on the grounds that the two regions followed different cultural developments prior to the Bronze Age, despite known contacts throughout prehistory (Çevik 2007:134; Düring 2006:13-14, 2011c:5-6; Özdoğan 1999:11; Rosenstock 2009:99; Sagona and Zimansky 2009:Fig. 3.1).

Most of the centre of Anatolia is on a plateau ca. 1000m above sea level (asl), and is geographically diverse. Within this diverse geography, there are no clear geographic boundaries separating the Lake District, Konya plain and Cappadocia from adjacent region; and different archaeologist define borders differently. In the south, the Taurus Mountains, up to 2000m high and with few natural crossings (Düring 2011c:7), provide a relatively clear border that is widely accepted among archaeologists (e.g. Düring and Marciniak 2005:169; Gérard and Thissen 2002a:1; Kuzucuoğlu 2002:33). The valley of the Göksu River, one of the most prominent natural crossings that connects the Konya plain with the coast and permits relatively easy access from the modern city of Karaman to Silifke at the coast (Bikoulis 2012:35-36; Newhard et al. 2008), does indeed not show clear signs of usage during the Neolithic and Chalcolithic periods (French 1965b:186; Şerifoğlu et al. 2013; cf.

Mellaart 1958b; Mellaart 1963d:203). In the northeast, the CANeW group has suggested the Kızılırmak River as a boundary (Kuzucuoğlu 2002:33), although the river would rather have provided a means of transport and a connection to areas in the east and north (Gérard and Thissen 2002b:48). By contrast, Todd's (1980) seminal survey (and works based on it, such as Allcock and Roberts 2014:Fig.1) actually included areas north and south of the river as part of Cappadocia. In the northwest, the CANeW group drew a less arbitrary line drawn between Lake Beyşehir and the Kızılırmak (Kuzucuoğlu 2002:Fig.1), while the TAY project (Türkiye Arkeolojik Yerleşmeleri / Archaeological Settlements of Turkey) includes the Eskişehir region within central Anatolia (TAY 2016). In the east and west, the mountains of the Lake District and Cappadocia blur without clear boundaries into extensive highlands.

Also between Cappadocia, the Konya plain, and Lake District there are no clear geographic boundaries. Although adjacent, the three vary in climate, vegetation and abiotic resources: the Konya plain is steppic today (Kuzucuoğlu 2002:33-34), and large parts of it were marshy in the Neolithic (Baird 2012a:438; Roberts et al. 1996; Roberts and Rosen 2009), without dense or extensive forest cover (Asouti and Kabukcu 2014:Fig.10; Schoop 2005a:19); the Lake District is more mountainous and wooded and features a number of intra-montane lakes, some of them salt lakes (DeCupere et al. 2015:2; Kuzucuoğlu 2002:33-34); Cappadocia is also wooded and rocky (Kuzucuoğlu 2002:33-34), and features obsidian, ores and minerals that were used by prehistoric peoples (Düring 2011c:Fig.1.2). All three regions, especially the fragmented mountain landscapes of Cappadocia (Özbaşaran 2011:100) and the Lake District, further in themselves represent a patchwork of microhabitats, so that it would be incorrect to portray the three regions as geographically distinct blocks.

Neither are there clear-cut cultural borders. In standard publications discussing the Anatolian Neolithic and Chalcolithic over the last 15 years, Cappadocia and the Konya plain are seen as somewhat of a unit ('central/Central Anatolia'). That the Konya plain and Cappadocia can be discussed together as one region, but separately from the Lake District (cf. Marciniak 2008a:98), has been accepted without further discussion in recent synthesising volumes on Anatolian prehistory, such as CANeW

(the Central Anatolian e-Workshop; Gérard and Thissen 2002a:1; Kuzucuoğlu 2002:33; also Düring 2011c; Sagona 2009:112-113; Schoop 2005a:18-19, 2011b:153). Chapter 3 will, however, demonstrate that cultural affiliations fluctuated throughout prehistory. Between 8500 and 6500 BC, there is a clear cultural boundary between the Konya plain and Cappadocia on the one hand, and the Lake District on the other, which remained hunter-gatherer territory while farmers lived in central Anatolia since 8500 BC (3.2.1). The Beyşehir/ Seydişehir region at the eastern fringe of the lakes region became Neolithic together with the Konya plain proper and Cappadocia (Süberde, from 7600 BC; Thissen 2002a:324) (Thissen 2002a:324), and is therefore by archaeology included in the Konya plain although these sites are located near lakes (Düring 2011c:49; Duru 1999b:186). At the same time, there might be important cultural differences between the Konya plain and Cappadocia, for example the contemporary sites of Boncuklu and Aşıklı Höyük are very different: Boncuklu Höyük was much smaller, and did not have the clustered layout typical of Aşıklı Höyük (from Level 2); Section 3.2.2 will explore how this might indicate different styles of community-making. The Lake District started farming after 6500 BC, but it is as yet unclear whether any people, animals or ideas originating from central Anatolia were involved in this transition (3.3.1). After 6500 BC, the three regions studied here were part of a cultural exchange zone that also included the coastal areas of western Anatolia. During the Early Chalcolithic, the Lake District and Konya plain shared a painted pottery tradition that did not reach Cappadocia (3.3.1, 3.3.3). My decision to include the Lake District in my research sample is based on these cultural contacts during the LN and EC. In the Middle Chalcolithic, the Lake District and Konya plain might both have been inhabited mostly or exclusively by mobile peoples, while socially stratified settlements emerged in Cappadocia (3.4.1). By the EBA, all three regions had cultural affiliations with a wider region within Asia Minor (3.6.1).

In conclusion, all three regions at different times might have shared cultural traits at different points in the 5000 years of prehistory, but all are also distinct from each other throughout much of that period; further, they might have shared traits with regions outside southcentral Anatolia, an understanding of which is however often

hampered by the fact that the directly adjacent regions are poorly researched (the south coast; the highlands east of western Anatolia; the area north of the Konya plain; see Chapter 3, Figures 14, 18). And last, it should not be assumed that sites and communities were necessarily similar even within each of these three regions in southcentral Anatolia. As a result, the geographic borders chosen for this research project are defined using important geographic features as corner points and drawing on the knowledge on cultural and geographical differences outlines there. They represent a region that features enough cultural exchange and similarities during the Late Neolithic and Early Chalcolithic to be researched together, but my research strategy (Chapters 4-5) needs to acknowledge that southcentral Anatolia was never culturally homogenous.

For the purpose of this thesis, the Konya plain is delineated in the south by the Taurus foothills, in the northeast by the Kızılırmak, in the north by an imagined line from the northern shore of Tuz Gölü to Lake Akşehir, in the west by the eastern shores and plains of Lakes Akşehir, Beyşehir and Seydişehir, and in the east by the hills and mountains of Cappadocia. Cappadocia is limited by the Kızılırmak in the north; in the south by the Taurus mountains, which run on an angle from the coast towards the northeast; and in the east by an imagined line from Kayseri to Mersin, separating it from the non-volcanic regions further east. The Lake District in this thesis reaches to the Taurus foothills in the south, and otherwise ends at an arbitrary line around the lakes, including the plains around the lakes: Acıgöl, Salda Gölü, Eber Gölü, Işıklı Gölü, Beyşehir Gölü, Suğla Gölü. Chapter 3 will show that in reality, the coverage of Neolithic/ Chalcolithic excavation is however less extensive than the here indicated areas. For example, in the Lake District, most excavated Neolithic/ Chalcolithic sites are located in the southern reaches of the district around modern Burdur and Bucak. This makes the Burdur/ Bucak area the region with the currently densest cover of excavated Neolithic/ Chalcolithic sites in Asia Minor (Düring 2011c:160; Duru 2012:21), but leaves much of the northern part unexplored.

| Years BC | CANew, Roger Matthews (Özbaşaran and Buitenhuis 2002:Tab.1) for central Anatolia | CANew, Mihriban Özbaşaran and Hijlke Buitenhuis (2002:Tab.2) for central Anatolia | Duru (2008:7-8, 23, 69, 122, 145) for the Lake District | Sagona and Zimansky (2009) for all Anatolia | Yakar (2011a:Tab. 4.1, Tab. 4.2)for all Anatolia | Schoop (2011b:153, 157, 161) for the central Anatolian Chalcolithic | Düring (2011c:Table 5.1) for central Anatolia | Baird (2012a:Tab.23.1) for all Anatolia |
|---------------|--|---|---|---|--|---|---|---|
| 13,000-10,000 | Epipalaeolithic | Late or Epi-Palaeolithic | Epipalaeolithic | Epipalaeolithic | Epipalaeolithic | [not commented on] | Epipalaeolithic | Epipalaeolithic |
| 10,000-9500 | | | | | | | | |
| 9500-9000 | | | | | | | | |
| 9000-8500 | Aceramic Neolithic | Aceramic Neolithic | Epipalaeolithic | Pre-Pottery Neolithic | [time of beginning not indicated] Early Aceramic Neolithic | [not commented on] | Epipalaeolithic | Epipalaeolithic |
| 8500-8000 | | | | | | | | |
| 8000-7500 | Early Pottery Neolithic | Neolithic | Early Neolithic | Pre-Pottery Neolithic | Late Aceramic Neolithic | [not commented on] | Aceramic Neolithic | Aceramic Neolithic |
| 7500-7000 | | | | | | | | |
| 7000-6500 | | | | | | | | |
| | Late Neolithic | | | Pottery Neolithic | Ceramic Neolithic | | Early Ceramic Neolithic | Ceramic Neolithic |

| | | | | | | | | | |
|------------------|---------------------|---------------------|-----------------------|---------------------|---|---------------------|------------------------|---------------------|------------------|
| 6500-6000 | | | | | | | Late Ceramic Neolithic | | |
| 6000-5500 | Early Chalcolithic | Early Chalcolithic | Late Neolithic | Early Chalcolithic | Early Chalcolithic | Early Chalcolithic | Early Chalcolithic | Early Chalcolithic | |
| | | | Early Chalcolithic | | | | | | |
| 5500-5000 | Middle Chalcolithic | Middle Chalcolithic | [Middle Chalcolithic] | Middle Chalcolithic | Middle Chalcolithic | Middle Chalcolithic | Middle Chalcolithic | Middle Chalcolithic | |
| 5000-4500 | | | | | | | | | |
| 4500-4000 | | | | | | | | | |
| 4000-3500 | [not commented on] | [not commented on] | Late Chalcolithic | Late Chalcolithic | [date for MC-LC transition not indicated] | Late Chalcolithic | Late Chalcolithic | Late Chalcolithic | |
| 3500-3000 | | | | | | | | | |
| 3000-2500 | | | Early Bronze Age | Early Bronze Age | Early Bronze Age | Early Bronze Age | Early Bronze Age | Early Bronze Age | Early Bronze Age |
| 2500-2000 | | | | | | | | | |

Figure 2 The periodisation of Anatolian prehistory discussed in the literature.

2.2 Time

All models are wrong, some models are useful. (Box 1979:202)

Chronology, meaning the sequence, start and duration of cultural stages and the dating of individual sites and layers, is among the most debated issues in southcentral Anatolian prehistory. Three chronology-related decisions had to be made in this thesis. First, to choose among the conflicting periodisation systems that subdivide Anatolian prehistory (2.2.1). Second, it was necessary to define the start and end date of a time period that, as reliably as can currently be determined, represents a meaningful chronological unit for comparative research (2.2.2). Third, and most importantly, how to date individual site and occupation level that fall within the temporal scope defined in Section 2.2.2 (2.2.3). All three sections rely on chronology debates summarised in the newest relevant literature (Düring 2011c; Duru 2008, 2012; Özbaşaran and Buitenhuis 2002; Sagona and Zimansky 2009; Schoop 2011b; Thissen 2002a, 2010; Yakar 2011a), and occasionally additional site-specific reading.

2.2.1 Periodisation

Archaeology in southcentral Anatolia uses a version of the four-stage model (Stone Age, Copper-Stone Age, Bronze Age, Iron Age) that is used all across the Near East. This stage model was originally developed as a shorthand chronological system for European prehistory in the very early years of archaeological research, but successively became associated with cultural-evolutionary content (Düring 2011c:128; Schoop 2005a:14-15). That is problematic for a number of reasons; among others, specifically for the context researched here, the established period boundaries are incongruent with the current knowledge of major turning points in the cultural sequence in prehistoric Anatolia (Düring 2011c:127; Yakar 2011a:58). This is not surprising, since period boundaries were established decades ago, when considerably less was known about prehistory (Özbaşaran and Buitenhuis 2002:67)

and archaeological research was conducted under different premises. As an example, the division of the Late Neolithic (Stone Age) and Early Chalcolithic (Copper-Stone Age) was in the Anatolian centre originally defined based on the appearance of painted pottery (Rosenstock et al. 2016:6; Schoop 2011b:151), not copper, making for a confusing period name (see Rosenstock et al. 2016:1-7 for a longer review on the intellectual history of the Chalcolithic); and newer research has indicated that apart from the pottery change, there was no substantial change between the Late Neolithic and Early Chalcolithic that might justify a subdivision into two period (2.2.2). As a result of these issues, this thesis will employ denominations such as ‘Early Chalcolithic’ without inferring any cultural content, but use them as shorthand terms to refer to ‘the time period between 6000 and 5500 BC’³.

Conflicting periodisation schemes exist within archaeology in southcentral Anatolia (Figure 2). In the recent literature, the CANeW group has suggested two slightly different periodisation schemes for central Anatolia. Sagona and Zimansky (2009), use a system reminiscent of the CANeW central Anatolian system for all of Anatolia. Similarly, Baird’s (2012a:Table 23.1) chronology for the Anatolian plateau (in this case comprising most of Asia Minor, Baird 2012a:431) is essentially based on central Anatolian evidence. Yakar (2011a) also attempts to establish a system for all Anatolia, which explains his rather vague absolute dating of periods. Interestingly, works by Schoop (2005a) and Thissen (Thissen 2002a, 2010) dedicated specifically to sorting out southcentral Anatolian chronology do not present any periodisation systems, instead working with site-specific sequences—although Schoop (2011b) defines clear phase boundaries for central Anatolia. Düring’s (2011c) system for central Anatolia best reflects the most current view on the cultural development of central Anatolian prehistory as outlined in Chapter 3 and will therefore be adopted here (Table 3) with one adjustment: Aceramic Neolithic and Early Ceramic Neolithic are subsumed as ‘Early Neolithic’ because despite the introduction of pottery, no major cultural change has been identified around 7000 BC.

³ All dates written ‘BC’ throughout the thesis will refer to dates cal. BC, unless stated otherwise. They also all carry an invisible ‘ca.’ which acknowledges the error margin of radiocarbon dating and the complexity of cultural processes in the past which cannot always be pinned down to a certain date or time span.

Adopting Duru’s (2008) Lake District periodisation for this thesis is not possible without adjustments since evidence for the start of the Neolithic around 8000 BC is ambiguous and until proven otherwise, 6500 BC should be seen as the baseline for the start of farming in the region (Appendix 1, Chapter 3.3.1). Assuming 6500 BC as the start of the Neolithic in the Lake District changes the Duru periodisation to one that closely resembles that of Düring for central Anatolia in terms of phase boundaries, fits the Lake District developed outlined in Chapter 3, and can therefore be adopted here. Additional confusion is added by the naming of phases; as already shortly discussed above: For understandable reasons, Duru (2008) refers to the earliest farming villages in the Lake District as ‘Early Neolithic’, which makes the Lake District Early Neolithic contemporary to the central Anatolian Late Neolithic. To make things simpler, and since period names are used in this thesis only as a shorthand to refer to a time frame in calendrical dates without the period name necessarily mirroring a stage of cultural development, it was here decided to call 6500-6000 BC the ‘Late Neolithic’ in all three regions, with the Lake District shifting directly from the Epipalaeolithic to the Late Neolithic.

| period | duration |
|---|--------------------------------------|
| Epipalaeolithic | 20,000 BC until beginning of farming |
| Early Neolithic (EN) of central Anatolia | 8500 – 6500 BC |
| Late Neolithic (LN) | 6500 – 6000 BC |
| Early Chalcolithic (EC) | 6000 – 5500 BC |
| Middle Chalcolithic (MC) | 5500 – 4000 BC |
| Late Chalcolithic (LC) | 4000 – 3000 BC |
| Early Bronze Age (EBA) | 3000 – 2000 BC |

Table 2 Periodisation used in this thesis.

2.2.2 Defining the temporal scope

The starting point of this thesis is the site of Çatalhöyük West, where excavated areas have recently been dated to between 5900 and 5600 BC (Orton et al. in prep), or the Early Chalcolithic. Although traditionally 6000 BC was seen as an important chronological boundary with the onset of painted pottery (2.2.1), recent research in prehistoric central Anatolia and the Lake District has started to ignore the 6000 BC-

boundary and to treat the period between 6500 and 5500 BC, the Late Neolithic and Early Chalcolithic, as a unit of cultural development—a period with socio-cultural traits significantly different from the preceding Early Neolithic and the following Middle Chalcolithic, and without appreciable cultural breaks during the millennium in between. This thesis will adopt this newly identified cultural period as the focus of its research.

The notion that 6000 BC was not a major point of change is not exactly new (Düring 2006:17; Mellaart 1975:111; Özbaşaran and Buitenhuis 2002:71), and the Early Chalcolithic (EC), “a somewhat obscure period” (Sagona and Zimansky 2009:124), has since its definition often been discussed in conjunction with the preceding Neolithic because similar socio-economic structures were observed (e.g. Düring 2011b:796; Mellaart 1975:111; Schoop 2011b:166). But more recently it has become obvious that a real cultural turning point occurred around 6500 BC, making the last 500 years of the Neolithic, here called the Late Neolithic (LN), different from the Early Neolithic. Accordingly, in his textbook on *The Prehistory of Asia Minor*, Düring (2011c) treats the Late Neolithic and Early Chalcolithic as one period (6500-5500 BC). This was, in his view, “a period of profound transformations in the Prehistory of Asia Minor with ramifications far beyond the peninsula” (Düring 2011c:122). A main reason for viewing 6500 BC as a turning point is that at this time Neolithic lifeways started spreading to western and northwestern Anatolia, after not having moved past central Anatolia for 2000 years. Düring (2011c:122) argues that this spread not only fundamentally transformed the newly neolithised areas, among them the Lake District (Chapter 3.3.1), but also points to profound social and cultural changes in central Anatolia, one suggested area of origin for those farmers who migrated west. Recent research at Çatalhöyük (Hodder 2014b) has indeed collected compelling evidence for profound changes around the 6500 BC (Chapter 3.3.3), while the following centuries show continuity at the site across the 6000 BC mark (Biehl et al. 2012a). In Cappadocia, a majority of existing settlements had been abandoned by 6500 BC, and new settlements were founded in new localities during the Early Chalcolithic (Allcock and Roberts 2014:47; Özbaşaran 2011:119; Sagona and Zimansky 2009:124) with Köşk Höyük and Gelveri being two examples.

Following 6500 BC, no major cultural break can be observed in the three regions until around 5500 BC: As Section 2.2.3 (Figure 3) will show, and Section 3.3 will contextualise, the current stage of research indicates that all settlements in southcentral Anatolia that existed during the Early Chalcolithic are abandoned in the centuries before 5500 BC, pointing to important socio-economic changes. No sites whatsoever dating to the MC were found in the Lake District (Vandam 2015), and the only traces of human presence found in the Konya plain during the following 1500 years probably belong to nomadic groups (Düring 2011b:801-802). In Cappadocia, after two settlements are founded newly, or reoccupied, around 5200 BC, but there still is a clear gap of several centuries around 5500 BC from which no settlements are known (see chronology of Köşk Höyük, Appendix 1; Allcock and Roberts 2014:Tab.2). I thus see a relatively good evidence basis for the interpretation that important cultural changes occurred around 5500 BC, and adopt this as the border of my research scope, but there are alternative opinions in the literature. Rosenstock (2014:Fig. 10) shows that MC site distribution is similar to that of the LN/EC, which might contradict the hypothesis of significant socio-economic changes. Contrary to Düring (2011c), the other recent textbook on prehistoric Anatolian archaeology by Sagona and Zimansky (2009:124) groups the EC with the MC, seeing them united by their “obscure” status in current research and their status as a period “between the two ‘revolutions’ – agricultural and urban –” and thus “important as the seedbed for aspects of complexity that led to major socio-political changes in the late fourth millennium BC”. Similarly, Yakar (2011a:59) sees the EC continuing until 5000 BC. And yet differently, Baird (2012a:Tab. 23.1) has 5400 BC as the border between Early and Middle Chalcolithic, but does not explain why. The 5500 BC-change is therefore much less well understood than the 6500 BC-change and might have been more gradual.

2.2.3 Site chronologies

Relative chronology. This heading means, as ever, pots— a veritable minefield.
(French 2010:168)

Many Neolithic and Chalcolithic sites in southcentral Anatolia are not securely dated. For a research project that compares evidence from different sites and researches developments over time, this presents the real danger of working within a faulty comparative framework. For this reason, I conducted a systematic review of available chronological information (Appendix 1) in order to construct a chronological framework for this thesis. Except for a set of new radiocarbon dates from Çatalhöyük West, all knowledge used for this framework is published, but fragmented between many different sources. If obtaining a comprehensive of southcentral Anatolian chronology is a time-consuming task that necessitates consulting a range of sources in different languages, there is the danger that it will be avoided, resulting in research based on incorrect chronological premises as in Arbuckle et al. (2014), Clare et al. (2008), and Selover (2015:Fig.0.2). This was an incentive for me to conduct a review of existing chronological data (radiocarbon dates, pottery chronology, stratigraphy) and to create a chronological framework that is as reliable as currently possible (Figure 3).

The main reason for the poor chronological resolution of the southcentral Anatolian Neolithic/ Chalcolithic is a general scarcity of radiocarbon dates: outside of Çatalhöyük, there are only 49 radiocarbon dates and 16 dendrochronological dates available from all sites and the entire millennium covered by this thesis (Appendix 1). Some sites were excavated before radiocarbon dating had the undisputed status it has today; and many now active Turkish teams continue to rely on relative dating (pottery typology and stratigraphy) and only produce a handful of radiocarbon dates. Such a scarcity of absolute dates seriously impairs research aiming to study social change ‘in real time’, which ideally would use chronological resolution that dates every building and building phase to within a decade. That this is theoretically possible for European/Near Eastern prehistory is demonstrated by new radiocarbon dating programs, for example the one currently underway at Çatalhöyük (Bayliss et

al. 2015; Marciniak et al. 2015b) which uses Bayesian modelling on a consistent series of dates from well-chosen contexts at strategic points in the stratigraphic sequence and is able to date events such as house construction or abandonment securely within a period of 10 to 50 years (Bayliss et al. 2014:58-60). The existing dating framework at other sites is, however, considerably less thorough. Unfortunately, this leads to a situation similar to that so well described and criticised by Bayliss et al. (2007:2-3) for British prehistory, where a lack of precise dating allows a study of cultural change to work only with very rough brushstrokes.

A more significant issue than the low resolution of dating is that the dating of levels and sites, relying on relative dating and low-quality radiocarbon dates, can sometimes err by centuries or even millennia. Examples are two radiocarbon dates from Hacilar and Bademağacı indicating very early occupation (7800 BC and 7000 BC), but both are unreliable because of insecure finds contexts (Appendix 1) and the use of charcoal for dating, which is a problematic dating material in the centre of Anatolia, where wood was often reused for considerable period of time ('old wood effect'; Thissen 2002a:334). The general scarcity of radiocarbon dates has, however, led to reluctance to discard ambiguous dates from the research process. There is also sometimes an overreliance on relative dating tools, for example Duru (1989c, 2012:22-23) works from the assumption that red-painted plaster floors in the Lake District must be roughly contemporary.

Thus working from different premises, my chronology in parts varies considerably from those used by the excavators of the site. When site chronologies were changed taking into account newer information pointed out by various researchers, this generally led to sequences becoming shorter than suggested by the excavators; for example, Hacilar was probably occupied for less than 700 years rather than spanning a total of 2000 years suggested by Mellaart (1970c:94); or Höyücek represents 500 years or less of prehistoric life rather than the 1300 years anticipated by Duru and Umurtak (2005:226-228). For a site-comparative study of culture change, this reappraisal of site chronologies means two things: observed cultural/social changes might have happened faster than previously thought; and developments at different sites that were previously thought to be contemporary

might not have been, and vice versa. Using a different chronology than previous research did, it is likely that I will arrive at different interpretations of the rate and sequence of change throughout the centuries 6500 and 5500 BC in southcentral Anatolia.

2.3 Conclusion

This thesis researches architecture excavated at sites in three regions areas in southcentral Anatolia: the Konya plain and Cappadocia, which the archaeological research tradition combines into 'central Anatolia' although there are important differences in their cultural trajectories; and the Lake District, which in prehistory, as well as in the tradition of archaeological research, followed somewhat distinct, developments. The period covered is 6500-5500 BC, which includes the Late Neolithic and Early Chalcolithic in traditional periodisation systems. Newer research has shown that this period was an important stage in the cultural development of prehistoric southcentral Anatolia, with important socio-economic changes distinguishing it from the period pre-6500 BC (the Early Neolithic), and also from post-5500 BC (the Middle and Late Chalcolithic). Within this chosen research scope, there are important differences in architecture and social organisation between sites, regions, and changes in material culture over the duration of the millennium in question, and these need to be acknowledged in a comparative research project.

In total, 11 sites in southcentral Anatolia have excavated layers of occupation dating to between 6500-5500 BC (Figure 3). Their architecture is the subject of this thesis: Hacilar, Kuruçay Höyük, Höyücek, Bademağacı in the Lake District; the uppermost levels of Çatalhöyük East as well as Çatalhöyük West, Erbaba, Pınarbaşı and Canhasan I⁴ on the Konya plain; and Köşk Höyük, Tepecik and Gerveri in Cappadocia. More sites are known from surveys (Allcock and Robert 2014; Baird 2005; Vandam 2015) but, since this thesis researches architecture, unexcavated sites lie outside its scope.

⁴ Henceforth, 'Canhasan' will in this thesis refer to the mound of Canhasan I unless stated otherwise.

| | Hacılar | Kuruçay Höyük | Höyücek | Bademağacı | Erbaba | Çatalhöyük East | Çatalhöyük West | Pınarbaşı | Canhasan I | Köşk Höyük | Tepecik | Gelveri | Musular |
|---------|----------|---------------|---------|------------|--------|-----------------------------|-----------------|-----------|------------|------------|---------|---------|---------|
| 5300 BC | | | | | | | | | | | | | |
| 5400 BC | | | | | | | | | | | | | |
| 5500 BC | | | | | | | | | | | | | |
| 5600 BC | | | | | | | | | | | | | |
| 5700 BC | Ic-d | | | | | | | | | | | | |
| 5800 BC | Ia-b | | MA | | | | | | | | | | |
| 5900 BC | | 7 | | | | | | | | | | | |
| 6000 BC | V-II | 12-8 | SP | LN, EC | | TP | | | | | | | |
| 6100 BC | | 13 | ShP | | 2-1 | South P-T, North H-J, TP | | Area B | | | | | |
| 6200 BC | IX-VI | | ESP | EN II | | | | | | | | | |
| 6300 BC | | | | | | | | | | | | | |
| 6400 BC | Aceramic | | | EN I | | South N-0 / North G | | | | | | | |
| 6500 BC | | | | | 3 | South M-L, North F | | | | | | | |
| 6600 BC | | | | | | | | | | | | | |

Figure 3 Dating of layers and sites occupied between 6500-5500 BC in southcentral Anatolia based on Appendix 1.
 Dark grey: radiocarbon dates attest occupation in this century. Light grey: relative dating has attested occupation in this period.

Chapter 3 SOCIAL ORGANISATION IN CENTRAL ANATOLIA AND THE LAKE DISTRICT 8500-3000 BC: THE CURRENT STATE OF RESEARCH

3.1 Introduction

The purpose of this chapter is to first, summarise existing knowledge on some of the main features of the development of social organisation from the start of the Early Neolithic into the EBA, with special attention to important non-architectural evidence that forms the framework for discussing the architectural evidence whose main features are introduced here, but which will be discussed in much greater detail throughout Chapters 6-9. This chapter deliberately focuses on themes, issues and sites that will form the main storyline of this thesis such as the development of social stratification that will become a nodal point of my research into the LN and EC for reasons summarised in 3.3.6. Second, to introduce sites that will be discussed throughout the rest of this thesis in their geographical-chronological context before drawing on them and their material during the following chapters. And third, to clarify terms for the discussions in Chapters 6-10, such as 'household' or 'mobility'. As mentioned in Chapter 1, I define these terms based on the literature consulted in this chapter in order to find context-appropriate definitions that capture the southcentral Anatolian prehistoric reality. This chapter also points out cultural features or trends that are shared or not shared between the Lake District, Konya plain and Cappadocia, in order to continue arguing the point (Chapter 2) that these regions followed slightly different trajectories during the Neolithic and Chalcolithic.

3.2 8500-6500 BC: Early Neolithic central Anatolia and hunter-gatherers of the Lake District

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Figure 4 Early Neolithic sites in Asia Minor, 8500-6500 BC (Düring 2011c:Fig. 4.1). 1 Boncuklu Höyük, 2 Çatalhöyük, 3 Pınarbaşı, 4 Canhasan, 5 Aşıklı Höyük, 6 Musular, 7 Kaletepe, 8 Süberde. Obsidian sources: a Göllü Dağ, b Nenezi Dağ, c Sakaeli, d Yağlar. Pınarbaşı Bor is located south of Aşıklı Höyük.

Early Neolithic sites: an overview

Nine Early Neolithic sites have been excavated in central Anatolia (Figure 5). Among these, Kaletepe represents an obsidian workshop without traces of settlement (Balkan-Atlı and Binder 2012; Balkan-Atlı et al. 1999). Pınarbaşı-Bor, excavated for only one season in 1982 (Silistreli 1984b), and Süberde, excavated only through test trenches (1964-1965, Bordaz 1969b:Fig.2), have produced very limited evidence about settlement and social organisation (Düring 2011c:80). Canhasan III (7650 to 6600 BC, Thissen 2002a:324) is only known from limited investigations (Düring 2006:114). This discussion of Early Neolithic village community organisation is therefore based on evidence from Çatalhöyük, Aşıklı Höyük, Musular, Pınarbaşı and Boncuklu Höyük. Among these, the discussion of the central Anatolian Early Neolithic is traditionally dominated by the evidence from the two large and well-researched sites: Aşıklı Höyük and Çatalhöyük, whereby Aşıklı Höyük (8400-7400

BC), is the main source of evidence for the first millennium of the Early Neolithic, while Çatalhöyük (7400-5950 BC, Appendix 1) represents the second half as well as the Late Neolithic. The smaller site of Musular seems to have been a special-purpose satellite site that was used periodically by the communities at Aşıklı Höyük and Çatalhöyük respectively. Pınarbaşı, Boncuklu Höyük and the lower levels of Aşıklı Höyük, the latter two currently under excavation, provide insight into the genesis of large, complex villages such as Aşıklı Höyük Levels 2-1 and Çatalhöyük.

3.2.1 The neolithisation of central Anatolia

A discussion of the neolithisation process will be kept here to a bare minimum. It is essentially two points that need to be discussed as a basis for the following. First, central Anatolia was neolithised by at least 8400 BC, but the Lake District not until ca. 6500 BC and this difference of cultural development pre-6500 BC must have had an, although not yet understood, influence on processes post-6500 BC. The oldest farming sites in central Anatolia are Aşıklı Höyük in Cappadocia, and Boncuklu Höyük in the Konya plain. Boncuklu and the oldest levels at Aşıklı Höyük are under excavation (Baird et al. 2012; Özbaşaran and Duru 2015; Quade et al. 2014; Stiner et al. 2014), and therefore knowledge about how settled life and farming started in central Anatolia is currently subject to revision. The newest radiocarbon dates from Aşıklı Höyük attest occupation from at least 8400 BC (Quade et al. 2014; Stiner et al. 2014:Fig.S1), but there still are unexcavated deposits of substantial thickness below the layers dated to this time horizon. The beginning of Aşıklı Höyük might therefore predate Boncuklu Höyük, dated 8400-7800 BC (Baird 2014:8703), by several centuries. Farming, in form of evidence for domesticated plants or animals or at least for herding/ cultivating, starts in Boncuklu at 8400 BC (domestic cereals and possibly legumes, Baird 2012a:440; Baird et al. 2012:228-230), and at Aşıklı possibly in 8200 BC with sheep and goat management (Baird 2012a:440, 2014; Düring 2011c:60; Stiner et al. 2014), but at least by 8000 BC when domesticated crops are present (Stiner et al. 2014:8405).

While farming villages started in central Anatolia, hunter-gatherer lifestyle persisted

in the Lake District until around 6500 BC. As discussed in the previous chapter, two radiocarbon dates from Bademağacı and Hacılar predate 6500 BC, but both are problematic and the most likely scenario remains that no farmers settled in the Lake District before 6500 BC (see longer discussion in 3.1.1). In other words, for a period of nearly 2000 years, a cultural border persisted at the fringe of the Lake District, with farmers on one side and hunter-gathers occupying the areas around the lakes and further west (Brami 2014a; Schoop 2005b). Unfortunately, we know close to nothing about these Lake District hunter-gatherers. Not much is known in general about Epipalaeolithic Anatolia, and in the Lake District itself only two Epipalaeolithic sites have been cursorily excavated and incompletely published: a short excavation at the cave site Dereköy near Isparta in 1991 revealed “Late Palaeolithic” material, which is however not precisely dated or detailed enough to interpret social organisation (Vermeersch et al. 2000). At Baradiz, a shallow open air site located between the Eğirdir and Burdur lakes, two small trenches were excavated in 1944. A recent study (Düring 2011c:42; Kartal 2003:46-47) has questioned the Epipalaeolithic dating of the lithics. In any case, the archaeological documentation of Baradiz is not sufficient to reconstruct its social organisation. A recent survey in the Burdur plain found only one other possible Epipalaeolithic site (Vandam and Kaptijn 2015:166). The absence of information about life in the Lake District prior to 6500 BC unfortunately leaves unanswered such fundamental questions as to why they chose to not take up farming and what the relation of Lake District hunter-gatherers with their farming neighbours was. At Epipalaeolithic hunter-gatherer cave sites in the mountains south of the Lake District, Öküzini, Beldibi and Belbaşı, evidence for contact with farmers has been found in the form of ceramics, polished axes and cultivated plants (Düring 2011c:36-38; Martinoli 2004:69-71), and it is possible that Lake District foragers also exchanged with farmers. This cultural border, although incompletely understood, must have had an impact on social processes after 6500 BC, and this will be returned to in the following section on the Late Neolithic.

A second important point to make here is that while important impetuses for the uptake of farming, and possibly also domesticated species (Baird 2012a:440; Baird

et al. 2012:219; Colledge et al. 2004; Düring 2011c:74), came from Upper Mesopotamia to central Anatolia, important cultural components of the central Anatolian Neolithic were developed autochthonously and continued from the preceding Epipalaeolithic (Baird 2012a:433, 435, 440; Baird et al. 2012:219; Düring 2011c:51, 73-74, 121; Sagona and Zimanksy 2009:54). Importantly, this included building traditions and an influence of these on the genesis of Early Neolithic farmers will be discussed in the following section. Düring (2011c:74, similarly Baird 2012a:440) interprets that the adoption of a new economy, together with related items (domestic plant and possibly animal species), went along with the non-adoption of cultural traits and thus a conscious decision by early central Anatolian farmers to be culturally different from the Fertile Crescent.

Contact between hunter-gatherers of central Anatolia and farmers of the Fertile Crescent might have evolved around the exchange of obsidian and initiated the neolithisation of central Anatolia (Baird 2012a:441). Two neighbouring sources of obsidian in Cappadocia (Nenezi Dağ and Göllü Dağ) were used in prehistory. Göllü Dağ obsidian is found in the southern Levant and Upper Mesopotamia, transported over distances of up to 900km since the Epipalaeolithic (ca. 14,000 BC) and would have fostered continuous contacts between what would become the earliest farming societies in the Near East. In the Pre-Pottery Neolithic (PPNA, PPNB) the amount of obsidian crossing the Taurus southwards increased, and by the PPNB, it is also found on Cyprus (Düring 2011c:52-54; Sagona and Zimanksy 2009:73). Aşıklı Höyük is located in a fertile river landscape only ca. 30km away from the obsidian sources at Nenezi Dağ and Göllü Dağ (Düring 2011c:58). The episodic presence of knapping specialists from the Fertile Crescent at the Kaletepe workshop at Göllü Dağ (8300-7800 BC) has been deduced from the observation of co-existing local and foreign knapping traditions (Balkan-Atlı and Binder 2012; Binder and Balkan-Atlı 2001; Düring 2011c:56). It is therefore likely that there was a connection between obsidian trading networks and neolithisation processes (Baird 2012a:441, 462).

Significantly, the above mentioned cultural border between central Anatolia and the Lake District that existed throughout the Early Neolithic might also have been linked to obsidian exchange networks. Sites in the Konya plain relied on

Cappadocian obsidian since the Epipaleolithic. At Pınarbaşı, at ca. 12,000 BC 90% of the lithic assemblage was made up from Cappadocian obsidian (Baird 2012b:186; Düring 2011c:43-44). More than 95% of the lithic assemblage at Early Neolithic Çatalhöyük is comprised of Cappadocian obsidian (Carter and Milić 2013; Düring 2011c:90). Cappadocian obsidian also dominates the assemblages at Boncuklu (Baird et al. 2012:231) and Canhasan III (Sagona and Zimansky 2009:76). Even at Süberde, at the western fringe of the Konya plain, obsidian made up 90% of the assemblage (Özbaşaran 2011:113) even though transporting it over such distances must have required considerable effort, as evidenced by the fact that the Süberde obsidian is used and re-used intensively (Sagona and Zimansky 2009:76). On the other hand, hardly any obsidian can be found prior to 6500 BC beyond the parts of southcentral Anatolia that were neolithised around 8500 BC. There is very little obsidian at Dereköy (Vermeesch et al. 2000:451, 458) in the Lake District, and very little at Öküzini south of the Lake District (Baird 2012a:437; Carter et al. 2011; Düring 2011c:44). It seems, then, that the expanse of the first neolithisation process in southcentral Anatolia was to a remarkable degree congruent with the extent of the spread of Cappadocian obsidian prior to and after neolithisation. Even if the exact mechanisms by which they worked remain unclear, obsidian exchange networks might have played an important role during the adoption of Neolithic lifeways in central Anatolia.

3.2.2 Making households, making communities

Really one of the most interesting features of the Early Neolithic central Anatolia settlements at Aşıklı Höyük and Çatalhöyük is their size. Both settlements were occupied without interruptions for long periods of time by populations estimated to have been in the thousands. Long occupation by large numbers of people resulted in mounds of substantial size: Aşıklı Höyük measures 4ha with a height of 15m (Düring 2011c:58), and Çatalhöyük 13ha with a height of 21m (Farid 2014:91. Canhasan III is smaller, but still of substantial size at 1ha and 6.75 m height (Düring 2006:114). The Aşıklı and Çatalhöyük settlements both grew over the centuries, with Çatalhöyük reaching its maximum size in Level IV around 6400-6500 BC (Düring

2011c:118; Hodder 2014b:11), and Aşıklı probably around 8000 BC (start of Level 2, Stiner et al. 2014:8405). Population estimates, notoriously difficult for such large prehistoric sites where the number of residents per building is as much subject of speculation as the number of contemporarily used houses, given that only a small percentage of these large sites can be excavated, range between 1500-3000 people for Aşıklı Höyük (Düring 2011c:71), 3500-8000 for Çatalhöyük (Düring 2011c:118; Hodder and Cessford 2004:21) and a very tentative 660-1250 people for Canhasan III (Düring 2006:125) at the heights of their occupation. Such sizes for permanently cohabiting communities were unparalleled: earlier and contemporary settlements in the Fertile Crescent did not exceed 300 people (Düring 2011c:119, 121).

The Early Neolithic sites of central Anatolia can therefore be characterised as a social experiment without precedent. These settlements exceeded group sizes that could rely on face-to-face interaction, but instead required different mechanisms of social integration to form a communal identity, keep social peace and distribute resources (Düring 2011c:119). And the fact that these communities existed over several centuries, with seemingly little alteration to their social makeup, attests to the existence of a sustainable and complex set of social rules (Hodder and Cessford 2004:20). How did the Early Neolithic communities organise themselves? This section will show that in the Early Neolithic, central Anatolians were developing ordering principles of society that would continue to be important throughout later prehistory: social cohesion in these settlements was organised through a three-tier system of household, neighbourhood, and village community. Integral to this system, neighbourhoods or kins occupied the middle ground and organised households into larger units that made the large population more easily manageable on a village scale.

Households

Based on a comparison of Aşıklı Höyük and Çatalhöyük East, Düring has suggested that households as a social institution seem to have developed, or become more articulated, during the Early Neolithic. Düring (and Marciniak 2005; Düring

2011c:64, 67) concludes that because it is difficult to recognise individual household residences at Aşıklı Höyük, the built environment indicates that a cluster of buildings was used collectively by a neighbourhood group and households would not have been a socially or economically autonomous unit. By contrast, in the second half of the Early Neolithic, at Çatalhöyük, households were a more autonomous social unit (Düring and Marciniak 2005:177; Hodder 2014b): Different from the image at Aşıklı Höyük, household residences at Çatalhöyük took the form of large, often multi-roomed houses. Houses⁵ at Çatalhöyük, although still diverse, appear more standardised (Düring 2011c:97). The fact that the typical household residence at Çatalhöyük was comparatively large, and completely equipped with storage, cooking and sleeping facilities is interpreted by Düring (2011c:98) as evidence for economic independence of households who were able to perform “most domestic and some craft activities [...] within the residence” (Düring and Marciniak 2005:177). Hodder (2014b:6) describes a range of evidence to support this, for example each house features an obsidian caches, and storage bins as well as cooking and serving vessels are of small size, suggesting that food was not shared regularly beyond the residence group. Plant use and processing patterns suggest daily, small-scale processing of plant foods, and very similar ranges of plant foods were found in each building, further supporting the idea of autonomous consumption and processing of resources. Hodder and Cessford (2004:21-22) conclude that “production, exchange, and consumption at Çatalhöyük seem to be largely organized at the domestic scale” and that “the house is an important social, productive, and symbolic unit at Çatalhöyük”.

The dichotomy between a first half of the Early Neolithic without ‘real’ households that were socially and economically self-sufficient on a basic level, and a second half where such households existed, might be exaggerated when comparing Aşıklı Höyük with Çatalhöyük. For example, Baird (2012a:449) reconstructs the existence of distinct households at Boncuklu, using an argument similar to that of Düring about

⁵ The term house is in this thesis used synonymously with residence/ dwelling: a built structure used for living purposes (Düring 2011c:99; Duru 2012:25; Hodder 2014b:4; Öztan 2003:70; Steadman 2004:52). Building is a more general term for a built structure of any function—residence or other (Cutting 2005b:31; Düring 2011c:136; Hodder 2014b:4).

Çatalhöyük: residences appear relatively standardised, and each residence is equipped with a hearth, food production and sleeping areas. The Boncuklu team further sees evidence for “strong household identities” (Baird et al. 2012:235) in the house-related ritual observed at the site, such as a subdivision of the house into a ritual and a work part, or the place-permanence whereby houses were rebuilt in the same spot (Baird et al. 2012:234). There is even some evidence that the formation of households predates the adoption of farming: Pınarbaşı is a site with multiple episodes of settlement of which one dates between 8500-8000 BC, possibly also lasting until after 8000 BC (Baird 2012b:192), but does not feature clear evidence for farming; it might represent a transitional stage of a local community adopting a sedentary hunting lifestyle (Baird 2012a:433, 438, 440, 2012b:197-199; Fairbairn et al. 2014). At this transitional village of Pınarbaşı, buildings were similar in size and probably all had hearths and work areas (Baird 2012a:450); they could be reconstructed as household residences. This evidence is tentative because no building has been completely excavated (Baird 2012b:193), but Baird (2012b:198) seems to suggest that the process of becoming sedentary was what started the development of households as stable social units: “increased residential stability offered new opportunities for people exchange and family and household construction”. This suggests that at least at some sites, households as social units already existed early in the Early Neolithic, or even were a social feature inherited from local pre-Neolithic hunter-gatherer groups; possibly there are differences in Early Neolithic social organisation between the Konya plain and Cappadocia.

Returning to the significance of households for this thesis, the **household** can for southcentral Anatolian prehistory be defined as a stable co-residence group that pools resources, or in other words: a social unit that lives together and also constitutes a nuclear economic unit (Baird 2012a:455; Düring 2006:39, 2011c:64; Hodder and Pels 2010:181; Steadman 2004:531, 534). In the literature, a majority of authors (e.g. Baird 2012a:449; Cutting 2005b:Tab.10.4; Düring 2013a:29-30) seem to envisage the typical Chalcolithic/ Neolithic household as a family unit of around 4-6 people. This hypothesis had however until recently never been verified through studying the genetic relation of household members. Recent genetic results from

Çatalhöyük East now suggest that biological ties might not have been what determined household affiliation (Hodder 2014b:8): dental morphology combined with isotope studies (Larsen et al. 2015; Pilloud and Larsen 2011:39-41) indicate that people buried together were not related, but had similar diets, i.e. they ate together and probably also produced food together. These new results make it possible to think about Neolithic households completely differently; a number of different scenarios seem possible, from family-like 'fictive kin' groups (Hodder 2014b:8) that might have included a mixture of people with different genders and ages, to groupings collecting e.g. people from the same age group, or any other type of composition. The fact that the social groupings that were being formed during the Neolithic might intentionally have superseded biological ties is significant; one possible interpretation will be discussed below (Egalitarianism).

Reconstructing the composition of households is actually quite challenging for Anatolian prehistory; for example, in the above mentioned example of the Çatalhöyük genetic studies it is only possible to study groups that were buried together, but it is possible that this group did not form a household prior to death (Hodder 2014b:9). Formation processes typical of Neolithic/ Chalcolithic houses in the study area, whereby houses were often intentionally cleaned and modified before abandonment (Çatalhöyük: Matthews 2005a:Tab.9.3, 145-146; Russell et al. 2014; Canhasan 2b: French 1998:31-32), not all people were buried inside the settlement (only very few burials were found e.g. at Hacilar: Mellaart 1970c:88, Kuruçay: Duru 1994c:101) and those who were might sometimes not have been buried inside their own residence (Düring 2011c:110; Hodder 2014b:5) makes it seem likely that archaeologists will never have secure data to really know how households were constituted. During the remainder of the thesis, the focus will be firmly on discussing the relationship between households, not the details of their composition unless they relate to the autonomy question. The important thing to note here, then, is that households during the Early Neolithic came to form the basic social unit that made up communities for the remainder of Anatolian prehistory, organising individuals into groups that were building blocks for larger groups.

Communities and subcommunities

In Aşıklı and Çatalhöyük settlements were structured by subdividing them into intermediate groups; or, expressed differently: there were several levels of integration by which households were linked with each other to form subcommunities and finally a village community. To a maybe lesser extent, this can also be observed at Boncuklu Höyük and Canhasan III. Importantly, there seem to have been differences between these sites as to the nature of these suprahousehold ties. Two main principles can be identified: creating social ties through physical proximity (clustering), and through ritual ties that also have social and economic components. At all Early Neolithic settlement sites, both principles can be observed, although one might have been used stronger than the other; for example, there is considerably more evidence for house-related ritual at Çatalhöyük than at Aşıklı Höyük, but spatial clustering might have been used stronger as a social structuring mechanism at Aşıklı Höyük.

Clustering communities

A number of Early Neolithic to Early Chalcolithic sites in central Anatolia – Çatalhöyük, Aşıklı Höyük, Canhasan III, Erbaba and Canhasan I – have been characterised as clustered (Düring 2006). ‘Clustered communities’ describes as much the visual impression of the settlement layout, with tightly packed buildings that were entered through the roof (Düring 2011c:61, also 2006:23-24) as the effect this arrangement had on creating tight-knit communities by, first, creating roofscapes as communal areas; and second, by subdividing large communities spatially into smaller communities.

In a clustered neighbourhood settlement the absence of doors in most or all houses of a cluster indicates access through the roof, as evidenced at Çatalhöyük through the existence of ladders and assumed at Aşıklı and Canhasan III (Cutting 2005:41; Düring 2011c:63, 116; Özbaşaran 2011:107). Traffic to and from houses would therefore have been across the roofs of neighbouring houses, and the flat roofs are

also reconstructed as important activity areas for households to perform many of their daily tasks; the roofscape of clustered settlements fulfilled the same functions as courtyards in a non-clustered settlement (Düring 2011c:69, 116-117; Özbaşaran 2012:139; Özbaşaran and Duru 2015:48). On such roofscapes, social cohesion across household borders was created through first, informal socialising and second, social control. By informal socialising, I mean unplanned social encounters and exchanges that would have happened regularly throughout the day while people walked across roofscapes, or sat and worked on them. Given the sometimes small area-wise size of houses, roofs would presumably not have offered much privacy when they were used as work space and social space during the day. The necessarily ensuing, and maybe intended, sharing of daily activities, experiences, knowledge, social control and maybe resources on the roofscape would have produced intense social bonds (Düring 2011c:69, 117). Social proximity is thus created through physical proximity.

At the central Anatolian clustered settlements, individual blocks of houses are divided from each other through streets, alleys and middens at Aşıklı Höyük (Düring 2011c:61, 68; Özbaşaran 2011:108; Özbaşaran and Duru 2015:48); and through alleys, open spaces and middens (Düring 2011c:96) as well as terraces and linear break in the house landscape formed by an alignment of the outer walls of adjacent houses (Hodder 2014b:6, 8, Fig.4) at Çatalhöyük. There have been suggestions to associate this spatial subdivision with social subdivisions, and this seems to be most clearly evidenced at Aşıklı Höyük (Bıçakçı and Özbaşaran 2001; Cutting 2005b:41). Düring (2011c:62) interprets the clearly demarcated building/ room clusters, separated by alleys, as the residence of socially delineated neighbourhoods which constituted very important social units. Each Aşıklı Höyük house cluster was spatially closed off, featuring a gapless façade towards the outside, and was accessible only by ladder onto the roofscape. Maybe access to the roofscape of an Aşıklı Höyük neighbourhood cluster was even controlled and on the roofscape, people would spend most of their daily lives within the neighbourhood community (Düring 2011c:117). For one such neighbourhood, of which three (Düring 2006:Fig.4.10) have been at least partially excavated at Aşıklı Höyük, Düring (2011c:68) estimates a population of 150 people. This is closer to the typical size of

known Neolithic settlements in the Fertile Crescent, which seem to not have exceeded 300 people (Düring 2011c:71), and to a community size that can rely on face-to-face interaction as an integrative mechanism (Düring 2011c:117). Each neighbourhood could then have functioned like a village in itself; and the large village would thus have functioned like a cluster of villages, compressed into one large settlement. The degree to which it regulated daily social and economic activities would have made the neighbourhood a powerful social grouping at Aşıklı, if not possibly the most powerful, and integral to the working of the village as a whole (Düring and Marciniak 2005:181).

At Çatalhöyük, by contrast, spatial arrangements seem to have been only one of several, co-existing forms of cross-household ties. Düring (2006:229-235; 2011c:117) tries to identify Aşıklı-like neighbourhood clusters at Çatalhöyük, separated by open spaces. However, a more holistic analysis of the built environment by Hodder (2014b:8, Fig.6) shows that the various spatial separations—terraces, middens, continuous walls—cut across each other instead of forming clearly delineated house clusters. He also cross-referenced the spatial groupings with other architectural evidence for social ties, most importantly the ritual ties that will be discussed in the next section, and found that these as well cut across the spatial divisions. Hodder (2013a:25, 2014b:7-8, 2014d:151-153, 156) reconstructs that several different systems of suprahousehold integration coexisted at Early Neolithic Çatalhöyük, with households entertaining multiple relationships both within their immediate surrounding, but also with a more spatially dispersed group of other households connected across distances by a complex web of ritual ties. Spatial proximity might then only have been one of several mechanisms creating social cohesion between households.

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Figure 5 Clustered neighbourhoods at Aşıklı Höyük Level 2 (Düring 2006:Fig.4.10).

Ritual ties

There is evidence at Aşıklı Höyük and Çatalhöyük that ritual activities were shared between households; ritual here meaning activities that likely had a religious component, but also were ritual in the way that they were performed at regular intervals and by specific rules. Especially at Çatalhöyük, communities seem to have invested a significant amount of energy into maintaining ritual, and it seems to have been of paramount importance in community-making.

Ritual webs at Çatalhöyük

At Çatalhöyük, there were different types of ritual ties, and they cast a cross-web over the settlement with a multitude of criss-crossing relationships by which individuals and households were integrated tightly into subcommunities and finally a larger community; within this web of relationships, households probably had alliances with several groups simultaneously. There were different types of shared ritual, and different ways of sharing ritual. First, members from different households were often buried together. Subfloor burials, interred during the use of the building into pits cut through floors and platforms and then re-patched with plaster, was the main on-site burial form attested throughout most of the Neolithic in the study region. People were buried in flexed position, sometimes with burial goods, and often several individuals were buried under the same house. A large number of subfloor burials have been excavated at Çatalhöyük East: 685 individuals in the 1960s (Düring 2011c:107), and 648 since 1993 (<http://www.catalhoyuk.com/database>). The distribution of burials among houses is extremely variable, from none to 62 burials per building (Hodder 2014b:5). When a large number of burials were present, it is likely that not every buried person had been a resident of the building prior to death. Düring (2002, 2006:201-211, 2008, 2011c:110) and Hodder (2014b:5, 9; Hodder and Cessford 2004:36; Hodder and Pels 2010) interpret that 'multiple-burial houses', with more than 10-15 buried individuals, collected the deceased from suprahousehold groups, making burial one ritual that tied households together.

Second, there are alliances between households relating to religious imagery found in the house interiors. The interior of most Çatalhöyük houses is elaborated with imagery: wall paintings displaying a number of things, such as hands, geometric patterns, and scenes including people and animals; and further, moulded features in form of animal shapes moulded from clay on walls, benches and pillars, sometimes with inset horns and teeth (e.g. moulded bucrania with real cattle horns) or other faunal elements (Düring 2006:195-201, 2011c:99-107). The abundance of these images had let Mellaart (1967:77) to interpret a substantial number of houses as 'shrines', but in newer research, all Çatalhöyük buildings are regarded as houses

in the sense of residences (see Düring 2011c:111-112 with a concise discussion of evidence refuting the existence of 'shrines' at Çatalhöyük, also Hodder and Cessford 2004:21). This imagery is irregularly distributed between houses, both regarding the motifs displayed and also in the number of images present. Observing patterns of contemporary houses displaying similar or different motifs, Hodder (2014d) postulated the existence of important cross-ties between individual households exhibited through several houses displaying the same motifs, for example painted hands or leopard reliefs (Figure 6). Hodder reconstructs this in terms of "secret societies or medicine societies" based around the identification with a specific (wild) animal connecting different households that were dispersed over the site (Hodder 2013a:25, 2014d:160, 161, 2014e:174, 182).

Observing the distribution of ritual items between houses, it is obvious that especially the number of mouldings and burials varies significantly, and that some buildings were more ritually elaborated or charged than others (Düring 2011c:106-107). A number of buildings, irregularly distributed across the site, stand out in particular as having particularly much imagery and particularly many burials. These houses have been called 'history houses' (Hodder 2014b:5; Hodder and Pels 2010) or 'lineage houses' (Düring 2011c:115-116) and are interpreted as bundling the ritual energy of a number of households, maybe 6-7 households (Düring 2006:303, 313). History and lineages houses also existed particularly long: many houses at Çatalhöyük are ritually continued through a practice termed 'building continuity' whereby houses were abandoned in a planned process, the upper part removed and the lower part stabilised and filled in; and then a new house constructed on top that followed the footprint of the old house (Düring 2007, 2009, 2011c:114; Farid 2014:91-92) and sometimes also continued certain features, for example a particular animal image in a particular spot (Düring 2011c:114; Hodder and Cessford 2004:35). The terms chosen for history or lineage houses also refer to the element of a long history that was important in creating the gravitas of these buildings (Düring 2011c:116; Hodder and Pels 2010:171-172). The pooling of ritual charge—images and burials that represent memories and history—in a number of focal houses is interpreted to bond different households to each other by creating a

shared identity when households defined themselves in relation to particular history/lineage houses. The house itself, the physical structure and all the ritual charge weaved into it in form of images and burials, developed an authority that was able to bond households into larger groups (Düring 2011c:115-116; Hodder 2012a:309; Hodder and Pels 2010:178, 183; Marciniak et al. 2015a:96).

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Figure 6 Ritual ties connecting contemporary houses in the Çatalhöyük South excavation area (Hodder 2014b:Fig.6).

'Radial divisions' refers to continuous lines created by consecutive house walls.

House-related ritual at Aşıklı Höyük and Boncuklu Höyük

Aşıklı Höyük and Boncuklu Höyük also feature house-related ritual, but ritual might have contribute to community-making in ways different to Çatalhöyük; and at both sites, some ritual activities might instead have supported household identities, not so much ties between households. In fact, the Boncuklu team interprets all house-

related ritual, of which much is similar to later house-related ritual at Çatalhöyük (see below, Genesis of large sites) as administered by the resident households, for household purposes: in this reconstruction, imagery, subfloor burial and building continuity served the building of household identities through ancestry- and memory-construction and idiosyncrasies in ritual expression that features slight differences between houses (Baird et al. 2012:234-235).

Aşıklı houses do not feature imagery (only the large, communal buildings discussed below are painted on the inside, Özbaşaran 2012:140). Subfloor burials and building continuity are present at Aşıklı, but they are difficult to interpret in terms of their relationship to community-making. To date, 70 sub-floor burials have been excavated and published from Aşıklı Höyük Levels 3-2 (Düring 2011c:67). The relatively low numbers of burials found as compared to the expected numbers of residents at the settlement show that only some members of the village community were buried inside the settlement (Düring 2011c:67-68, 108-110), and the selection of people for burial locations is interpreted by Düring and Marciniak (2005:175) in the way that burial was regulated by a suprahousehold group, like the neighbourhood. The excavators of Aşıklı, however, seem to prefer an interpretation of subfloor burials in the realm of household identity. Of the burials whose location is known (see Düring 2006:87 for issues with these data), 80% were found under rooms which contained a hearth, and about half of the remains show signs of burning (Düring 2006:89). Contrary to Düring and Marciniak's proposal that burial might have been regulated by neighbourhood groups, this suggests symbolic links between burial and fire/hearth, and possibly between burial and households which centred around hearths (Özbaşaran 1998, Düring 2011c:67). Of course, it is possible that burial rites reinforced household and neighbourhood ties.

At Aşıklı Höyük, up to eight or ten consecutive building renewals have been attested in a deep sounding (Figure 7; Düring 2006:93-97, 2011c:65; Özbaşaran 2011:108). The location of the hearth and possibly also other interior features was also continued through the various phases (Düring 2011c:66). Düring and Marciniak (2005) interpret building continuity at Aşıklı Höyük as regulated by neighbourhood groups. Building continuity might have been another mechanism of enforcing

suprahousehold control over households and individuals, coercing people into already existing structures (literally and metaphorically): Düring and Marciniak (2005:179) suggest that if households had had economic autonomy, they might have been compelled to change their house according to the changing needs and size of the resident group, which ethnographically is the more common use of the built environment (Düring 2011c:65-66).

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Figure 7 Building continuity observed in the deep sounding at Aşıklı Höyük (Düring 2011c:Fig.4.4).

Ritual-social-economic ties

Importantly, the ritual cross-ties observed at Early Neolithic sites also had clear economic and social connotation; or better: there existed many social and economic ties between households and subcommunities that were ritually maintained or also had a ritual component. In the archaeological record, the ritual

element seems particularly visible, but the social and economic exchange that was part of such relations might have been the more significant component on a day-to-day basis. At Çatalhöyük, the above described ritual connections also had social and economic importance since Hodder (2014d:151, 153) reconstructs them as a social security system in which households could obtain support and resources if needed. There is some particularly tangible proof for this reconstruction in form of diet markers (isotopes) that indicate that people who were buried together shared the same diet, but diets vary between different co-burial groups (Hillson et al. 2013:246-250; Hodder 2014b:6, 8-9; Pearson 2013:291-296; Pearson et al. 2015a; Pearson et al. 2015b; Pilloud and Larsen 2011). Hodder (2014b:8-9) suggests to reconstruct such a subcommunity as 'practical' kin – people brought together not through genetic ties, but by cooperation and the sharing of daily lives, including social and economic activities. 'History houses' might have been one important nodal point in this system: They controlled ritual that involved a number of households, and might in turn have been provided with food and other resources (Hodder and Pels 2010:178). But individual households would have entertained different sets of ties with other households as argued above, and therefore shared food, time, and possibly also non-food resources through different subcommunities (Hodder 2014b:10, 2014d:153, 162).

At Aşıklı Höyük, ritual suprahousehold ties worked differently. First, rituals seem to have taken place in special ritual buildings, not in residences. And second, the community ritual might have had a larger scale, bringing several different neighbourhoods together in large gatherings. In Level 2, the Aşıklı Höyük settlement had two large multi-roomed built complexes arranged around courtyards (courtyards MH and MI in the north, courtyards HV and T in the south; Figure 24). These buildings were marked as special through their size and the inclusion of large courtyards; and through the use of stone and special earth building techniques, as well as painted floors and walls (Düring 2011c:62, 71-72; Özbaşaran 2011:108, 2012:140). It is unclear whether the two buildings are contemporaneous or not (Düring 2011c:72). The courtyard buildings are interpreted as places for meetings, religious or non-religious, that crossed neighbourhood borders and integrated the

greater village community, for example through feasting (Düring 2011c:72-73; Özbaşaran and Duru 2015:50). The largest court, HV, could have gathered around 340 people in Düring's (2011c:72) estimates. Aşıklı had a satellite site at 400m distance across the river, Musular (7600-6600 BC, Thissen 2002a:324), which is interpreted as a special-purpose site for the large-scale processing of wild cattle carcasses for feasts (Düring 2011c:78; Duru and Özbaşaran 2005; Özbaşaran 2011:110; Özbaşaran et al. 2012). Özbaşaran and Duru (2015:50) interpret that the overall enclosed and clustered appearance of the settlement indicates 'introversion'—a socially self-sufficient village community. They suggest that the village community would have been important during the social adaptation to a farming life in central Anatolia, but also that its size combined with the sheer newness of sedentary life for central Anatolians caused social tensions. Special festive community events might have been one way to alleviate social tensions; feasts as well as the cooperation that likely happened leading up to the event (hunting, carcass processing, cooking) would have involved informal socialising and informal negotiation of relationships, and maybe also some more formalised negotiation of social relations.

Summary

In sum, individuals and households at Early Neolithic sites were integrated by strong social-ritual-economic ties. Within the complex web of relations between houses, it is probable that individuals or households at Early Neolithic Çatalhöyük belonged to more than one subcommunity at the same time. Henceforth, the term **community** refers a large social group, for example encompassing an entire settlement (e.g. (Düring 2006:306, 2011c:71; Özbaşaran and Duru 2015) or even more, it can encompass people living dispersed within a local landscape (e.g. Baird 2012a:446; Düring 2011c:118-119). **Subcommunities** are social groupings within a community that combine more than one household, also referred to as neighbourhoods or kin groups (e.g. Düring 2011c:70, 228; Hodder 2014b:8; Steadman 2004:527).

Genesis of large Early Neolithic settlements

Interestingly, the large Early Neolithic clustered settlements of Çatalhöyük, Aşıklı Höyük and Canhasan III were set in nearly 'empty' cultural landscapes, with no contemporary sites found in the vicinity as based on current knowledge from surveys (Baird 2005:66-71; Düring 2011c:77-78). This and other evidence suggests that the large Early Neolithic sites might have been formed by the contraction of several smaller communities into one large village. Such a genesis could be the origin for the above described social organisation of subdividing large groups into more manageable smaller subcommunities.

Before the occupation of Çatalhöyük, several small settlements were scattered across the area that would later become the immediate surrounding of the Çatalhöyük settlement, but these had all been abandoned by the time Çatalhöyük was established (Baird 2002:Fig.7, 2005:66; Hodder 2014b:9-10). One of these was the already discussed site of Boncuklu Höyük, 10km north of what would become Çatalhöyük. Hodder (2014b:10) and Baird (2012a:440, 433; Baird et al. 2012:225, 227-228, 234; also Düring 2011:43) observe, despite the obvious differences in house form (round vs. rectangular) and settlement layout (non-clustered vs. clustered), a similar social conceptualisation of houses at both sites including building continuity, subfloor burial, installations on walls, painting on walls and floors, the symbolic importance of wooden posts and separations between 'clean' and oven-related 'dirty' parts of the house. It is therefore likely that Boncuklu saw the beginning of some elements in the organisation of village community life that has been so well documented at Çatalhöyük.

Based on these observations, the formation of Çatalhöyük could have been through the contraction of a local settlement system of smaller sites into one large settlement (Baird 2005:67; Düring 2011c:120; Hodder 2014b:10). Since only a very small part of the lowermost levels is excavated, nothing is known about how this process might have worked exactly (Hodder 2014b:11). A similar scenario is suggested by Düring (2011c:71) for Aşıklı Höyük, which became very large in Level 2; the older Levels 5-3 at the site are currently under excavation, so that it might soon

be possible to reconstruct the formation of this community in more detail. Based on the preliminary information from Levels 5-4 published by the excavator Özbaşaran (Özbaşaran 2012; Özbaşaran and Duru 2015), Aşıklı 5-3 was a smaller and less densely built village of round huts that do not immediately appear similar to the Level 2 houses. This suggests that if Aşıklı Level 2 represents the contraction of several smaller communities, this process might have been gradual and developed alongside a change in house layout and settlement layout.

3.2.3 Egalitarianism

Early Neolithic societies in central Anatolia are reconstructed as ‘fiercely egalitarian’ (Hodder 2014b:5). **Egalitarianism** shall be defined here as no person or group of people having a higher social or economic status than other community members; for example, access to different or more food or a different workload (Hodder 2013b:26, 2014b:5, 2014d:156, 159-160), or greater influence on decision-making within the group, although that might be more difficult to verify archaeologically. There have been claims as to the existence of elites at Aşıklı Höyük, mostly based on the existence of the above described ritual buildings separate from residential quarters, whose creation is ascribed to an elite that was in possession of the resources necessary to build these structures (Asouti 2005a:79; Esin 1996:40; Schachner 1999:46, 109). This argument is also built on an analogy with Neolithic sites in south-east Anatolia (Cutting 2005b:28), where there are more indications for ritually-made social status differences but which are also part of a very different cultural sphere (Düring 2011c:72). The current excavators (Özbaşaran and Duru 2015:48), Düring (2006:309, 2011c:73) and Cutting (2005b:33) have found that there is no evidence for the existence of elites at Aşıklı Höyük if the large courtyard buildings are instead understood as community buildings meant to reinforce ties between social groups in the settlement.

As these examples show, architecture plays an important role in the discussion of Neolithic status differences. On the other hand, Düring (2014:133) has recently suggested that in Neolithic Anatolia “houses as manifestations of social groups

made it possible to have profound power differences between people cloaked in a vocabulary of kinship and belonging". Düring seems to suggest here that the architecture appearance of these early villages deliberately concealed status differences — from past people living in these built environments, but also from the archaeologist. This very interesting suggestion should be very relevant for a study of social status via architecture, because it indicates that architecture might not always display existing status differences. There are also other items of material culture that indicate status differences, however; and at Çatalhöyük, egalitarianism has been systematically researched by testing various possible indicators of status or wealth differences: the team cross-referenced potential status indicators ranging from burial goods, storage capacities and diet markers to obsidian points, not finding that any of those features clustered in particular houses, also not the ritually elaborate houses (summarised in Hodder 2013b:26, 2014b:5). There also do not seem to have been differences in socioeconomic status by gender (Hodder 2006:208-214, 2014b:6), but some social differentiation by age was observed, with older people being buried with more diverse and elaborate burial gifts (Hodder 2014b:6; Pearson and Meskell 2015:477-478).

Apart from some age-related status differences, there are only occasional indications that people living in houses with a special ritual status (see above, 'history' and elaborate houses) might have had also special social or economic status. For example, studies of the diet and pathologies of skeletons from subfloor burials attest that some individuals buried in history houses had preferential access to protein-rich foods, and that on average individuals buried in history houses did different types of physical work than those from non-elaborate houses (Hodder 2013b:26-27, 2014b:5; citing work by Pearson 2013, Larsen et al. 2013).

Nevertheless, examples of households or individuals that were able to translate ritual status into socioeconomic advantages are rare at Çatalhöyük before 6500 BC and "the overall impression is of a fierce egalitarianism" (Hodder 2014b:5, 2014d160).

The archaeological evidence from Early Neolithic sites shows clearly, however, that the upkeep of these tight-knit, egalitarian societies required considerable

effort—the ‘fierce’ part of the deal. The above mentioned evidence for a potential slight or occasional special socioeconomic status of the residents of ‘history houses’ at Çatalhöyük can maybe be understood to mean that tendencies for individuals or households to attempt to work for their own status instead of for the collective were always there, but that during the Early Neolithic they were kept in check (Hodder 2013b:26, 2014b:11, 2014c:18). It might have been the above described compartmentalisation of the village society into sub-units, which at the same time were tightly integrated by various ritual-social-economic ties of reciprocity, that prevented the need to establish formal hierarchies to organise the large village (Hodder 2014b:6, 11, 17). Through a subdivision into subcommunities, neighbourhoods and households would have bundled some of the necessary decision-making, and these subcommunities were of a size that made equal participation by all or most members possible (Düring 2011c:120; see also Hodder and Cessford 2004 for a reconstruction of how social coordination at Çatalhöyük was achieved on the level of households and household groups by a subtle communication of social rules instead of through a centralisation of power). The high degree of social control that was possible within these tightly clustered villages would also have ensured that individuals or households did not monopolise resources for themselves (Hodder 2014c:18). The participation in social reciprocity on several levels, for example through providing for and participating in feasts; participating in decision-making processes; at Aşıklı Höyük through the building and maintenance of the large courtyard congregation buildings; at Çatalhöyük through ritually elaborating houses; and maybe other forms of reciprocity that are not as clearly visible archaeologically would have been time-consuming and work-intensive (Hodder 2014b:9, 11, 2014c:18-19). This exchange system at Çatalhöyük might have included the surrendering of biological children to other subcommunities (Hodder 2014b:9), and therefore the breaking up of what could be considered natural social ties, family ties, in favour of creating artificial social groupings; this could represent a particularly radical form of reciprocity as part of an egalitarian system.

3.2.4 The Early Neolithic: a summary

This section has explored Early Neolithic social organisation by specifically concentrating on a discussion of the genesis of the social groupings that would remain the main ordering principles of southcentral Anatolian society for many millennia to come: households, village communities, and intermediate groupings within village communities such as neighbourhoods. In Early Neolithic village communities, there were several levels of integration by which individuals were made parts of differently sized subcommunities that were linked by various ties of reciprocity and together formed a village community; these ties also created and maintained egalitarianism. I have tried throughout this section to show also the varieties of social organisation that existed throughout the 2000 years of the Early Neolithic. Early Neolithic archaeology in central Anatolia has been focused on the two large sites, Aşıklı Höyük and Çatalhöyük, mostly because there was little material from other sites to compare them to since smaller villages that might represent a different way of conceptualising village life such as Süberde and Pınarbaşı-Bor were not excavated in ways that allows the reconstruction of their social organisation. The ongoing excavations at Boncuklu and Aşıklı Höyük 5-4 are now increasingly modifying the archaeological view on the central Anatolian Early Neolithic. This section has also pointed out differences in the interpretation of particular architectural features by different researchers; this and similar examples within the next few sections call attention to the need for a review of architectural epistemology.

3.3 6500-5500 BC: The Late Neolithic and Early Chalcolithic

This section summarises the existing knowledge on social organisation and architecture in Late Neolithic central Anatolia and the Lake District, with reference to general developments in Asia Minor. During this time, we will see all three regions studied here transformed fundamentally, when the Lake District is neolithised and central Anatolia underwent significant changes to the social system that had characterised the Early Neolithic. This section will discuss six themes or processes, of which two (the neolithisation of western Anatolia, climate change) describe the larger regional framework, and four (household autonomy, mobility and dispersal, social competition and warfare) the processes that this thesis will concentrate on.

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Figure 8 Sites in Asia Minor with excavated occupational layers dated between 6500 and 5500 BC (Düring 2011c:Fig.5.1).

1 Hoca Çeşme, 2 Yarımburgaz, 3 Fikirtepe, 4 Pendik, 5 Aktopraklık, 6 Ilıpınar, 7 Menteşe, 8 Barcın Höyük, 9 Demircihöyük, 10 Ege Gübre, 11 Ulucak, 12 Hacılar, 13 Kuruçay, 14 Bademağacı, 15 Höyücek, 16 Erbaba, 17 Çatalhöyük West, 18 Çatalhöyük East, 19 Pınarbaşı, 20 Canhasan, 21 Tepecik-Çiftlik, 22 Köşk Höyük, 23 Mersin-Yumuktepe.

3.3.1 The neolithisation of the Lake District and western Anatolia

Around ca. 6500 BC, Neolithic lifeways started spreading, and rapidly, past the border between farmers and hunter gatherers that had previously existed for around 2000 years west of the Konya plain, reaching the Lake District, Aegean Turkey, the Marmara region and finally Europe. Meanwhile, northern Anatolia, north of the Konya plain and Cappadocia, remained hunter-gatherer territory: A recent survey project at the Black Sea coast did not find evidence for sedentariness before ca. 5500 BC (Düring and Klinkenberg 2015). The neolithisation of the west is relevant here for three reasons that will guide the following discussion: First, central Anatolia could be the, or a, region of origin of the farmers or cultural traditions that travelled west; in this case, it is significant to consider what cultural processes in the Konya plain and Cappadocia around 6500 BC could have triggered this move. Second, it is in connection to the former relevant to consider how much central Anatolia had influence on the newly forming farming communities of the Lake District. And third, the neolithisation of the west produced an increasingly diverse cultural landscape in Late Neolithic and Early Chalcolithic southern and western Anatolia (Baird 2012a:443; Düring 2011c:199) and this, too, had influences on internal developments in southcentral Anatolia.

Over the last few decades, there have been several claims as to the existence of pre-6500 BC farming sites in western Anatolia, but the evidence is mostly ambiguous. Hacılar and Bademağacı in the Lake District have both produced one single radiocarbon date older than 6500 BC, but these can be refuted as unreliable (Appendix 1, cf. Arbuckle et al. 2014:2, cf. Brami 2014c). Sites in the Marmara region have been dated to an Aceramic Neolithic starting in 7000 BC based on lithic typology, but are only known from surface survey and without radiocarbon dates (Düring 2011c:126, 2013:c79). Only at Ulucak on the Aegean coast there is more reliable evidence for Neolithic occupation pre-6500 BC, since seven radiocarbon samples from the oldest occupational layer date to between 7000 BC and 6500 BC, with the most reliable dates from short-lived materials indicating a date of 6760-6600 BC for the oldest settlement (Çilingiroğlu et al. 2012:152-153; Çilingiroğlu 2011:68; Çilingiroğlu and Çakırlar 2013:21). However, even if some farming sites

west of the Konya plain pre-date 6500 BC, this does not change the fact that 6500 BC was a major cultural turning point in western Anatolia (Düring 2013c:79). For western and northwestern Turkey the following, rapid neolithisation must have had the effect of a cultural landslide (Düring 2011c:123, 127). In probably less than a century, fully functioning farming villages with constructed habitations, pottery and other material culture characteristic of the Anatolian Neolithic existed all over western Anatolia (Arbuckle et al. 2014:7; Brami 2014; Düring 2013c:80).

Out of central Anatolia?

Based on different and sometimes conflicting lines of evidence, different researchers reach differing conclusions regarding the region(s) of origin of the western Anatolian Neolithic, possible routes for a migration of farmers into the area, and also the degree to which pre-existing local hunter-gatherer traditions were adopted into the new lifestyle. There seems to be consensus that local Epipalaeolithic traits were incorporated into the emerging Neolithic in western Anatolia (Baird 2012a:442; Çilingiroğlu and Çakırlar 2013:25; Düring 2011c:197-198, 2013c:87; for the Lake District: Duru 2008:7, 2012:28), but the nature, extent and origin of external influences remains a topic of discussion.

The first reason to assume central Anatolia as the origin of the second Neolithic revolution could be simply its geographical proximity: the fringes of the Lakes region had been occupied by farmers since at least 7600 BC in Süberde, and it is likely that farmers living in the Beyşehir region undertook trips deeper into the wooded lake landscape, and so relocating settlement might have come naturally. This could be one reason why Düring (2011c:198) and Çilingiroğlu and Çakırlar (2013:24) automatically assume that if the spread went along with migration, these people would have come from central Anatolia. And indeed, the presence of Cappadocian obsidian in the newly neolithised areas indicate that these areas were at least in enduring contact with central Anatolia: at Lake District sites and Ulucak on the Aegean coast, Cappadocian obsidian makes up 40% of the chipped stone assemblage next to flints (Düring 2011c:166, 178). Ilıpınar, Pendik and

Fikirtepe in the Marmara region use Cappadocian obsidian next to obsidian from the source at Sakaeli and Yağlar in northern Anatolia (Düring 2011c:194-195). There might have been influences of central Anatolia on pottery traditions in the west (Brami and Heyd 2011:178-183; Özdoğan 2015:51; Özdoğan 2011:S421). Possibly most compelling, studies of modern and ancient human DNA have identified a likely origin of many, but not all, modern European gene variants in central Anatolia, suggesting a significant migration of central Anatolian farmers to Europe (through western Turkey) in the Neolithic (Brotherton et al. 2013; Haak et al. 2010). Hodder (2014b:18) links this directly with the observed dispersal of the Çatalhöyük community around 6500 BC (below), suggesting that the people who left the site might have migrated to western Turkey: “The study of population genetics often identifies a core for the spread of many gene variants in central Anatolia (King et al. 2008 [sic]; Haak et al. 2010). [...] Is it possible that the impetus for these spreads derived from the build-up of pressures of the type identified at Çatalhöyük, released by the dispersal of more self-sufficient mixed farming units?” (similarly Düring 2011c:198-199, 2013c:91). If this were the sequence of events, that would be significant for this research project because it would mean that people living in the Lake District after 6500 BC shared a common cultural past with those in the Konya plain, and might be part of similar social processes.

On the other hand, the new farming regions in western Turkey appear culturally diverse both in comparison with central Anatolia, and with each other (Çilingiroğlu and Çakırlar 2013:25-26; Düring 2011c:178). In the Lake District as well as in the Aegean and Marmara regions, settlements were generally smaller than in the contemporary Konya plain and did not form dense house clusters, but instead often parallel lines of houses with much open space within the settlement, indicating a different social use of space (Duru 2012:27; Schoop 2005b:49). Wattle-and-daub buildings dominate at early Ulucak (6400-6000 BC, Çilingiroğlu et al. 2012:141; Çilingiroğlu and Çakırlar 2013:25), and in the Istanbul and Marmara region (Düring 2011c:180, 184; Özdoğan 2011:S423, S427), but not to the same degree in the contemporary Lake District or central Anatolia. In the Istanbul region, Hoca Çeşme (dated between 6500 and 5500 BC) and the lower levels of Ege Gübre (6200-5700

BC) had round buildings that are otherwise rare in Anatolia during this time (Düring 2011c:177-178, 180; Özdoğan 2011:S421; Sağlamtimur 2012:197-198). On the other hand, Bami (2014b; Bami et al. 2016) locates the origin of some house-related practices characteristic of the Neolithic in the Lake District, western Turkey and southwestern Europe, such as ritual house closure and building continuity, in central Anatolia; many of the similarities perceived by him seem however based on generalising observations that do not appreciate the very different cultural contexts that these practices are set in. The pottery in the upper levels of Hoca Çeşme resembles that from contemporary sites in what is now Bulgaria (Düring 2011c:177-178), but pottery from the lower levels is closer to a central Anatolian tradition (Özdoğan 2011:S421, S426). The Marmara region further has different pottery as compared to Aegean Turkey (Düring 2011c:178). After 6350 and 6000 BC respectively, there is painted pottery the Lake District and Konya plain, but the pottery used in Aegean Anatolia and the Marmara region (Çilingiroğlu and Çakırlar 2013:25; Schoop 2011b:152) and Cappadocia is monochrome (see more on painted pottery below). From around 6000 BC, pottery decorated with the *impresso* technique can be found at Ulucak and Ege Gübre, a tradition characteristic to the Aegean and Adriatic coast (Çilingiroğlu and Çakırlar 2013:25; Özdoğan 2011:S421; Sağlamtimur 2012:201). *Impresso* pottery indicates that the Aegean coast of Turkey was part of a circum-Aegean interaction zone at least from 6500 BC, also evidenced for example by the exchange of obsidian from the Aegean island of Melos which is found in a number of sites in Aegean Turkey (Çilingiroğlu and Çakırlar 2013:27; Horejs et al. 2015; Özdoğan 2015:51; Perlès et al. 2011; Reingruber 2011), including Ulucak, where obsidian had previously been ascribed to a Cappadocian source (Çilingiroğlu et al. 2012:148) which made for very different reconstructions of exchange patterns (Düring 2011c:178; Reingruber 2011:Fig.15). Lake District sites also use Cappadocian obsidian to an appreciable degree (Düring 2011c:166; Duru 2012:27), although with processing techniques different from central Anatolia (Düring 2011c:174), and are not involved in the exchange network of Melian obsidian (Reingruber 2011:Fig.15). Ilıpınar, Fikirtepe and Pendik, sites in the Marmara and Istanbul region dating to between 6500 and 5500 BC, used both Cappadocian obsidian and obsidian from places in northern Anatolia, suggesting

contacts with both regions (Düring 2011c:194-195, 229-230). The overall impression is that of an intricate mosaic of cultural traditions in western Turkey.

A newer line of evidence towards discussing the neolithisation of western Anatolia comes from studies investigating the spread of domestic animal species across Neolithic/ Chalcolithic Anatolia, which is presumed to mirror the pathways through which people (farmers) or the idea of farming spread. Arbuckle et al. (2014), based on a large dataset of faunal remains from across Anatolia, reconstruct southeast Anatolia as the region of origin for at least the domesticated pigs and cattle that became important for subsistence in the new farming areas in western Turkey in a way not observed before in central Anatolia (Arbuckle et al. 2014:Fig.1, 4-5). Comparing the timing of the appearance of different domesticated species in western Turkey, they conclude that central Anatolia “was not directly involved in the earliest spread of domestic livestock either to the Lakes region or western Turkey” because no domestic cattle or pigs existed there at the time when it appeared in the west (Arbuckle et al. 2014:7-8). They therefore (Arbuckle et al. 2014:7, Fig. 1) reconstruct a “rapid westward movement of domestic animals across southern Turkey”, along the south coast via a coastal or maritime route from southeast Anatolia to the Lake District and Aegean. Unfortunately, the Arbuckle model works with very early dates for Lake District sites that have been found problematic here (Appendix 1), and many of their conclusions become invalid if not accepting their chronological framework. Seeing 6500 BC as the baseline for the neolithisation of the west, cattle might have been brought from the Anatolian centre since at Çatalhöyük, newer research has just moved the date for the earliest domesticated forward to just after 6500 BC (Hodder 2014b:12; Russell et al. 2013b). And a study of ancient cattle DNA concludes that the genetic origin of the domestic cattle brought into western Anatolia and Europe between 7000 and 6400 BC is in central Anatolia (Scheu et al. 2015:10).

After 6500 BC, there was a great diversity in the use of animals in the Neolithic regions of western Anatolia, and much more could be said about what this might reveal about the origin of the farming models adopted in that region (recent summaries: Arbuckle et al. 2014; Çakırlar 2012; Çilingiroğlu and Çakırlar 2013;

Düring 2013c:82-86). Here, it shall suffice to conclude that a complex patchwork of shared and non-shared traditions in the use of material culture existed across central and western Anatolia in the centuries after 6500 BC, and importantly this also includes a variety of subsistence strategies, which of course is at the heart of a cultural transition to farming. This cultural diversity most likely indicates a diverse origin of the western Anatolian farmers or their cultural traditions, mixing influences from different already-farming regions in the east and autochthonous elements derived from local hunter-gathers lifestyles (Çilingiroğlu and Çakırlar 2013:25-27; Düring 2011c:198-199, 2013c:92; Özdoğan 2011:S421; Özdoğan 2015:52); for example, Duru (2012:27-29) suggests that the Lake District Neolithic was a local adaptation of farming by hunter-gatherers already living in the region. And there most likely were many different neolithisation events over the course of a few decades or centuries (Brami 2014a; Düring 2013c:92; Özdoğan 2011:S427). There probably also was a maritime pathway involved in the spread of farming to western Turkey and Europe (Horejs et al. 2015; Özdoğan 2011:S420-S421, Scheu et al. 2015:9), maybe responsible for the few farming sites in the Aegean region that predate 6500 BC, many of which are close to the coast (Brami and Heyd 2011:186) and some of which might constitute 'failed attempts' at an earlier establishing of farming (Brami 2014a; Brami and Heyd 2011:193).

Cultural diversity and exchange in western Anatolia post-6500 BC

Independent from the question of where the impetus for farming came from, the above outlined evidence serves to show that after 6500 BC, western Anatolia including the areas studied here became a dynamic cultural landscape in which cultural innovations and knowledge were exchanged between regions, and importantly also in west-east direction, demonstrating that the newly Neolithic regions in the west quickly also came to have cultural influences on central Anatolia, not only the other way around. This included a number of techniques or items of material culture that would come to play an important role in the negotiation of social relations during the Late Neolithic and Chalcolithic of southcentral Anatolia;

the use of sheep wool and painted pottery are discussed here as examples. Painted pottery would after 6500 BC be used in social competition through hospitality (see below, Social competition); later in the Chalcolithic and especially in the EBA wool play a role in the construction of social inequalities and hierarchies in southcentral Anatolia (3.6.3). It seemed important to, before discussing in the following sections how these items were socially used to construct social competition and inequalities within southcentral Anatolia during the centuries and millennia following 6500 BC, demonstrate here that originally the use of these items was probably born out of the dynamic interaction zone in western Turkey created by the Neolithic in 6500 BC, and varied between the three regions of southcentral Anatolia; thus contributing to one aim of this literature review: pointing out the deeper roots of later (MC-EBA) developments in the LN/EC.

Evidence for the use of wool starts in western Anatolian earlier than in central Anatolia. Spindle whorls and loom weights were found in Ulucak from 6000 BC (Düring 2011c:176, 198, Tab. 5.4). At Hacilar, apparently spindle whorls were found routinely (Mellaart 1970c:165, 170) at least since Level VI (Düring 2011c:166, Tab.5.4; Mellaart 1970c:159), dating to between 6350 and 6100 BC; this so far seems to be the earliest date for wool use in western Anatolia. However, no faunal assemblage from the LN/EC Lake District seem to have yielded evidence for wool production yet (DeCupere 2005; DeCupere et al. 2008; DeCupere et al. 2015; Duru and DeCupere 2003). Faunal research at Çatalhöyük concludes that there probably was no production of wool (Marciniak 2011:121-122; Russell and Martin 2005:74, 96), and an absence of spindle whorls confirms this (Düring 2011c:134). Spindle whorls were maybe found at Canhasan 2b (mentioned by Düring 2011c:140, Tab.5.4; French 1962:32; but not in French 2010), but the faunal assemblage awaits publication. At Erbaba, faunal analysis does not indicate sheep wool use, but possibly use of goat hair (Arbuckle 2008:359-361). In Cappadocia, wool production either started or became more pronounced at Köşk Höyük during the Middle Chalcolithic, and MC Güvercinkayası probably also produced wool; wool production in Cappadocia intensified in the LC (Arbuckle 2012a:308-309; Arbuckle et al. 2009). Based on the fragmentary data collected here, the impetus for wool use might

originate somewhere west of central Anatolia and date to the LN/EC.

As a second example, based on the site chronologies suggested here in Chapter 2/Appendix 1, the tradition of painting pottery with intricate red-on-cream/cream-on-red designs might have emerged in the Lake District and subsequently spread to the Konya plain. Small amounts of painted pottery existed at Hacilar since the start of Level IX (6350 BC), and its amount relative to monochrome pottery gradually increased throughout the sequence until it made up 60% of the assemblage in Level I (6000-5800 BC; Mellaart 1970c:100). Painted pottery is also introduced in Bademağacı around 6350 BC, between Levels EN I and EN II (Duru 2008:Fig.129; Schoop 2005d:171, pls.129-130). At Höyücek the introduction of painted pottery seems to be between the 'Early Settlements phase' and 'Shrine phase' (6200 BC; Schoop 2005a:169; Duru 2008:Figs.126-127; Duru and Umurtak 2005:187-188). Kuruçay as well has painted pottery from the start of occupation in 6200 BC (Duru 1994c, 2008:Fig.122; Schoop 2005a:263, Pl.92). The amount of painted sherds in the lowermost levels of the sites is small (probably also because all these early levels were only excavated in small areas, and few artefacts overall were recovered), which is why they are usually still classified as monochrome (e.g. Düring 2011c:Tab 5.2, 170; Schoop 2005a:189, Fig.4). But away from such classifications, the existence of painted sherds is undoubted, and precisely the slow and gradual nature of its introduction is interesting here because it is in contrast to the later, sudden introduction of pottery painting to the Konya plain.

The first painted pottery in the Konya plain dates to around 6000 BC. At the top of the Çatalhöyük East Mound, where the last building is dated to around 5950 BC (Marciniak et al. 2015b:172-173), the only find of painting on pottery is one single sherd with a red line. About a century later on the West Mound (in layers dated to between 5900 and 5800 BC), a majority of pottery is painted. At the same time, the amount of pottery in general increased dramatically (Franz and Pyzel in press). Neither Cappadocia (Düring 2011c:154; Tepecik: Bıçakçı et al. 2012; Godon 2005) nor Aegean Anatolia (Düring 2011c:179) had a tradition of pottery painting between 6500 and 5500 BC. At Köşk Höyük, most pottery does not seem to have been painted, but some was, including at least one pot from Level 3 (Öztan 2012:38-39,

Fig.34). A few sherds resembling Canhasan 2 material (Öztañ 2003:72), were found in the Middle Chalcolithic Level 1, i.e. at a time period where the painted pottery tradition of the Konya plain had already come to an end; they might have been an imported (Düring 2011c:151) curiosity. It remains to be seen how the Köşk Höyük excavators interpret the social use of these rare painted vessels.

This short overview shows that the appearance of painted pottery in the Lake District not only predates that of the Konya plain and Cappadocia by a few centuries, but also painting enters the pottery repertoire gradually in the Lake District (Düring 2011c:167), and at different sites at different times, while in the Konya plain it appears suddenly but in large numbers at Canhasan and Çatalhöyük between 6000 BC and 5900 BC. This suggests a scenario whereby pottery painting was first developed in the Lake District around 6350 BC, and then became more important after 6100 BC, when it increases in relative amount in Hacilar Level V, Kuruçay 12 and Höyücek SPh (Thissen 2010:279), and is then introduced to the Konya plain after 6000 BC (Biehl 2012b:22), but never reached Cappadocia, or only in changed form.

Summary

In sum, the questions of how, when, why and from where farming culture arrived in regions in western Turkey are subject to ongoing research. For this thesis, two observations are important. First, western Turkey turned into a dynamic interaction zone from 6500 BC onwards, with ideas, knowledge, and possibly people moving in various directions and creating cultural diversity. Second, human genetic evidence indicates that most likely some larger groups of people (with domestic animals) left central Anatolia around 6500 BC to migrate west, and they might have had some cultural influence on the western regions including the Lake District, but the Lake District Neolithic was not directly derived from central Anatolia, nor was it culturally closely aligned with any region further west. This thesis shall therefore not assume that architecture and social organisation were similar between the Lake District and central Anatolia during the Late Neolithic and Early Chalcolithic.

3.3.2 Climate change?

I would like to only briefly mention climate change here as a topic that has been part of the LN-EC discussion for a few years, but a direct influence on the processes that are in the focus of this thesis has not yet been proven. Several researchers, and a research group around Bernhard Weninger in particular, have published a series of papers arguing that a short period of climatic deterioration, droughts and cooling that can be observed in the northern hemisphere between 6200-6000 BC, the so-called 8.2ka event (Horn et al. 2015:2-5; Weninger et al. 2014:1-10), had a profound influence on prehistoric communities also in Europe and the Near East. For central and western Anatolia in specific, the Weninger group and others claim that it triggered several of the processes discussed in this section: mobility and dispersal, and warfare, as well as the spread of Neolithic lifeways to western Turkey (Berger and Guilaine 2009; Budja 2007; Clare et al. 2008; Clare and Weninger 2010, 2014; Turney and Brown 2007; Weninger et al. 2014; Weninger et al. 2009).

Although the topic has been discussed for a few years now, there is not yet any unambiguous evidence that first, the 8.2ka event had an influence on the local environment in the southwest of Anatolia, and second, that any cultural changes were directly related to such environmental and climatic changes. In the southern Konya plain, archaeological and palaeoenvironmental studies have revealed long-term resilience of local forests during the 7th millennium (Asouti 2009; Asouti and Kabukcu 2014; Willett et al. in press). Data from lake cores in Cappadocia and the Lake District show resilience, if not increase, of forests during this period (Willett et al. in press). The most recent local case studies of palaeoclimatic proxies thus fail to detect any impact of the 8.2ka event on southcentral Anatolian environments (also see Flohr et al. 2016; Horn et al. 2015 for other regions in the Near East).

There might therefore have been no environmental deterioration in the first place that could have caused social change *contra* Weninger et al. who keep insisting that southcentral Anatolia experienced considerable climate-induced social turmoil around 6200 BC. To name two of their most prominently repeated examples: First, they perceive a cultural disruption at Çatalhöyük around 6200 BC, first claimed

based on the sudden abandonment of Çatalhöyük East, followed by a hiatus of 200 years before a reoccupation at Çatalhöyük West (Weninger et al. 2006:410, 2009:33-34) and now that the non-existence of such a hiatus has been proven, based on the relocation of settlement across the river and introduction of painted pottery (Clare et al. 2008:79; but see an apparent return to the hiatus claim in Clare and Weninger 2014:1). Even overlooking that painted pottery does not start until about 200 years after the event, there stills needs to be a much better argument as to the details of the causality that translates cold/dry weather into a settlement location across the river and pottery painting. Second, Clare et al. (2008) then link the interpretation of turmoil in the Konya plain with that for site destruction in the Lake District to postulate attacks of displaced Konya plain peoples on settlements in the Lake District. Even if accepting the warfare evidence (3.3.5), there needs to be a more holistic discussion of possible other causes before seeking an explanation in environmental changes. In short, there is no evidence that climate changes had any influence on the processes studied here (also Baird 2012a:435, 446; Düring 2011c:125); if it did, it is still more relevant in this literature review to display the many intertwined social, economic and maybe environmental changes that eventually constituted larger cultural changes, and to emphasise the agency that communities had in responding to changes of their environmental and social setting.

3.3.3 Household autonomy and social competition

After reviewing the larger regional framework, the rest of this section will discuss a series of socioeconomic transformations in Cappadocia, the Konya plain and Lake District that significantly changed the social landscape between 6500 and 5500 BC. Much of this and the following sections (3.3.4, 3.3.5) will be based on Çatalhöyük evidence. Çatalhöyük is not the only excavated site in southcentral Anatolia that was occupied before and after 6500 BC, but the only one where levels on both sides of the 6500 BC-mark have been investigated thoroughly: Tepecik is still being excavated and only partially published (Bıçakçı et al. 2012). Erbaba was excavated in a manner that did not produce many data on social organisation (Düring 2006:248);

at Canhasan I, levels pre-6500 BC have only been investigated in sondages (Düring and Marciniak 2005:180, note 3). By contrast, at Çatalhöyük, the 6500-BC transition has recently become one focus of research. New evidence (summarised in Hodder 2013a, 2013b, 2014b; Marciniak 2015, 2015b; Marciniak et al. 2015a; Özdöl-Kutlu et al. 2015) confirms and specifies what was already in broader terms known before (Düring and Marciniak 2005:182; Düring 2006:246-247; Marciniak and Czerniak 2007:126, 2012; Mellaart 1967:210, 217): At Çatalhöyük, 6500 BC is the date of major and relatively fast changes that completely changed the social system established in the Early Neolithic and led to a drop in population numbers, greater autonomy of households and a stronger focus on pastoral mobility.

The 6500 BC-change at Çatalhöyük

Hodder (2014b) describes the 6500 BC-change as a solution to tensions that gradually built up through a kind of ‘overheating’ of the Early Neolithic system of community-making. The above discussion of the Early Neolithic (3.2.2) has described pre-6500 BC Çatalhöyük as a very large and close-knit community organised in a three-tier system of household, kin and village community. The increasingly large number of people living at the site was organised and held together by complex social ties that centred around the sharing of resources and symbolism, and relied on subcommunities to integrate and organise a number of households. This system culminated in the Çatalhöyük Levels South M-O/ North G (Mellaart Levels VII to VIa, dated to 6400-6500 BC, Hodder 2014b:Tab.1), which Hodder (2014b:1) calls the ‘classic’ levels. It was the material culture of these classic levels that originally drew attention to the site through the effervescence of their symbolic elaboration (Mellaart 1962a, 1963a, 1967). The particular abundance of house elaboration in the middle levels is now interpreted to signify increasing efforts to keep an ever more demanding social/ritual system going. The number of animal installations, the number of burials and burial gifts all peaked in the middle levels (Hodder 2014b:10-11). In South M-O, the village was the largest and most populated. The increased population seems to have caused stress, visible on the

skeletons (Hillson et al. 2013:386; Hodder 2014b:11). These signs point to increasing strains on a system of community life that had previously been successful and sustainable over a long period of time. Population increase might have been an important factor that fuelled this steady process of ‘overheating’: potentially the community increased fertility initially to produce more people to share the workload, but then the increasing size of the group only added to the demands on community organisation (Hodder 2014b:1, 11, 17).

Community organisation changed considerably after Level O, after 6500 BC. From Level South P onwards, Çatalhöyük looked quite different. Overall population numbers seem to have dropped, together with the signs of workload and stress on human skeletons (Düring 2006:246-247; Farid 2014:112; Hodder 2014b:11-12). A decrease of symbolic elaboration in houses is the most immediately visible sign that community and subcommunity ties might have been loosened. After South O, the number of bucrania installations, burials and animal reliefs decreases (Düring 2006:201; Hodder 2014b:11, 15). Research into the production and processing of food and artefacts, discussed in the subsequent section, has shown that households relied stronger on their own productive capacity than community ties to secure their subsistence.

How serious, severe or revolutionary would this transformation have seemed to the people who experienced it? Hodder (2013b:20) describes the 6500 BC-change as “radical” but not necessarily sudden, since radiocarbon dating has not yet precisely dated all the various changes to material culture that mark this transition (Hodder 2014b:18). As a rough time frame, the transformations described here occurred between 6500 and 6300 BC (Hodder 2014b:17). 200 years is, however, short enough for human memory to notice that things (houses, pots, relationships between households) were different than they used to be a few decades ago; it is likely that people were aware that their world was changing. Studying the 6500 BC-changes therefore does not only offer the exciting opportunity to study prehistoric social change ‘in real time’; but the change to household autonomy would also cause or influence further transformations that will be discussed in the following. After the 6500 BC change, Çatalhöyük was inhabited for nearly another millennium

until ca. 5600 BC. The last few centuries, excavated in the TP area at the summit of the East Mound (6300-6000 BC, Marciniak et al. 2015b:Fig.5) and on the Çatalhöyük West Mound (6000-5600 BC, Orton et al. in prep), is much less well researched at present than pre-6300 BC levels. Preliminary results indicate a large degree of cultural continuity during those last centuries, and observes changes in material culture seem to represent a gradual further developments of trends that started after 6500 BC (Biehl et al. 2012a; Marciniak et al. 2015b:175).

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Figure 9 Reconstruction of dispersed occupation at Late Neolithic Çatalhöyük (Farid 2014:Fig.4.2).

Autonomous and competing households at Çatalhöyük

Household autonomy here describes the ability of a household to act socially and economically fairly independently from other households within the same community or neighbourhood (e.g. Düring 2011c:98; Düring and Marciniak 2005; Hodder 2014b:6); this economic and social autonomy also has a ritual component. Household autonomy is not an absolute variable; for example, as already

mentioned Hodder (2014b, also Düring 2006:247) describes the Çatalhöyük households as embedded in a careful balance of dependencies and autonomies all throughout the duration of the site, whereby only the weighting shifted around 6500 BC towards greater autonomy. In the context of the discourse investigated here, 'autonomous households' then often seems to mean 'more independent than in the Early Neolithic'.

Autonomy is a partial loosening of the community ties, then. In Section 3.2.3, I have demonstrated that these same ties also maintained egalitarianism. And when the ties between household loosened at Çatalhöyük around 6500 BC, there is evidence that also egalitarianism decreased and social competition emerged or became stronger. Hodder (2014b:12) concludes that egalitarianism subsisted until the end of the occupation at the site, but after 6500 BC there are increasing signs of socio-economic specialisation and differentiation of households. Social competition might have developed along an already existing social fault line: Hodder (2014b:17) believes that the Early Neolithic system of constituting and maintaining the large Çatalhöyük community was "already under threat at the start of the occupation of Çatalhöyük, when house units were both independent and heavily dependent on complex crosscutting social networks. The tensions in this system were released by allowing individual house units greater selfsufficiency" after 6500 BC. In this scenario, the dual demands of maintaining the households while investing resources and time into maintaining suprahousehold ties became steadily unbearable up to a breaking point, after which households shed much of the strongly collectivist community ties and focused on their own production.

Competitive productivity

Household autonomy and competition were at post-6500 BC Çatalhöyük created through higher household-specific economic productivity which also included some economic specialisation. A new use of domestic animals seems to have played an important role in this process. From 6500 BC (Level South P) onwards, there is a sharp increase in the amount of sheep and goats being herded, and sheep and goat

meat started playing a larger role for daily subsistence. At the same time, domesticated cattle is introduced and becomes part of daily consumption whereas earlier (then wild) cattle had been used for special consumption ('feasting', Russell et al. 2013a; Hodder 2014b:12, 16, Fig. 7). There is also tentative evidence from animal bone taxa and pathologies, as well as animal diet (isotopes) that sheep/goats were now managed in smaller herds by individual families or households whereas in the classic levels, herds might have been pooled (Hodder 2014b:12; Russell et al. 2013b:236). Hodder (2014b:16) thinks it might have been the ownership of a large amount of meat (herds) that allowed households to rely more on their own resources and invest less in social security via bonds with other households. When individual ownership became more pronounced, there might even have been the beginning of an accounting system that involved small clay objects (Bennison-Chapman 2013:273-274; Hodder 2014b:16).

Household autonomy and competition just after 6500 BC, then, was based on individual households increasing their productivity, and keeping the results to themselves rather than investing them into suprahousehold relationships. 'History houses', previously nodal points of suprahousehold ties, participated in competition (Hodder 2014b:12). Male members of high-status 'history house' households were significantly more mobile than those of houses with less ritual status (Hodder 2013b:27, 2014d:159-160), suggesting investment in productivity outside the settlement, for example related to herding. Pastoral productivity might then have been one way for households, and especially history house-households, to increase their productivity. Craft specialisation was another one: some Late Neolithic Çatalhöyük households specialised in the production of e.g. antler tool, stone and shell beads, clay and stone figurines, chipped or ground stone (Hodder 2013a:19-20, 2013b:22, 24, 2014b:14). Productive specialisation might have been another way to increase the household's productivity and thus allow economic independence. But specialisation also meant that items were exchanged between households each producing different things (Hodder 2014b:14, 17; 2014c:19), and these items might therefore easily have become incorporated into the increasingly competitive relationships between households. Many of the above named materials that were

part of early specialisation at Çatalhöyük can be described as 'rare' insofar as it required effort to obtain them: the sources of obsidian as well as many of the kinds of stones and shell used for beads and grinding implements were located several days travel from the settlement (Hodder 2014b:14; Nazaroff et al. 2015); and antler could only be obtained by hunting, or opportunistic collection of antlers that had been naturally shed. Antler and stone therefore were not readily available in unlimited quantities, and having and exchanging these rare items could have economically and socially empowered households. There is some additional evidence for this in Hodder's (2013a:19-20, 2014d:161) observation that there seems to be some concentration of stone workshops in history houses at post-6500 BC Çatalhöyük. Investing more heavily into specialisation and mobility, Late Neolithic history houses might thus have been among the first to become socioeconomically more powerful than others.

Architecture responded to these changes. Not only did the settlement contract, but also there increasingly were gaps in the settlement texture, with a few houses forming clusters that were scattered around the mound surface, or even free-standing houses (Düring 2006:228; Farid 2014:96; Hodder 2014b:12). As households started to rely more on their own production, houses became larger, and started to have more complex layouts including several rooms and outdoor areas which enabled them to fit a larger range of storage and production activities (Hodder 2014b:12). The newly abundant open areas within the settlement were more intensely used for productive activities. More firespots are found within middens, as well as ovens and hearths constructed outside which were associated with cereal processing. Some buildings had private yards where activities were performed similar to those inside houses, using installations such as ovens or a mudbrick platform (Bogaard et al. 2014; Hodder 2014b:12, 2014c:18). The use of the house for creating ritual ties between households decreased in importance. Not only did symbolic house elaboration decrease, but also burials and wall paintings were located in different parts of houses, suggesting changes to the rules or conventions by which they were created (Hodder 2014b:1). Also after 6500 BC, building continuity decreased. Houses were lived in for shorter times, abandoned earlier,

and when they were re-built, the new house often did not follow the footprint of the older (Düring 2006:228, 247; Düring and Marciniak 2005:180; Hodder 2014b:15). By 6000 BC, houses often (before 6000 BC in TP) or completely (after 6000 BC on the West Mound) lack symbolic elaboration and subfloor burials have disappeared altogether. In TP, individuals were interred in a constructed burial chamber, and on the West Mound, only two burials were found, both within the infill of houses. In TP, some buildings were continued and others not, and some were lived in for only a short time (Marciniak 2015, 2015b; Marciniak et al. 2015b; Biehl et al. 2012a, 2012b; Biehl and Rogasch 2013).

Competitive hospitality

So far I have described how social competition at Late Neolithic and Early Chalcolithic Çatalhöyük was created through productivity; another important factor was competitive hospitality. The domestic animals that households now invested so much energy in started to be used for feasting, large-scale consumption events involving more than one household: Sheep and goat which had become so important in the subsistence economy were now also used in feasting whereas prior to 6500 BC, (then wild) cattle had been preferred for feasting (Hodder 2014b:16; Russell et al. 2013a:235). After domestic cattle is introduced, it is used alongside wild bull for feasting. The fact that some houses in the later levels (South P-Q and North G-H) have large collections of feasting remains suggests that feasting now had a competitive aspect of display and differentiation, rather than of giving and social inclusion as previously (Hodder 2013b:25; Russell et al. 2013b:236).

Pottery seems to have changed in context to increasing competitive hospitality. Changes to the pottery repertoire after Level O could indicate a new function of these containers in display, exchange and hospitality: a greater variety of shapes is developed, and pottery decoration through cutting and pricking increases (Hodder 2014b:15-16; Yalman et al. 2013). After 6000 BC, painted pottery appears rather suddenly (see 3.3.1), and at the same time, the amount of pottery increased dramatically (Franz and Pyzel in press). Several explanations have been suggested

for the 'painted pottery revolution', but in light of the above discussed use of ceramic dishes in competitive hospitality after 6500 BC, painting might have been adopted as a means for social competition during commensal events (Hodder 2013a:23). Andesite trays that became more common in the TP Area and on the West Mound where they also became footed might equally have been used for display during commensal events (Hodder 2014b:16).

This section has portrayed social competition as an outcome of household autonomy; or household autonomy was a prerequisite for social competition. At Çatalhöyük, households started competing for socioeconomic resources immediately after gaining greater autonomy, with the result that power and wealth hierarchies developed subsequently. The mild, incipient differences in wealth and status observable at Late Neolithic Çatalhöyük East, is described by Hodder (2013b:2, 2014b:5, 2014e:182) with the term 'social differentiation' that also or foremost refers to non-hierarchical differences between households (e.g. Hodder 2014b:11, 14), of which one example is productive or craft specialisation. In this scenario, autonomy, competition and incipient stratification seem like subsequent stages of one process.

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Figure 10 Serving vessels from on the Çatalhöyük West Mound (Franz and Ostaptchouk 2012:Fig.7).

The wider framework: sites other than Çatalhöyük

To what degree are the 6500 BC-changes at Çatalhöyük mirrored at other sites? French (1998:68) interprets that the Late Neolithic to Early/Middle Chalcolithic Canhasan in the southern Konya plain shows no signs of social stratification. There has thus been no discussion of household autonomy and competition at Canhasan. Since Canhasan, occupied at some point during the Late Neolithic and throughout the Early Chalcolithic, remained a clustered settlement after 6500 BC, Düring (2006:280-281, 2011c:141) suggests that this settlement, as well as Late Neolithic Erbaba in the western Konya plain close to Lake Beyşehir, might have followed a different course than Çatalhöyük and remained tightly communities until the end of the Early Chalcolithic. The portrayals of LN-EC Tepecik and EC Köşk Höyük in Cappadocia by Bıçakçı et al. (2012), Öztan (2012) and Düring (2011c:151-154) do not refer to increases in household autonomy, or emergence of social competition. However, a process similar to the above outlined changes at Çatalhöyük after 6500 BC has been recognised by Arbuckle (2012a) at Early Chalcolithic (post-6000 BC) Köşk Höyük in Cappadocia. Arbuckle outlines evidence that the inhabitants of the site regularly engaged in meat-feasting events that had a competitive aspect; competition evolved around the differential contribution of households to the feast, and attribution of meat shares to households/individuals during the feasts. Feasting events allowed household to display their economic and social success by providing meat and decorated ceramic dishes. Arbuckle points out that the negotiation of social relations through food sharing had a long tradition since at least the Neolithic, but now they were used to display socio-economic differences publicly. The Early Chalcolithic is thus, in Arbuckle's (2012a:310) reconstruction, the period when social and economic inequalities first emerged in Cappadocia, and by the Middle Chalcolithic they became clearer visible in the material culture including settlement architecture (3.4.3).

In the Lake District, Düring (2011c:163-172) recognises at Late Neolithic-Early Chalcolithic Hacılar, Bademağacı and Höyücek as made up from spatially defined house clusters, occupied by kin groups that shared resources; he does not seem to recognise signs of social competition. By contrast, the excavators of the above

named sites recognise many signs for social stratification at LN/EC Lake District sites. Duru (2008:7) interprets the fortification walls of Kuruçay 11 (6100-6000 BC; Thissen 2010:Fig.13) as a sign for the formation of social stratification and “the concentration of authority” in the hands of a few. For the following Early Chalcolithic, he (Duru 2008:8) reconstructs that settled farming communities became increasingly prosperous, causing raids by nomadic groups (see below) which in turn gave rise to “the emergence of strong individuals or those of status to rule over the society”. Similarly, Mellaart (1970:c34; and Steadman 2000b:183-184) reconstructed Hacilar II (6100-6000 BC, Figure 3) as a village separated into two parts with richer people living in the more substantial houses in the west, and ‘poorer’ people in the eastern half. Part of this argument is based on the differential distribution of painted pottery in the village (Mellaart 1970c:34, 38). This village further had a religiously justified institution of authority residing in an elaborate building that Mellaart (1970c:36) refers to as ‘shrine’: “the building was therefore probably the main village shrine and the seat of the local authority, responsible for the welfare, both religious and economic of the small society of Hacilar II”. He further (Mellaart 1970c:77) interprets the ‘fortress’ of Hacilar I (6000-5800 BC) as the seat of “a ruler who had command of considerable human resources” as evidenced in the precision with which the fortress is constructed. This ruler might have resided in the multi-roomed building ‘block A’ (Mellaart 1970c:85)

In conclusion, signs for social competition or stratification have also been identified at other sites in southcentral Anatolia starting around 6100-6000 BC. At the same time, the developments in Cappadocia, the Lake District and even Canhasan seem different from those at Çatalhöyük; differences in social status might be both differently configured and differently expressed in material culture. It is important to keep in mind that since farming only arrived at the Lakes around 6500 BC, it would not be surprising if the millennium that followed saw a cultural development different from central Anatolia. However, it would also be possible to recognise similarities: decorated pottery seems to have been used for social competition in all three regions. Overall, there is more potential to study in combination the here outlined evidence for emerging status differences, and compare and contrasts

developments from different sites that appear poorly synthesised at the moment.

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Figure 11 Reconstruction of Hacilar IIa (Mellaart 1970c:Fig.22).

3.3.4 Mobility, dispersal and the development of cultural landscapes

Alongside the increased herding that was a basis of household autonomy, the use of the landscape by the Çatalhöyük community changed. Skeletal remains of both animals and humans, and isotopes studies suggest that mobility increased throughout the centuries between 6500 and 6000 BC. Isotopes from sheep bones show that after 6500 BC, their diet became more varied suggesting that they were grazed over increasingly wider territories (Hodder 2014b:13; Pearson et al. 2007). Since the ownership of large herds was now not only possible, but also desirable within the social makeup of the settlement, it would have both attractive and necessary to secure the well-being of animals by moving them to favourable grazing areas away from the immediate surrounding of the site. Together with animals, people moved as well: From South P onwards, human skeletal evidence suggests

increased mobility of both men and women (Hodder 2014b:15; Larsen et al. 2013:400-401, 2015:33). This does not indicate nomadic pastoralism, but rather a type of mobility whereby groups operated from a permanent settlement (Çatalhöyük), but spent part of the year traveling and using campsites (Hodder 2014b:13-14). One such campsites was Pınarbaşı, 24.5km south of Çatalhöyük in the Konya plain, which has produced evidence of occupation as a seasonal camp for sheep herders and possibly hunters between 6500-6000 BC (Baird 2012a:447, 2012b, Hodder 2014b:14). Overall, the newly autonomous Çatalhöyük households increasingly used areas further away from the site for their increased productivity (Hodder 2014b:12).

Herding might have been a primary focus of this extension of household productivity into the landscape, but other items of material culture also display it. After South M (6500 BC), pottery was mainly produced from clays probably originating from volcanic regions west of the site, instead of from local clays as previously (Doherty and Tarkan 2013; Hodder 2014b:10). Shell and stone used for bead production after 6500 BC also made use of a greater variety of raw materials brought from different locations, of which some also came from greater distances (Hodder 2014b:14). Next to Cappadocian obsidian, the later levels also contain obsidian obtained from the Lake Van area 650-800km to the east of the site (Carter and Milić 2013:417; Hodder 2014b:14-15). Ostaptchouk (2014) has reconstructed that by ca. 5900 BC, people on the West Mound obtained stone for chipping through several networks, of which one brought flint from at least 200km to the east. Hodder (2014b:10) links these developments, too, with the new intensity of household-specific production in the course of which households increasingly came to create and sustain relationships with other communities, outside of the Çatalhöyük settlement.

Mobility is used here (similar to e.g. Baird 2005:55; Hodder 2013a:21, 2013b:21) as characterising a socioeconomic whereby groups of people spend at least some months of the year moving from place to place and exploiting resources scattered throughout the landscape, never staying in one place for longer than a few days or weeks. A main reason for mobility in Late Neolithic and Chalcolithic central Anatolia

(see 3.4) was the caretaking of large herds of sheep, therefore the terms 'pastoralism' (Arbuckle 2012a:310) and 'transhumance' (Bachhuber 2015:39) are also often used in the literature to refer to what is here more neutrally called 'mobility'.

Cultural landscapes

The temporary use of the landscape, including camps like Pınarbaşı, after 6500 BC in the Konya plain seems to have taken more permanent form after 6000 BC. It was already mentioned that for most of its earlier phases not many settlements existed on the southern Konya plain other than the large sites of Canhasan and Çatalhöyük (3.3.2), but in his survey of the Konya plain around Çatalhöyük, Baird (2002, 2005, 2012a:446) found a marked increase in sites on the Çarşamba alluvial fan after 6000 BC. The many (14) Early Chalcolithic sites were smaller and possibly more short-lived – while Çatalhöyük (West) might have been a larger, more permanent settlement that could have had a central role in the interaction of the many communities on the Çarşamba fan (Baird 2002:150, 2005:71-73). It is possible that environmental factors played a role in this development: around ca. 6200 BC, the seasonal flooding of the Çarşamba alluvial fan ceased, making it possible to establish permanent sites in more places than before (Roberts and Rosen 2009:399). Baird (2012a:446) suggests that these new settlements were established by people who left Çatalhöyük, but it might just as well have been people coming from elsewhere. In either case, communities were now embedded into a cultural landscape with other communities permanently living nearby.

Some very tentative evidence for pastoral part-mobility comes from LN/EC Cappadocia as well. In Cappadocia, Bıçakçı (in press) cites environmental evidence for the existence of substantial pastoral use of the landscape during Neolithic or Chalcolithic times, but the Tepecik faunal assemblage has not yet been analysed with regards to pastoral mobility. Unfortunately, survey evidence as summarised by Allcock and Roberts (2014) cannot be used to contextualise the observation at Tepecik, since a majority of sites dated to the Chalcolithic are not dated any more

precisely, and the development noted by the authors whereby more sites in more varied settings were created during the Chalcolithic (Allcock and Roberts 2014:48) might postdate the EC.

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Figure 12 Early Chalcolithic settlements around Hacilar and Kuruçay attested by survey (Vandam 2015:Fig.13-3).

In the Lake District, a recent survey by Vandam (2015; De Cupere et al. 2015:3) in the Burdur plain has shown that dense occupation and a similar settlement pattern as that observed in the Konya plain was also present since the start of Neolithic occupation: small to medium sized villages were scattered around the landscape. Their proximity (e.g. 10km between Hacilar and Kuruçay) suggests that the communities were in contact (Duru 1994c:104; Umurtak 2011b:6). After 6100 BC in the Early Chalcolithic, additionally isolated farmsteads or hamlets of small size are

also present. In the immediately surrounding (< 5km) of Hacılar and Kuruçay (Vandam 2015:288), several smaller settlements were found. In conclusions, landscapes across southcentral Anatolia became more dynamic after 6500 BC. In the Konya plain, more intense roaming in the plain around Çatalhöyük 6500 BC led to the establishment of satellite campsites, and after 6000 BC of fully established and permanent villages. In Cappadocia, a similar process might have taken place, but the evidence is less secure than in the Konya plain. In the Lake District, the newly established farming settlements formed a dense cluster of small and medium-sized sites from the start, but after 6000 BC the cultural landscape became denser when very small settlements appeared in the landscape.

3.3.5 Warfare?

The excavators of Late Neolithic and Early Chalcolithic Lake District, James Mellaart and Refik Duru, paint a picture in which this region first experienced a few centuries of peace after the introduction of farming, but then entered a period of turmoil in ca. 6100 BC that extended until the Late Chalcolithic. The evidence for this comes mainly from the architectural record: at Hacılar, Höyücek, and Kuruçay, the excavators interpreted levels of destruction, sometimes through fire; changes in building and sometimes pottery traditions interpreted as a changeover in population following attacks; and fortification walls with defensive function. Possible fortifications were found at Bademağacı ENII4-3 (6350-6200 BC; Duru 2012:17), Kuruçay 11 (Duru 2008:42), Hacılar VI (Mellaart 1970c:10), Hacılar II (Mellaart 1970c:25) and Hacılar I (ca. 5800 BC, Mellaart 1970c:75) and Late Chalcolithic Kuruçay 6 (Duru 2008:123; all dates from Thissen 2010:Fig.3).

Both Duru and Mellaart reconstruct that the threat came from outside the region: Mellaart (1970c:16) interpreted the fires that destroyed Hacılar VI, IV and IIa as accidents, but found (Mellaart 1970c:145, 1978:24-25) that Hacılar II was intentionally destroyed and Hacılar I established through the invasion by a people from southeast Anatolia who brought with them a new style of decorating pottery.

Duru connects the frequent destruction levels observed at different Early Chalcolithic sites—e.g. Kuruçay 7 (ca. 5900 BC, Duru 2008:15); Hacilar Ib (ca. 5800 BC, Mellaart 1970c:76)—as the result of “plundering raids launched by nomadic groups who had not as yet switched to a sedentary way of life” and were taking advantage of the prospering sedentary groups (Duru 2008:8). This constant threat, he claims, led to the fortification of Hacilar and Kuruçay, as well as to the establishment of more authoritarian social structures, with a ruling elite as discussed above; emerging warfare and social stratification are therefore related (Duru 2008:8-9). Clare et al. (2008) recently connected the evidence of warfare in the region with the 8.2ka climatic event and suggested the destruction in the Lake District was inflicted by people who had come under economic stress in the semi-arid areas of central Anatolia after climatic deterioration (Clare et al. 2008:81-82). They further (Clare et al. 2008:78, 79) identify a defensive aspect in the linear arrangement of (yet unexcavated) contemporary sites in the Beyşehir plain, i.e. at the border of Lake District and Konya plain, stating that “long linear arrangement of sites provid[ed] inhabitants with mutual support from neighbouring communities in times of danger”.

This account of Late Neolithic and Early Chalcolithic warfare in the Lake District not only contrasts with the current understanding of contemporary developments in the rest of Asia Minor, where no signs for large scale violence have been observed, but also recently the evidence basis for above scenario has come under attack. The invasion of Hacilar II by those people who built Hacilar I was convincingly challenged by Rosenstock’s (2010a) recent re-evaluation of the excavation evidence, who instead argued for stratigraphical and cultural continuity. Düring (2011c:165) has pointed out that the house fires observed at Lake District sites need to be further investigated to determine whether it was arson or accident. Düring has further questioned the existence of fortification walls at Kuruçay 11 (Düring 2011a:72, 2011c:171), Hacilar I (Düring 2011a:73; Rosenstock 2010a:24) and Late Chalcolithic Kuruçay 6 (Düring 2011a:76), as well as the chronology used by Clare et al. (2008) to connect archaeological evidence to the climate sequence. There is therefore disagreement about whether or not there was warfare in southcentral Anatolia

between 6500 and 5500 BC. The term **warfare** is used in this thesis (as in Bachhuber 2015:127; Clare et al. 2008; Selover 2015:6-10), to describe larger-scale violent conflict between different social groups, mostly between groups that live in different settlements. This sets it apart from smaller-scale and/or non-violent conflicts and tensions that are expected to also have occurred in prehistoric Anatolian communities (e.g. Hodder and Cessford 2004; Özbaşaran and Duru 2015:50; Selover 2015:6-10).

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Figure 13 Reconstruction of the Kuruçay Level 11 fortification walls (Duru 2008:Fig.82).

3.3.6 The Late Neolithic and Early Chalcolithic: a summary

Between 6500 and 5500 BC, social organisation in southcentral Anatolia changed: increasing household autonomy, emerging social competition and stratification, increasing mobility and possibly emerging warfare constitute four interrelated processes observed in different intensities and forms across the three regions studied here. The first intimations of social competition and differentiation are of particular interest; they suggest that the origins for social stratification that would emerge in the Middle Chalcolithic (3.4) and grow into the Early Bronze Age (3.6.)

can be found in the LN and EC. A number of very recent publications (especially Arbuckle 2012a; Duru 2008; Hodder 2014b) have made a number of new suggestions as to the details of the process, which can be contrasted with older ideas (e.g. Mellaart 1970c); it is therefore an interesting topic to research for this thesis. The processes by which social status differences emerged during the LN/EC are so tightly interwoven with emerging mobility, which produced the means (herds, meat) for households to compete; household autonomy, which might have been a precondition for social competition; and warfare, which in the Lake District might have emerged alongside differences in social status. In conclusion, this thesis will focus on researching a particular aspect of changing social organisation in the LN/EC, that of emerging differences in socioeconomic status; and it will research this process in relation to three other social processes that new research has suggested as characteristic of southcentral Anatolia: increasing household autonomy, mobility and warfare.

3.4 5500-4000 BC: The Middle Chalcolithic

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Figure 14 Middle and Late Chalcolithic sites in Asia Minor (Düring 2011c:Fig.6.1). Sites mentioned in this section and the next are: 24 Beycesultan, 25 Kuruçay, 26 Bağbaşı, 40 Kabakulak, 41 Güvercinkayası, 43 Köşk Höyük, 44 Canhasan.

3.4.1 Absence of evidence or evidence of absence?

Across Asia Minor the Middle Chalcolithic is poorly investigated, although more Middle Chalcolithic sites have been excavated in the last few years (Düring 2011b:797, 2011c:223, 232). In southcentral Anatolia in particular, the number of known Middle Chalcolithic sites is dramatically lower than from all other periods of prehistory. In fact, only three Middle Chalcolithic sites have been excavated in central Anatolia: Canhasan, Köşk Höyük and Güvercinkayası—and no sites in the Lake District. With the beginning of the MC, other regions of Asia Minor start to be much better documented, and the focus of discussion (e.g. in Düring 2011c) moves away from the southcentral regions. To what degree does the empty map of Middle Chalcolithic southcentral Anatolia represent research bias, rather than actual developments in the past?

Düring (2011b:796-797, 2011c:200-201) ascribes a main responsibility for the poor state of Middle Chalcolithic research in Asia Minor to a neo-evolutionary research agenda, which views Anatolian prehistory as a series of important threshold events that led towards social modernity. In such a research framework, the 'millennia in the middle'—between the Early Neolithic and the Early Bronze Age—are of relatively little interest, the Middle Chalcolithic even more than other periods: "This problem is mitigated to some degree for the Early Chalcolithic, which is often considered an extension of the Neolithic, and the Late Chalcolithic, which is commonly perceived as the initial stage of the subsequent Early Bronze Age. Whereas the Middle Chalcolithic in particular has been caught in the middle, one might say" (Düring 2011b:796). Few projects across Asia Minor have explicitly researched the MC directly. Instead, most known Middle Chalcolithic material was discovered during projects focussed on other periods (Düring 2011b:797, 2011c:202). The Middle Chalcolithic is further generally neglected in the synthesising literature. Düring (2011b:797) points out that the MC is dealt with in one paragraph in Sagona and Zimansky (2009:134), and not discussed at all in Yakar's (1985, 1991, 1994) overview monographs on prehistoric Anatolia. In the context of a research bias against the revolution-less Late Neolithic and Chalcolithic, the Middle Chalcolithic is therefore clearly the most neglected period, despite its considerable length of 1500 years. A neo-evolutionary lack of interest might therefore be partially responsible for the 'Dark Ages' of the Middle Chalcolithic. There remains, however, the real fact that very few MC sites are known despite some projects explicitly setting out to find them (e.g. Vandam 2015:284). It will be argued here that this is due to two interrelated facts: the problematic of recognising MC material during surveys; and a real absence of sites of substantial size.

Baird's Konya Plain Survey showed a noticeable reduction in site numbers during the Middle Chalcolithic (Baird 2002:151, 2005:62, 73, Fig.5.6). Çatalhöyük West is abandoned some time before the start of the MC. In Chapter 2/Appendix 1 it has been demonstrated that in an updated chronology of Canhasan, the uppermost Level 1 can probably be dated to the MC; the previously MC-dated Level 2a however is clearly Early Chalcolithic. This in turn questions the dating methods used

by the Konya Plain Survey, which relied on French's Canhasan chronology (French 1998:69) to date survey pottery to the Middle Chalcolithic (Baird 2005:62). It must therefore be assumed that the six sites identified as MC based on painted pottery styles (Baird 2002:144) are in fact all EC, and that no MC sites at all are recorded in the Konya plain. At the same time, Düring (2011c:246) notes that Canhasan Level 1 has monochrome pottery similar to wares that were dated as Late Chalcolithic by Mellaart (1963d:199) during his surveys of the Konya plain, which was also the reason why French (1998:69) originally dated Level 1 to the LC (see Appendix 1). It is thus possible that some of the many (36) LC sites recorded for the Konya plain through surveys (TAY 2016) are in fact rather Middle Chalcolithic. In sum, the only excavated MC site in the Konya plain is Canhasan. Previous ambiguities in the dating of Canhasan have compromised the reliability of survey results to the point that it is not possible to say where Middle Chalcolithic occupation actually exists on the Konya plain.

No Middle Chalcolithic sites whatsoever are known from the Lake District. No previous survey, including a recent one by Vandam, has identified a single MC site (Vandam 2015:289), including the first 500 years of the Late Chalcolithic until 3500 BC (DeCupere et al. 2015:7), a situation that Duru (Duru 2008:188-189; also Eslick 1980) interpreted this as the practical desertion of the region during this period. Vandam (2015:289, 291), however, points out that without known MC sites from the region there is no way of knowing what MC material might look like and thus it would not be recognised in surveys; a precarious situation similar to that in the Konya plain which can only be overcome by excavating stratified MC material. Vandam also points out that no Middle Chalcolithic occupation was found at excavated Lake District sites with occupation spanning from the LN or EC to the LC or EBA (Vandam 2015:292), suggesting that indeed MC occupation was absent or covered only a very small part of the sites. My re-evaluation of site chronologies (Chapter 2/Appendix 1) confirms that at Kuruçay and Bademağacı, the two excavated sites with occupation prior to and after the MC, no MC occupation was attested—in fact, at both sites occupation ceased some time around 5900-5800 BC and they are not reoccupied until the LC and EBA respectively. Since radiocarbon

dating was used sparingly in these excavations, however, it is possible that remains dating to between 5500 BC and 4000 BC were simply subsumed within levels ascribed to the EC or LC. It remains to be seen what layers will be excavated under the EBA layers at Hacilar Büyük Höyük, currently under excavation. The excavators found the easily recognisable EC painted pottery within EBA fill, and assume the existence of pre-EBA levels to be excavated within the next few years (Umurtak and Duru 2012, 2014).

Vandam (2015:293-296) concludes for the Burdur plain that the lack of MC sites in the surveyed areas is not an oversight, but also that the favourable environment make a total absence of human activity over 1500 years unlikely. Rather, settlements might have changed in nature, e.g. to shorter-lived settlements with architecture made from organic materials producing thin deposits; or occupation relocated to more marginal areas, such as hillsides or hilltops, and were thus not found in surveys that tend to concentrate on plains—this settlement relocation or transformation still, however, suggests substantial cultural change (Vandam 2015:293, 295). One possibility—a change to more mobile lifeways—will be discussed below. It must also be pointed out here again that excavations as well as newer surveys have concentrated on the southwestern area of the Lake District around Burdur and Bucak (Belli 2002:Map 2; Vandam 2015:Fig.13-2). It is thus possible that the observed cultural change at the beginning of the MC encompassed only this area within the Lake District, not the entire District.

In Cappadocia, all excavated EC sites—Köşk Höyük, Tepecik, Musular and Gelveri—had been abandoned by the end of the EC. However, around 5200 BC, Köşk Höyük was reoccupied and a new site was established: Güvercinkayası. Two more Middle Chalcolithic sites known through survey, Büyük Deller and Kabakulak, both close to Güvercinkayası, are recorded by TAY (2016) and (Düring 2011c:233, 244). Since Middle Chalcolithic sites are excavated in Cappadocia, recognising MC pottery during surveys might have been less of an issue and these data might actually represent an overall scarcity of MC settlements. However, prior to the start of the Köşk Höyük excavations in 1981, surveys such as that by Ian Todd (1964-1966, Todd 1980) that is cited as a main source by Allcock and Roberts (2014:34) would not

have been able to relate surface finds to the red and black burnished ware that characterises the MC assemblages at Köşk Höyük and Güvercinkayası (Düring 2011c:244). Summarising the results from several surveys in Cappadocia, Allcock and Roberts (2014:46, Fig.4) note that sites proliferate in the Chalcolithic, but can often not be dated to a subphase of the Chalcolithic. They list (Allcock and Roberts 2014:Tab.2) only two sites dated securely to the Middle Chalcolithic, but 163 sites that are not dated more specifically to any period of the Chalcolithic, and more Middle Chalcolithic sites could be hidden in this figure. It must be remembered that Köşk Höyük and Güvercinkayası represent only a short time period within the MC, and from the rest of the period no excavated settlements are known within Cappadocia to help with the relative dating of surface assemblages—unless sites excavated just north and east of Cappadocia (Figure 14) are used as points of reference, which however often allows only a very broad chronological attribution (Düring 2011c:244-245), which explains the high number of ‘Chalcolithic’ sites reported by Allcock and Roberts (2014).

To sum up, the lack of known Middle Chalcolithic sites in southcentral Anatolia might partially be due to research bias. No MC site has been excavated in the Lake District, and the single site (Canhasan) in the Konya plain has only recently been recognised as such. However, surveys can only find sites from a certain period when diagnostic finds have previously been securely dated in an excavated site. Nevertheless, the abandonment of sites prior to, or around, 5500 BC, and the lack of substantial MC occupation at sites spanning the EC to LC, could indeed point towards a substantial reorganisation of settlement and society (Vandam 2015:293) in both regions. In Cappadocia, on the other hand, substantial MC sites were found and excavated in Cappadocia, suggesting different processes occurring here.

3.4.2 Middle Chalcolithic mobility?

The sparsity (or total absence) of MC remains from the Lake District and Konya plain poses the question as to whether this period might have been characterised by more mobile lifeways. Without any material remains of human occupation, it is

impossible to reconstruct Middle Chalcolithic lifeways in the Lake District, but a change to more mobile lifeways could be one possible option to explain the seeming absence of sites. Mobile peoples would have used different parts of the landscape than sedentary farmers, and constructed more ephemeral and less archaeological visible settlements; this fits with Vandam's (2015:293, 295) suggestion that settlements relocated and became more short-lived during the MC and DeCupere et al's (2015:7) observation that in the Burdur plain "palynological and sedimentological data point towards a low anthropogenic impact" between 5500 and 3500 BC, thus indicating that people were present in the area, but practising low-impact economies. Sites probably used sporadically by mobile groups during the MC were found in the Taurus mountains (cave sites) and intermontane valleys just south of the Lake District (Düring 2011c:219; Eslick 1980:13; Vandam 2015:294) which is not direct evidence for mobility in the Lake District, but at least in the wider region.

In the Konya plain, the increasingly part-mobile lifeways that have been observed from the Late Neolithic and Early Chalcolithic (see 4.3) might have led to communities eventually taking to mobile pastoralism entirely. The possible remains of a Middle Chalcolithic⁶ camp used sporadically by mobile pastoralists was excavated at Canhasan Level 1. After the Early Chalcolithic occupation represented by Level 2 came to an end, the site was not occupied for an unknown period of time. When it was re-occupied, Level 1 architecture was very different to that of Level 2, with free-standing buildings surrounded by large open areas that featured pits, paving, hearths and storage installations (French 1998:50-54, 66-67, Fig.26-31). Both the buildings and the outside areas provided ample room, and French (1998:67) remarks that "there is now space inside or beside the structure for the safe-keeping of animals". The Level 1 architecture not only abandoned the tight clustering and layout of buildings that was observed in the LN-EC layers, but the walls are also thinner, the buildings had only one storey and no standardised layout,

⁶ See Appendix 1 for a discussion of the Canhasan chronology. This thesis prefers to date Canhasan Level 1 to the MC, but the original date suggested by French (1998:69) was LC. If Level 1 is dated to the LC, the Konya plain is without excavated MC sites, and the discussion of whether this occupational phase represents part-nomadic occupation should instead be seen in the cultural context of the Late Chalcolithic.

and were “constantly changed and adapted” (French 1998:50-53, 67). A domestic function can be deduced from the hearths, ovens and benches found in at least some structures (French 1998:67). Düring (2011b:800-801, 2011c:246-247), using ethnographic parallels, suggests that the nature of Canhasan Level 1 buildings and their frequent alteration might indicate transient, episodic use rather than permanent use. The thin walls could indicate temporary roofs/tents rather than constructed substantial roofs, and the many large storage installations could have been essential while their owners were travelling. The size of the buildings could indicate that they served as a camp for more than one household (Düring 2011c:246), or else that they were also used to house animals as suggested by French (1998:67).

In Cappadocia, animal remains from the two excavated Middle Chalcolithic sites (see below) show evidence of increased mobility, although not by the residents of these villages. At both sites, isotopes show the increased mobility of sheep, but the culling age distribution suggests that animals were not kept at the settlement (Arbuckle 2012b:308-310). Based on this evidence, Arbuckle (2012a:309) argues that the sedentary inhabitants of Köşk Höyük and Güvercinkayaşı were provisioned with meat “through an increasingly complex, large-scale and mobile pastoral system”. This suggests that the above noted scarcity of (substantial and therefore recognised) Middle Chalcolithic sites could reflect that the landscape was used by prosperous nomadic pastoralists alongside settled farmers. The presence of mobile pastoralists is only indirectly reflected in the Köşk and Güvercinkayaşı assemblages; direct archaeological remains of pastoralists, such as transient camps, have not (yet) been identified.

To sum up, mobile peoples might have dominated the cultural landscapes of the Lake District and Konya plain during the MC; in Cappadocia substantial village settlements existed that interacted with an ever more specialised and prosperous part-nomadic pastoral economy. This chapter has portrayed the nature of this transition as very gradual: pastoral mobility became economically more important in central Anatolia after 6500 BC (3.3.3) and across southcentral Anatolia, more varied cultural landscapes with small dispersed settlements existed since ca. 6000

BC (3.3.4). This process might eventually have morphed in to a new social reality whereby many groups across all three regions discussed here did not live in large, permanent settlements any more: the long-standing permanent settlements that existed during the LN and EC were abandoned, but this happened at different sites at different times between 6000 and 5500 BC (Figure 3). This observation discounts not only Duru's (2008:8, 189) scenario of raiding nomads putting an end to the prosperous settled life of the Early Chalcolithic, but also qualifies suggestions to connect the nomadic transition to climate change (cf. Clare et al. 2008:81-82; Vandam 2015:295-296). It is difficult to combine the fact that the transition to widespread mobile lifeways took at least a few hundred years with an explanation of pressure by external forces only. Instead, internal social/ cultural processes would have at least contributed to the process, and these could have had a lot to do with the economic opportunities offered by owning sheep herds: the prosperity of Cappadocian MC pastoralists as reconstructed by Arbuckle (2012a, 2014) shows that this might have been an attractive socioeconomic option during the Middle Chalcolithic.

3.4.3 Cappadocian villagers, pastoralists and chiefs

Two Middle Chalcolithic settlements have been excavated in Cappadocia, both radiocarbon dated to 5200-4800 BC (Düring 2011c:241-242; or 5300-5700 BC suggested by Arbuckle 2012a:303). The architectural and animal bone records from both Güvercinkayası and Köşk Höyük give indications of hierarchical structures and socio-economic differences that might have evolved alongside an agro-pastoral economy. Further, both sites might have been located strategically to control the surrounding: Köşk Höyük in relation to obsidian sources (Özbaşaran 2011:118), and Güvercinkayası overlooks a river valley that forms an important east-west communication route (Arbuckle 2012a:303).

At Köşk Höyük, about 60km southeast of Güvercinkayası, the Middle Chalcolithic Level 1 was separated from the EC occupation by a hiatus of about 300 years (Figure 3) and when the site was reoccupied the settlement layout was very different, with

houses forming rows along wide, stone-paved streets (Arbuckle 2012a:303; Öztan 2003:70). The excavators interpret this regular layout as the sign of centralised decision making (Arbuckle 2012a:303). Level 1 is well preserved (Düring 2011c:242), possibly because at least some of its buildings were destroyed by fire (Öztan 2003:71). The buildings making up this level were all residences and similar to each other, normally with a storage room in the back and a large main room that featured hearths, ovens, platforms, posts and niches in the walls. Under platforms and walls, burials were found in pits and pots, predominantly of infants and children, and often with grave goods (Düring 2011c:242; Öztan 2003:70-71). Although following the same layout as the other residences, one house at Köşk Höyük, House II, was nearly twice as large as the other buildings, with large storage space. It was burnt twice, and its inventory is exceptionally well preserved. It consisted of large amounts of pottery, as well as female figurines, bone tools and grinding implements (Arbuckle 2012a:303; Düring 2011c:242-244; Öztan and Faydalı 2004). Arbuckle (2012a:303; similarly Düring 2011c:243-244) suggests reconstructing this as the residence of people with “a prominent, and perhaps central, role in the community”. This is further supported by faunal evidence, since it can be reconstructed based on deposits found associated with houses that the large House II had preferential access to quality cuts of meat (Arbuckle 2012a:309).

Güvercinkayası, excavated since 1996 by Sevil Gülçur, was a settlement newly founded on top of a steep rock formation. It seems to have been occupied only for 400 years during the Middle Chalcolithic, its occupation radiocarbon dated to 5210-4810 BC (Düring 2011c:241; Gülçur and Firat 2005:41). The settlement did not exceed an area of ca. 1-2ha (Arbuckle 2012a:303; Gülçur 1997:85), confined by the limits of the hill top and an estimated 80% of the site have been excavated so far (Gülçur et al. 2016:423). Estimated from the size of excavated houses, not more than 40 buildings in total could have fitted on the hilltop during one occupation phase (Düring 2011b:804), housing a population that Düring (2011c:241) estimates to be around 200 people. Three successive levels of densely clustered buildings were found, and it is the last and best documented phase, well preserved because it was burned (Gülçur and Firat 2005:44), that much of the discussion of the site

centres on. The excavators reconstruct an upper and a lower settlement at Güvercinkayası (Arbuckle 2012a:303; Gülçur and Firat 2005:42). The lower settlement consisted of a dense cluster of relatively small houses along a street. The stone buildings were relatively uniform in size and layout, measuring 20-30m² and consisting of a main room with oven and hearth that could be accessed via a door, and a smaller, back room used for storage, as evidenced by silos and pots that were embedded into the floor. Overall, this layout resembled houses at Köşk Höyük (Düring 2011c:241; Gülçur and Firat 2005:42). Of the built structures excavated in the 'upper settlement', two were twice as large as the residences in the 'lower settlements', and featured large ceramic assemblages, a unique assemblage of high-status objects, such as copper tools, stamp seals and imported painted ceramics, clusters grinding stones and several large ovens, as well as ceramic storage jars with significantly larger storage capacity than the smaller residences. The upper settlement was located directly adjacent, but separated from the lower by a thick wall with at least three round external towers (Arbuckle 2012a:304; Gülçur and Firat 2005:43-44).

The excavators suggest reconstructing the Güvercinkayası 'upper settlement' as a building complex used for storage, and potentially as residence, by a group of people who controlled a significant agricultural surplus and used it to exert influence over others—a 'chiefly estate' within a stratified society (Arbuckle 2012a:304, 310; Gülçur and Firat 2005:43; Gülçur and Kiper 2008:251; Gülçur et al. 2015:554) evidently separated and protected from the rest of the resident community by the above mentioned wall and towers. At Güvercinkayası, the signs of differential access to meat is even more pronounced than at Köşk Höyük. The spatial distribution of consumption and butchering assemblages shows that across the lower settlement households seem to have had equal access, processing entire carcasses. In the upper settlement, butchery waste was nearly absent, which suggests that the upper settlement was provisioned with high-quality cuts of meat that were initially butchered in other parts of the settlement (Arbuckle 2012a:309). Alternatively, the evidence can be used to suggest that the 'upper settlement' was a communally used storage and meat-consumption space, as previously suggested by

Gülçur and Firat (2005:43).

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Figure 15 Plan of Güvercinkayası (Arbuckle 2012a:Fig.2c).

Düring (2011c:244) objects to this reconstruction by stating that the Güvercinkayası community would have been too small to have hierarchies, but this argument seems less viable given that the community might have extended beyond those permanently living in the settlement: Gülçur (Gülçur and Kiper 2007:118; also Arbuckle 2012a:304) interprets Güvercinkayası as a pre-urban settlement that housed an elite who controlled the surrounding land and defended themselves and their surplus behind defence walls—the beginning of a class system. As mentioned above, Arbuckle (2012a:309) reconstructs both Köşk Höyük Level 1 and Güvercinkayası as connected to an independent, large-scale and off-site pastoral

economy and provisioned entire settlements with meat, milk and probably wool, and the products of this pastoral sector were used in status assertion in ways explored in the next paragraph.

Although individual aspects of the here outlined current reconstruction of the social system at Köşk Höyük and Güvercinkayası could be contested—for example, Düring (2011b:805, 2011c:244) cautions that the social function of the possible defence wall around the ‘upper settlement’ of Güvercinkayası needs to be better investigated, and the same could be said for the potential roles of these two sites as centres of a larger, pre-urban settlement system—it is tempting to interpret the evidence from Middle Chalcolithic settlements in Cappadocia as the further development of processes that started at Late Neolithic Çatalhöyük in the Konya plain and at EC Köşk Höyük: communities with increasing socioeconomic differentiation that evolved around the ownership of animal (particularly sheep) herds—a highly visible form of wealth—and/or access to their products (Arbuckle 2012a:310). Arbuckle (2012a:310) posits that, by the Middle Chalcolithic, the mechanisms through which the ownership of animals was translated into wealth and power had changed: instead of asserting status subtly through competitive, yet still ostensibly community-oriented feasts, as at EC Köşk Höyük, the emerging elites began to overtly assert wealth and influence through preferential access to meat.

Based on this discussion, **social stratification** can here be defined as being marked by social hierarchies and differentiation whereby some households/groups of people acquire more status or wealth than others. Other terms encountered in the literature to describe what is here called stratification are hierarchy (e.g. Düring 2011c:289) or inequality e.g. Arbuckle 2012a; Düring 2011a:80). As the Köşk Höyük and Güvercinkayası examples show, social stratification had a social element (power); and an economic element (wealth), i.e. ownership of or control over things that were sought-after, such as meat/livestock (Arbuckle 2012a) and maybe other agricultural resources. Further, the beginnings of a wool economy at these two sites, as tentatively reconstructed by Arbuckle (2012a) are particularly interesting in relation to the fact that by the Late Chalcolithic and Early Bronze Age, wool would

have become a commodity produced and traded on a large scale in Anatolia, as well as in Mesopotamia, and functioned as an item that secured wealth and power to its owners (Arbuckle 2014). An element of socioeconomic power is indicated by clustering of grinding stones and pottery inside the potential elite residences at Köşk and Güvercinkayaşı, and also storage capacities and stamp seals (administrative tools) in the case of Güvercinkayaşı. These finds seem to show that elite status was related to the control of storage and/or processing of food resources for a larger group, as suggested by Gülçur and Kiper (2008:251) and Arbuckle (2012a:310) for Güvercinkayaşı. However, the fact that elite residences at Köşk and Güvercinkayaşı took the form of 'large houses' could indicate that the elites residing in them were limited in their ability to express their status and intended to naturalise their position through the " 'framing' of the new MC social system within the fundamentally Neolithic lexicon of households" (Arbuckle 2012a:310).

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Figure 16 Köşk Höyük Level 1 (Arbuckle 2012a:Fig.2b).

3.4.4 The Middle Chalcolithic: a summary

This section has argued three points; first, the MC might across southcentral Anatolia have been dominated by mobile lifeways, and it is relatively difficult to detect signs for mobility and the archaeological record. Second, the two excavated MC settlements in Cappadocia display relatively clear signs for social stratification, constructed in ways that seem to form a continuation from the LN/EC social competition: elites distinguished themselves through preferential access to the products of agricultural productivity, and especially pastoral productivity and the meat it produces was used in status negotiations. And third, although it seems counterintuitive in a neo-evolutionary research framework, the very pastoral mobility that makes the MC so obscure in archaeological research seems to have been a very important factor in the construction of social stratification.

It can be concluded that behind the uncertainties produced by the incomplete state of research Middle Chalcolithic southcentral Anatolia, this period emerges as another key turning point in this narrative: While it could be argued that Late Neolithic and Early Chalcolithic social organisation still betrayed a lot of its Early Neolithic genesis, these lifeways were discontinued in the centuries before and around 5000 BC: established settlements were abandoned, and groups of people across all three regions might have explored different settlement locations and/or different (mobile, pastoral) economic strategies. In Cappadocia, social stratification and elites first become clearly visible, and their strategies of obtaining wealth and power seem to be intimations of structures that grew until the Early Bronze Age. This reconstruction fits well into the larger picture, since all across Asia Minor communities started exploring entirely new economic strategies during the 5th millennium (Düring 2011b:808, 2011c:255-256; Schoop 2011b:160-161).

3.5 4000-3000 BC: The Late Chalcolithic

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Figure 17 Reconstruction of Kuruçay Level 6 (Duru 2008:Fig.233).

3.5.1 Late Chalcolithic: regional perspectives

No Late Chalcolithic sites have been excavated in the Konya plain or Cappadocia. Surveys, however, have found 36 Late Chalcolithic sites in the Konya plain (TAY 2016), suggesting that a completely unexplored cultural landscape existed in the region. However, the lack of excavated, stratified and securely dated LC pottery in the plain questions the accuracy with which surface sherds could be dated (see the above discussion on the dating of Canhasan Leve 1). In Cappadocia, Allcock and Roberts (2014:Tab.2) record six sites that dated to the LC, and 163 sites that are not

dated specifically to a period of the Chalcolithic. They (Allcock and Roberts 2014:48) conclude that the lack of knowledge about LC Cappadocia is entirely research bias: “The energetic Early Bronze Age that followed in the area also gives confidence to the idea that there was thriving settlement development towards the later Chalcolithic”. Currently, the LC of both regions however appears even more obscure than the MC.

After a curious absence of sites in the (surveyed parts of the) Lake District during the Middle Chalcolithic, occupation for the Late Chalcolithic is again well documented. Apart from the two excavated sites, Kuruçay and Beycesultan, TAY (2016) lists 21 sites found through survey, and the Vandam survey (Vandam 2015:Fig.13-2; Vandam and Kaptijn 2015:168) added another eight in the Burdur plain. Vandam reconstructs (DeCupere et al. 2015:7; Vandam 2015:289; Vandam and Kaptijn 2015:168) that these date from the second half of the Late Chalcolithic after 3500 BC, while for the first half only scant remains are attested. Vandam reconstructs Late Chalcolithic life in the Burdur plain as a dense occupation with small and probably short-lived settlements co-existing with larger villages like Kuruçay, all practising mixed farming—leading up to the denser occupation, urbanisation and social complexity in the Early Bronze Age. At the same time, mobile peoples might still have existed in the region: Duru (2008:19, 122) recognises a small, short-lived site at Bademağacı, where some LC pottery without related architecture was found, and suggests it might have been used periodically by a nomadic people. This interesting observation suggests that communities with different socioeconomic structures co-existed in the LC Lake District: small agricultural villages, larger villages or towns like Kuruçay (see below), and mobile groups.

3.5.2 Early urban centres in the Lake District?

The above inventory of the Late Chalcolithic in southcentral Anatolia has produced a painful research gap in the Konya plain and Cappadocia, but a lively cultural landscape in the Lake District, where two larger sites have been excavated:

Beycesultan just west of Işıklı Gölü at the western edge of the Lake District, and Kuruçay in the Burdur plain, a LN/EC site that was reoccupied in the LC. Duru (2008:9) notes similarities between the two sites. Beycesultan (LC dated to 3800-3400 BC by Schoop 2005a:Fig.4.10) was the first excavated Chalcolithic site in southwestern Anatolia (Düring 2011c:223). Due to the limited size of the exposure, and incomplete publication of architecture, only fragments of Late Chalcolithic architecture, settlement layout and social organisation can be reconstructed at Beycesultan, although LC remains were 11m thick and attest to substantial and long occupation. The excavated architecture seems to represent houses for nuclear households (Düring 2011c:223-224). A new excavation project at Beycesultan started in 2007, but so far has explored only Bronze Age and later levels (Abay and Dedeoğlu 2016).

The only site where LC architecture has been excavated on a large scale Kuruçay 6-3. The oldest LC Level 6 has been radiocarbon dated to between 3600 and 3400 BC, suggesting that Kuruçay postdates most of the Beycesultan sequence (Düring 2011c:226), and its later Levels 5-3 span the time period until 3200 BC as suggested by pottery dating (Duru 2008:15; Schoop 2005a:Fig.4.10). Levels 5-3 yielded only limited architectural evidence, but the Kuruçay Level 6 settlement is “undoubtedly the best documented village of Chalcolithic Asia Minor” with 23 buildings excavated (Düring 2011b:802). As the other levels at the site, also Level 6 was not well preserved: of most houses, nothing of the house interior was left and of the house shells, often only the stone foundations survived but some walls stood 1.5m high (Duru 2008:124-128). Most buildings consisted of a single room of ca. 4m x 7m, but some had two rooms or a small room added on the outside. One collapsed roof was found and indicates that houses were single-storied mudbrick structures with a flat roof (Düring 2011c:227; Duru 1996e:113).

Duru (1996d:58, 1996e:114-116; 2008:9, 123-132) interpreted Kuruçay 6 as a small urban centre (‘town’) “ruled by a strong authority”. He recognises a central power in the regular, and therefore planned, layout of the settlement, which also qualifies Kuruçay 6 as a ‘town’ rather than a village. The excavators further identified in the centre of the village a building complex that included an elite residence, a temple

marked a large table made from clay and a special finds inventory, and a large storeroom/magazine housing “items belonging to the temple” (Duru 2008:127). It remains unclear whether these items were equipment for rituals or maybe food or other consumables. This building complex was surrounded by domestic buildings whose outer walls constituted a saw-toothed defence wall with narrow gaps acting as gates. Defence systems were also identified in the much less well preserved Levels 5-4, and another temple with mudbrick-stele and storeroom in Level 3 (Duru 1996e:116-117, 2008:130-131). Duru (2008:15, 122, 129-130) further ascribes a number of destruction events throughout Level 6-3 to warfare. In Duru’s reconstruction, then, LC Kuruçay was a small pre-urban centre with defence wall that experienced multiple destruction events.

Düring (2011c:227-228) argues against this reconstruction. He points out that the Level 6 ‘temple’, apart from its good preservation, is similar to other buildings in construction and inventory; and further points out that the reconstruction of a planned and defensive settlement does not adequately acknowledge that Level 6 was subdivided into seven subphases and rather represents an organically growing village that started out with more open space and gradually became more densely built up. Düring (2011b:803; 2011c:228) instead suggests a reading of Level 6 as an increasingly dense settlement made up from several “household clusters” of three to five buildings, occupied by core households connected through kinship lines.

3.5.3 The Late Chalcolithic: a summary

The Late Chalcolithic of southcentral Anatolia is especially poorly explored. With essentially only one LC site excavated, there is little evidence to contextualise Kuruçay 6 and therefore it is to critique the excavator’s reconstruction of a small urban centre. This gap in the research landscape must, although the Late Chalcolithic in Anatolia is generally perceived as the lead-up to the Early Bronze Age (Düring 2011c:201), impede exploring the development of social organisation in a long-term perspective, such as the question of how the incipient social stratification of the Middle Chalcolithic developed into stratified societies of the EBA.

3.6 3000-2000 BC: The Early Bronze Age

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Figure 18 Main EBA sites in Asia Minor (Düring 2011c:Fig.7.1). Sites mentioned in the text are: 4 Troy; 15 Demircihoyük; 20 Beycesultan; 21 Karataş; 22 Bademağacı; 23 Harmanören; 29 Acemhöyük; 31 Alacahöyük; Göltepe-Kestel is located in the mountains of southern Cappadocia, and Hacilar Büyük Höyük west of Bademağacı.

3.6.1 Research framework

With the beginning of the Early Bronze Age, the research framework changes considerably. In the words of Düring (2011c:257), “the archaeology of the Early Bronze Age (EBA) in Asia Minor is worlds apart from that of the Chalcolithic” and Neolithic in terms of research questions, research methods, personnel, and affiliation, typically being oriented forwards towards the later Bronze Age and Iron Age, and eastwards towards southeastern Anatolia and Mesopotamia. In this particular view, the EBA is seen as the start of the historic, ‘civilisation’ periods of the Near East and there is a tendency by Bronze Age archaeologists to ignore the roots that EBA culture had in previous cultural developments (Düring 2011c:258; see Bachhuber 2015:29-33, 47, 56 with remarks on some such roots). In this thesis,

however, the Early Bronze Age is the beginning of the end: social stratification of Anatolian communities had clearly been established by the EBA (3.6.3, 3.6.4). A relatively clear cultural break divides the EBA from the following MBA: there is a period of turmoil and destruction across the Anatolian plateau around 2200 BC (Bachhuber 2015:181-182), and in the following MBA, important new development start such as the establishment of Assyrian (Mesopotamian) trading colonies in the Anatolian centre (Düring 2011c:261, 274; Sagona and Zimansky 2009:225). There is a further novelty that also fundamentally changes the way post-EBA Anatolia is being researched by archaeology: first appearances of writing in Anatolia start immediately after the EBA (Bachhuber 2015:183; Düring 2011c:258), it is therefore the last prehistoric period.

Within the generally well-developed research landscape of the EBA (Figure 18), southcentral Anatolia represents an unfortunate exception. Excavations at larger EBA settlements are still underway or not yet comprehensively published: Bademağacı was excavated until 2010 and research is ongoing. Since 2011, Umurtak and Duru have been excavating Hacılar Büyük Höyük in the Lake District, where a larger EBA settlement is currently being uncovered (Umurtak 2012; Umurtak and Duru 2014). Excavations have so far concentrated on the fortification wall, not much has so far been excavated of the settlement proper and its social organisation remain to be researched. Also in the Lake District, the EBA area excavated at Beycesultan in the 1950s was too limited in size to research its social organisation (Düring 2011c:269, 288-289; Steadman 2011:237), but new excavations are underway since 2007 (Abay and Dedeoğlu 2016). EBA Kuruçay was a small settlement that existed between 2500-2200 BC, but of its architecture only fragments were preserved (Duru 2008:15, 146, 158). In Cappadocia, the large site of Acemhöyük might have been an important EBA centre, but excavations have so far concentrated on the Middle Bronze Age (Arbuckle 2012b:463-464) and EBA levels were only reached through a deep sounding (TAY 2016). At Karahöyük in the Konya plain, excavations between 1953 and 1982 concentrated on the MBA and not much is known about the EBA settlement layout (TAY 2016), and this remains the only EBA site excavated in the Konya plain. The evidence from settlements is

complements by other types of sites, of which three were excavated in southcentral Anatolia: Harmanören in the Lake District is a cemetery (Düring 2011c:278); in Cappadocia, Kestel was a tin mining site used in the EBA, and nearby Göltepe was interpreted as a non-permanent village set up by the miners (Bachhuber 2015:38-39, 41-42; Düring 2011c:276; Yener 2009).

Since surrounding areas of Anatolia are much better researched than EBA southcentral Anatolia, overviews of the EBA (Bachhuber 2015; Düring 2011c:257-299; Sagona and Zimansky 2009:172-224) typically base their storyline on evidence from other regions, and this section will draw on these discussions to contextualise the southcentral Anatolian evidence. There is some justification for this approach in the fact that in the course of the EBA, regions of southcentral Anatolia became part of larger cultural entities. Throughout the first 400 years of the EBA, ceramic assemblages become more homogenous and larger cultural regions can be identified in western and central Anatolia (Düring 2011c:264-266, 299). For the issue of most relevance to this thesis, that of elite-making (Bachhuber 2015), the existing evidence indicates that southcentral Anatolia saw developments similar to its larger and better-researched regional context.

3.6.2 Early Bronze Age cultural landscapes

In this short section I want to provide a framework for the following discussion of elite-making by creating an image of the cultural landscapes that elites operated within. During the EBA, cultural landscapes developed that were inhabited more densely by ever more people than in earlier period (Düring 2011c:257), and economically more intensively used (Bachhuber 2015:29). And increasingly, there were relationships of mutual dependency between settlements, for example in form of the hierarchical relationships that existed between citadels and their rural surrounding (Allcock and Roberts 2014:48; Bachhuber 2015:122-127, 185-186). In contrast to the low number of excavated EBA sites in southcentral Anatolia, surveys have produced an image of lively cultural landscapes. Allcock and Roberts (2014: Tab.2, Fig.4c) record 340 EBA sites in Cappadocia that produced a very dense cover

of settlements and other types of sites. Many sites that had been inhabited during the Chalcolithic remained inhabited and grew, and many more sites were founded, making for a sharp increase in settlement numbers. This development is mirrored in the Konya plain, where an increased number of settlement sites of different size indicates higher population density in areas of agricultural potential (Allcock and Roberts 2014:48 drawing on preliminary data from the Konya Plain Survey). In the Lake District as well, Vandam (2015:289; Vandam and Kaptijn 2015:168-169) noted continuity of settlement locations from the Late Chalcolithic and an increasingly dense occupation with a mixture of small, and short-lived to larger sites—a possible settlement hierarchy.

The more intense economic use of the landscape foremost refers to a more intense agricultural use, but also included a use of areas that are agriculturally marginal, for example for mining metal ores (Bachhuber 2015:29-31, 41-43, 46-49). The mining settlement of Göltepe, related to the Kestel mine in the south of Cappadocia, might have been a settlement seasonally used in summer for people employed in mining, metal processing and pastoralism (Bachhuber 2015:38-39, 42; Yener 2009).

Discussion continues as to the degree of pastoral mobility that might have otherwise existed in the EBA in marginal areas. Especially connected to the Alacahöyük burials (see below), there have been suggestions of an important and part-mobile pastoral sector, but Bachhuber (2015:39, 75) rejects most evidence for EBA mobility as unconvincing, and Arbuckle's (2014) and DeCupere et al.'s (2015:7) reconstruction of EBA animal economies does not explicitly reconstruct a mobile sector.

External cemeteries, located in vicinity of settlements, represent a new type of site not (yet) archaeologically known from earlier periods (Bachhuber 2015:85; Düring 2011:278; Steadman 2011:232). In southcentral Anatolia, one cemetery has been excavated: Harmanören, located between the Burdur and Eğirdir lakes (Düring 2011c:278), and another one was found in a recent survey (Vandam et al. 2013). Based on better researched cemeteries from other regions (Demircihöyük-Sarıket, Karataş-Semahöyük, Düring 2011c:280-281), Bachhuber (2015:53, 94-95) describes extramural cemeteries as part of a strategy of rural (village) communities to lay

claim to territories in the agricultural landscape by establishing a historical-ancestral relationship through interment of the dead outside the village.

3.6.3 Early Bronze Age elite-making

A recent book by Bachhuber (2015) provides a summary of strategies that Early Bronze Age elites in Asia Minor employed in creating and maintaining their status. The title of Bachhuber's book, *Citadel and Cemetery*, refers to two different elite-making strategies he identified in Asia Minor, of which the 'citadel'-strategy was more wide-spread. Both strategies existed throughout the entire EBA, although with some differences between period and regions that I will pass over in the following; and both are typical of the EBA in Asia Minor and would not continue into the MBA (Bachhuber 2015:128, 189). Most evidence on Bachhuber's narrative is from outside southcentral Anatolia, where considerably more sites have been excavated on a larger scale (3.6.1); based on the available evidence from EBA southcentral Anatolia, there is however no reason to expect that this region significantly varied from the framework developed by Bachhuber.

Cemetery: performance and procession

The 'cemetery'-strategy refers to the site of Alacahöyük, located east of Ankara. Alacahöyük is not a citadel: there is no evidence of fortifications, an elite residence, or any other buildings that stand out from the residential architecture, except for a larger complex (Building ABC) that probably was used in cemetery-related ritual. At this settlement, the local elite asserted their status not through the architectural elite-making strategy associated with citadels, but through ostentatious funerary rituals that included the deposition of large amounts of metal, processions and communal feasts. Through these acts, the elite demonstrated its control over agricultural production, trade, prestige objects and a relation with the supernatural (Bachhuber 2011, 2015:97-106, 128, 185; Düring 2011c:293). A closer examination of the details of this strategy is less relevant to this thesis, since this elite-making

strategy is explicitly not strongly related with architecture. It is however, important to note that in the EBA, not all elite status was architecturally expressed. So far, the 'cemetery'-strategy has in this particularly strong articulation only been observed at Alacahöyük and possibly a few less well preserved/excavated sites in the surrounding region (Bachhuber 2015:105), but Bachhuber (2015:98, 103, 185) stresses that it represents a more emphasised variation of status assertion through mortuary ritual that can also be observed at other sites (below, Villages). Alacahöyük was first excavated from 1935, and Bachhuber (2015:10-14, 99, also Düring 2011c:290) considers it possible that the present image of the site, which is unique in the EBA of Asia Minor in many ways, might be distorted due to the premodern excavation and research style and non-comprehensive publication of the site. New excavations were conducted at Alacahöyük until 2012 (Bachhuber 2015:97; Çinaroğlu et al. 2013) and the results of this project might modify the reconstruction of this site in the near future.

Citadel: administration and monumentality

The 'citadel'-strategy of EBA elite making is the focus of Bachhuber's book and can only be summarised here. Corner stones of this strategy are: control over agricultural productivity including wool as an important commodity; preferential access to rare and imported items; the potential for violence; and a visual assertion of status through the architecture of the citadel itself.

EBA elites based their status on two forms of wealth: locally produced agricultural products, and prestige items obtained through exchange networks, of which metal is an important example (Bachhuber 2015:130, 185). Of these two, agricultural production—of food, and wool which was manufactured into textiles—was the more important resource for providing a basis for and legitimisation of elite status; EBA elites were foremost agricultural elites (Bachhuber 2015:181). Agricultural productivity soared in EBA Asia Minor, when landscapes became much more densely settled and intensively farmed (Bachhuber 2015:147), and wool production proliferated (Arbuckle 2014:210; Bachhuber 2015:29-41). Elites derived power from

administering the production, storage and distribution of these products and the associated labour, which included placing large workshop and storage building used by a larger community in or near the elite residence—the ‘central complex’. In these complexes, much of the community’s work, and probably also food consumption, took place in a spatial and social framework created by the elite. And the influence of citadel elites would through the extraction of agricultural products also have extended into the surrounding landscapes, and smaller communities living in villages and farmsteads (Bachhuber 2015:130-138, 147-149, 180-182, 185). One such central complex (‘palace’, Duru 2008:151) was excavated at Bademağacı: in the centre of the relatively large settlement that encompassed an estimated 60-100 houses (Düring 2011c:282), there was a large building with at least 16 rooms, of which some were storage rooms with bins and ceramic storage containers (Duru 2008:146-151). The many stamp seals and sealings found in and near this building indicate that goods and transactions were centrally administered here (Bachhuber 2015:130-132; Umurtak 2009b, 2010, 2013). Wool and woollen textiles would have constituted significant value during the EBA, which was used in elite-making strategies in two ways: as a centrally administered agricultural product, and as bodily adornment worn by elites in form of brightly coloured, often red, clothing; red pigment was insofar a prestige item as it had to be laboriously produced (Arbuckle 2014; Bachhuber 2015:137, 165-166; see Arbuckle 2012a; Schoop 2014 for roots of this development in the MC-LC).

The influence over the surrounding rural areas by citadel elites was also supported by the potential of the elite to use violence (Bachhuber 2015:148, 180) on villages or protect them from violent attacks by other, competing citadels (Bachhuber 2015:127, 181, 185). EBA status assertion has a clear martial element: elites used violence, or the threat of violence, as a means of asserting their status over non-elites (Bachhuber 2015:103, 106, 148, 185), and this is overtly expressed for example through the ritual deposition of weapons on citadels, their heavily fortified appearance (Bachhuber 2015:148), or also the concentration of weapons in the Alacahöyük elite tombs (Bachhuber 2015:55, 106). Different elite groups might have fought each other; more often, however, the many destruction events of citadels

observed in the archaeological record might have been caused through violent attacks by the non-elites that the citadel elites sought to govern (Bachhuber 2015:128, 171, 182, 187). A main reason for warfare during the EBA thus seem to be conflicts resulting from the emerging social hierarchies, and from (violent) negotiation of hierarchies (Düring 2011a:79-80, and Selover 2015:370 reach a similar conclusion).

The display of rare and valuable items was another important EBA status-making strategy and represent an exclusionary strategy: the display of these items communicates inclusion into an elite group at the exclusion of non-elites (Bachhuber 2015:168, 188). The strategy included imported objects such as amber, carnelian and lapis lazuli (Bachhuber 2015:167), but most importantly the conspicuous consumption of metal. First evidence for metalworking in the Anatolian centre dates to around 3500 BC, the middle of the Late Chalcolithic (Lehner and Yener 2014:549; Schoop 2011a; Yalçın 2008:20-21; see crucibles found at LC Kuruçay: Duru 2008:143). Metal was produced and consumed in increasingly large amounts throughout the EBA (Bachhuber 2015:155; Düring 2011c:274-275; Sagona and Zimansky 2009:200-205; Yener et al. 2015:597-598). Its value as a prestige object derived from the amount of work needed to produce it (Düring 2011c:275), but also from a range of other mechanisms discussed by Bachhuber (2015:157-165, 168-169) that included craftsmanship, object biographies and a cosmopolitan connotation resulting from the fact that Anatolia was part of metal exchange in a larger region of the Near East; there was mutual exchange of bronze, possibly raw materials for bronze production, but certainly metal-production technologies and styles with Upper Mesopotamia and northwest Iran (Bachhuber 2015:155-165, 186-187; Düring 2011c:275-276; Steadman 2011:232-233). Metal was conspicuously consumed by citadel elites in different ways, during different occasions: it was displayed during funerary rituals and processions (see above, Alacahöyük), daily as jewellery (Bachhuber 2015:166-167) and during feasts in form of wine drinking vessels. Wine consumption also started or became more widespread during the EBA, and it became another commodity for elite-making through conspicuous consumption (Bachhuber 2015:31-32, 138-143, 164-165). The

social importance of both wine and metal is further attested by a curious artefact category: skeuomorphic pottery vessels, which imitate the look of metal vessels and often were wine drinking vessels (Bachhuber 2015:139-143), found for example at Beycesultan (Bachhuber 2015:62-63; Düring 2011c:264). Large public feasts were sometimes concluded by the deposition of ceramic tableware and other consumption debris such as animal bones (Bachhuber 2015:141-143). This represents a particularly drastic and spectacular form of the conspicuous consumption of wealth by disposing of valuable items. This strategy was also used on other valuable items: evidence from Troy and other sites indicates that meat was ritually burnt and deposited in what would have been public spectacles. Moreover, several sites including Bademağacı contained metal hoards that were intentionally deposited during non-public, more exclusive events that might also have had connotations of piety and the building of exclusive relationships with the supernatural (Bachhuber 2009, 2015:170-177, 181, 187; Düring 2011c:278).

Citadels were the places that enabled and bundled all these elite-making strategies: they were central complexes, heavily fortified, and also the stage for feasts and other events of conspicuous consumption (Bachhuber 2015:114). And they were visually monumental, thus widely communicating and re-enforcing elite status, mostly through their façades: citadels were fortified settlements, of which most were built on top of existing *höyüks* and therefore in an elevated location. Many had massive fortification walls, towers and glacis—stone encasings of the mound flanks that stabilised slopes and enhanced the visual effect of fortifications. Citadel facades communicated an element of power and stability that would have visually projected into the surrounding landscape from the top of the mound, and was employed by elites as a status-assertion technique (Bachhuber 2015:107-114, 128-129). It adds to the impression of a martial element to EBA elite-making that defensive architecture is chosen as the architectural language of hierarchy. And citadels were probably built with labour extracted from the surrounding, dependant hinterland (Bachhuber 2015:128). Among the fortifications of EBA citadels, Bademağacı is a rather humble example: its *höyük* is not very high, there is no fortification wall, instead houses formed a continuous ring at the settlement edge,

around a central courtyard. This house ring was further surrounded by a 4-7m wide glacis-like structure forming a gradual slope of rubble stones that is interpreted as flood protection rather than an effective defence against hostile attacks (Duru 2008:154). Altogether, the Bademağacı settlement perimeter was rather humble in its monumentalising, representative function (Bachhuber 2015:108). The fortification wall currently excavated at Hacılar Büyük Höyük (Umurtak 2012; Umurtak and Duru 2014) was a much more massive example of an EBA citadel façade. Contrasting with the monumental façades, elite residences in citadels were often not actually architecturally spectacular and so tightly integrated into the storage, workshop and ritual areas of the central complex that they become architecturally difficult to discern for archaeologists (Bachhuber 2015:114-122; Düring 2011c:282, 284; Ivanova 2013:30-31).

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Figure 19 Plan of EBA and later structures at Bademağacı (Duru and Umurtak 2009b:Plan 1). Structures labelled 'ITC' and 'saray' are dated to the EBA.

Villages: hidden hierarchies

A third form of elite-making refers to 'villages', used by Bachhuber (2015:53, 107) to refer to settlements where social hierarchies do not exist or are not overtly

expressed (in material culture), two examples being Demircihöyük and Karataş, located north and south of southcentral Anatolia. Bachhuber (2015:53, 55, 70-82, 84, 107; cf. Eslick 1988:39 on Karataş) suggests that social hierarchies or status differences did exist within village communities; but the place for the building and negotiation of status differences might not have been the village itself, where at least architecturally communal integration and equality prevail, and social competition might not have been appropriate; but rather the village cemetery. In the cemetery, households competed for status by displaying their farming productivity through sponsoring feasts related to mortuary ritual and by depositing valuable items such as metal (Bachhuber 2015:89-97, 150; Eslick 1998:38); this is not dissimilar to the elite-making strategy characteristic of Alacahöyük. Particularly rich graves could indicate that individuals with leadership authority ('chiefs') existed in villages (Bachhuber 2015:96-97; Massa 2014). Villages were further in a hierarchical relationship with a citadel that extracted parts of the villages' farming productivity, maybe in exchange for protection (Bachhuber 2015:122, 185-186).

3.6.4 The Early Bronze Age: a summary

In this narrative of the development of social stratification in southcentral Anatolia, the EBA emerges as the period when social hierarchies are well developed, and archaeologically unequivocally recognisable. There are a number of excavations now ongoing at EBA sites in southcentral Anatolia that might soon shed more light on this so far rather poorly explored period. Although especially the research gap produced by the Late Chalcolithic makes it difficult to draw a long-term perspective, it is possible to argue that some of the strategies, and some of the items of material culture used in EBA elite-making, were already present in the LN/Chalcolithic. For example, it could be suggested that the significance of wool as an item of wealth in the EBA might have developed out of the use of animal products in LN-MC status assertion (3.3.3, 3.3.4, 3.4.3). Architecturally, MC Güvercinkayaşı (3.4.3) features an 'upper settlement' not unlike the EBA 'central complexes' in citadels on raised locations. These parallels appear indistinct at the moment, however, maybe also due to the intellectual fault line that separated EBA research

from Neolithic/ Chalcolithic research (3.6.1). To further research similarities and differences in EBA and earlier elite-making strategies will be a task for this thesis.

Returning to the issue of social complexity that originally started my interest in the effect of LN/EC social changes on developments later in the Chalcolithic and EBA (Chapter 1): In the centre of Anatolia, the Early Bronze Age (EBA) is commonly regarded as the period when complex society emerged (Sagona and Zimansky 2009:174; Steadman 2011:231), possibly as the end result, now clearly archaeologically visible, of previous (Neolithic/ Chalcolithic) less clearly visible, only partially or only locally present complex traits (Arbuckle 2012a:302; Çevik 2007:132; Schoop 2011b:165); or the period when development towards complexity became more pronounced (Düring 2011c:257), while some aspects of complexity, such as urbanisation, were only fully developed in the Middle and Late Bronze Age (Bachhuber 2012:575). There are several elements that make EBA societies 'complex': important ones are the development of urban centres (towns or cities) with influence on surrounding areas, forming small state-like entities (Çevik 2007; Steadman 2011:231), the development of extensive long distance-trade networks (Düring 2011c:257; Steadman 2011:232) and of stratified societies with an elite controlling an urban centre and its hinterland (Düring 2011c:257; Sagona and Zimansky 2009:174; Steadman 2011:231). This literature review has concentrated on the latter, social stratification, and attempted to demonstrate that social stratification, as a central element of EBA social life, had probably developed over many centuries and millennia during the Late Neolithic and Chalcolithic (Arbuckle 2012a; Çevik 2007:132; Düring 2011b:809, 2011c:256, 297, Steadman 2011:231-232) as the unintended outcome of many changes in the social fabric of local communities. Also, new research shows the society in this part of Anatolia moved towards social complexity via previously unperceived mechanisms and pathways, for example through mobile pastoralism. In conclusion, the changes in social organisation observed in southcentral Anatolia after 6500 BC are significant not only, but also, because they represent roots of Anatolian social complexity.

Chapter 4 WRITING NEW STORIES FROM OLD BUILDINGS: THEORY

Learning archaeological theory [i]s something akin to taking medicine: important but nothing to look forward to. (Urban and Schortman 2012:9)

4.1 Introduction: a contextual approach towards architectural indicators of social organisation

This thesis aims to interpret Late Neolithic and Early Chalcolithic social organisation in southcentral Anatolia via a study of excavated architecture, using methods that fit the specific research context of this project. While Chapter 5 describes the ‘how’ of my methodology, this chapter discusses the ‘why’. Through discussing my methods and their theoretical genesis, this chapter explores methods of architectural research practices in Neolithic/ Chalcolithic southcentral Anatolia; maybe in larger detail than necessary to devise a thesis methodology, but in accordance with the methodological/ epistemological focus of this thesis.

Postprocessual archaeology acknowledges that a research methodology is most successful when it acknowledges the specific context that a research project is set within. ‘Context’ encompasses a number of things, but is composed broadly of two parts: the modern context within which the archaeologist works; and the specific cultural context under which the material studied by archaeology was produced in the past (Hodder 1991:154).

The first part includes the specific conditions, pre-understandings and biases created by previous research traditions and previous researchers. They influence the research aims and the data available for new research projects such as this; the nature of the data forms another important component of this category. Not least, the researcher’s own persona, forged by previous research experience—here: my prior experience—is part of the context. A critical awareness of these multiple influences shaping the results of the archaeological research process was part of the

original 'contextual archaeology' as formulated by Hodder (1991:109, 125, 173; Johnsen and Olsen 1992:426) and has subsequently been matured into a technique called 'archaeological reflexivity', which is further explored in Section 4.5.

The second element of 'context' is the past cultural context being researched. Postprocessual approaches are founded on the notion that material culture needs to be interpreted by understanding it within the particular original social and cultural context in which it was created, and that archaeological methods need to be suitable for doing so (Hodder 1995:12-13, 17). Initially named 'contextual archaeology' (Barrett 1987; Hodder 1991:121-155, 1995; Johnsen and Olsen 1992), this conviction subsequently became one of the cornerstones of postprocessual archaeology. It is central to how postprocessual-inspired research projects answer the fundamental question of how it is possible to reconstruct the complexity of past people's actions from material culture (Barrett 1987:469; Hodder 1995:14; Johnsen and Olsen 1992:419). Contextual archaeology can therefore be defined as the attempt to "interpret the evidence primarily in terms of its internal relations rather than in terms of outside knowledge" (Hodder 1990:21; see also Hodder 1991:13, 15; Johnsen and Olsen 1992:426).

This is a direct counter-reaction to the processual urge to conduct archaeological research by applying general models to a particular case study and then relating the case back to general laws of human behaviour (Barrett 1987:470; Hodder 1991:122). The notion that past human behaviour does not follow general laws is at the heart of postprocessual study. Instead, all human behaviour is inherently conditioned by the specific cultural circumstances that surround it, all material culture is conditioned by its cultural context, and "the [archaeological] record contains meaning specific to the historical conditions under which it was constructed" (Barrett 1987:469; Hodder 1995:26; Shanks and Tilley 1992:15). Archaeology can use this to its own advantage: By researching the meaning of material culture specifically to the cultural context in which it was created, it is possible to reach a much deeper understanding of this past cultural context rather than the more superficial understanding that is predetermined if one wants to see all human cultures as essentially the same. It enables archaeologists to reconstruct

human history as a mosaic of specific social strategies created under specific conditions (Barrett 1987:470). Chapter 1 has articulated the aim of this to reconstruct developments towards 'social complexity' in southcentral Anatolia as the unintended outcome of the strategies chosen by groups of people in order to deal with the challenges of living together permanently in large groups. A contextual framework for understanding these developments therefore is ideally suited to the research aim of this thesis.

What does a contextual interpretative approach look like in practice? Hodder's strategy (Hodder 1991:125, 128, 143-145, 1999a:51; Johnsen and Olsen 1992:425) is to acquire an intimate knowledge of the data, including the wider archaeological and cultural context in which they are set, as well as "sensitivity to the particular data" (Hodder 1991:122) in the form of a methodology that carefully works in an exploratory manner from the data towards interpretation while exercising critical self-awareness to avoid imposing meaning. Ideally, individual archaeological objects and observations are understood by juxtaposing them with as many other objects and descriptions as possible in a 'thick description' that creates a framework of reference wherein meaning can be understood (Hodder 1995:13, 144; Hodder et al. 2008:34). Through the recognised patterns in material culture, archaeology can reconstruct past daily practices and routines which express the underlying social concepts in which archaeology is interested (Hodder 1991:128). Section 4.2 will show how these concepts have already been successfully used in the context of prehistoric Anatolian architecture research, and this entire chapter discusses how this thesis, in particular, will use them.

It seems, however, that the first and most important decision for a contextual research project is to define the extent of its context. Düring (2006:52) observed correctly that "[t]he archaeological enterprise is based on analogical reasoning": even on the most basic level of architectural interpretation, individual items of material culture need to be compared and equated or contrasted with others to find out, for example, that an arrangement of stones was a wall and not a floor (Hodder 1999a:47). The necessity of analogies gives even more weight to the correct choice of 'context' as a framework within which things can be compared

safely and in which cultural conditions are similar enough to be able to transfer meaning from one building or one site to the next to observe similarities and differences between items of material culture that are then abstracted to infer social function, meaning and use (Hodder 1991:128-134, 1995:12-13, 1999a:48). And, of course, the choice of temporal and geographic boundaries is already an interpretation, and one with far-reaching consequences since it pre-determines what data are included in the research project (Hodder 1995:141, 1999a:48, 85; Shanks and Tilley 1992:xix).

Hodder defines context as “the totality of the relevant environment” (Hodder 1991:143, 1995:13). So what environment is relevant to my research question? Chapter 2 has already defined the geographical and chronological boundaries of my research sample; it has also pointed out that currently, archaeology does not have a definite knowledge of the chronological geographical borders of cultural units in prehistoric Anatolia. Chapter 5 will discuss how this insecurity can be accounted for in my research methodology. The first half of this chapter sets out to explore in greater detail the material culture of southcentral Anatolian Neolithic/ Chalcolithic architecture as well as existing research and existing research traditions about this material culture. This exploration of context will transition into a more specific discussion of how this study will deal with context in the second half of this chapter. My own ideas and methodological decisions will be formulated alongside a review of existing literature, summarised in Section 4.7, and translated into a methodology in Chapter 5.

4.2 Previous research of social organisation via architecture

A suitable starting point for formulating a context-specific research methodology is to examine the ways in which previous researchers have analysed Neolithic/ Chalcolithic southcentral Anatolian architecture to interpret social organisation. In this section I explore the methods and interpretational techniques used in previous research projects similar to mine with the aim of defining the most appropriate

methods for researching the data set in this thesis.

4.2.1 Analysis

Site-specific work

At the site level, architecture is recorded throughout the excavation process by the excavation team, and typically, the excavation director publishes descriptions and images of the architecture in reports, papers and monographs. Architecture always takes a prominent role in these publications. They include social interpretations of the architecture most often authored by the excavation director. At Çatalhöyük East, architecture research is shared between several researchers who follow a variety of methodological approaches, including geoarchaeological (Love 2012; Tung 2013) and experimental (Stevanović 2012a) techniques that have not been used at the other sites studied here—and a greater focus on the house as an object with a life history, which involves dedicated research into its construction (Baranski et al. 2015; Love 2012, 2013a; Stevanović 2012a, 2013; Tung 2013), modification (Matthews 2005a, 2012; Matthews et al. 2013) and abandonment (Cessford and Near 2005; Harrison et al. 2013; Matthews 2005a; Russell et al. 2014).

Among the comparative works of architecture research discussed below, Düring's (2006) methods are also relevant in this section because his thesis builds comparison from a detailed discussion of each site. Düring (2006:2, 35-37) created a comprehensive spatial database that recorded the location of constructed features and other immovable architectural features such as wall paintings, hearths or burials, and then observed patterns synchronically (comparing contemporary buildings) and diachronically (following changes over time). Düring's approach is ideally suited to understanding a settlement in its entirety as a complex four-dimensional space—the fourth dimension being time and temporal changes to the built environment. In contrast to Steadman and Cutting (see below), who deliberately picked particular buildings as examples to base their argument on, and

to Schachner's typological approach, Düring researches the settlement as a holistic organism. The architectural analyses done within the Çatalhöyük Research Project (e.g. Love 2012; 2013a; Tung 2013; Matthews 2005a; Hodder 2014:Fig.6) essentially follow the same trajectory: they pay minute attention to architectural details such as mudbrick composition or the number of consecutive wall plaster layers, and make sense of them through seeing their location in a four-dimensional framework. And the most recent publication cycle in particular demonstrates how rich the archaeological understanding of architecture can become if placed alongside observations about 'other' categories of material culture, here meaning those typically studied by different specialist subdisciplines such as pottery, faunal remains, botanic remains or ground stones (e.g. Hodder 2013b, 2014d). This approach towards architectural analysis is reminiscent of Geertz' (1973:1-30) thick description which is an enabler of contextual archaeology (Hodder 1995:13, 150): a particular way of reasoning whereby human behaviour is interpreted and explained by placing an observation into rich webs of related observations, the combination of which can reveal reliable understandings of past and present human behaviour.

For this thesis, site-specific architecture analyses are relevant in three ways. First, they provide the data for my study, and understanding the genesis of these data is important in a contextual approach. Second, they can highlight particular site- or regionally-specific idiosyncrasies of architecture that are relevant for devising my research strategy (see 4.3). Third, some successful principles of site-specific work might be suitable to transfer into a comparative study. It is, however, research comparing architecture from several sites that I want to look at in particular here to explore the specific methods and interpretation techniques used in comparative research.

Systematic comparative work

Four works have systematically compared Neolithic and Early Chalcolithic architecture in southcentral Anatolia. Schachner (1999) embeds it into a wide comparative framework that encompasses central, northern and southeastern

Anatolia between the beginning of the Neolithic and the early 2nd millennium BC. His research aimed to identify larger chronological trends and regional differences in architectural expression. Cutting (2003, 2005a, 2005b, 2006a, 2006b) selected example buildings from a range of Neolithic and EC sites in southcentral Anatolia to answer a research question about architectural adaptation to climate, but also commented on other issues of social organisation. Düring (2006) provides a compelling and detailed study of the inner workings of communities living in a particular settlement type (clustered settlements) from five sites in central Anatolia (Aşıklı Höyük, Canhasan III, Çatalhöyük, Canhasan I, Erbaba). Due to this scope, and the fact that EN Çatalhöyük and Aşıklı Höyük provided the most material, his thesis has a strong focus on the Early Neolithic and counts as the most comprehensive and current study of EN central Anatolian society through architecture that has been confirmed by recent research at Çatalhöyük (Hodder 2014b). While these three pieces of work were PhD theses, Steadman's (2000b, 2004) work was not of monograph length, but instead comprised a series of papers. Steadman (2000b:175, 2004:528) also selected more extensively excavated sites and occupation levels from the Neolithic to the EBA, and from different regions in southern, central and eastern Anatolia and focussed on similar research aims to this thesis, including how increasing social complexity was both expressed in, and brought about by, changes in settlement architecture over time.

All of these previous comparative studies combined quantitative and qualitative elements. Qualitative elements prevail, with all works relying primarily on textual descriptions of architecture (both as data, and for the presentation of their results), and visual analysis of architectural drawings and photos. As ways of recognising patterns in qualitative data, researchers recorded the presence/absence of certain architectural features (Cutting 2005b:20-21; Düring 2006; Steadman 2004:528-545), their location and orientation within buildings or in relation to buildings (Düring 2006:35-36; and to a lesser degree Steadman 2004:528-545), and used space syntax or access analysis to reconstruct people's movement through architectural space (Cutting 2003, 2005b:133-134; Düring 2006:32, 109, 126; Steadman 2000b:190-192). Düring (2006:29, 33, 107-108) records reservations about the suitability of

space syntax analysis for understanding the complex cultural workings of a built environment that can only ever be fragmentarily documented in excavation, and in my opinion the results of his study, as well as Cutting's (2003) work, confirm these doubts, as also observed by Düring (e.g. 2006:238, 257, 278-279). Partially excavated settlements and neighbourhoods present an additional challenge to space syntax analysis. Schachner (1999:35-42) constructs a typology of houses according to the shape of their plan (round, rectangular etc.) to map regional and chronological differences in architectural expression; plan shape is also analysed by Steadman (2004:Tab.2). Cutting and Schachner both explicitly work from the assumption that there are building/house forms that are typical to, and culturally representative of, a certain site or region or period, and their interpretations rely heavily on such 'typical' architecture (Cutting 2005a:123-128, 2005b:162-163; Schachner 1999:83-96).

Quantitative elements used routinely include room/ building size (floor area) and number of rooms per building (e.g. Cutting 2005b:21; Düring 2006:167-173; Schachner 1999:161; Steadman 2004:Tab.2). Although acknowledging that "quantitative analysis may be of limited use when studying prehistoric architecture" (Cutting 2005b:2), Cutting (2005b:19-24) uses quantitative features more extensively than the others, and employs a range of statistical techniques to analyse quantitative data, an approach that Düring (2006:36) explicitly rejects, since "the use of complicated statistical measures that are difficult to understand does not enhance the plausibility of a reconstruction". I agree that the statistical methods used by Cutting do not seem to lead to any interpretations that could not have been reached otherwise.

4.2.2 Interpretation

Analogy

Archaeology interprets architecture, as other material culture, through analogies (Cutting 2006a; Düring 2006:52-53; Love 2013c:263): an arrangement of stones is declared a wall because it looks similar to an already identified wall; an

arrangements of walls and floors is called a house because its internal furnishing is similar to that of already identified domestic residences; and an arrangement of buildings is found to reflect social hierarchies because it contains aspects previously found in other stratified societies. The built structure at hand needs to be referred to some larger context to make sense of it. How have previous studies of southcentral Anatolian architecture constructed an interpretational framework? A review of the above mentioned works shows that they compare their study objects, built structures of Neolithic/EC sites in central Anatolia or the Lake District, against first, previously excavated and interpreted architecture from the same site, or in the same region and from the same period; and/or second, architecture of chronologically/geographically different entities, thus employing cross-cultural comparison.

Many of the above named works routinely use cross-cultural comparisons to translate Neolithic/ Chalcolithic Anatolian architecture into interpretations about past social organisation. For example, Düring (2006:26-51), Cutting (2005b:5-17) and Steadman (2000b, 2004) preamble their data analyses with extensive reviews of such cross-cultural architecture studies, and refer to these when interpreting the southcentral Anatolian record. Cross-cultural examples are then cited again when interpreting archaeological data (e.g. Cutting 2005b:125; 127-128; Düring 2006:91, 97, 111, 231, 235). Most commonly, such cross-cultural studies refer either to other regions of the Near East where Neolithic life has been more extensively researched, such as southeastern Anatolia (Düring 2006:106; Hodder 2013b:2-6; Love 2013b), or the southern Levant (Cutting 2005b:8-10, 30-31, 139-140; Düring 2006:235, 311; Hodder 2013b:2-6; Love 2013b; Steadman 2004). Schachner (1999) goes particularly far by discussing central Anatolia together with southeastern Anatolia as one coherent story of the development of early farming life. Other cross-cultural analogies refer to ethnographies of modern societies living in earthen architecture (Cutting 2005b:80; Düring 2006:41-42; Love 2011:64-68) or living in the modern or pre-modern Near East (Cutting 2005b:127-128; Düring 2006:42; Steadman 2004:522-524). Wider anthropological theory on architecture, some of which is based on observations of faraway cultures such as medieval England or pre-modern

Polynesia or Indonesia, is also used, however (Adams 2005; Cutting 2005b:7; Düring 2006:42, 210, 300; Hodder 2006:24-25, 109-110, 162-163; Love 2011:41-42), as are references to archaeological examples that are geographically and chronologically far removed from Neolithic Turkey, such as Iron Age Britain or the Bronze Age Netherlands (Cutting 2005b:12; Düring 2006:37).

However, the same researchers who employ cross-cultural analogies have also expressed concerns. The most common concern seems to be that cross-cultural comparison can lead to a lack of appreciation for the intricacies and idiosyncrasies of the body of archaeological data and of the cultural context that is being researched. For example, at the end of her thesis, Cutting (2005b:139-140) concludes that the interpretational model she employed, which was based on Neolithic research in the Levant as well as modern anthropological and ethnographic examples, was inappropriate to reconstruct the complexities of social structures in Neolithic central Anatolia (similarly Düring and Marciniak 2005:166-167). She reports that she was able to fit Anatolian evidence into the model, but that “this apparently close fit between data and model can be achieved only by an oversimplification of the evidence” and finally advises the use of ‘import models’ only with great caution. Düring (2006:93, 2011c:72, 100, 121) not only frequently cautions against comparing Neolithic evidence from Asia Minor with that of other regions in the Eastern Mediterranean but also stated Düring (2006:312, 2011c:141; similarly Cutting 2005b:3) that within central or southcentral Anatolia local idiosyncrasies prevail in social organisation and its architectural expression, and developments at different sites often cannot be combined to one storyline. In conclusion, there is a danger that cross-cultural comparison leads to a generalising understand of past societies when cultural idiosyncrasies are not adequately acknowledged; or worse, an oversimplified and distorted interpretation of the past.

Düring (2006:29, 52-53, 315; and similarly Love 2011:64) suggests a usage model of cross-cultural analogies, especially from ethnographic work, whereby only technological aspects of building are compared between cultures, not social or cultural ones. ‘Technology’ in Düring’s (2006:55-58, 67, 71) work encompasses mainly building material choice, construction techniques and maintenance

practices. However, it has been shown within southcentral Anatolian prehistory itself that architectural 'technology' cannot be separated from 'culture'. Possibly architecture differs from other items of material culture in that it is always, inherently, and completely human-made. Only its most basic molecular components are not (sand, silt, clay, stone, wood), but how they are chosen and assembled to form architecture is always culturally constituted (see for example Love's work 2013a, 2013b on human agency in respect to mudbrick composition). A use of ethnographic or experimental analogies is, then, only possible to research the behaviour of built structures when people are not involved; for example, to study the material signatures of buildings that collapsed after being abandoned (Friesem 2016; Friesem et al. 2011; Friesem et al. 2014a, 2014b; Goodman-Elgar 2008). In not last, the use of cross-cultural comparisons is not compatible with the context-specific approach I have selected, and outlined in the beginning of this chapter. If the specific cultural context of its creation is inherently necessary to the archaeological understanding of material culture, then there is no foundation for cross-cultural reasoning.

I would also argue that it is simply not necessary to employ cross-cultural analogies. I believe that by now, previous research has created so much in-depth knowledge about prehistoric southcentral Anatolian architecture that it might be possible to use only that as a reference framework. Although the use of cross-cultural analogies might have merits that have not been explored here adequately, not using them in this thesis is a decision in favour of concentrating on exploring the material at hand more closely. Having only southcentral Anatolian prehistoric architecture itself to refer to, I will by default come to reflect more deeply on its specific idiosyncratic nature, exploring in greater depth the intricacies of the interactions between people and their built environment and the best methods to study them; and also expose gaps in archaeological knowledge more acutely since there is nowhere to turn to for inspiration. Many previous works of architecture research in southcentral Anatolia have very successfully interpreted architecture by cross-referencing it only with material culture from inside the study region. To only name a few recent examples: Hodder (2013a, 2013b, 2014b), on behalf of the Çatalhöyük

team, provides a 'thick' description of social changes at the site by cross-referencing different observations on architecture, and cross-referencing them also with many other items of material culture. Arbuckle (2012a) combining studies of architecture by the Güvercinkayası team and animal bones analyses into an interpretation of the use of settlement space in the construction of social inequalities. These works were all site-specific, though; the contextual approach might be more complicated when employed on a larger body of data from several sites. For example, the difficulty of defining cultural boundaries (Chapter 2) indicates that a strictly 'blinkered' approach might be difficult to actually achieve in reality; the next chapter will have to discuss how to translate the contextual premise into a methodology.

Architectural indicators of social organisation

Previous site-specific and comparative work on architecture in the study region has been successful in reconstructing social organisation by researching specific architectural features as part of a wider web of other architectural features and other items of material culture. For example, Chapter 3.2 has described how the relatively well-researched social organisation of the Early Neolithic was read from archaeological indicators such as the asymmetric distribution of burials between houses (Çatalhöyük), the asymmetric distribution of hearths (Aşıklı Höyük), or building continuity (both of the former, and Boncuklu Höyük). I will here call these architectural features 'indicators': specific characteristics of the architectural record that are indicative of a specific social use of the house. As the previously named examples show, 'indicators' are not necessarily or not only individual architectural items, such as the presence or size of a hearth in a building, but also aspects of the synchronic and diachronic relationships of architectural units, such as in the examples above. And some indicators (e.g. subfloor burials) are not even architecture in a strict sense, if architecture is defined as floors, walls, and roofs—but they form part of the built environment as it was created by the Neolithic/Chalcolithic peoples and should therefore be part of an architectural analysis.

Indicators as defined here thus try to encapsulate a specific aspect of the social use

of architecture; for instance, the examples named above indicate that some Early Neolithic communities deliberately created an asymmetry in the distribution of vital features (hearths, ritual items) between houses that created social bonds between households. Defined like this, architectural indicators purposefully are aimed at encapsulating specific aspects of the social use of architecture. This is the reason why, as stated in Chapter 1, archaeological epistemology here overlaps with researching the social makeup of past communities: in an archaeological approach that attempts to create an understanding of material culture by retracing details of its social use in the past, as contextual/ postprocessual archaeology does (4.1), epistemology strongly overlaps with describing the social use of architecture in the past.

It does not really matter in this respect whether specific indicators in the built environment were in the past created deliberately with the aim of constructing social relations; or whether they were created unconsciously, but can still be read by the archaeologist as physical traces of social practices. I agree rather with Anatolian architecture researchers who chose to focus on the human agency in architectural creation, and believe that Neolithic/ Chalcolithic people deliberately shaped their built environment in specific ways in order to construct the types of social interactions and relations they sought to create. Some colleagues express this notion in the very titles of their works: Düring's thesis (2006) was entitled *Constructing Communities*, Love's (2011) *How houses build people*. The built environment at these early farming settlements has been portrayed as an artificial social environment that was different from the not-human made environment people had lived in before creating large permanent settlements (e.g. Düring 2006:297). Social interactions inside the village always took place on a stage created by the built environment. The configuration of this stage, the properties of architecture, influenced social interactions and was changed and transformed by people's actions. Hodder (2006:136-139, 227; Hodder and Cessford 2004; also Düring 2006:215) discusses how the built environment socialised its inhabitants into the social roles sanctioned by the village communities. Architecture, and the way it shaped daily practices, was thus instrumental in enforcing rules such as

egalitarianism (Hodder 2014b). There is, then, a mutual creation process at work: village communities created a built environment that created communities (Düring 2006:38, 44; Love 2011:49-50; Tung 2008:8, 43). As social organisation changed, people also adjusted their built environments to the new social realities. Changes over time to the built environment can therefore indicate changes of the social organisation of a community.

Summary

In this section, I have decided to employ a context-specific approach towards studying architecture: I intended to use only prehistoric southcentral Anatolia as the intellectual reference framework within which to make sense of architecture by analogical reasoning. I have further formulated that this thesis will base a study of social organisation on observing architectural ‘indicators’: specific features of the architecture at prehistoric sites that express how architecture was used in the past when constructing communities, and can be used towards archaeological epistemology.

4.3 Architecture as material culture in prehistoric southcentral Anatolia

Having decided on a context-specific approach towards researching southcentral Anatolian architecture in order to incorporate better the specific idiosyncratic nature of this architectural record, the next step is to explore this idiosyncrasy. As cited in 4.1, Hodder (1991:122) states that a contextual approach begins with ‘sensitivity towards the data’; a clear understanding of the nature of these data is thus crucial. Here I would like to summarise a few observations based on Chapter 3 that are important to note in order to decide on analysis methods: What is architecture, in the cultural context of Neolithic and Early Chalcolithic southcentral Anatolia, and how was it socially used to construct communities? There are five idiosyncrasies I would like to point out.

First, built and unbuilt, roofed and unroofed spaces functioned in close symbiosis, and both should be included in a study of 'architecture'. All sites studied here are built up densely. The clustered settlements that characterise most of the sequence at Çatalhöyük East and West, Erbaba and Canhasan III and I are the extreme rendition of this; but even in non-clustered settlements, buildings stand close together. An argument can be made that non-roofed spaces within the settlement were socially structured through and significant in their relation to built spaces: unbuilt/unroofed space was necessary for the functioning of the built/roofed space, and built and unbuilt space functioned in such close symbiosis that the definition of what 'architecture' is becomes blurry. For example, the middens within clustered settlements were vital to the functioning of the settlement as a whole (Bogaard et al. 2014:145-147), supporting activities that the houses were not suitable for, such as refuse disposal, defecation, storage or animal penning (Matthews 2005a; Shillito 2011:102-109). At contemporary less densely clustered sites, the mere existence of more unroofed space inside the settlement was found to be significant, and perceived as a deliberate choice of inhabitants to not build in a clustered manner and therefore create differently structured communities (Lake District: Schoop 2005a:48; Duru 2012:27, Tepecik: Bıçakçı et al. 2012:91; Boncuklu: Baird et al. 2012:224). In these arguments, the social importance of unroofed space is derived from its being not roofed, it is therefore defined in relation to roofed space; and its mere existence is seen as an important cultural statement.

Second, the importance of built structures in configuring settlement space, creating the artificial environment within which social interactions took place, and therefore in a way 'framing' social interaction, is reflected in how archaeologists perceive the architecture of prehistoric southcentral Anatolia: architecture forms the interpretational framework through which archaeologists make sense of the site and its past community. Typically field reports or field monographs (e.g. Duru 1994c; Mellaart 1970c) start with architecture discussions. Other material culture, such as pottery and lithics, is then typically interpreted by relating it to the spatial-temporal and conceptual framework created by the built environment (e.g. Arbuckle 2012a; Bogaard et al. 2013). Stratigraphy at the sites studied here nearly

always equates to architectural stratigraphy: it records the spatial relation of built structures, and other deposits are defined through their spatial relationship to buildings: They are over, under, between walls and floors. Studying stratigraphy at southcentral Anatolian sites is therefore the realm of architecture research, and other items of material culture are mapped into an architectural stratigraphy that forms the spatial-temporal framework for their investigation. This in turn influences architecture research: the archaeology-made borders that define 'architecture' are blurred if object in houses or between houses are seen as essentially all part of the built environment. In southcentral Anatolia most certainly 'architecture' is more than walls and floors; it encompasses human remains buried under floors (Aşıklı Höyük, Boncuklu Höyük, Çatalhöyük), artefacts found on floors and in installations that are used to reconstruct (e.g. grain found in Höyücek bins: Duru and Umurtak 2005a:167; Umurtak 2007b:7), and deposits inside buildings (e.g. at Hacılar and Canhasan, where they are interpreted as building collapse French 1998:33-34; Mellaart 1970c:17, 28). It is, however, possible that archaeology's reliance on architecture as both a research object in itself, and as the framework through which to make sense of other evidence, has influenced the way we perceive it as the social framework of past communities. Remarks such as "the Çatalhöyük buildings were mudbrick encapsulations of the cosmos, replete with traces of all that their inhabitants knew and belonged to" (Carter and Milić 2013:478) possibly capture rather than a past reality the belief of archaeologists that all we need to know about a Neolithic Anatolian society is contained in the house—which might not be entirely true. We might overestimate the archaeological importance of architecture, or underestimate how much knowledge about the past eludes us because it did not leave physical traces inside the village cosmos, for example off-site activities.

Third, in Neolithic/ Chalcolithic villages, social, economic and ritual life and space were integrated to the point where they become inseparable. In the Early Neolithic at Çatalhöyük, Aşıklı Höyük and Boncuklu Höyük, there is little to no spatial or conceptual separation between the social, economic and symbolic/ ritual/ religious spheres (Düring 2006:211) and indeed all three are entangled to a degree where such a division might be incorrect in the first place. At Çatalhöyük, social and

economic features such as hearth, oven and storage spaces; social space with platforms in the 'clean' area of the house; and ritual ones such as wall paintings, burials and moulded installations, if present, were all assembled on the 27m² (Düring 2006:245) that made up the average house (similarly at Boncuklu, with even smaller houses, Baird et al. 2012:233-234). Ritual at Early Neolithic sites has been shown ultimately serve the maintenance of social cohesion, and to blend also into the economic sphere e.g. through feasting (Section 3.2.2). The 'shrines' (ritually elaborate houses) Mellaart recognised at Hacilar II were also at the same time residences with cooking and storage installations (Mellaart 1970c:29-30, 35-36). A research project seeking to reconstruct socioeconomic processes from architecture (here: the emergence of socioeconomic status differences) therefore needs to research house-related ritual as well.

Fourth, settlements in the study region were constructed as dense social/architectural webs in which a single building can only be understood in relation to others. For example, Chapter 3 has described how in the Early Neolithic people constructed communities by establishing multiple social/economic/ritual ties between individual buildings and households at Çatalhöyük, Aşıklı Höyük and Boncuklu Höyük. It follows that the settlement must ideally be understood as a whole—a complex organism made from individual parts (buildings). Approaches that pick out individual buildings for archaeological study, such as Cutting's work (2005a, 2005b, 2006b) therefore seem less suited to understand the workings of society and the settlement. Within this multi-component settlement space, 'architecture' must be studied by archaeology as a process with four dimensions. At many sites, houses were constantly changed in small ways that might however signify important changes in the local social fabric within a house or house group. Frequent modifications to a house cluster are reported from a number of sites, for example through adding walls or subdividing rooms with new walls (Höyücek: Duru and Umurtak 2005:167-168), blocking doorways (Hacilar II: Mellaart 1970c:35), or abandoning a house while its neighbours continued to be used (Canhasan: French 1998:32; Höyücek: Duru and Umurtak 2005:164-165); and Stevanović (2012c:79) provides a compelling study of how such seemingly minor changes to individual

buildings modified the relationships between neighbouring households. There is also evidence that Neolithic/ Chalcolithic people deliberately commemorated changes to the architectural and social, making the *höyük* a living archive that preserves evidence for social transformations. The practice of building continuity at Aşıklı Höyük, Çatalhöyük and Boncuklu Höyük has in Section 3.2.2 interpreted as a means of creating social continuity. But at all sites studied here, people decided to build on the stumps of older houses for centuries, thus creating *höyüks* which in themselves are a specific form of settlement; the preservation of the old under the new houses apparently was of significance (Rosenstock 2009:221-223). In sum, house biographies—the relative sequence of all events that happened to the house—have been shown to be of central importance to understanding the house as a social object, and such events and processes must therefore be included with the ‘architecture indicators’ of social organisation.

Fifth, while researching built structures within a network of other built and unbuilt space, it is important to appreciate the small differences between them. Even at sites that at first glance feature somewhat standardised house layouts, no two buildings are ever identical (e.g. Mellaart 1970c:11 about Hacilar VI). Particularly in the relatively uniform built environment typical of the study region, even small differences are socially meaningful. Love (2013c) and Hodder (2014d:156; Hodder and Farid 2014:27) have argued that Çatalhöyük households deliberately used different mudbrick recipes and small idiosyncrasies, such as square ovens, as statements of autonomy counterbalancing the relatively standardised house layouts. Steadman (2000b:184) has considered whether one house at Hacilar II might display status by being located in a slightly raised area within the settlement. Even if layout, size and furnishing seem similar, building life cycles might display important differences, for example (Matthews 2005a:5) and (Russell et al. 2009, 2014) have pointed out the variety of building abandonment modes at Çatalhöyük. Within the spatially dense villages researched here, it seems impossible that such idiosyncrasies were not being noticed by neighbours (Love 2013c:276), and this makes them socially meaningful. Architecture researchers should therefore emphasise differences, not similarities, between buildings. This in turn discounts

the search for a 'typical' house (cf. Cutting 2005b:123-137; Schachner 1999). Neither is there a typical settlement form: At the end of his thesis, Düring (2006:311) concludes that Çatalhöyük and Aşıklı Höyük looked similar but functioned differently. Baird et al. (2012:233-234) show that Boncuklu houses were symbolically structured and renewed in similar, yet different ways compared to later Çatalhöyük. The most promising architecture analysis therefore seems one that acknowledges the idiosyncrasies of individual buildings, while not forgetting that these are part of a settlement web (e.g. Düring 2006; Hodder 2014b; Love 2013a).

In sum, the following specific characteristics are of crucial importance to guide a further analysis of architecture at southcentral Neolithic and Early Chalcolithic Anatolian sites: First, built and unbuilt, roofed and unroofed spaces functioned in close symbiosis, and both should be included in a study of 'architecture'. Second, 'architecture' encompasses more than built structures, but also at a minimum objects deposited within or under these structures. Third, social, economic and ritual life and space were integrated to the point where they become inseparable. Fourth, settlements were constructed as dense social/architectural webs in which a single building can only be understood in relation to others, and in which inhabitants also used the temporality of architecture to construct social relations: 'Architecture' must therefore be studied by archaeology as a process with four dimensions. Fifth, within the relatively uniform architectural expression, differences between houses are socially meaningful. Data analysis in this thesis (Chapter 6-9) will incorporate these notions.

4.4 Architectural legacy data

Archaeology is a cumulative enterprise (Düring 2011c:xiii)

Next, it is necessary to discuss the idiosyncrasies in the data set that have been created not by Neolithic and Chalcolithic peoples, but by the archaeologists who unearthed their material remains. Düring (2006:2, 12), Schachner (1999:3) and

Cutting (2005b:20) all state that the use of architectural data generated through excavation by other people, each working with different excavation methods and research aims, was a significant challenge, and possibly the major challenge, faced by their comparative architecture research. Düring (2006:2) states that

“the study was designed specifically as a test for exploring the degree to which the potential of the low resolution data from older excavation projects can be further developed using modern computer methodologies, and whether these data can be meaningfully integrated with more recent high resolution excavation evidence that is by necessity much more restricted in scale. The study of settlements in Near Eastern archaeology depends on our ability to incorporate projects that have generated low-resolution data, simply because that evidence will probably not be replaced in the near future.”

This statement captures the essence of what also presents the main challenge of the data at hand here: The sites studied in this thesis were excavated over a period of nearly 60 years since 1957, and over this period archaeological methodologies and research questions have changed significantly, making for a heterogeneous set of legacy data. The methodology and theoretical framework used in this thesis are situated in a 21st century postprocessual research approach that might not be immediately compatible with data generated in a culture-historic research framework, and sometimes decades ago. This makes it advisable to consult theory that facilitates working with diverse sets of legacy data.

4.4.1 Legacy data

‘Legacy data’ is a term originally developed in computing for data from an outdated computer system (Allison 2008). In archaeology, ‘legacy data’ refers to data created using outdated methods of fieldwork and recording (Ellis 2008; Ellis et al. 2008; Witcher 2008), or simply “other people’s data”, acknowledging that every researcher’s strategy differs from that of others (Atici et al. 2013:664; also Smith 2008). The challenge for the re-researcher is to account for biases and pre-interpretations introduced by the manner in the data were originally generated, to

deal with inconsistencies, ambiguities and conflicting information in the data set (Allison et al. 2008; Atici et al. 2013; Ellis et al. 2008; Láng 2013:6; Smith 2008:31-32); and to grapple with the fact that legacy data might not always be suitable for new research objectives (Allison 2008:10). When attempting a synthetic or comparative study with legacy data (such as this thesis is aiming to achieve), one further faces heterogeneous data sets created “at different times, by different people, with different research objectives”, which multiplies issues (Allcock and Roberts 2014:36; for other case studies see Ellis 2008; Láng 2013; Witcher 2008).

All data used in this thesis could be called legacy data: some were created with pre-modern excavation methods; and except for Çatalhöyük West Trench 5, all data is “other people’s data”, since I was not part of the team that excavated it. Further, this comparative study faces the issue of data created with different excavation methodologies. Even within the same excavation project, the skill of recognising contexts and the methods of excavating and recording them constantly change and improve over the course of a few years as the team becomes more familiar with the site, as experienced for example at Çatalhöyük (Berggren and Nilsson 2014:57) and Canhasan (French 1998:8-13), so that recordings from the first year of excavation might not be directly comparable to that from the last year.

Architecture represents a unique archaeological material in that it is never possible to completely re-analyse it in the same way as, for example, a pottery expert could re-analyse assemblages kept in museums (as done by e.g. Schoop 2005a:11; but artefact assemblages are also always pre-interpreted, Atici et al. 2013). Due to the layered nature of Anatolian *höyük* sites, much of the architecture studied in this thesis was removed after recording in order to reach lower levels; even if preserved, once exposed to the elements earth walls, wall plaster (Lingle 2014; Lingle et al. 2015; Matero 2000:75, 84-85) and even stone walls erode quickly. Trenches are often backfilled at the close of excavation (Çatalhöyük West: Biehl and Rogasch 2013:94; Hacilar: Mellaart 1961b:39), and where this has not been carried out, remaining architecture erodes within a few years (see Baranski 2015; Matthews and Farid 1996 for reports on re-opening 1960s trenches at Çatalhöyük; Duru 2008:ix who states that the excavated Lake District sites were “left to the

elements [and] unfortunately have vanished and no longer exist today). In short it is impossible to re-examine architecture in the same way as the initial excavators were able to. While in other areas of archaeological enquiry, researchers weigh the benefits of working with legacy data against its issues (e.g. Allcock and Roberts 2014:34; Allison 2008:10-11; Atici et al. 2013:664, 673; Witcher 2008), for architecture analysis in a prehistoric Anatolian context there is simply no choice.

It is therefore important to view legacy data not as a problem, but simply as an innate challenge of doing architecture research in prehistoric Anatolia. Comparative studies addressing larger (regional) research questions, such as this one, need excavated architecture from a range of sites, and ideally sites excavated on a large scale and in a detailed manner. Even in an active research landscape such as Neolithic/ Chalcolithic southcentral Anatolia, excavating such data takes decades, and both methods and research frameworks are bound to change during this time. Finding viable strategies to enable high-quality comparative research is therefore crucial. Further, as Düring (2006:12) pointed out, while legacy data might often lack the precision or resolution required by current research, “the excavations of the 1960s provide us with a very different kind of evidence related to a much more extensive way of digging that can no longer be practiced ethically in modern archaeology” and thus can genuinely contribute data about settlement organisation that cannot easily be regenerated—not to mention that what has been excavated once cannot be excavated again. In sum, Anatolian architecture research needs to develop methods to routinely and competently handle legacy data.

4.4.2 Dealing with legacy: the Anatolian context and beyond

Of course, archaeological research with legacy data is nothing new, and has been done in southcentral Anatolia with great success. Some more recent examples are Schoop’s (2005a) pottery project, Allcocks’ (Allcock and Roberts 2014) integration of the results of three large multi-period surveys in Cappadocia between 1964 and the present, and Steadman’s (2000b, 2004), Schachner’s (1999), Cutting’s (2005b) and Düring’s (2006) architecture work. Outside of Anatolian archaeology, there is a

relatively recent, but growing corpus of literature reflecting on the use of legacy data from archaeological field work, attesting to the fact that this is an issue of increasing importance within archaeological research. This literature will be used here to complement and contextualise the Anatolian experience.

How did previous architecture researchers in my research area deal with legacy data? Cutting (2005b:19) states that her methodology was developed “to be suited to the often poorly-preserved and fragmentary architectural material typical of most prehistoric Anatolian sites”. Her data recording form was deliberately designed in an open form to account for the fact that “the type and quality of the [...] information available varied considerably between sites” (Cutting 2005b:19, 21). Cutting further limited the variables she included to those available from all or most sites (Cutting 2005b:20), and as already mentioned in Section 4.2 relied heavily on the few better documented sites, levels and buildings to create her narrative. While thus preserving analytical integrity, such an approach by default accepts rather than challenges the status quo; and underappreciates a large amount of available evidence for Neolithic/ Chalcolithic southcentral Anatolian architecture.

Schachner (1999:3) faced similar problems: not all data he required were available from every site due to differences in quality between excavations and different quantities of publications. Schachner’s solution was to widen the chronological and geographical scope of his research, and to include more sites in order to be able to distinguish general trends despite gaps in local data availability (Schachner 1999:3). Since this approach clashes directly with the contextual approach chosen for this thesis it was not a viable strategy and I would argue further that this is not an ideal solution to the problem of legacy data: equating across large chronological and geographical distances, and filling research gaps at one site by assuming that things must have been similar to how they were at better researched sites, can only produce images of past human behaviour that are general at best, and distorted at worst. Including more data and more sites also typically prevents, within the framework of what a single PhD-sized research project can typically achieve, the researcher from exercising the degree of minute attention to the data that was proven by Düring (2006) to be a successful strategy.

Düring (2006:2) framed his study specifically as an exercise in dealing with legacy data, and demonstrates how, through detailed detective work, 'old' data can be translated into new research frameworks. He (and also to a degree Cutting 2005b) employed strategies recommended by the few sources that provide concrete advice on legacy data. First, data verification (Atici et al. 2013:667, 669, 677, Tab.1), whereby facts are cross-checked between different data sources (e.g. text, photos and plans), the data set scanned for internal inconsistencies and contradictions, and architectural data cross-referenced with other information about the site, such as artefact assemblages. Data found to be ambiguous will either be assigned a lower reliability (Cutting 2005b:68, 77, 80; Düring 2006:89, 211) or omitted from analysis (Atici et al. 2013:669; Düring 2006:166; Láng 2013:6). Second, once the data set has been consolidated, it can carefully be translated into a new research/interpretational framework. In Düring's work (2006:36), this was done by transferring data into a GIS (Geographical Information System) in order to observe diachronic and synchronic patterns not observed before. Other solutions found in the literature include translating data into new chronologies (Allcock and Roberts 2014:38; Atici et al. 2013:669) or site stratigraphies (Láng 2013:5-6). Major overhauls of the research framework are problematic at long-standing excavations whose results have long spread into the wider research discourse and a break with e.g. an inherited stratigraphic/ phasing system that is found incongruent with new observations (Çatalhöyük: Farid 2014; Hodder 2014b:Tab.1), or an overhaul of building typology (Pompeii: Ellis 2008) runs the risk of confusing rather than clarifying the research landscape. However, since archaeological categories contain interpretation, it might be desirable to part with them, for example at Çatalhöyük, where Mellaart (1967) distinguished 'houses' and 'shrines', but the new project re-interpreted the function of built structures and now uses the more neutral label 'building' (Hodder 2014b:4). This thesis encountered similar issues in Chapter 2/Appendix 1, for example when the 'Aceramic' levels at Hacilar, or the 'Early Neolithic' at Bademağacı were found to be Late Neolithic.

And third, the above named legacy data projects documented the ambiguities encountered within the data set, and included this in their publication of the results

(Allcock and Roberts 2014:36-37; Atici et al. 2013:666-667; Düring 2006; Ellis 2008; Ellis et al. 2008; Láng 2013:6). They further clearly documented the details of the methodology followed while working with the data. This point is particularly urged by Atici et al. (2013:667-670) who conducted an experiment comparing results from three independent re-studies on a legacy faunal dataset and found that, although all three had taken approximately the same steps, differences in seemingly minor decisions made during analysis resulted in significantly different interpretations. Finally, several reports stress the importance of choosing research questions suitable to the existing data, which often meant to not answer some research question that the research originally set out to answer (Allcock and Roberts 2014:42; Arbuckle et al. 2014:2; Atici et al. 2013:667, 673). I will note, though, that at the same time the re-research needs to be able to produce new and different results, otherwise it becomes an obsolete enterprise.

There is one technique that other legacy data projects found to be of central importance, but which has not yet explicitly been used in southcentral Anatolian architecture research: Reflexive source criticism, here meaning an investigation of the research history including methods and theoretical frameworks, to understand the context within which certain labels, identifications, interpretations and records were created (e.g. Allcock and Roberts 2014:36-37; Allison 2008; Ellis 2008:11; Witcher 2008). Witcher (2008) explicitly introduces the relevance of reflexive archaeology to the work with legacy data by saying “the process of source criticism is essentially a reflexive archaeological practice”. An investigation of the methods and techniques used during the original fieldwork that created the data is necessary for an informed, critical use of legacy data. This was found to be especially important if data sets were many decades old (Witcher 2008), and/or had already been used and re-used several times, creating a halo of secondary and tertiary interpretations (Ellis 2008).

Summary

To summarise, comparative architecture research in southcentral Anatolia by

default relies on legacy data and diverse data sets. A small but recent and productive body of literature recommends strategies for successfully working with legacy data that that will be employed in this thesis. Since source criticism, the critical evaluation of legacy data through understanding the context they were produced in, was found by previous studies of legacy data to be a foundation of successful data (re)use, I will discuss in detail in the following section how archaeological reflexivity can be used to work with architectural legacy data derived from excavations.

4.5 Reflexivity

Reflexive archaeology is one of the many facets of postprocessual archaeology and describes a critical awareness of the archaeological research process and its influence on the results of research. Archaeological reflexivity applies the notion that human behaviour and knowledge is always conditioned by cultural context (4.1), to archaeology itself to realise that there is no absolute truth in archaeological research, and that all archaeological knowledge is a product of the social context it was produced in. At the beginning of this chapter, 'context' has been defined as being made up by the past culture that is being researched; the medium through which it is researched (here: architecture); importantly, the archaeologists who conducted the prior research that produced the data and the literature landscape this thesis is dealing with; and the archaeologist who is conducting this particular piece of research (me) and the previous experience, knowledge and beliefs I bring to this work. Here it will be argued that reflexive source critique can help dealing with biases introduced by archaeological research in order to get a clearer view of the past.

4.5.1 What is archaeological reflexivity?

The first publications to introduce the term reflexivity to archaeology were published in 1987 (Leone et al. 1987; Shanks and Tilley 1987:2). Burke et al.

(1994:14) point out that “the explicit use of reflexive methods in archaeology and the social sciences may be relatively recent, but reflexivity underlies and imbues the Western intellectual tradition”. Similarly, Leone et al. (1987:283; also Wilkie and Bartoy 2000) connect reflexive archaeology with Marxist critical theory, which originated in Frankfurt (Germany) in the 1920s. Reflexive archaeology shares many common goals with critical archaeology and the terms are at times used interchangeably (e.g. Shanks and Tilley 1992:67).

Although archaeology researches the past, it takes place in the present, within a sociopolitical framework that encompasses more than the archaeologists involved in a particular research project: Local communities, government authorities, scholars from archaeology and related disciplines, and the interested public observe and influence the researchers’ work and interpretations (Burke et al. 1994:14; Hodder 2000a; Leone et al. 1987:284). With so many groups and individuals, each with their own set of values, involved in the process of producing and re-producing knowledge, conclusions are always subject to change (Hodder 2000a:9) and there are no “facts” that can be separated from “interpretation” (Hodder 1999a:81). Reflexive archaeology thus advocates the questioning of assumptions through investigation of the archaeological practice itself: its methods, theories, and practitioners. This includes questioning the very basic presuppositions that archaeological research is based on and that might be taken for granted (Burke et al. 1994:20), such as the geographical and chronological categorisation that was reviewed in Chapter 2 of this thesis. Rather than desponding in the face of “uncertainty, insecurity and general unrest” (Burke et al. 1994:20), destabilisation (Hodder 2000a:8) and “chaos” (Chadwick 1998) produced by acknowledging the subjective nature of archaeological research, reflexive archaeology advocates an acceptance but critical awareness of subjectivities (Shanks and Tilley 1992:67) and welcomes the inclusion of many varying positions to enrich archaeological knowledge (Edgeworth 2006b:16; Hodder 2003:58).

In a way, as Edgeworth (2006c:xii-xiv) points out, reflexivity is simply following through with archaeology’s own logic in which all human action is seen as social or cultural practice, and thus also seeing archaeological practice as socially situated.

Central to the notion of reflexivity is the belief “that a self-critical awareness of present practices will lead to refinements and/or changes in those practices which, in turn, will produce a better archaeology” (Burke et al. 1994:20) with greater methodological rigour and more reliable research outcomes (Berggren and Hodder 2003:431; Burke et al. 1994:14; Leone et al. 1987:285). Reflexive methodology can thus not only help to understand the present (present archaeological practice and thought), but also the past. This thesis aims to do both, since the two are interrelated: I work towards a better understand of the archaeological research process in order to suggest improvements in our understanding of the past.

Applying reflexivity

How exactly can reflexivity be applied as a research tool in this thesis to produce a better research outcome? First, it can assist in developing a suitable research methodology. The contextual approach towards developing a methodology that was outlined in the first section of this chapter is already one of the most important requirements of reflexivity: “Th[e] contextualisation of method is one of the key struts of a reflexive method. Rather than the emphasis on universal method seen in positivist archaeology, the emphasis is on developing methods sensitive of context and problem” (Hodder 2000a:3). Doing just that, this chapter constructs a context-appropriate methodology and interpretive framework through exploring existing methods and research biases.

Second, reflexivity is here employed as a tool for source critique and data verification. Reflexive thinking has been shown above to be a particular brand of critical thinking that critiques the product (a research opinion) by understanding the process in it was created. In this thesis, it is used to re-evaluate prior research and prior knowledge to arrive at new interpretations; in both components: that of evaluating epistemology, and that of researching architectural data with the created tool kit. Burke et al. (1994:19) state that “as Potter (1992:232) points out, reflexive research empowers others through providing sufficient contextual information for them to take positions independent to that of the researcher.”

Developing new and independent research opinions becomes possible when it is acknowledged that previous research opinions are the product of the specific research context they were created in; to become knowledgeable of that context is therefore of crucial importance in this thesis.

Third, theoretically it would be possible to research previous architecture research, and excavation recordings in specific, as an exercise in archaeology ethnography: To find out more about the people who excavated the architecture. Reflexive theory, and especially its application to fieldwork which is reviewed in the following, outlines clearly that site recordings can be used to draw conclusions about the archaeologists who produced them as much as about the archaeology that was being recorded. Since this thesis is not primarily a piece of ethnographic work about excavation projects in southcentral Anatolia, it investigates excavators and excavation projects only to a very minor degree that helps towards the main research aim: a better understanding of how architectural was socially used in the past.

4.5.2 Archaeological recordings as material culture

Excavation [...] is an autobiographic, subjective, socially determined and often fundamentally ambiguous and/or contradictory set of interpretative activities (Tilley 1989:278)

As a starting point into reflexive critiques of architectural data, we must explore the process by which these data were first created: excavation. As legacy data, this thesis necessarily deals with pre-interpreted data. Excavated, recorded, drawn, photographed, and then processed for publication, information about Neolithic and Chalcolithic architecture of southcentral Anatolia has been negotiated, transformed and filtered multiple times since the beginning of archaeological exploration in the area. The record now available has a multitude of authors who each impacted the product in different ways. It follows that this thesis is, in fact, researching two

different kinds of material culture. It researches architecture, but not the architecture itself – it researches recordings of prehistoric architecture made by archaeologists in the 20th and 21st century. Archaeology's artefacts—such as photos, notebooks, drawings, site reports, publications—have in fact been described in reflexive studies as material culture (Bateman 2006:72; Lucas 2001b:44; Yarrow 2008:135) that presents its own complexities when used as a research object.

Understanding how archaeological knowledge is created through excavation is particularly relevant to an epistemological thesis dealing with excavated architecture from southcentral Anatolia. In section 4.2.2, I argued that architecture might be especially contextual because it is always entirely human made. Similarly, the architecture studied here might be especially shaped by archaeological practice because it is excavated; and when excavated, it is often in a state of preservation whereby it is literally re-created by the excavators who therefore have an exceptional influence on the archaeological record.

The ethnography of archaeological excavation

There is a large contingent of literature, mostly from the last 20 years, that reflects on how knowledge about the past is created and transformed through the processes of excavation, of site recording and data publication (for overviews see Edgeworth 2006a; Hodder 2000b). However, outside of the Çatalhöyük Research Project (Berggren and Nilsson 2014; Hodder 1997, 2000b), not much explicitly reflexive work has been done related to southcentral Anatolian prehistoric archaeology although a number of publications include reflexive elements: Cutting's and Düring's theses include discussions of how fieldwork techniques employed at southcentral Anatolian sites influenced the excavation results (e.g. Cutting 2005b:42, 69; Düring 2006:87, 92, 107, 158, 249) and French (1998:8-16) published a highly relevant hindsight-review of the 1960s excavation methods. Here, literature from outside Anatolian archaeology will be used to supplement reflective work created in Anatolia.

Reflexive studies of archaeological field work have documented excavation as a complex sociological space in which material culture (e.g. photos, drawings, context sheets, notebooks) is created that is as much a document about remains of past cultures as it documents the excavation process itself, and the people involved in it. While archaeology's material culture can be, and is (e.g. Chrysanthi et al. 2015; Edgeworth 2012; Mickel 2015), used to research archaeologists and the archaeological process, of more relevance here is an awareness of how this might have impacted knowledge about the past; and specifically, how the architectural data I deal with were created in a specific social context that impacted them.

Excavation as the creation of a site

If reflexive archaeology declares all knowledge to be subjective, this is even more the case if what will become primary data has to first pass through a filter of bodily perceptions like vision, smell or touch (Edgeworth 2012:80; Hodder 1999a:92). Such bodily perceptions, and especially vision as possibly the field archaeologist's most important tool, have been shown in neuro-psychological, linguistic, and anthropological research to be inherently socially constituted. For example the visual perception of colour (Davidoff et al. 1999; Goodwin 2006:48-50; Hodder 1999a:85; Kay and Regier 2006) and spatial relations (Amorapanth et al. 2012) as well as the categorisation of objects (Malt et al. 1999) —crucial components of archaeological 'field vision'—have been shown to be learnt, i.e. subjective and socially constructed. Because to see is to interpret, different people might see very different things in the same archaeological feature (see Hodder 1999a:104 with an example from practice). Archaeological vision is further a trained and acquired skill that is influenced by the nature and amount of fieldwork exposure an archaeologist had previously (Berggren and Hodder 2003:427; Goodwin 2006:54) and prior experience shapes what is being perceived (Andrews et al. 2000:526; Bradley 2003:155; Edgeworth 2012:78, 80).

Reflexive archaeology holds that the interpretation of the archaeological record starts immediately—unavoidably—while it is being unearthed (Hodder 1999a:92):

“It is difficult to separate in our minds the excavated evidence from its interpretation, which inevitably begins as features are seen, dissected and removed” (Barker 1993:161). This initial interpretation influences any further actions taken during excavation work: the cycle of uncovering–perceiving–interpreting–uncovering is actually, physically, creating the walls and floors and other archaeological features. And after uncovering, opinions formed about an archaeological context further influence the manner of its removal, which is an important part of the process of understanding it; for example, pre-existing interpretations direct whether the sediment is sieved or not (Hodder 1997:692). The typically small group of people involved in uncovering a particular feature thus shape the feature quite literally (Hodder 2000b:16; Lucas 2001b:42-43), and any archaeologist who sees it after its uncovering sees an archaeological context that has already been filtered and interpreted (Gero 1996:252-253). Thus, “excavation is essentially an interpretative activity” (Yarrow 2003:65), any ‘data’ generated in the field contains interpretation (Chadwick 2003:100; Hodder 1999a:83-85). Archaeological features do not exist as an objective truth outside of the field archaeologists’ perception, “a theoretically neutral entity merely uncovered and revealed by the archaeologist” (Edgeworth 2012:78); they are in a way made by the archaeologist as much as they were made by people in the past (Berggren and Hodder 2003:430; Edgeworth 2012:78-80). As Witcher (2008) puts it, “This does not mean there is no reality 'out there', but simply that there is no objective way of recording it”: the site as it exists after excavation is made by archaeologists.

Excavation as negotiation

Excavation is always team work, and ethnographies of archaeological fieldwork have documented that complex interpersonal dynamics impact the knowledge created in the field. Anatolian excavation projects are typically socially diverse—consisting of academics, students, locals, professional excavators, and often several nationalities—and this is likely to produce not only a diversity of opinions about the

archaeological record, but also complex dynamics by which these opinions are voiced, heard, transformed, recorded—or not voiced, heard, or recorded. Yarrow (2003, 2006) and Hodder (2000a) portray the outcomes of excavation work as matters of negotiation that are constantly being communicated about, formally and informally, throughout the day and over the course of an excavation season. Examples of such negotiations have been documented for example by Locatelli et al. (2011) who observed archaeologists' interaction around the creation of an excavation photo record; by several researchers who observed how excavation and results were being discussed and interpreted outside of actual work hours in informal settings during the excavation season (Berggren and Nilsson 2014:67; Chadwick 2003:106; Eddisford and Morgan 2011; Yarrow 2006:21). These examples show that social interaction influences knowledge- and opinion making before and during recording of archaeological features. And they ascribed a pivotal role to excavation directors and other senior personal in the making of the archaeological site since hierarchies and individual personalities influence whose opinions are voiced and heard within the team (Chadwick 2003; Gero 1996; Hodder 1997:698; Locatelli et al. 2011:330-331; Lucas 2001a:9). Senior personnel are also typically the ones to do more (or all) of the documentation and report/publication writing, and this step in the archaeological process has a critical filter function (see below). Not last, outside parties can influence the excavation process and its results: the academic research community (Farid 2000:27; Yarrow 2006:26), funding bodies (Bradley 2003:157), legislative bodies, and local communities (Bartu 2000; Hodder 1997:693-694, 2000a, 2003, 2008; Shankland 2000).

Filtering through documentation and writing

After excavation, site recording—in text, photo and drawings—further filters and interprets archaeological features: recording is always, and sometimes deliberately, an interpretive activity (Bateman 2006; Hodder 1989, 1997:692, 1999a:94; Leibhammer 2000). Site recording has been portrayed as a translation or coding process, whereby the excavators' thoughts and perceptions, i.e. intangible things,

are transformed into words or images (photos or drawings), i.e. a tangible record (Berggren and Hodder 2003:430; Hodder 2000b:16; Lucas 2001b:44). The record of the site thus produced is intended to be more easily understood by a wider range of people, since it constitutes a pre-interpretation of the site (Hodder 1999a:94) by archaeologists who translate archaeology into words and images that can be shared and reproduced to preserve archaeology even past its destruction by excavation or other processes (Leibhammer 2000:137; Yarrow 2008:129, 134). In short, excavation records are “materializing strategies for enabling the archaeological record to be subject to repeated investigation” (Lucas 2001b:44).

And precisely because archaeological features are often destroyed either during or after the recording process, or for other reasons not accessible any more (backfill, permit etc.), the archive of site recordings then in a way becomes the site; in the absence of the physical site to engage with, the archive substitutes it and can be used and reused for research possibly indefinitely (Lucas 2001b:43-44; similarly Yarrow 2008:129). This ascribes a crucial bottle-neck filter function to site recording: The excavation team will engage with the archive, not the site, while writing reports, research papers and books (Hodder 2000b:16; Lucas 2001b:44). And anybody who was not part of the excavation team can only obtain that knowledge about the site that is documented in the archive, or those parts that are being shared with the public. Therefore “the subsequent way in which we go on to analyse and interpret a site is already pre-formed by the materializing strategies we use in the field, from the way we draw a section to the way we select, bag and label our finds” (Lucas 2001b:44). After excavation and recording, the process of writing site reports and academic papers presents yet another filtering and interpretation step, and one that routinely strips away information about the specific social context that surrounded the knowledge creation on site (Hodder 1989:273; Lucas 2001a:9, 12; Mickel 2012; Tilley 1989:279).

In sum, the image that the academic community and public have of a site is created by the excavation team. Acknowledging that this image is not a neutral truth about the past is absolutely crucial for a study of architectural legacy data. How much the results of an excavation are influenced by the subjective individual experience of

different excavators, and the unique dynamics inside a team, has been documented at Çatalhöyük, where not only the Hodder team has created significantly different interpretations of the site as compared to Mellaart, but also the different teams working under the umbrella of the Çatalhöyük Research Project, with slightly varying excavation techniques, have created different images of this Neolithic settlement (Berggren et al. 2015:Tab.1; Berggren and Nilsson 2014:66-67; Hodder 2000a:9-10, 2008; Marciniak 2008b; Tringham and Stevanović 2000).

Summary

The results from reflexive studies of archaeological fieldwork clearly indicate that excavation methods, preconceptions and research rationales, as well as the agency of the excavators—and especially those in senior positions, such as site directors—significantly shape the excavation results. This insight is for this thesis relevant not only when dealing with the actual site recordings during the application of the tool kit (Appendix 12), but also in the creation of this toolkit in the first place, which is of course based on excavated data, site recordings and publications

4.6 Text as data: Content analysis

In this chapter, Section 4.2 decided on a context-specific approach towards studying social organisation from architecture, using only previous research in prehistoric southcentral Anatolia as a referencing system. This necessitates a systematic study of existing literature in order to construct an interpretive framework by identifying architectural indicators of social organisation; and I will suggest that the method of *content analysis* is suitable for this. The discussion is now transitioning into debating methods rather than theory, but I want to outline why content analysis fits the research strategy already decided on.

Content analysis

Content analysis describes a range of techniques that systematically identify and evaluate the content and meaning of communications with the aim of reconstructing social behaviour. It can be applied to any form of conserved communication—written text, recorded speech or music, images, videos—to study thoughts and interactions (Abbott and McKinney 2013:316; Price 2010). Content analysis sorts, condenses and synthesises meaning contained in text and images through coding. Coding is a process, often done in a software program, by which the researcher attaches labels to segments of text or images; the labels depict the meaning of the text passage—as understood by the researcher. In a second step, the researcher can then observe patterns from these labels (Berg 2009:338-339; Charmaz 2006:3).

Content analysis has been characterised as a quantitative technique by some (Krippendorf 2004; Lacy et al. 2015), and as qualitative by others (Abbott and McKinney 2013; Charmaz 2006)—or as a mixture (Berg 2009:342-343; Price 2010). While it certainly has a quantitative element in that the researcher counts how often a particular topic or theme has been stated, I agree with those (Abbott and McKinney 2013; Price 2010), who hold that content analysis has by default a strong qualitative component, and emphasise the interpretive element of content analysis: if language is analysed, it is the individual researcher who makes the decision whether a combination of words encompasses a certain meaning. While it can thus never be an ‘objective’ technique (cf. Berg 2009:341), content analysis allows a more systematic description and evaluation of a data set composed of text or images than mere observing, listening or reading would; it moves past perception to a more unbiased evaluation (Abbott and McKinney 2013:317).

Applying content analysis

Content analysis is a method in the social sciences and according to my research in large literature databases (Google Scholar, Scopus, Web of Science), only a few

archaeological research projects have used content analysis explicitly as a method. A majority of the examples found can be characterised as reflexive work, i.e. the ethnography of archaeology investigating archaeological practice rather than archaeological data ((Beaudry and White 1994; Oikarinen and Kortelainen 2013; Rosenswig 1997; also see Leuven 2015 with a similar method). Content analysis has also been used to study how archaeology is presented in the public (Eakle and Chavez-Eakle 2013; Nichols 2005). Shanks and Tilley (1992:211-240) used content analysis to research newspapers and advertisement as part of a study of modern material culture. This spread of topics indicates that content analysis was used previously in projects not dissimilar to mine: archaeological projects which processed large amounts of text, and often employed a reflexive element. Content analysis can therefore be used here to systematically map the existing discourse on architectural indicators of social organisation in Neolithic and Chalcolithic southcentral Anatolia as a foundation for constructing an interpretational model that understands the social use of architecture ‘from the inside’ instead of applying an external model onto the data.

Further, I argue that the principles underlying content analysis will sound very familiar to archaeology, and that the method is inherently suitable for archaeological research. One reason why this method fits so well for my project is that content analysis, or at least the decidedly qualitative kind, is rooted in grounded theory. Grounded theory is another social sciences term, and social sciences method, but its principles are similar to the contextual approach to archaeology. Grounded theory approaches work from data to interpretations through an intimate and detailed exploration of the data themselves, which is reminiscent of the ‘interpretation from the inside’ formulated by Hodder (1990:21) as a principle of contextual archaeology. Grounded theory seeks to let “the data to speak for itself” in developing concepts and interpretations⁷ from the data themselves rather than viewing them through pre-existing hypotheses (Abbott and

⁷ Note that in the social sciences, ‘theory’ is used as a term to describe what this thesis refers to as ‘interpretations’: the result of a research project (e.g. Abbott and McKinney 2013:319-320). This is different from archaeology, where ‘theory’ typically describes part of the foundation of a research project: assumptions—essentially about how to get from material culture to interpretations of human behaviour—existing prior to data analysis that guide the examination of data (Hodder 1995:4, 1999a:12-13).

McKinney 2013:319-320, Charmaz 2006:2). In a grounded theory project, data are thus gathered at the very beginning of the research project, and not only interpretations, but also the 'middle-ground' analytical categories that lead from data to interpretations are derived from the data themselves (Charmaz 2006:2-3). This principle sounds very much like Hodder's (1991:16) appeal to interpret archaeological data through "the telling of stories grounded in the data". And just like Hodder (1995:13) for contextual archaeology, Charmaz (2006:14) cites Geertz's (1973) 'thick description' as the ideal 'rich' data for a grounded theory approach leading to reliable interpretations.

In sum, especially if done in a grounded theory framework, with emphasis on and awareness of the qualitative and interpretative nature of the process, content analysis has a strongly exploratory nature. Coding immerses the researcher deeply in the data, and labels, patterns, ideas and interpretations emerge successively during the data exploration process (Charmaz 2006:3, Fig.1.1). This fits well with my intentions to build up an interpretational model to make sense of architectural evidence in southcentral Anatolia from this evidence itself. The notion of grounded theorists and content analysts (Charmaz 2006:10) that the individual researcher has inevitably great influence on the research process and its results connects well with reflexive archaeology.

4.7 Summary: Architectural markers of social organisation: a context-specific approach

Choosing a context-specific approach towards researching architecture, this thesis will use previous research as a main source to construct and interpretational framework—a package of architectural indicators of social organisation and social change—for its analysis. Since it uses archaeological publications itself as data, the chapter went on to reflect in greater detail on the reflected use of legacy data, and found a method—content analysis—suited to processing large amounts of text systematically. Further, this chapter has defined specific idiosyncrasies of southcentral Anatolian architecture that need to be respected by architectural

research methods. Having established the foundations and borders of an interpretational framework, Chapter 5 will set out to translate the thoughts collected in this chapter into practice.

Chapter 5 METHODS

This thesis has two components. The first and more important component is a content analysis of 222 archaeological publications that provided the basis for a discussion of the epistemology by which archaeology translates architectural features into interpretation of social organisation (Chapters 6-9). Component 1 generates a tool kit of 'indicator packages' that can be applied to the archaeological record. The second component is a trial run for the indicator packages, which are applied to architectural data (Appendix 12) as a means of evaluating the tool kit.

5.1 Component 1: Building epistemology

5.1.1 Defining a corpus of core literature

As the basis for the content analysis and epistemological debate, I defined a list of literature that represents a comprehensive image of the debate on archaeological research of social organisation and architecture in prehistoric southcentral Anatolia since its beginning, and then systematically scanned this corpus of literature for discussions the four aspects of social organisation that had been chosen for study here: household autonomy, social stratification, mobility and warfare. The coding list was compiled while writing Chapter 3 and familiarising myself with the extent of existing literature on the matter. It was then complemented by checking the reference lists of the literature consulted in Chapter 3 for relevant publications. The final list contained 222 publications (Appendix 2.1) and was compiled according to the following criteria:

First, geographically, the corpus was restricted to publications that discuss southcentral Anatolia. Chapter 4 formulated a context-specific approach towards studying architectural indicators of social organisation; Chapter 2 demonstrated that the three regions studied here cannot be seen as a cultural unit. This issue was addressed during coding (see 5.1.2).

Second, chronologically, the literature base extended from the Early Neolithic to the Early Bronze Age. This thesis researches the LN and EC as a period of transition between EN and EBA social organisation and therefore strives to study a long-term perspective in the architectural creation of social organisation. However, since this thesis has a decided focus on the Late Neolithic and Early Chalcolithic, more literature about architecture from that period was included. In particular, site-specific literature (in column 2 of Appendix 2.1) was only included from sites that had previously (in Chapter 2) been identified as having LN and EC occupation. The other periods of prehistory are only included insofar as they are discussed in the comparative literature (column 1). The literature selection therefore displays the aim of this thesis: to research LN/EC architecture in particular, but within the context of social and architectural developments between the EN and EBA.

Third, as for the **date of publication**, the coding list contains literature about southcentral Anatolian architecture and society published since the start of excavations at Hacilar in 1957, i.e. since the first examples of the Late Neolithic and Early Chalcolithic southcentral Anatolian architecture were unearthed. As another tool to critique epistemology, my research aimed to display the development of interpretations and opinions circulating within the research landscape over the last 60 years and to show how archaeological knowledge was made, created and modified over the years.

Fourth, as for the **type of publication**, publications were chosen that are likely to contain interpretations rather than simply descriptions of architecture. Yearly excavations reports were therefore not included, with a few exceptions. The coding list included: first, textbooks on the prehistory of Anatolia, and chapters, relevant to the study region, in synthesising textbook-like publications such as *The Oxford Handbook of Ancient Anatolia* (Steadman and McMahon 2011) or CANeW (Gérard and Thissen 2002b). Second, books, journal papers and book chapters that compare and synthesise the architecture of LN/EC southcentral Anatolia.

Third, publications discussing architecture at individual sites LN/EC sites in my study area. As stated above, site-specific literature was limited to papers and books that

interpret architectural evidence more comprehensively than normally done in the annual field reports. A few exceptions were made from these selection rules for site-specific literature:

- No final book-length publications yet exist for Bademağacı, Köşk Höyük, Çatalhöyük West, Pınarbaşı, Musular or Tepecik. None were published, or probably ever will be published, for Gelveri and Erbaba. In these cases I included on the coding list the most recent synthesis papers provided by the research director and/or architecture specialists. For example, for, Duru's (2012) paper in *Neolithic in Turkey* discusses the excavation results of Bademağacı in relatively detailed manner.
- From the 1950s and 1960s excavations at Hacilar, Çatalhöyük and Canhasan, I also included the annual reports in *Anatolian Studies* into the coding list. The reason was that in the case of Hacilar and Canhasan, some time (or considerable time at Canhasan) passed between the end of excavations and the book publication. In the meantime, other researchers referred to the opinions voiced in the preliminary reports. For example, Alkım's (1969) volume would have been published before the Hacilar book (Mellaart 1970c). French published his final architecture monograph only in 1998, and until then his reports remained the final work on Canhasan. Another reason for also including the 1950-1960s preliminary reports was that French and Mellaart would have used each other's work while forming their own opinions about the sites they were excavating; the interpretations contained in these reports therefore had an influence on the research progress.

5.1.2 Coding indicators and themes

Text search

Text passages that discuss or mention the aspects of social organisation (household autonomy vs. community interaction, social competition and stratification, mobility,

warfare) studied in this thesis were identified by searching the literature for a list of pre-determined terms (see Table 3), which I then read and analysed in detail. For this to be possible, all sources had to be digitised via scanning and then the text rendered readable with automatic text recognition in Adobe Acrobat XI Pro. It was necessary to employ such a part-mechanised reading technique due to the large amount of literature used. Excluded from the automated approach were Turkish and French sources for two reasons: first, both languages have many special characters that complicate automated text recognition. Second, I am less familiar with these two languages than with German and English, and therefore found it safer to read Turkish and French sources completely with the help of dictionaries and the English summaries included in some sources.

The search terms were chosen based on my experience with the diction in the scholarly discourse, acquired while writing Chapters 1-5. They were also first tested on a number of different sources that I knew particularly well (and thus was able to judge whether anything was overlooked after using the search terms) to verify that the search terms indeed capture all relevant text passages. It is believed that using this reading strategy, my literature documentation is exhaustive insofar that no indicator that is mentioned at least twice or three times in the literature corpus was overlooked; since I also used the same literature corpus in different chapters of this thesis, it is unlikely that I overlooked many indicators or opinions.

| Topic | Search terms |
|---|---|
| Chapter 6: Household autonomy/ Community integration | <p>English: house, commun, building, architect, structure, room, autonom, depend, neighb, residen, collectiv, group, lineage, kin, famil, corpor</p> <p>German: Haus, Gebäu, Struktur, Raum, unabh, eigenst, selbst, Nachbar, wohn, kollektiv, Grupp, Famil, Clan, Klan, Gemein, trenn, kommun, zusamm</p> |
| Chapter 7: Social stratification | <p>English: elite, lead, rul, hierarch, stratif, equal, egal, compet, public, chief, class, wealth, differentiat, complex, importan, dominan, rank, power, prestige, rich, residen, priviledge, depen, aggrand, status, authori</p> <p>German: Elit, herrsch, Macht, Fürst, Hierar, stratif, gleich, egal, öffent, Autori, Klasse, Reich, wohl, Unterschied, Prestig, komplex, wichtig, domin, Rang, Privil, abhäng</p> |

| | |
|----------------------------|---|
| Chapter 8: Mobility | <p>English: mobil, sedent, nomad, move, transhum, pastor, transien, seasonal, tempor, camp, ephem, herd, permanen, migra</p> <p>German: mobil, nomad, sessh, seßh, transhum, pastor, saisonal, Camp, Lager, Herde, permant, dauer, kurz, lang, Hirte, tempor, zeitw, konstan, migr</p> |
| Chapter 9: Warfare | <p>English: defen, abandon, desert, destruct, destroy, fort, war, confl, protect, attack, perim, enclos, viol, fire, burn, conqu, peace, feud, inva, blaze, massac, hostil, bastion, sack, intru, raid, enem, aggress</p> <p>German: verteid, verlass, auflass, zerstör, forti, befest, krieg, konflikt, schutz, schütz, angriff, attack, umfass, gewalt, brand, erober, fried, inva, massak, feind</p> |

Table 3 Search terms used to identify text passages discussing architectural indicators of social organisation.

Coding indicators and themes

Within the text passages identified through key word search as relevant to the study of social organisation I searched for architectural indicators: architectural features that are associated by the authors of the source with to one or more of the aspects of social organisation studied here. ‘Architectural features’ are here defined as discussed in Section 4.3, i.e. also referring to unroofed space, house-related processes such as construction and abandonment, and objects weaved into the house fabric. Using the software programme NVivo, relevant text passages were tagged with one or more labels called ‘nodes’. As a second means of recording, I maintained Word lists of indicators, labels, text passages and sites related to them. These lists were kept as a security copy in case a problem occurred with NVivo, and to more easily be able to sort and organise indicators. The lists are provided here in Appendices 3-7, where each indicator also received a number (#1, #2, ...). While coding and immersing myself in the literature, I kept another file to record observations relevant to the discussion of each indicator. As my content analysis was progressing, I started organising indicators into groups I called ‘themes’: groups of indicators with a common trait, for example all those related to settlement layout or the process of house construction. The themes are very important categories for exploring the social use of architecture (5.1.3).

The indicator labels contained the particular architectural feature and the social interpretation given to it by the author of the tagged source, for example 'community-clustering'. Indicators therefore combine architectural feature (clustering) and interpretation (community integration); and if a certain feature was associated with different social interpretation, an individual node/indicator was created for each of them; for example, there are four different indicators (#13, #47, #130, #165) that refer to clustering. In choosing nodes/labels, I tried to be as specific as possible in identifying concrete features of architecture that can be observed in the field; for example, creating different indicators for the presence/absence of storage installations in a house (#5, #73) vs. their size (#6, #75-#77). Occasionally, however, I created more general nodes, or 'headline nodes', that capture important opinions related to architecture and social organisation voiced in text passaged that do however not mention individual architectural features.

Corresponding to my research strategy of limiting my analysis to Early Neolithic to Early Bronze Age southcentral Anatolia, I only coded statements made about architecture from this period and region. Different regions and periods of southcentral Anatolian prehistory varied in their social organisation and its architectural expression (Chapters 3), and it remains unclear to which degree analogies can be made between different sites, or even different occupational levels within the same site. I addressed this problem by recording during coding (Appendices 3-7) what site, and if applicable what level, had been used as evidence for formulating a social-architectural marker. This put me in a position to evaluate for what sites, regions or time periods different forms of architectural expression were relevant. Researching regional and chronological differences was not as such an aim of this thesis, but is to a degree necessary to create a reliable indicator tool kit.

I coded all text passaged that expressed that the author associated a certain architectural form with a certain social interpretation, independent of whether the author referred to or cited other researchers, or based the interpretation on own research; and independent also from whether the author concluded that the architectural feature in question was present at the site they discussed. Since the

main aim of the content analysis was to document epistemology, it was important to capture all possible interpretations of an archaeological feature. For example, an archaeological discussion that argues that settlement enclosure walls, either in principle or at a particular site, do not represent a defence wall still documents that there is a possibility that enclosure walls could be interpreted as fortifications. I have termed such statements ‘hypothetical’ and marked them in Appendices 3-7 as such. A second type of hypothetical statements are discussions that that a certain indicator was not observed at a given site, as in the following example which contains four architectural indicators for differences in social status: “At Çatalhöyük there is no evidence that size [#106] can be correlated with wealth (for example numbers of storage bins [#112], numbers of ovens [#113] or numbers of burials [#123])” (Cutting 2005a:167). When an opinion was repeated in the same source more than once, every mention was counted in order to document how prevalent a certain opinion is in the literature. Text was coded whether or not the author stated explicitly why they associated an architectural feature with a social interpretation; actually, in many cases the interpretation was assumed rather than argued, and that is discussed as part of the results in Chapter 6-9.

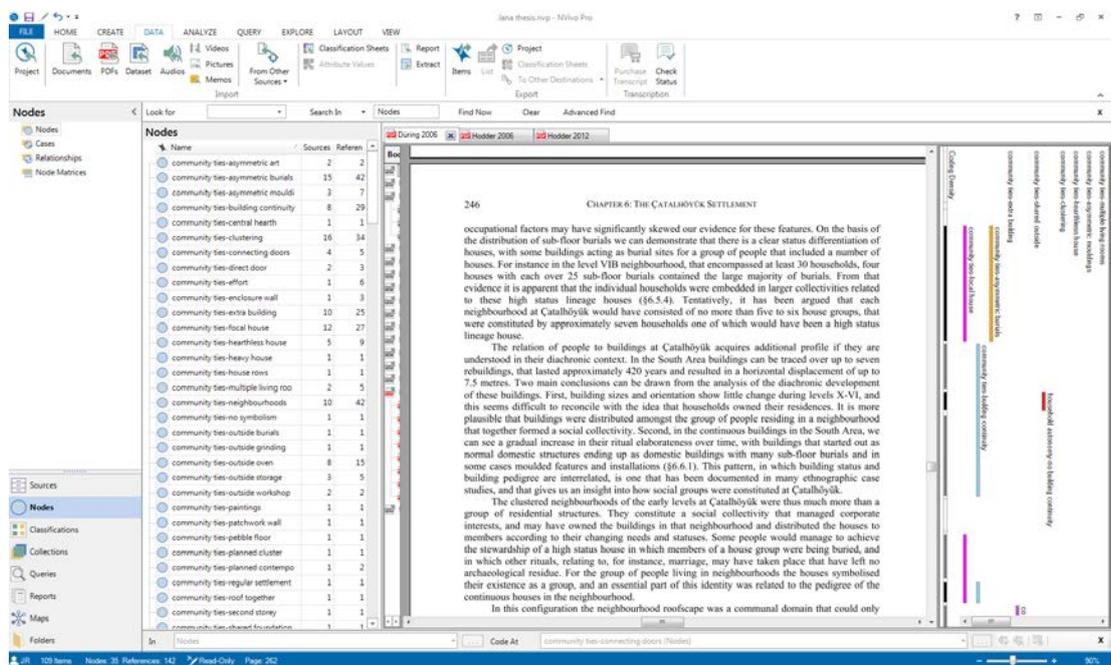


Figure 20 NVivo interface: The list of already established nodes is on the left, and on the right a visualisation of codes already tagged in the text.

Exploratory coding

The manner of coding chosen by me had a decidedly exploratory nature, which suited the aim of exploring architectural epistemology broadly and deeply. Coding is the breaking down of data in order to conceptualise it in new ways, and if done in an exploratory manner without predefined set of nodes/labels, it is referred to as 'open coding', and approach derived from grounded theory (Abbott and McKinney 2013:320-321; Berg 2009:353). Labels and themes emerged while coding and exploring the literature; the categories by which I sorted and made sense of the research discourse, and of the social use of architecture in the Neolithic/ Chalcolithic peoples, are therefore a result of the analysis done in this thesis, built up from a systematic review of previous research: the epistemological tool kit this thesis set out to create. In exploratory coding, the list of nodes/labels is typically constantly changing and evolving (Abbott and McKinney 2013:320), and I also regularly changed the names of labels, decided to split one category into two or three, or combined two nodes when I recognised them as essentially the same, or moved nodes between themes. Such an exploratory manner of coding required a lot of back-checking. For example, when I only discovered an indicator fairly late in the coding process, which was usually a result of my increased understanding of the topic matter as I was immersing myself in the discourse via coding, I went back and re-processed literature to check for content relating to the newly discovered node. In order to obtain a fairly broad overview of different opinions in the discourse early on during the coding process, I took care to initially analyse a variety of literature from different authors to experience a range of opinions and ways of expressing them. These steps correspond to the best practice advice for open coding by Berg (2009:353-356, Fig.11.1) and Abbott and McKinney (2013).

Content analysis can be automated with automatic text recognition and tagging (Berg 2009:366-372; Lacy et al. 2015:799-802), but this was not feasible for this thesis. In fact, coding for this research project was a deeply interpretive, not a mechanical task. Other researchers' thoughts about the social use of architecture are interlinked with their other notions about the social use of material culture, and of cultural developments in southcentral Anatolia. Understanding of the wider

interpretational framework of each researcher's work, as laid out in their publications, was therefore required. I often found myself reading and re-reading longer parts of text several times to make sure I adequately captured the essence of a particular statement; the complete analysis of some longer and more complex pieces of writing could take many hours. To adequately capture the social meaning of Neolithic/ Chalcolithic Anatolian architecture, and the complex interpretations made about it by archaeology, it was necessary to immerse myself in deeply in the discourse.

To a very high degree, the results of the coding process are therefore my personal understanding of the academic discourse. The data and results I produced are qualitative and not suitable for statistical analyses; my coding strategy incorporated only a minor quantitative element in that it documented how many different people discuss a particular indicator, how often it is stated, and how many sites it refers to. This knowledge became also relevant in the evaluation stage (5.1.3), where the reliability and applicability of a particular indicator was evaluated also against how prevalent a certain opinion is within the research discourse, and what breadth of evidence it is based on. At the same time, the results of my coding can be reproduced and evaluated by others because every single text passage I used to extract indicators from the literature is listed in Appendices 3-7, and all text is publicly available. This enables others to check whether I missed indicators, or misunderstood and 'overcoded' text passages (put meaning into a text where it was not).

Challenges encountered: textual ambiguities

The main challenge encountered while coding were opinions formulated in the literature in ways that did not express a clear connection between architectural form and social interpretation. In other words, from the way the text is worded or structured, it was not entirely clear whether a researcher associated a particular architecture feature with a particular social interpretation. There were two main

reasons for this. First, the nature of my coding criteria, which necessitate unequivocal (within the same sentence or paragraph) connection of architectural form and social interpretation is not ideally suited for publications in which data description and interpretation are separated into two parts within the text; examples are Marciniak's publications in Chapter 6 (Autonomy) and papers by Steadman (2004) and Baird (2012b, et al. 2011) in Chapter 8 (Mobility). Second, there were of course many social interpretation of architecture in the literature that could not be accurately mapped onto the research questions asked in this thesis. This issue was particularly prevalent when researching household autonomy and community integration for Chapter 6; sentences such as "[Çatalhöyük's] elaborately decorated and maintained buildings signal a considerable investment of time, and therefore of identity, on the part of the groups of people associated with each building" (Cutting 2005b:140) make a clear statement about architecture's relation to social identity and cohesion, but do not clearly refer an architectural feature, here ritual house elaboration, unequivocally to either the household or a group larger than the household.

In dealing with such textual ambiguities, I decided to only code if the text was unequivocal about linking a certain architectural feature with one of the social processes researched in this thesis. Particular care was taken to interpret the meaning of the analysed text as accurately as possible, employing knowledge on idiosyncrasies of southcentral Anatolian architecture collected in Chapters 3 and 4.3. For example 'house' was not equated with 'household' since the two are not always congruent (Chapter 3.2.2). A sentence like "Geoarchaeological analysis of mudbricks established that cultural modifications were used to create social differences between neighbouring houses" (Love 2013c:263) was therefore not coded for household autonomy. However, to achieve a broad overview of the discourse, text passages relevant for the evaluation of certain architectural feature, if it was not possible to document them via coding, were included on my separate note sheet so that I could refer to them while evaluating and contextualising indicators (5.1.3).

5.1.3 Evaluating indicators and themes

After documenting indicators in the academic discourse, indicator lists (Appendices 3-7) were critically evaluated. This evaluation constitutes the bulk of Chapters 6-9. During evaluation, I scrutinised the arguments provided by authors in support of their interpretation of an architectural feature, using the tagged text passage itself and the wider textual context it was embedded in. I further discussed whether the specific social indication ascribed to an architectural marker could be substantiated through comparison with other indicators, and with additional archaeological evidence. I also checked whether a particular connection between social and architectural expression was possibly only valid for a particular site, region, or time period, by observing which sites were named in the discussion of a particular indicator. My own argument resembles a thick description, relating different archaeological evidence to each other, and also referring different indicators to each other, mostly those of the same theme, but also across themes. The evaluation draws on evidence from various sites, but the purpose of the evaluation was not foremost to determine whether an indicator had been convincingly proven at a particular site, but rather whether the social use attributed by previous researchers to architectural form could be substantiated; however, the two often overlap.

The indicator evaluation was tailored to critique and dissect the social mechanisms behind the architecture; discussing these indicators thus essentially meant discussing the mutual interaction of community organisation and the built environment. Indicators are discounted if the evaluation concluded that they cannot (securely enough) be associated with a particular social use. Apart from thus creating a toolkit (displayed in Appendices 8-11), a primary aim of Chapters 6-9 is to lay out a kaleidoscope of architectural evidence and interpretation. From this display, I create first, a tool kit for architectural research and second, knowledge about the social use of architecture in the Neolithic and Chalcolithic. Both represent my idiosyncratic view, but the format of the discussion is also open enough to allow others to read the indicators and themes differently and construct their own opinions. In creating a story of architecture and social organisation in the Neolithic/

Chalcolithic, the themes were of primary importance for discovering larger patterns in the social use of architecture.

5.2 Component 2: Applying indicator packages

The results from component 1 provided a 'checklist' of architectural indicators. Using this list as a guideline, I analysed the descriptions of architecture (text and images) published of each individual site and occupational level within the study area (Appendix 12). Component 2 was designed to be a trial run for the indicators identified in Chapters 6-9; another means of evaluating the indicator packages. The results from this trial run are used in Chapter 10 for a final reflection on epistemology. The architectural analysis in Appendix 12 was therefore not as extensive as it could have been if this had been the primary aim of the thesis. For example, I did not employ advanced methods such as GIS applications; and I decided to leave a fuller discussion of the Çatalhöyük West architecture to the upcoming site publication. I further did not analyse the architecture from Tepecik or Çatalhöyük East, where Late Neolithic levels are still under excavation. The amount of sites (11) and data included was sufficient to test the indicator package on a range of material; not including Çatalhöyük East further freed up capacity for a more thorough scrutiny of the other sites (this site tends to require a significant chunk of the attention if included in comparative work, e.g. in Cutting 2005b; Düring 2006, as well as my own Chapters 6-9).

Appendix 12 summarises this trial run, Chapter 10.2 its results. The primary aim of this analysis was to establish whether a certain architectural indicator was present at a site/occupational level or not. In many cases, this necessitated a prior review of different aspects of the site's reconstruction more generally, most commonly of stratigraphic phasing, the reconstruction of building units (where does one building end and the next start), and of roomfills and evidence for upper stories. Following this general introduction, indicators are discussed separated into the overall themes formulated in Chapters 6-9. For this architectural analysis, I employed legacy data strategies outlined in Chapter 4.4: cross-checking data from several sources, integrating publication on artefact and ecofact assemblages, checking for internal

inconsistencies, and documenting the arising issues and inconsistencies.

Collecting site data

For the analysis in Appendix 12, I used exclusively published information. From all 11 sites, I consulted all of the available publications that dealt with LN-EC levels, including those that specialise in a discussion of artefacts; these are listed in Appendix 2.2 and represent to the best of my knowledge all available literature on the sites in question. A very important source were the annual excavation season reports that are published by every project and represent an indispensably rich source of information not only for sites where no final book-length publication has appeared yet, but also because they often contain details that were not included in the final publication, and interpretations that were later changed. Reports therefore offer some insights into the knowledge-making process of an excavation project. Because of my limited understanding of Turkish, I might however have missed out on some relevant details discussed in site reports. All information about Çatalhöyük West used by me is also publicly available in season reports or the online database (<http://www.catalhoyuk.com/research>). However, my involvement in the project probably allows me a more holistic image of the site and its architecture than could be gained based on the publicly accessible data since making sense of the information that is fragmented between different reports and different areas within the database requires either knowledge of the documentation system or the investment of considerable time to understand the database (Düring 2006:147; Mickel 2015:306).

I had originally hoped to use archived excavation recording from the 1960s/1970s excavations at Hacilar, Canhasan, Çatalhöyük and Erbaba for this project. However, the University College London (Louise Martin pers. comm. November 2015) and University of Pennsylvania Museum of Archaeology and Anthropology (Alessandro Pezzati pers. comm. February 2016) informed me that the James Mellaart and Jacques Bordaz archives are currently being sorted and accessioned, and not yet available. It is also possible that large parts of the Hacilar and Çatalhöyük site

recordings did not survive a house fire at Mellaart's Istanbul home that destroyed many of his primary records (Düring 2006:150; Farid 2014:95). David French (pers. comm. May 2014) had informed me that he retains some field recordings in the UK for further publication work, while other parts of the Canhasan archive are held by the British Institute at Ankara (BIA, previously British Institute of Archaeology at Ankara, BIAA) and under whose the auspices the Hacılar, Canhasan and Çatalhöyük excavations were carried out in the 1950s-1960s. I assessed this archive during a personal visit to the BIA in August 2014 and found that most of the recording that would be most relevant for an architectural analysis must still remain with David French: the BIA only holds very few of the trench notebooks, no original trench sketches or scale drawings, and no photo lists that record the content of the available photographs. An assessment of architectural data in the Hacılar, Canhasan, Çatalhöyük and Erbaba archives will thus remain a task for future researchers.

Chapter 6 AUTONOMOUS HOUSEHOLDS

Houses are in us as much as we are in them. (Love 2013c:264)

6.1 Introduction

This chapter discussed how architecture from settlements in Late Neolithic and Early Chalcolithic southcentral Anatolia can be studied to research the balance of household autonomy and community integration that was in Chapter 3 described as undergoing important shifts around 6500 BC. For the purpose of this chapter, the different levels of community integration (subcommunities, village community) are all discussed together as ‘suprahousehold integration’ in order to prioritise the distinction of household autonomy vs. suprahousehold integration over a discussion of the exact nature of that suprahousehold integration. This chapter is very long since many indicators (93) are associated with the household autonomy/suprahousehold integration debate, and this chapter also discusses some more fundamental issues that later chapters will draw on, for example the difficulty of reconstructing food storage capacities (Theme 1) or the significance of researching building materials (Theme 2).

This chapter is structured according to the themes identified through content analysis and further in roughly chronological order: First (6.2), I discuss markers that have been associated with a ‘baseline’ household autonomy at Early Neolithic central Anatolian sites. Second (6.3), I discuss architectural evidence for suprahousehold integration that spans all periods including the Early Bronze Age. The third and final section (6.4) deals with markers for household autonomy that are derived from post-6500 BC archaeological contexts and therefore mark the Late Neolithic/Early Chalcolithic movement towards greater household autonomy—beyond the Early Neolithic ‘baseline’. This structure is displayed in Table 5, which can be used as a roadmap to navigate this chapter. \

Architectural indicators of household autonomy and suprahousehold integration

The content analysis (Appendices 3-4) has identified 46 architectural indicators of household autonomy, and 47 indicators of suprahousehold integration from the archaeological debate on Early Neolithic to Early Bronze Age southcentral Anatolia. I organised these 93 indicators into 16 themes by sorting them into five groups according to the overall aspect of architecture that they refer to (Table 4), as well as introducing a chronological component to the subdivision of themes (Table 5). Specifically, I decided to separate indicators of household autonomy mentioned for pre-6500 BC (Early Neolithic) household autonomy from those mentioned in context to post-6500 BC sites, contexts or processes in order to more accurately depict a possible development of the architectural expression of autonomy. For example, in the group ‘House Furnishing’, **Theme 1** describes the patterns of presence/absence, size and relative distribution of features of internal house furnishing that characterised Early Neolithic household autonomy; and **Theme 8** captures how internal house furnishing changed after 6500 BC alongside changes to greater household autonomy. Within the same group, **Theme 13** describes indicators of community integration through all chronological periods from the Early Neolithic to the Early Bronze Age; these were not further chronologically subdivided since the focus of this analysis is on autonomy.

| | |
|---|---|
| House layout and furnishing | Theme 1 The complete house Theme 13 Sharing social and economic space Theme 8 More productive space Theme 12 House standardisation |
| Building materials and construction techniques | Theme 2 Constructing individualities Theme 11 Building the house together Theme 7 Building independently |
| House-related ritual | Theme 3 Symbols of the household Theme 4 Leaving and continuing the house Theme 15 Symbols of community Theme 5 Breaking with the past |
| Settlement layout | Theme 9 Living close together Theme 10 Divide to unite Theme 6 Giving each other space |
| Unroofed space and non-residential buildings | Theme 14 On common ground Theme 16 Constructing community space |

Table 4 Themes identified in the household autonomy/ community integration debate.

| | |
|--|--|
| Early Neolithic household autonomy | Theme 1 The complete house Theme 2 Constructing individualities Theme 3 Symbols of the household Theme 4 Leaving and continuing the house |
| Early Neolithic to Early Bronze Age community integration | Theme 9 Living close together Theme 10 Divide to unite Theme 11 Building the house together Theme 12 House standardisation Theme 13 Sharing social and economic space Theme 14 On common ground Theme 15 Symbols of community Theme 16 Constructing community space |
| Post-6500 BC household autonomy | Theme 5 Breaking with the past Theme 6 Giving each other space Theme 7 Building independently Theme 8 More productive space |

Table 5 Chronological relevance of themes identified in the household autonomy/ community integration debate.

6.2 Household autonomy: Early Neolithic ‘baseline’ autonomy

6.2.1 Theme 1: The complete house

Several researchers share the notion that there is a basic set of features a house needs to possess in order to make its residents economically and social self-sufficient at a most basic level. Not always do they specify what features make a house self-sufficient, therefore a parent node (**#1**) was created to collect all text passages that did not specify individual features. Closely related to **#1** is the notion that to identify a community made up from autonomous households, all or nearly all houses within one occupation level need to be ‘complete’ (**#2**); otherwise those living in ‘incomplete’ houses had to rely on other households (see also **#67** in **Theme 13**). For example, Düring (2007b:163, 176, 2011c:97, 2013a:29) sees the fairly standardised size and furnishing of Çatalhöyük houses as evidence that its community was made up from relatively independent households, and Hodder (2005a:15) the existence of storage and food production installation in each house as evidence for independent food processing. All indicators of **Theme 1** therefore

view individual house in comparison with others.

The basic social and economic needs of a household are summarised by Cutting (2006b:96) as “rest, cook, eat, sleep and work”. Steadman (2004:531, 533) uses similar criteria when arguing that ‘complete’ houses at Kuruçay 12 or Bademağacı ENII3-4 must have incorporated a cluster of different structures that together fulfilled all the functions of a house. Although the idea of a ‘complete’ house is at least partially based on ethnographic parallels (e.g. Düring 2006:42, 91, 2011c:64), it makes sense that a building needs to afford this range of activities in order to be able to house a household: The household was defined in the introduction as a social unit that lives together and pools resources; if the residence does not afford this, then there is no household. This was probably the reason why Düring (2006) comes to equate ‘living room’ (his term for what is called here, and also e.g. by Steadman 2004:525, 531, 536, the ‘complete house’) with household: that he counts the number of households at a site or in a neighbourhood by the number of ‘living rooms’ in a house cluster (e.g. Düring 2006:306) or postulates that houses with more than one living room must have housed more than one household (Düring 2006:173, indicator #65) clearly shows that the household is equated with a ‘complete’ living unit.

The equation of ‘complete house’ with household makes the architectural indicators of **Theme 1** the very foundation of the ‘baseline’ household autonomy created during the central Anatolian Early Neolithic: Chapter 3.2, based particularly on work by Düring (2006), has shown that ‘baseline’ household autonomy evolved during the Early Neolithic; at Aşıklı Höyük (8400-7400 BC), even the above named basic functions of the household were not all possible within one house or living unit, and therefore real households, socially and economically self-sufficient on a basic level, were probably not existent (although see discussion of some contrary evidence in 3.2.2). ‘Real’ households only emerged during the second half of the Early Neolithic and are best documented at Çatalhöyük East. This theme was therefore separated from **Theme 13** because this latter theme specifically collects markers of how the houses during LN were made economically more productive. **Theme 1** describes the Early Neolithic baseline; **Theme 13** is the Late Neolithic

development past this baseline. Indicators **#1** and **#2** represent a guideline for thought, but it still needs an actual list of criteria for discerning a 'complete' prehistoric Anatolian house: what, precisely, are the features a prehistoric Anatolian houses needed to make the inhabiting group self-sufficient on a basic level? Six architectural markers were mentioned in the literature. Three in particular were mentioned often and by a number of scholars using a range of sites for evidence: a certain minimal size of the house (**#3**), fire installations that can be used for cooking (**#4**), and storage facilities (**#5**).

Space requirements

That a house needs to offer a certain amount of space (**#3**) to allow for the entire range of activities named above as basic social and economic tasks of the household to be carried out seems straightforward. How much space is needed, though, is much more difficult to decide. The only one to discuss this question in greater detail was Düring (2006). He discusses various ethnographic parallels (Düring 2006:91, 102) that vary significantly, and finally seems to settle on between 9 to 12m² as a minimum house size for a household of 4-5 people (Düring 2006:90-91, 122, 2011a:64, 97). This thesis has pledged scepticism against cross-cultural analogies, and such scepticism seems especially justified in this case. Düring (2006:90, 111, 2011a:64, 98) himself always qualifies the cross-cultural discussion of minimal house size with the label 'problematic'. Space requirement is so deeply entrenched with culturally constructed notions of personal space and privacy (Garvey 2005; Leino-Kilpi et al. 2001) that it is not reasonably possible to try and estimate how much space a prehistoric Anatolian household would have needed to be able to cook, sleep, socialise and work in their house. Further, the size of the household (number of people) of course needs to be known as well before deciding what an appropriate house size might be; and to reliably reconstruct households sizes is impossible for the Anatolian Neolithic (see Chapter 3.2.2). There is a third issue: the only measure of house size accessible to archaeologists, and even that only in cases of good preservation and complete excavation, is the internal area of the lowermost living

floor. It is, however, generally accepted that much daily life took place outside of houses in southcentral Anatolian prehistory: either on roofs (**Theme 9**) or unroofed areas next to houses (**Theme 14**). This, and the fact that some buildings might have had more than one story (for example, second stories have been suggested for Er Baba, Canhasan and Hacilar; see Appendix 12) must complicate the relationship between the size of the house footprint and the living/activity space available to its residents to the point where it is not realistic to decide whether a house is large enough for an autonomous household. I will therefore accept that minimum house size would have been a requirement for a household to function as an autonomous social and economic unit, but caution that this cannot be pinned down to a number. Indicator **#3** is therefore discounted.

Cooking installations and storage

A range of authors name fire installations for food preparation (hearth or oven) (**#4**) as a necessary feature of a socially and economically self-sufficient household. Economic or practical arguments prevail in this discussion: Many food-preparation procedures necessitate heat, and a residential group without a fire installation would have had to rely on fire installations located in other buildings or in communal areas, and therefore on cooperation with other households, to fulfil one of the most basic and daily functions of the household as an economic unit: provisioning its members with food. Eating together also has a social dimension: “As people ate in the house, the domestic unit was brought together and social relations were formed and reformed” (Hodder 2006:87). Heat from the oven could also have been used for some manufacturing procedures, and Steadman (2004:537) and Özbaşaran (1998:559) point out that fire installations were also necessary to heat and lighten the house throughout the cold central Anatolian winters.

Many discussions of the necessity of a hearth in the house centre around Aşıklı Höyük, where only 35% of the rooms have hearths (Düring 2006:84), including many rooms that are not directly connected to others and could therefore be seen as independent houses (Düring 2006:92). Researchers discussing the phenomenon

of the asymmetric hearth distribution at Aşıklı Höyük agree that hearthless houses could not have housed autonomous households. Düring (2006:296, 2011c:64) reconstructs a usage pattern whereby a group of people used several dispersed rooms—including one with hearth—together as their residence, but this spatial fragmentation of the household residence is seen as strong evidence that Aşıklı households were dependant on each other to the degree where they might not even meet the ‘baseline’ Early Neolithic household independence and the minimal requirements to make a ‘real’ Neolithic central Anatolian household (Düring and Marciniak 2005:173-174). Similarly, Steadman (2004:546) sees many Aşıklı buildings as ‘incomplete’ houses and reconstructs biological kinship relations between the group of people who shared the use of several ‘incomplete’ and complete’ houses. At Çatalhöyük East as well, the very few examples of houses without a hearth are interpreted as evidence for a close daily social and economic cooperation between different residential groups (Hodder 2014c:17; Hodder and Farid 2014:4, 29; Stevanović 2012c:79). It should however be pointed out that all examples listed in this discussion (B.3, B.44, B.77, B.59) are from the upper, post-6500 BC levels of the East Mound, a fact that requires further discussion given that overall this phase of the settlement is interpreted as having developed towards greater household autonomy. In reverse, the presence of a hearth or oven in a building is generally seen as very strong indication to identify a relatively autonomous household, even if there is not much other evidence to verify and contextualise this interpretation (e.g. Cutting 2005b:127, 136; Düring 2006:172, 212; Steadman 2004:533, 544).

There are further indications that the hearth had symbolic and social importance in Neolithic central Anatolia: Hodder (2006:147-148, 194) mentions that sometimes figurines were found in hearths of abandoned houses, and sometimes young people were buried close to the hearth rather than under the more commonly used platforms (Hodder 2006:217-218). At Aşıklı Höyük as well, burial and hearth are linked insofar as rooms with hearths were preferentially used for burial (Düring 2006:89, 2011a:67; Özbaşaran 1998:560), and Özbaşaran (1998:560) uses ethnographic parallels to argue that the hearth might have been “the heart of the house” and imbued with connotations of life and continuity. While the fact that the

hearth might have become entrenched with household-related symbolism does not in itself make it a necessary household feature, overall the argument that fire installations were a necessary requirement in the Anatolian Neolithic and Chalcolithic for a household to function autonomously on a daily basis are convincing, especially the economic aspect of food preparation, and indicator #4 is therefore included on my indicator list. When applying this criterion onto architectural data, however, care needs to be taken since in principle hearths could also have been located on roofs, upper floors or privately owned outdoor areas (#46) rather than the ground levels that are normally preserved for excavation. And at Çatalhöyük East, hearths were sometimes removed at some point during the house live and only indirect (scouring) traces of them remain (Hodder and Farid 2014:29). The seeming absence of hearths in the house interior should therefore be contextualised with evidence from roofs and outdoor areas.

A logic similar to that of indicator #4 underlies the argument that households needed to store their own food to be self-sufficient (#5). This argument is mentioned by even more authors than the hearth criterion, although the two are related since they both are interpreted as evidence for the household-based ownership, processing and possibly consumption of food (e.g. Düring 2006:296; Hodder 2006:219). The fact that independent in-house storage is in most of the text passages documented here simply mentioned as evidence for household autonomy instead of being discussed in detail shows that the connection between both is often seen as self-evident; this unfortunately often prevents a real investigation of this connection. However, a few arguments can be drawn out of the wider textual context in which storage autonomy is mentioned: Düring and Marciniak (2005:177) point out that in-house storage shows that each residential group pooled its resources, thus fulfilling one requirement making it a households. Second, Hodder (2014c:17-18, 2014d:156; also Twiss et al. 2008:54) mentions that the in-house storage has a connotation of 'hiding' household-owned resources from the eyes of non-household members which implies an aspect of privacy and suggests that whatever was stored was not shared between household but owned by each household. Further, Hodder (2006:94, 219) mentions storage in the context of

activities that were shared inside a household group, thus drawing attention to the fact that not only the stored resources themselves, but also the work carried out around them (e.g. maintenance of stored goods, pest control) would likely have involved only the household group, and thus contributed through shared time and work to its identification as a social and economic unit.

While it seems straightforward that independent food storage would have been necessary to make an autonomous Neolithic/ Chalcolithic household, I would like to point out that to a much larger degree than the presence/absence of a hearth, storage is often not clearly archaeological visible. A survey of Neolithic storage facilities across the Near East (Bartl 2004) showed just how many different architectural forms are associated with storage. And in central Anatolia itself, several sites or occupational levels that are better preserved than others feature evidence for storage in perishable containers (see discussion of **#6** below), proving the existence of storage forms of which under normal conditions no trace, neither the container nor the organic content, would have been preserved. It follows that an absence of archaeologically visible storage facilities in a house does not automatically mean that the household did not store goods; however, the presence of storage facilities makes it likely that they did. Indicator **#5** is therefore accepted, but with cautions.

Different from the hearth criterion (**#4**), 'storage' is a relative variable: How much storage space is enough (and not too much) for a household to store its own food and non-food resources? This leads into the discussion of the next indicator (**#6**): the argument that households were autonomous if each house has storage space enough to feed the household group (Hodder 2013b:23); related are the notions (to be discussed later with **Theme 13**) that if the house does not have enough storage space, the resident household was probably engaged in suprahousehold sharing relationships (**#74**), but that if in-house food storage exceeds 'family-size', then the very large storage capacity also indicates sharing on a suprahousehold level (**#75**). In other words, there is a 'right' amount of storage capacity that indicates the autonomous household (**#6**).

The discussion around household-appropriate storage space centres on Çatalhöyük East, where it is embedded in a wider discussion around the social meaning of food consumption and sharing (e.g. Atalay and Hastorf 2006; Bogaard et al. 2009; Demirergi et al. 2014). At Çatalhöyük, there is non-architectural evidence that ‘family-sized’ (#6), in-house (#5) storage supported (only) the resident household in form of microdebris on the floor which show that probably plant food, meat and fish were processed regularly in small amounts inside the house (Bogaard et al. 2013:127; Hodder 2013a:18, 2013b:23, 2014c:17-18; Hodder and Farid 2014:22), which is confirmed by the size range of East Mound pottery vessels, where large pots are missing (Hodder 2013a:17-18, 2014b:6, 2014d:155-156). As for architectural evidence, like indicator #5, one issue with indicator #6 is the archaeological visibility of storage space: archaeologists can never be sure that the visible storage, e.g. in installations such as bins, actually represents the entirety of the storage space available to or used by the household—and vice versa, whether all visible storage space was actually taken up with food, and with what kind of food. There is an assumption underlying much of the storage and food discussion at Çatalhöyük that the storage bins found there in nearly every building were most often used to store plant staple foods, such as grain and pulses (e.g. Atalay and Hastorf 2006:301; Bogaard et al. 2009:661; Hodder 2013b:23)—which although such items were often recovered from bins (Bogaard et al. 2009:Tab.3, Tab.4) is problematic. For example, in the well-preserved burnt buildings at the top of the East Mound, also meat (Twiss et al. 2009:888) and non-food items such as tools and preforms were found in bins (Bogaard et al. 2009:657, Tab.3; Twiss et al. 2009:888). Moreover, Bogaard et al. (2009:663) point out the possibility that some of the stored plant foods were animal fodder. Demirergi et al.’s (2014:93-99) discussion of various storage containers at Çatalhöyük reveals that storage was done in a range of mobile, fixed, organic and non-organic containers or simply on the floor of storage rooms and possibly even outside the house (see also Atalay and Hastorf 2006; Bogaard et al. 2013; Bogaard et al. 2009:660-663), so that it seems impossible to judge with accuracy the total capacity of storage space inside one building at a given point in time and “bin capacity is therefore an imperfect (and conservative) indicator of total storage capacity” (Bogaard et al. 2013:119; similarly Twiss et al.

2009:892). These observations suggest that even in better preserved and researched houses within southcentral Anatolian archaeology, it is incredibly complex to reconstruct how much storage space was available to a household.

A second issue is the difficulty of knowing how much food was needed by a household in order to survive independently. Even if equating bin capacity with the amount of plant staple foods owned by a household, it seems impossible to judge how much of such food would have been enough for economic independence. For Hodder's (2013b:23) argument that typically the storage capacity of Çatalhöyük East houses was to "hold enough staple food to feed a small-scale family for one year", he cites work by Bogaard et al. (2009, also 2013:119, 127). Bogaard et al. use evidence from some of the better preserved houses at Çatalhöyük to postulate that their bin space "would accommodate nearly a ton of cereal grain or similarly concentrated plant food, which approximates the annual staple requirement of a small-scale family (c. 5-7 people)" if the diet did not rely only on such foods, but also included a range of other wild and cultivated foods; these estimations are based on ethnographic studies of diet. By contrast, using ethnographic evidence by interviewing women from the modern village of Küçükköy near Çatalhöyük, Atalay and Hastorf (2006:301) state instead that if assuming that the bins were used to store plant staple foods, such as grain, the average bin content of a Çatalhöyük house could have fed a group of 6-8 people only for a few months if grain is eaten as a staple food. These examples already show a degree of disagreement about the food requirements of a Çatalhöyük household. Uncertainty increases if contextualised with a larger study of Neolithic storage by Bartl (2004:39-42) who studied a larger number of ethnographic examples that show clearly that how much plant food an individual person consumes in a given time depends on overall consumption behaviour and diet; for example the ratio of meat consumption vs. plant consumption. And of, course, when dealing with households the food requirements of the household group also depends on its size, which is as a rule a difficult variable in Neolithic archaeology (see Chapter 3.2.2).

To conclude: While it can be stated that the independent ownership and storage of sufficient food resources is of central importance to make an autonomous

household, and that an investigation of storage practices is highly informative of socioeconomic relations at prehistoric sites (Demirergi et al. 2014:91), I reserve doubts as to the degree archaeology will be able to reliably document storage capacity. Indicators **#5** and **#6** must therefore be included on the indicator list, but they are less reliable as indicators of household autonomy or non-autonomy under normal preservation conditions. The discussion around storage in the context of household autonomy and communal integration will be continued with **Theme 13**.

To contextualise the discussion of indicators **4#-#6**, I need to mention that these are embedded in a more extensive discussion of the Anatolian Neolithic/ Chalcolithic house(hold) as an autonomous productive unit. These discussions also refer to non-architectural evidence for food and non-food related production activities performed in the house such as grinding equipment (Cutting 2005b:136; Hodder 2013b:24) or microdebris on floors (Hodder 2013b:23, Matthews 2005b), which are seen as evidence for household autonomy (e.g. Düring and Marciniak 2005:177; Hodder and Farid 2014:27) but are not included here because they do not refer to architectural features. Further, the in-house consumption of food is also mentioned by e.g. Düring (2006:122) as an important criterion for household autonomy. However, previous research has not identified a clear architectural marker associated with consumption, so it cannot be researched here directly, although features such as cooking installations, benches and sitting platforms might be linked to socialising and food consumption (e.g. Düring 2006:176).

Benches and platforms

While in the argument for indicators **#3-#6** economic factors prevail, the arguments for indicators **#7-#9** are more founded in a social and symbolic sphere. Benches (**#7**) are mentioned by Cutting (2005b:136, 2006b:96) in the context of her arguing that houses at Çatalhöyük East were 'complete' in the sense encapsulated in indicator **#1** and therefore represent residences of autonomous households: "At Çatalhöyük, the ornate buildings were, almost without exception, self-contained household residences containing full sets of routine domestic features (ovens, hearths,

benches, storage facilities and platforms) and domestic artefacts (food household processing tools)” (Cutting 2005b:136). No real argument is made of how benches (and platforms **#8**) are necessary for household self-sufficiency, but Cutting (2006b:96) names resting, sleeping and working as some of the “basic living needs of a household group”, and it can be inferred that benches and platforms are seen as resting and sleeping facilities.

Platforms (**#8**) are mentioned in a similar context by Düring (2006:167, 176, 212, 2011c:97) and Cutting (2005b:136, 2006b:96): both repeatedly name them as features of a ‘complete’ house at Çatalhöyük East. Düring (2006:176-178) focusses on the aspect of platforms and plaster ridges leading to a subdivision and compartmentalisation of internal space, which across the settlement (both in horizontal/synchronic and vertical/diachronic comparison) followed a common set of principles: there was a high degree of standardisation to how houses were laid out, and how internal space at Çatalhöyük was conceptualised. This characteristic of Çatalhöyük architecture has received much scholarly attention (e.g. Hodder and Cessford 2004), and different aspects of it will be discussed throughout this chapter. House standardisation will especially be discussed in **Theme 12** in the context of rules or shared practices that bind a village community together.

In the context of household self-sufficiency, both platforms **#8** and benches **#7** are less convincing. They are mentioned in a rather cursory way as related to Çatalhöyük household autonomy without real discussions of the connection between the two and the other. Since a household has been defined in the beginning of this chapter as a social unit, it makes sense to expect that a self-sufficient household requires a house that can accommodate socialising, resting and commensality. But the fact that all mentions of indicators **#8** and **#7** refer to Çatalhöyük East shows that these activities are not, in the wider context of prehistoric southcentral Anatolia, unequivocally tied to particular architectural form: at other settlements, people might have found different architectural solutions, different architectural form and features, for these social needs. Indicators **#7** and **#8** should therefore not be used in a comparative study, and they have not been used for this purpose by other authors: the text passages coded for

indicators **#7** and **#8** rather express a view of 'the self-sufficient house at Çatalhöyük typically had these features' rather than 'a house needs benches and platforms to be self-sufficient'. They are in that way closer to range of other internal features discussed especially by Düring (2006:178, 211) as other features found in many Çatalhöyük living rooms (e.g. screens, niches, wall paintings, moulded features and sub-floor burials), which are however not clearly mentioned as connected to household autonomy, which is why there were not coded in this project.

A range of different arguments are named by Düring and Hodder to connect the quality and quantity (i.e. number of replastering events) of wall and floor plaster **#9** with the identification of a building as the residence of a self-sufficient household. The discussion centres mainly around Çatalhöyük East, where the layering of plaster is routinely researched through micromorphology, which has not to the same degree been done at the other sites studied here. Düring (2011c:64) mentions ethnographic studies in the modern Near East showing "that the best index for households consists of 'living rooms' characterised by superior plaster, regular upkeep, and the presence of hearths". He observed the same principle in archaeological evidence at Çatalhöyük and Aşıklı Höyük where 'living rooms' were replastered much more often, and with finer and whiter plaster, than side and storage rooms (Düring 2006:165, 166, 176). Düring (2006:165) also connects the frequent replastering to the fact that household residences by common definition contain a hearth and/or oven (indicator **#4**), therefore the white walls become sooted and need to be replastered regularly to keep the interior of the house bright. A more symbolic meaning of replastering is invoked by Hodder's argument for a link of replastering and the symbolic upkeep and continuity of the household. He stated that "The particular historical moment that creates the multiple replasterings at Çatalhöyük seems to involve the house-based construction of continuities and links with the past (ancestors or the dead). It is part of a wider shift from community to household-based organization" (Hodder 2006:128, 2007:32).

Replastering is seen here in the context of caring for the house, but also of continuity and repetition which will be discussed in greater detail with **Themes 3-4** and ascribed to suprahousehold control over the house. Further, the house was the

stage not only for the social rituals and symbolism of the household, but also and foremost of suprahousehold groups (**Theme 15**), which is why 'care for the house' cannot be unequivocally be ascribed to the house's residents. And specifically, replastering might have been performed in the context of ritual events such as burial (Boivin 2000; Stevanović 2012c:56) or the application and hiding of wall paintings (Last 1998a:369, 371), and since symbolic house elaboration is at least partially related to the suprahousehold sphere (**Theme 15**), replastering could in contrast be seen as communal control over the interior of individual houses. The regular upkeep of high-quality plaster (**#9**) can therefore not be an indicator for household autonomy.

In conclusion, among the indicators making up **Theme 1**, indicators **#1** and **#2** function as headlines. Only one has been identified as a strong marker of household autonomy: a hearth or oven (**#4**), located in the residence or a privately owned outdoor area, is necessary to allow a household to function daily as a social and economically independent unit. While I in principle agree that a certain amount of internal space in the residence (**#3**) and household-owned storage facilities (**#5**) of appropriate size (**#6**) are necessary to make a 'complete' house, I have cautioned that the exact amount of space needed by a household group to function independently cannot be known, and therefore discounted **#3** from the indicator list. The storage criteria (**#5**, **#6**) are included with cautions. Indicators **#7**, **#8** and **#9** are dismissed as indicators of household autonomy: benches and platforms (**#7**, **#8**) are routine features of 'complete' household residences only at Çatalhöyük, and the care for the house expressed in frequent replastering with high-quality clay (**#9**) cannot unequivocally be attributed to the resident group.

6.2.1 Theme 2: Constructing Individualities

Theme 2 bundles markers related to the process of house building. To an even higher degree than the other themes, this one relies nearly exclusively on Çatalhöyük East evidence, the only site among those studied here were in-detail

research of construction practices was done. A range of authors view differences between the specific clay mixtures and wood types used to construct houses (#10) as indicative of a baseline household autonomy at Çatalhöyük East: at this site, each occupation level represented a mosaic of houses with different building materials. Unfortunately no study has yet systematically compared pre-and post-6500 BC levels in reference to the issue of building material use possible reflecting the post-6500 BC change to greater household autonomy; examples from both sides of this dividing line are therefore mixed together in the argumentation of the sources cited here.

Building materials and construction techniques

Based on patterns in the composition of bricks and mortar used for house construction, Love (2012:152, 2013a:91) and Tung (2013:80) established that at Çatalhöyük East, each household—or occasionally a small group of neighbouring houses, which are accordingly identified as functioning in close social/economic connection (Hodder 2013a:17, 2014b:6, 2014d:155, 156) manufactured their own bricks, and connect this to social and economic independence. Three different mechanisms by which household autonomy can lead to differential use of building materials are discussed in the literature. First, it was hypothesised that different materials could indicate differential access to clay and/or wood sources in the landscape, and therefore a household- or neighbourhood specific territoriality outside of the settlement (Matthews 2005b:396; Stevanović 2012a:190, 200, 2013:112). For example, Hodder (2005d:29, 2012b:67-68, 179-182) points out that the existence of rules about digging for clay around the settlement might have been necessary to not harm the complex interaction of watertable and vegetation in the marshland surrounding the site, and a similar argument could be made for the management of wood resources around the site (Asouti and Kabukcu 2014; and see Asouti 2013:161) for suggestions of communal control over woodland use around Çatalhöyük). That in-depth studies of mudbrick material use at Çatalhöyük have shown that there probably was no allocation of clay sources to specific parts of the

community (households, neighbourhoods) (Hodder 2013a:17; Love 2013a:93; Tung 2013:78-79) does not discount the fact that in principle differences in building materials between contemporary houses could indicate household-specific rights of resource use, thus strengthening the identification of a household as an independent economic unit. It must however be pointed out that while a system of allocating different areas of the landscape to the use of different households for the extraction of building materials would signify economic independence of individual households, it also would attest to a suprahousehold level of organisation and rule enforcement.

Second, Love (2012, 2013a, 2013c), Stevanović (2012a, 2013) and Tung (2013) relate the act of shared construction to shared practices and knowledge that bind together the group participating in construction. Not only would working together to construct a house have meant that the builders spent a lot of time together for a certain period of time, likely over the course of a few weeks or months (Stevanović 2012a:202); but also house construction probably represented a particularly meaningful experience for all those involved. Given the multiple social, economic and ritual importances ascribed to Çatalhöyük houses, the creation of a house would likely have constituted an event of special significance for those involved, especially since it was not a daily occurrence (Love 2013c:276; Tung 2013:78). There is additional evidence that house dismantling/ construction involved feasts (Hodder 2006:60; Russell et al. 2014:111, 112) which added to its being a shared meaningful experience, but does not in itself constitute architectural evidence. Tung (2013:67, 74, 78) further stresses the connection between shared building practices and shared knowledge, for example knowledge of the location and properties of raw materials. The sharing of knowledge, sharing of time which gave opportunity for informal socialising that strengthened personal ties, but also and especially the sharing of a significant experience (house creation) are important arguments to support the argument that house constructing was of significance for the coherence of the building group. House-specific buildings material could indicate that each household was (primarily) in charge of building their own home, thereby reinforcing its identity as a social and economic unit; later, **Theme 11** will outline evidence for

the suprahousehold sharing of construction tasks, which would by the logic discussed in this paragraph have strengthened suprahousehold identities.

So far, house-specific building materials at Çatalhöyük East have been discussed in the context of access to resources and of shared knowledge and practice. As a third argument for a relation of building material use and household autonomy, Love (2013c) has argued that visible differences in mudbrick fabrics were deliberately displayed during the construction process in order to “mark social identity and autonomy through the performance of building” (Love 2013c:263). Mudbrick manufacture is a process during which the maker(s) can choose from a multitude of different possibilities as to the choice of what sediments and temper to mix in what ratios, so that each brick or batch of bricks “are the result of a complex series of socially informed choices” (Love 2012:141) and therefore indicative of social patterns; this makes the mosaic of different bricks types seem socially meaningful rather than accidental. Love argues that within the otherwise relatively uniform built environment (**Theme 12**) and egalitarian social structure of Çatalhöyük East, house construction provided an opportunity to exhibit household identity in a very visible way since “It was impossible to build a house without being seen by others” (Love 2013c:276). Because brick manufacture and brick laying “was a large-scale, outdoor activity involving a suite of actors, locations and materials over a certain length of time” (Love 2013c:263) it was akin to a performance, and one during which household-specific brick recipes exhibited household-specific identity—before walls were plastered over, and the mudbrick matrix (and the identity statement connected to it) was hidden inside the house fabric. Even hidden, mudbrick differences might still have had meaning, though, given that they “are situated in a larger practice of hiding and burying meaningful objects at Çatalhöyük, where unseen objects had as much power and affect as any object on display” (Love 2013c:264, 274-275). The practice of hiding meaningful objects in the house will be further discussed with **Theme 3** below, and indeed practices like the burial of people under floors, and deposition of animals parts in the walls of Çatalhöyük houses renders credibility to Love’s argument.

In conclusion, there have been convincing arguments to relate individualised

building material choice to household autonomy, and a similar argument has been made about different construction techniques **#11** (Hodder 2006:94; Love 2013a:93, 94, 96). Surprisingly, construction techniques—here meaning the ways bricks or stones or pieces of wood are shaped and assembled into a structure—have received far less attention in the household autonomy discussion, although one could argue that they would have functioned by the same principles: they can indicate whether knowledge and practice of house constructed was shared beyond the household group, and different construction techniques would also have added to a ‘performance’ of household identity during construction as suggested by Love (2013a) for mudbrick fabrics.

Given that the discussion of **#10** and **#11** mostly deals with mudbrick at Çatalhöyük: Do the same principles also apply to materials other than mudbrick; and sites other than Çatalhöyük East? Although the entire argument related here is based on Çatalhöyük East, there is no reason to exclude the possibility of similar social processes taking place around building material choice and construction techniques at other sites in southcentral Anatolia. Indicators **#10** and **#11** will therefore be included on the indicator list. It shall already be cautioned, though, that at no other site were building materials and techniques systematically studied, and often detailed descriptions of e.g. mudbrick colours are not even systematically included in publications. Further, the above cited results from Çatalhöyük are embedded in a larger context of studies of building material composition and sources (e.g. Doherty 2013; Matthews et al. 2013; Mortimore et al. 2004); without the same degree of insight into building techniques existing at other sites, an attempt to make sense of material differences between contemporary houses in social terms might not get very far. It is therefore anticipated that an analysis of indicators **#10** and **#11** in Appendix 12 will deal with fragmented information, and that results might not be entirely reliable.

There is further no reason to assume that similar social processes could not have evolved around the use of wood and stone as building materials: these components as well are chosen and sourced from the landscape, shaped and assembled—and the same social processes of sharing knowledge and practice, and displaying of

identities can influence the building process. Since the principal composition of stone and wood is not human-made, though, earthen building materials (bricks, mortar, floors, plaster) might represent a more sensitive measuring tool. Further, architectural wood is only occasionally preserved at southcentral Anatolian sites.

(Not) sharing walls

Indicator **#12** was grouped with **Theme 2** because independent walls are further evidence that each household controlled and possibly completed the construction of its house autonomously, similar to **#10** and **#11**; but the social meaning ascribed to wall independence, as will be outlined in the following paragraphs, transcends the construction process and also has connotations of house ‘completeness’ captured in **Theme 1** and of independent control over house and household development over time similar to some arguments in **Theme 4**. There is a shared perception among a range of architecture researchers that the juxtaposition of the dense settlement layout/clustering (**#47**) typical of Neolithic/ Chalcolithic Anatolian sites, and the fact that houses still often had their own independent set of walls requires some explanation; that it was socially meaningful (e.g. Düring 2006:162; Hodder 2006:57, 94; Steadman 2000b:188). The non-sharing of walls is generally taken to mark independent households (**#12**), while the sharing of walls between neighbouring structures indicates suprahousehold connections (**#54**). All text passages coded for **#12** refer to clustered sites, and most to Çatalhöyük East. Most mentions of indicator **#12** assume rather than state a connection of independent walls with household autonomy; but a range of arguments have been put forward.

Heinrich and Seidl (1969:118-119, similarly Hodder 2006:219) stated that the own set of walls demonstrates sole, unshared ownership of the house by its residents; similarly Steadman (2000b:188) indicated it could signify a marking of household territory. Hodder (2013a:17, 2014d:155) points out that non-shared walls retains the household’s ability to change and modify their house without cooperating/ negotiating with others: “And yet it is also remarkable that, given such packing [clustering], there is such a strong preference not to share part walls. While party

walls occur, they are relatively rare. There is almost a fierce independence in the retaining of independent walls. There is a desire to retain a house-based autonomy. To have party walls would have restricted a particular house's ability to rebuild or to change" (Hodder 2005d:15). And indeed, own walls would in principle have enabled households to modify their house without coordinating with others, although when discussing indicator #47 it will be pointed out that in dense settlements house building would never have been an entirely independent undertaking. Further, it has been argued that house-owned walls create emotional or social independence through a clear physical boundary as a separation from the next house(hold): "Houses at Çatalhöyük had their own four walls, which could establish a private independence from the neighbours by physically and emotionally creating a boundary" (Love 2013c:274; similarly Steadman 2000b:188). A related argument is that own walls also visually display household autonomy: "The domestic house, then, constrained by its walls and only peripherally connected to the surrounding houses, was seen as implicitly proclaiming itself to be a self-sufficient entity" (Stevanović 2012c:77).

A number of other arguments have been brought forward that provide more practical explanations for the non-sharing of walls in clustered settlements: Düring (2006:162) points out that not sharing walls would simply have been more convenient given that neighbouring houses were renovated, abandoned and reconstructed on different schedules. Further, at least in the upper levels of large clustered mound sites like Çatalhöyük and Aşıklı Höyük, the village would have formed a complex townscape on an uneven terrain created by the mound, solved e.g. through terracing (Hodder 2006:101; Hodder and Farid 2014:29); and independently built houses can more easily be fitted onto the mound relief (Düring 2006:162). Steadman (2000b:188) points out that double walls "lessened transmission of household noise or smells" between residences, although it could be objected that the same effect could have been reached by building a single, thick wall if houses had really wanted to share a wall.

I agree that the very consistent adherence to not sharing walls observed at clustered settlements points to a social significance of this behaviour. To my mind,

none of the practical advantages of non-shared walls discount the possibility that the wall-independence also, or mostly, had a social significance. To some degree, it does not even matter whether the non-sharing of walls was started by households wanting to retain the symbolic independence of their residence, or whether this social component was simply an effect of this building tradition. It is unfortunate that no architectural study has previously investigated the social meaning of wall-independence and -sharing (#12) at non-clustered sites; I will therefore tentatively assume that similar social meaning could have accompanied wall sharing at non-clustered sites.

Interesting in the context of house construction and its relation to the household autonomy-community integration balance is also a remark by Rosenstock (2009:217) who theorises that the clustered layout typical of some Neolithic and Early Chalcolithic central Anatolian sites (indicator #13) could indicate a lack of suprahousehold coordination because individual houses (households) were allowed to appropriate space to the point where only few public space was left inside the settlement. The social meaning of clustering will be further discussed in Theme 9 where it will be argued that the evidence for connecting it instead with strong communal ties outbalances this argument.

6.2.2 Theme 3: Symbols of the household

A majority of the symbolism discussion is based on Çatalhöyük East, where houses were routinely symbolically elaborated to a degree not observed at many other Neolithic/ Chalcolithic sites. The Çatalhöyük symbols have attracted a lot of scholarly attention since the early 1960s, therefore the debate around them and their social meaning is complex, and there is a broad range of sometimes contradictory opinions in the literature. Only extracts of the symbolism debate can be related here for two reasons; first, while symbolism features prominently both in the household autonomy and in the community discussions (**Theme 15**) it has also been discussed in relation to many other aspects of Neolithic life (e.g. domestication, gender relations, Hodder 2006) that are not of direct interest here.

Second, as already mentioned, symbolism has been debated since the 1960s, but household autonomy has only become a topic of scholarly discussion during the last 10 years so that it is explicitly discussed only in the newer sources on symbolism. In conclusion, only parts of the symbolism discussion can be mapped onto the present debate of household autonomy.

Symbolic house elaboration

Collected with indicator **#14** were statements that in essence argue that when and because items with symbolic power are located inside the house, then they worked to strengthen the identity of the household group as a group. This view is explicitly argued in some sources coded for this marker, but implicitly assumed in many more which were also coded. Before discussing this further, it is necessary to define with what symbolic items buildings the study region were elaborated. Items with symbolic connotation can be different at every site, and therefore there is a second level to the discussion of **#14** which will not be discussed here but instead in Appendix 12: items related to this indicator need to first be identified as being of symbolic content. House elements that are typically connected to (house-related, household-related, community-related) symbolic content in southcentral Anatolian prehistory are: in-house burials, wall paintings, moulded images attached to walls or installations, and artefacts embedded into floors or walls. Subfloor burials will be discussed separately with indicator **#18**. Portable symbolic items are discussed here only if found in the house in a stratigraphic position that indicates that it really was part of the house. The role of mobile symbolic items in relation to house elaboration is more difficult to grasp since studies at Çatalhöyük have shown how portable items with symbolic or social power such as figurines or obsidian were constantly moved and circulated within the built environment (Carter and Milić 2013; Meskell 2015; Nakamura and Meskell 2013). A discussion of these movements in relation to the household autonomy question is beyond the scope of my thesis, which will instead focus on the non-portable ritual items named above, which formed parts of the house fabric itself.

A closer look at the text passages relating to indicator **#14** shows that this entire discussion is based on Çatalhöyük and more recently Boncuklu Höyük, where symbolic behaviour similar to that of Çatalhöyük was found (see Chapter 3.2.2). Other sites either had no (archaeologically recognisable) symbolic elaboration of buildings, or it has not been systematically researched in relation to the autonomy question. Canhasan, Bademağacı and Höyücek are mentioned only once in connection with this debate (Baird 2012a:453), and this particular text passage clearly shows the unquestioned and unreasoned transmission of Çatalhöyük/Boncuklu principles to other sites.

Why did researchers conclude that symbolic items located in the house strengthen household identity? Four interrelated arguments can be identified. First, the location of symbolic items inside the house could have had connotations of ownership or at least non-sharing of ritual beyond household borders (Hodder 1996a:48; Last 2005:208): Those who do not live in the house would only get to see and interact with the symbols when allowed inside the house by the resident household, while house residents would have been constantly surrounded by the symbols of the house. Particularly, it is argued, there is a sense of ownership and privacy if symbolic items are hidden from sight inside the house fabric, under floors or inside walls. When hidden, only those who either saw the item prior to hiding, or were told about it, even know of the presence of the ritual item in the house: “one might gradually learn the secrets hidden behind the walls, that a vulture skull was behind that protrusion on the wall, that a fox and a weasel skull were behind that lump of plaster, that there used to be a painting on that wall. And those that lived for long in a house would know in greater detail where individuals were buried, which head came from where, and exactly where the obsidian was hidden beneath the floor near the oven. The more one was in the ‘in group’, the more one would know about what was hidden” (Hodder 2006:169-170, also 184). Again the assumption seems to be that such knowledge would most likely be (mostly) restricted to the actual resident of the house—the household—and Hodder (2006:170) argued that such shared, secret knowledge was used to construct and negotiate membership of the house group; he also seems to envisage social power

being drawn from secret ritual knowledge.

Second, Hodder (2005b:11, 2005c:186, 2005d:23, 2005e:131, 133, 2006:58; also Asouti 2005a:81) connected the Çatalhöyük in-house symbolism with a larger process occurring during the earlier Neolithic in Anatolia whereby the location of symbolic items changed from being inside public space to being inside houses. Hodder compares Çatalhöyük to older sites such as Aşıklı Höyük, as well as Göbekli Tepe and Çayönü in southeastern Anatolia, to argue that the relocation of symbols was part of creating a stronger ritual, social and economic autonomy of households at Çatalhöyük as compared to the earlier Neolithic. This argument closely relates to that documented here as indicator **#15**: that a lack of large, communally used ritual buildings at Çatalhöyük, in contrast to the above named sites where communal ritual buildings existed, supports the notion that ritual was now appropriated by the household (e.g. Asouti 2005a:81; Hodder 2005c:186, 2005d:23, 2005e:131, 133, 2006:58) or at least that the ritual maintenance of suprahousehold ties was weaker (Düring 2006:310). This process is taken as additional proof that the relocation of symbols into the house interior meant an appropriation of symbolism by individual households for their own purposes. And what were these purposes? As a third argument for connecting in-house symbolism with empowerment of the individual household, symbolic house elaboration has been understood as part of a larger cultural behaviour of constructing memory and ancestry on the house level (Baird 2012a:453; Hodder 2005c:185, 186, 2005e:133, 2006; Özbaşaran and Duru 2014:625, 632) that also includes e.g. closure rituals, building continuity (**Theme 4**) and subfloor burials (**#18**). Hodder (e.g. 2006:204, 232) reconstructs house-based groups at Çatalhöyük, but also the Anatolian later Neolithic in general, to be majorly constituted by shared memory and ancestry, and accordingly the management of memory and ancestry to be done mostly inside the individual household groups. The visualisation of memory and ancestry in form of symbolic items then not only served to bind the household group together, but also to display household autonomy in the public arena at occasions when they were exhibited to other households (Asouti 2005a:86). Inside this interpretational framework, symbolic items become part of myths and narrations specific to a household (Hodder

2005d:133, 2005e:186, 195, 2006:164, 165); they might somehow have been incorporated into daily social and economic routines (Last 1998a:371-374); and some imagery is related to the negotiation—within the household group—of family life, household roles and their transitions (Hodder 1987:49, 1996a:47). Somewhat related is the fourth argument identified in this debate: That at least some symbolic imagery, and the timing of its creation, hiding, re-revelation and removal, were related to life cycles of the household, commemorating and marking socially and ritually important events that occurred inside the household group such as birth, ageing and death (Haddow et al. 2015:19; Hodder 1996a:48, 1999; Last 1998a:369, 2005:202) and that the house itself became an archive of family history (Hodder 2005c:184; Last 1998a:370). Last (1998a:369), and similarly Cutting (2006b:96), even suggests that a Çatalhöyük house without ‘decoration’ might not have been a fully functioning house; not a ‘complete’ house.

A number of arguments can be collected to discount indicator **#14**. Although the mechanisms described so far are in theory valid reasons for connecting in-house symbolism with household empowerment, newer research has started to research symbolism in new ways that challenge many of the arguments summarised above. Looking beyond the individual house, newer studies focussing the diachronic and synchronic distribution of symbolic items inside the complex four-dimensional web that was Neolithic Çatalhöyük have tended to see symbolism as strongly controlled with the suprahousehold sphere (**Theme 15**, e.g. Düring 2006; Hodder 2014b; Hodder and Pels 2010). Further, there are now new and different insights into the wider social and cultural context of society and architecture that the symbolism discussion is set within, and this in turn has changed views on the role of symbolism in the household-community balance (a trend also observed by Düring 2013a:31). A majority of sources coded for **#14** (and **Theme 3** more generally) were published by the Çatalhöyük team in the 2005/2006 publication cycle, with Hodder’s monograph (2006) providing a comprehensive summary of thoughts he and others had been developing since the 1990s (1987, 1996a, 1999b) as part of a larger theory about developments of symbolism and ritual accompanying the origins of agriculture and sedentism (Hodder 1990). But in 2005/2006, Hodder wrote in a different framework

than now—there is now more and more rigorously tested knowledge about social structures at Çatalhöyük. For example, when contrasting Çatalhöyük symbolism with that of earlier sites to argue for in-house symbolism signifying household independence, Çatalhöyük is treated as a homogenous unit. Only in the last few years of research at Çatalhöyük, published in the 2013/2014 research cycle, has the team focused stronger on development over time (Hodder 2013b:2, 2014b). The 2005/2006 interpretations were also written under the then current opinion that at Early Neolithic Çatalhöyük the independent household, or small groupings of houses, was the most important institution creating social cohesion and integration, and managing resources (e.g. Hodder 2005d:29, 2005e:185, 2006:128, 250), which has since been disproven by newer research which showed that social cohesion at the site relied on several levels of suprahousehold institutions: house, neighbourhood, moiety, community (Düring 2011c; Hodder 2014b). In sum, newer and more detailed analysis have modified the simple equation of ‘symbols in the house = symbols of the house(hold)’. Indicator **#14**, as a general attribution of house elaboration to the household sphere, will therefore be discounted here. And although the presence of community buildings **#89** will in **Theme 16** be found as indeed marking communal integration, the absence of such buildings **#15** cannot automatically be equated with an absence of suprahousehold shared ritual, since such shared ritual can also become visible in different architectural form, of which many examples will be discussed with **Theme 15**.

Symmetry and idiosyncrasy

That indicator **#14** was discounted does not, however, mean that all Çatalhöyük ritual should be attributed to a suprahousehold sphere; it is possible that some ritual was household-controlled and others on a more communal level. In the further course of this chapter, we will identify two main themes or aspects of architecture that indicate household autonomy (and see discussion in Chapter 10): symmetry, i.e. the relatively even distribution of certain features between contemporary houses, and idiosyncrasy, i.e. seemingly small-scale differences

between the configurations of individual houses. Both rely on a study of the diachronic and synchronic distribution of symbolic items within the built environment of a site; and as stated in the discussion of **#14**, such studies are the newest trend also in the symbolism debate, so that indicators incorporating the ideas of symmetry or idiosyncrasy of ritual should work well. And in fact, there have been suggestions that idiosyncrasies in the symbolic elaboration of houses (**#16**) or the symmetric distribution of items between houses (**#17**) identify ritual as being controlled by individual households: Hodder mentions that “the art produced in neighbouring buildings is often quite different within an overall canon” (Hodder 1996a:47) and understands this to mean that “Despite the overall conventions on where symbols should be located [**#64**], people were able to pick and choose the specifics of which symbols to use, very much on a household level” (**#16**, Hodder 2006:143). And Düring (2006:217, 2007a:136) has tentatively connected the Çatalhöyük wall paintings with the household sphere because they occur in every house (**#17**; Düring 2011c:102-103; Hodder and Cessford 2004:22) unlike other symbolic items, which were irregularly distributed and therefore probably not household controlled (**#86**). Considerably less has been written about these ideas (**#16**, **#17**) as compared to **#14** or also the typically asymmetric distribution of ritual features at Çatalhöyük (**#86**, **#87**), but in the wider context of the thoughts and ideas collected in this chapter they gain traction and are therefore tentatively included on the indicator list. There is further additional proof for both hypotheses in the fact that the distribution of painting tools and materials strengthen the impression that wall paintings were created by each household: “Çamurcuoğlu [2013] indicates that painted plasters, pigments and stone palettes/tools are found within buildings and spaces in all contexts. Çamurcuoğlu interprets the evidence in terms of house-based painting activity” (Hodder 2014d:161, also 2013a:20). This argument might work even if the actual content of the paintings sometimes indicates connections between households because they are similar to other paintings in other houses (**#85**), or because the painted scene depict—possibly ritual—group activities (Hodder 2005d:15, 2006:30-31): the act of creation was still done and controlled by the individual household.

Burials: subfloor and chambers

The discussion around the social interpretation of subfloor burials is again mainly based on Çatalhöyük although a number of Neolithic and Chalcolithic sites in southcentral Anatolia feature this burial form. The arguments why subfloor burials display a strong household identity are very similar, or identical, to those discussed above for other symbolic items located in the house (#14): In this strand of argumentation, subfloor burials, keeping dead household members close to the living, are associated strongly with the control or ownership of individual households at Çatalhöyük over their own sphere of memory and ancestry (Asouti 2005a:84; Hodder 2005e:133, 2006:164). Ancestry, articulated in burial location, might have been relevant to the living members of the household for obtaining and maintaining household-specific access to economic and social resources (Baird 2012b:460; Hodder 2007:32), for example to claim ownership of the house itself (Hodder 2005e:137, 2006:249). Burials also bind living household members to place and therefore create strong social cohesion between them (Hodder 2005c:195, 2005e:137, 2006:165). Burials—the death of household members—also mark important transformative event in the history of the residential group, and the collection of burials under the house floor become part of the tangible archive of the household’s shared history (Haddow et al. 2015:19, 20; Hodder 2005c:195, 2006:165): “the lifecourse of houses and the individuals associated with them were deeply intertwined and, moreover, can be seen to be part of a shared biography that was achieved through the periodic and episodic embedding of bodies—whole or in part—within them. In so doing, the social and biological vicissitudes of life for the Neolithic inhabitants of Çatalhöyük—birth, changes in status, demographic crises, death, the unification/dissolution of lineages, etc.—were inscribed in the architectural record of their buildings” (Haddow et al. 2015:24). Burials might even have been catalysts for important household decisions such as house abandonment and renewal (Baird 2012a:460; Haddow et al. 2015:23; Matthews 2005a:132).

Outside of Çatalhöyük, Düring (2011c:67) and Özbaşaran (1998:560) very tentatively link subfloor burials at Aşıklı Höyük with household identity because a preferential choice of rooms with hearth for burial, as well as burning traces on skeletons, seem

to show a symbolic connection with hearths/fire. But Düring's (2006:86-89) longer discussion of this matter shows that the contextual data for this conclusion is not reliable: in most houses the subfloor was not excavated; and not of all known burials is the location published so that the sample might be distorted. It remains to be seen what the renewed excavations at Aşıklı publish about burial location (e.g. Özbaşaran and Duru 2015:15). Since some young people at Çatalhöyük were also buried close to the hearth instead of under the more commonly used house platforms (Hodder 2006:123, 136), a link of hearth and burial might indeed at least sometimes have played a role at these two sites, which has supported the perception of subfloor burials being related to household identities since hearths as well have been understood as carrying household symbolism (see #4).

The arguments for an association of subfloor burials with household identity are essentially similar to that for indicator #14, and the same process of re-interpretation that was described above for #14 has also affected indicator #18: the equation of 'burial inside house = burial by the household' is too simplistic, and newer and more complex analyses of burials within four-dimensional space at Çatalhöyük have found more arguments for associating burials with suprahousehold ties. There are two main reasons for this re-interpretation, which will be discussed in **Theme 15**: First, biodistance studies at Çatalhöyük (Pilloud in Hillson et al. 2013:342-350; Hodder 2014b:7-8; Pilloud and Larsen 2011), the only site among those studied here where such analysis has been done, showed that the people buried together were not genetically related. Second, burials are not evenly distributed between contemporary houses, indicating that burial location was part of a negotiation between households, and that people from different households were buried together (Düring 2003, 2008; Hodder 2014b; Hodder and Pels 2010). These two findings effectively undermine the assumption, intuitively assumed by many researchers (e.g. Duru 1996e:120; Heinrich and Seidl 1969:115; Hodder 1987:46; Mellaart 1964:93, 1967:205; Sagona and Zimansky 2009:78; Yakar 1991:208, 220), which indicator #18 founds on: that those buried in or under the house must have previously lived in the house, and be of the same biological kin, and also of the same kin as the people still living in the house after the burial. Of

course, the definition of kinship/household at Neolithic Çatalhöyük could have been of a social rather than biological nature (Hodder 2014b:8), therefore this finding alone does not discount the connection of household and subfloor burial, but the uneven synchronic distribution of burials (#87) does.

A similar statement can be made about the two burial chambers (#19) excavated in one of the uppermost levels of the Çatalhöyük East Mound. Two different burial chambers were found with a temporal gap of ca.55-155 years between the disuse of the first and the construction of the second, and Marciniak (Marciniak et al. 2015b:174) has suggested that this time frame “may indicate a [...] memory regime that probably referred to the past of the individual household and its specific genealogy”. Unless, however, it is actually proven that the individuals interred here belonged to the same household this is only one possible suggestion; if it were instead assumed that the burial chamber contained members of different households, it would be a strong indication for a suprahousehold level of ritual.

In conclusion, the automatised connection of group burial (#19), and subfloor burial specifically (#18), with a household sphere of ritual has been discounted by newer research. Based on the discussion of #16 and #17 above, it could be tentatively suggested that researchers might find new evidence for household control over burial in the Anatolian Neolithic/ Chalcolithic by looking for burial idiosyncrasies or cases of a more symmetric distribution of burial between contemporary houses; or of course in studies of ancient DNA proving a kin relation between co-buried people; but until such time, a general connection of subfloor burial with ritual household autonomy (#18) is rejected here. And that subfloor burials decrease or disappear after 6500 BC at Çatalhöyük (Theme 5) can be seen as additional proof that at least in the centuries leading up to the change, burial had indeed a meaning more on the suprahousehold level (Theme 15), and not primarily on for the forging of household identities. If in-house burial had been closely related to ritual household independence, one could expect to see it continuing after 6500 BC, when households became more independent.

Finally, it must be remarked that possibly a majority of people throughout the

southcentral Anatolian Neolithic and Chalcolithic were buried outside the settlement: at some of the sites studied here, no or very few burials were found inside the settlement (e.g. Hacilar: Mellaart 1970c:88; Kuruçay: Duru 1994c:101), and even those where intramural (mostly subfloor) burial is a regular feature, comparisons of burial number and estimated population show that likely a significant number of community members were buried off-site (Aşıklı Höyük: Düring 2006:87). At Çatalhöyük, a possible extramural burial site was found in the KOPAL offsite excavation area (Hodder 2006:106). For a study of architecture, however, extramural burial behaviour is only relevant insofar as it must be kept in mind that intramural burial might have been the exception rather than the rule.

6.2.3 Theme 4: Leaving and Continuing the House

Theme 4 also describes house-related ritual and could have been combined with **Theme 3**, but I separated it for two reasons. First, I wanted to stress the theme of social/ritual continuity being created through the repetitive destruction and re-creation of houses and items within houses; and second, because **Theme 4** is focussed stronger on ritual practices and processes than on ritual items; although both aspects overlap in both **Theme 3** and **Theme 4**.

Leaving the house

Ritual practices accompanying the abandonment, closure and rebuilding of houses were observed mainly at Çatalhöyük East, but partially also at Boncuklu Höyük and Aşıklı Höyük. This set of practices is poorly explored in terms of the household autonomy vs. communal integration balance, and there seems to be much future research potential to re-investigate abandonment, closure and foundation practices in light of the 6500 BC change, especially at Çatalhöyük East which spans this transition.

At Çatalhöyük East, most houses were ritually closed upon abandonment (**#20**). Four subsets of (ritual) closure practices were observed: cleaning/deposition in the

house interior, dismantling of the house shell, intentional house burning and the deposition of closure/ and foundation deposits. The cleaning/preparation of the house interior could include the removal of valuable objects such as wooden posts and ladders as well as symbolic sculptural features and paintings; installations such as ovens and bins were either removed or stabilised by filling in sediment to prevent collapsing; sometimes floor and wall plaster were removed, possibly for reuse in another building (Hodder 2005c:186); and sometimes human skulls, parts of animal heads, sprinkled red ochre, figurines, grain or other objects were placed on the floors, in postholes or bins (Düring 2006:161; Farid 2014:92-93; Hodder 2005c:186, 2005e:134; Hodder and Cessford 2004:32-33; Hodder and Farid 2007:52; Last 2005:201; Matthews 2005a:Tab.9.3, 145-146; Stevanović 2012c:70-74). Afterwards, the roof and the upper part of the walls of nearly all houses was dismantled and the building filled in with fairly sterile (artefact-less) sediment that might have been specially prepared (Martin and Russell 2000:64-66; Matthews 2005a:129, 133). After this, some buildings were burned. I gave its own indicator number to the intentional burning of houses upon abandonment (**#21**) because this practice will be discussed again throughout the remainder of the thesis (**#31**, **#128**) and has also otherwise received a lot of attention of the research community, although only a minority of buildings was actually burnt (Haddow et al. 2015:23; Hodder and Farid 2014:Tab.1.5). Some of the burnt buildings were investigated for the cause of the fire, and were identified to have been deliberately set to fire, not accidentally or through arson or warfare. The fact that they were ritually cleaned and prepared in the above mentioned ways served as evidence that house burning was deliberate, and part of the abandonment ritual (Haddow et al. 2015:22). Further, the specific and idiosyncratic ways in which buildings burned is suggestive of a controlled process (Cessford and Near 2005; Haddow et al. 2015:22; Harrison et al. 2013; Hodder 2005b:12, 2013a:17; Twiss et al. 2008).

The final step of the abandonment process often was the construction of a new building on top of the abandoned house, although not in all cases was a new building built onto an abandoned one at Çatalhöyük (Düring 2006:220; Farid 2007:52). Since closing and dismantling one house, and the erection of the next

house seems to have happened in close temporal connection at least at Çatalhöyük, which has the most fine-grained stratigraphy and radiocarbon dating of the three sites featuring such closure ritual, it is likely that house abandonment and rebuilding at this site was one continuous process (Düring 2011c:114; Farid 2014:93; Hodder 2013a:16; Hodder and Cessford 2004:32; Russell et al. 2014:113). There is evidence that house closure and foundation was accompanied by ritual feasting, and the feasting remains were buried as foundation deposits (Hodder and Cessford 2004:32; Russell et al. 2009). In other cases, burials under house walls or inside sterile house fill are interpreted as foundation deposits (Hodder 2005c:186; Russell et al. 2009:106, 2014:117).

Just as the indicators of **Theme 3**, the Çatalhöyük closure/foundation rituals were first investigated when the ritual elaboration of houses was still attributed mostly to household identity and it is therefore not surprising that abandonment rituals, too, were put into the realm of household ritual. In this context, closure rituals were interpreted—similar to the **Theme 3** discussion—as part of the memory-, ancestry- and continuity-building and appropriation of ritual that strengthened household identity and asserted the position of the household inside the community, e.g. its right to access certain resources (e.g. Baird 2012a:453; Hodder 2005b:14, 2005c:186, 195, 2005e:134). For example, foundation deposits, as well as the above mentioned abandonment deposits on house floors, are interpreted by Russell et al. (2009:108, 120, 2014:119) as supporting an independent household identity: “the commemorative deposits are hidden, and specifically hidden in houses. This certainly suggests that they were considered to carry power that was harnessed for the benefit of the household, and also shielded so as to avoid inadvertent harm to those coming in contact with them, or to prevent outsiders from appropriating their power” (Russell et al. 2009:120).

No real argument has been provided for why closure rituals were controlled or conducted by the individual household; rather, this seems to have been assumed rather automatically and then influenced the further investigation and interpretation of closure rituals. For example, while there might have been any number of reasons for why (most) houses were ritually terminated before becoming

structurally instable (Matthews 2005a:145), in some cases there is evidence that the timing of abandonment and rebuilding might instead have been determined by the death and interment of a certain individual, when stratigraphic evidence and the condition of skeletons indicated that one particular individual was buried in the house just before abandonment (e.g. Haddow et al. 2015:24). Based on the assumption that this individual must have been a member of the household resident in the house in question (**#18**), the timing of house abandonment was then seen as additional proof to see closure rituals in the household sphere (e.g. Haddow et al. 2015:24; Russell et al. 2014:120). Other and not directly archaeologically verifiable household events such as marriage or illness were also named as reason for house closure and foundation (e.g. Matthews 2005a:145; Russell et al. 2014:120). Even if the death of a certain individual was reason for house abandonment, this individual does not necessarily need to have been a household member as pointed out by Russell et al. (2014:120). If the person was not member of the household, the fact that the death of a non-resident was reason to close the house could instead be seen as evidence for suprahousehold ties. An automatic equation of closure/foundation rituals (**#20**, **#21**), and a household sphere of ancestry- and identity-making is therefore here rejected.

More promising are suggestions to relate closure rituals to household autonomy when and if they are idiosyncratic. As has already hinted at during the previous discussion: Among the many possible different practices to choose from for closure ritual, Çatalhöyük house often received quite idiosyncratic treatment **#22**, and sometimes different consecutive house versions within the same continuous house stack (**#23**) received similar abandonment treatment (e.g. Hodder 2005b:12, 2005c:188; Hodder and Cessford 2004:32-33; Matthews 2005a:Tab.9.3, 145-146). Further, different houses were abandoned and rebuilt at different times, each house following its own schedule (Farid 2007:52; Hodder 2013a:16, 1, 2014b:6. These are reason why Hodder (2013a:16-17, 2014c:17, 18, 2014d:162) more recently continues to see ritual closure more in the context of preserving household identities within the tight-knit Early Neolithic village community, or perhaps as part of a localised phenomenon including only a small group of houses and households

in a case where three neighbouring buildings shared similar abandonment treatment (Hodder 2014d:162). Russell et al. (2014:119) make similar observations, for example: “Rare and distinctive obsidian tool types appear as both closing deposits and caches in B.56 and B.44. These material constructions of memory hint at a household identity maintained through the generations, in part through the material incorporation of meaningful objects into the house”. Such idiosyncratic closure practices seem meaningful since they contrast with other cases where closure treatment is similar between houses, for example “there is a wider pattern of placing obsidian points in western retrieval pits. So the memories involved in these practices in Buildings 1 and 5 may be larger scale than the house” (Hodder 2005f:187, 191). Since it fits within the wider theme of a relation between household autonomy and architectural idiosyncrasy discerned in this chapter, indicator **#22** is tentatively accepted as a potential indicator of household autonomy, although it can generally be concluded that house closure rituals deserve a systematic re-interpretation in light of newer insights into Neolithic community structures.

Continuing the house

When Çatalhöyük houses were rebuilt on older houses then in a majority of cases the new house followed the footprint of the previous building (Düring 2006:161, Fig.6.27; Farid 2014:Fig.4.6a). This practice has been termed building continuity (**#23**) and is also observed at Aşıklı Höyük (Düring 2006:97, 2011c:65; Özbaşaran 2011:108) and Boncuklu Höyük (Baird et al. 2012:234). Building continuity is defined by Düring (2011c:65) as a practice whereby “buildings were continuously reconstructed on the same spot, with the same dimensions and orientations as older buildings, using existing walls as the foundation upon which a new structure was raised”. This practice is interpreted as the continuous re-creating of a particular house over centuries, and the various consecutive physical manifestations the house are therefore essentially all the same house (Düring 2011c:114). Not every building was renewed, and how often buildings were rebuilt was highly variable.

Some continuous houses could have lasted up to 420-700 years at Çatalhöyük: Up to 6-7 rebuilding episodes are in evidence, and the duration of house lives has been dated to between 70-100 years on average (Hodder and Pels 2010:179; also Düring 2006:218, 246). Even though it has been argued (see Düring 2005:4, 2009:29, 2011c:66 for a discussion) that practical considerations guided the use of old walls as foundations for new ones, thus increasing stability, or that the tight clustering of buildings (#47) might have prevented radical changes to their layout, a further investigation of building continuity makes it more likely that it was a deliberately chosen ritual behaviour (Düring 2005, 2009, 2011c:66): Apart from the location of walls, other house features were continued as well, such as hearths, activity patterns shown by microdebris, or painted and moulded motifs (#24) which often occurring in the same spot in the house across different levels (Düring 2011c:66, 114; Hodder 2005c:187, 188, Hodder 2006:227, 2013b:25, 2014b:6; Hodder and Cessford 2004:20, 35; Matthews 2005a:147). There might be a connection of closure rituals (#20) and building continuity (#23) in the way that some form of orderly abandonment seems a prerequisite for building continuity and Düring (2009:33) suggests that the wish to replicate the building could have been a reason why buildings were so carefully dismantled and stabilised.

Building continuity has been interpreted as a practice connected to household identity for similar reasons as other ritual practices at Çatalhöyük: it is seen as supporting the creation and maintenance of continuous ancestral lines that served to bind the household together and assert its place (quite literally) inside the community (Baird 2012b:453; Haddow et al. 2015:19; Hodder 2005c:195; Twiss et al. 2008:42). It has been argued that building continuity binds a household to place, thereby building household identity through spatial continuity (Baird 2005:71) and strengthening the ownership of this particular spot of the settlement, this house, by a particular household (Cutting 2005b:127). Rosenstock (2009:221) points out that a strong attachment of individual households to place might have been both reason and result for/of building continuity.

Further, building continuity has also been interpreted as strengthening the household through a specific form of architectural, and thereby social and symbolic,

reproduction (Haddow et al. 2015:19): The continuous destruction and renewal of the house (#23) can be seen in the context of other house-related practices that involve destroying or hiding something in order to create it new. It is interpreted that such practices built continuity of the house, and the social group(s) related to it, precisely not by the conservation of the (built) status quo, but by its constant renewal and reproduction. These practices include: destroying a seemingly usable house only to erect a more or less true copy of it (#23); creating wall paintings, but then hiding them under a layer of white plaster, only to create a new painting a little later (Baird 2012a:453; Düring 2011c:100-101; Hodder and Farid 2014:17; Last 2005:202, 207); and the hiding or abandoning of symbols within the house fabric, followed by symbol retrieval or recreation.

The latter example refer to two other indicators grouped with this theme: Building continuity could also entails the continuity of symbols (#24) that were re-painted or re-moulded in subsequent versions of the same house (Hodder 2005c:188; Hodder and Cessford 2004:35; Hodder and Pels 2010:182; Matthews 2005a:147) which is generally seen as further evidence for the relation of building continuity as a house(hold)-specific practice (Baird et al. 2011:391; Hodder 2005c:188, 194). And in particular, the retrieval of symbolic items from older houses within a house stack, by digging narrow, targeted pits through floors and infill to remove a moulded feature, post, obsidian deposit or bones from a burial (#25) has been understood as strong proof for the connection of the closure-foundation-continuance complex with the household scale rather than a communal scale (Hodder 1999b:162, 2005c:191, 2013a:16). Retrieval pits clearly show that things deposited under the floors, in previous versions of the house, continued to have meaning in the present, and the inhabitants of the new house were aware of what was below their feet, and even of the exact location (Hodder 2006:227). Hodder (2005c:186; Hodder and Cessford 2004:33) sees the transmission of memory of the location of such valuable items located at the house-scale, and a range of researchers have pointed out that in general, practices of hiding items somewhere in the house fabric suggests an element of privacy whereby knowledge is kept to a small group (e.g. Love 2013c:276; Russell et al. 2009:120)—although there is no particular reason to

assume that this group was a household.

Indicators **#23-#25** can be discounted for the same reason as most other indicators of **Theme 3** and **Theme 4**: House abandonment and continuity practices need to be re-evaluated in light of the fact that newer research sees more evidence to associate much ritual behaviour at Çatalhöyük with the maintenance of tight-knit ties between households (see **Theme 15** discussion). In particular, building continuity (**#23**) will be shown in **Theme 15** to be a cornerstone of the 'history house' concept and thus of cross-ties between households at Çatalhöyük; and to be associated with communal control over built space at Aşıklı Höyük as well (**#88**). If this central element of the house succession is associated with inter-household relations and negotiations, this suggests a necessity for re-thinking the accompanying rituals (**#20, #21, #24, #25**) within the sphere of communally organised ritual. For example, Hodder and Farid (2014:33) remark while discussing history houses that "An emphasis on history-making is seen in the elaborate abandonment and foundation practices that ensured the continuity of buildings" and thus indicate that it could be equally possible to interpret closure/foundation rituals in the context of history houses asserting their status and control over a ritual group that encompassed several households (see **Theme 15** discussion).

Additional evidence to see the abandonment-foundation-continuation of houses in the suprahousehold sphere comes from the already mentioned feasting deposits that, deposited on the floors of to-be-infilled in houses, or in the sterile infill, have been interpreted as being the remnants of festivities or maybe work-feasts that went along with what must have been weeks of work for a group of people (Russell et al. 2014). The composition and amount of these deposits clearly show that a larger number of people were involved in the feasting event (Hodder 2006:172): "Like other feasting deposits at Çatalhöyük, these are always partial: they contain remains of multiple animals, but never anything close to an entire individual. This suggests that the remains are divided among more than one house, and that house closure feasts, while tied (perhaps) to the end of a single house, are multi-household in scale. Indeed this is also implied by the amount of meat: several caprines and certainly several aurochs would feed many households, possibly

even the whole settlement in the case of multiple aurochs” (Russell et al. 2014:117). And Russell et al. (2009:121) point out that there is also a asymmetry of distribution of foundation/abandonment deposits that could indicate suprahousehold relation the same way that **#86** asymmetric elaboration and **#87** asymmetric burial do: “Rather, not all houses are suitable for holding either burials or commemorative deposits, perhaps because their occupants do not constitute an independent household but area spatially separated adjunct of another house (Düring 2005), or because houses of lineage heads are the centers of ritual.”

And finally, it is possible to argue that no house abandonment and dismantling could ever have happened with at least the passive involvement of neighbours in such dense living conditions as are the rule at all sites discussed here; passive involvement meaning here that residents in neighbouring house plots were aware and accepting of the ongoing work, and increased traffic, dust and noise that necessarily went along house construction and destruction (**Theme 11**): “What must have been a major disruptive exercise appears nonetheless to have been carried out whilst neighboring houses continued in use” (Farid 2014:93). It is especially impossible to imagine the controlled burning of one house (**#22**) without the involvement of neighbours, who presumably needed to be part of making the necessary precautions to prevent damage to adjacent structures.

6.3 Suprahousehold integration

6.3.1 Theme 9: Living close together

One of the most iconic features of (some) Neolithic/ Chalcolithic settlements in southcentral Anatolia is the dense clustering of buildings within them, with often only a few centimetres of space between houses (**#47**); and one of the most widely held beliefs among those documented in this thesis is that this spatial closeness must reflect social closeness between the households living in the buildings. The clustered, or agglutinating/ agglomerating/ conglomerating (see Düring 2006:19; Rosenstock 2014:237 on these terms), settlement layout has been described as the

characteristic central Anatolian Neolithic settlement type, and a style of organising settlement and community that was unique to the central Anatolian Neolithic/ Early Chalcolithic (Baird 2012a:465; Düring 2006:23, 2011c:61; Düring and Marciniak 2005:170; Özbaşaran 2000:135, 2011:118; Steadman 2000b:176). Among the text passages documented here, there was a substantial number which automatically and without explanation or discussion related clustering with collectivity. This observation is insofar worrying as automatism prevents a closer archaeological examination of this architectural feature and in fact Düring (2011c:121) states that “the reasons for this type of agglomeration remain poorly understood”. From the combined array of literature documented here, though, three main arguments can be identified for relating clustering to strong suprahousehold integration.

First, it has been argued that clustering represents a visual demonstration of communal ties: the individual house becomes visually undiscernible within the house landscape, and this is seen as a reflection of a strong community identity that prevented households from achieving and/or displaying too much independence (Düring 2005:21, 2006:92, 122; Düring and Marciniak 2005:175, 178, 182-183; Hodder 2005d:16, 2014d:155). Evidence for this point is found in the efforts made to leave no gaps between buildings. For example, within an Aşıklı Höyük house cluster, some buildings took irregular shapes to fit into existing gaps between other buildings (Düring 2011c:68), indicating that the gapless physical proximity of houses, and possibly symbolically between the groups residing in them, was important at Aşıklı. French (1998:68) makes a similar argument about Canhasan I, and Biehl et al. (2012b:99) about Çatalhöyük West.

Some researchers sought to support the equation of clustering with the desire for displayed social closeness by postulating the following genesis of clustered settlements, or Çatalhöyük in particular: First suggested by Heinrich and Seidl (1969:118), and picked up by others (Düring 2001:2, 2002:226; Hodder 1996a:48, 2005e:137, 2012a:309; Matthews 2005a:129), this model holds that a small group of initial settlers built the first buildings in a loose arrangement, that their descendants preferred to live close to the original house of their kinsmen and ancestors ('Stammhäuser der Sippen'), and this system was continued as the

settlement grew. Clustering is here equated with kinship ties between different households (also e.g. Düring 2006:112; Steadman 2004:547, 548 for Aşıklı Höyük and Canhasan). However, until the lowermost occupation levels of clustered sites such as Aşıklı, Çatalhöyük and Canhasan are excavated on a larger scale, such models remain conjecture—and given the size of these sites, it is doubtful that this will happen soon.

One issue with this first argument, but also the following ones, is that very clearly researchers argue from the underlying notion that living in such dense conditions is not desirable in itself; ergo there must have been an important social reason for this arrangement (e.g. Düring 2006:92, 122; Düring and Marciniak 2005:175). This argument is insofar problematic as it seems to derive from modern European notions of privacy. However, a few convincing arguments have been brought forward to show that living in clusters would have produced daily strains that could have been avoided or alleviated by not living in clusters: Hodder (2006:101-102) discussed that sanitation, transport of goods and animals to and from houses, as well as management of rodent pests would have represented daily logistical challenges within a dense or clustered settlement.

The second argument for clustering signifying community rests on a consideration of the roofscapes that were created by such building traditions and constituted important transport and activity areas. Within clustered settlements, buildings normally do not have doors opening onto unroofed spaces on ground levels (Düring 2011c:61). The absence of doors in most or all houses of a cluster indicates access through the roof, as evidenced at Çatalhöyük and assumed at Aşıklı and Canhasan III (Düring 2006:77, 117, 2011c:63, 116). Charred ladder bases were found at Çatalhöyük by Mellaart (1963e:75, Pl. 16b), and the recent excavations have documented many examples of ladder imprints or ‘scars’ in the wall plaster (Düring and Marciniak 2005:176; Hodder 2014a:172, 419, 488, Fig.23.6). Access to each house was therefore across the roofs of neighbouring structures, and must have been regulated and permitted through rules or negotiations involving several residence groups (Düring 2007b:169; French 1998:68; Hodder 2006:100; Love 2013c:276; Rosenstock 2014:239).

In a clustered neighbourhood settlement the absence of doors in most or all houses of a cluster indicates access through the roof, as evidenced at Çatalhöyük through the existence of ladders and assumed at Aşıklı and Canhasan III (Cutting 2005b:41; Düring 2011c:63, 116; Özbaşaran 2011:107). Traffic to and from houses would therefore have been across the roofs of neighbouring houses, and the flat roofs are also reconstructed as important activity areas for households to perform many of their daily tasks; the roofscape of clustered settlements fulfilled the same functions as courtyards in a non-clustered settlement.

Further, access to rooms being through the roof would naturally have made the roofscape of a building cluster communal space, because residents of one building had to cross their neighbours' roofs regularly during their daily activities (Düring 2011c:69, 117). Düring (2011c:69, 116-117) furthermore suggests that the roofs would have been used during the day for social and economic activities. This assumption seems reasonable, given that the roof would have offered more light, space, and fresh air than the interior of the often small, windowless houses. Düring (2011c:69; also Özbaşaran 2012:139; Özbaşaran and Duru 2015:48) suggests seeing the roofs of clustered settlements as fulfilling the same functions as courtyards in a non-clustered settlement. Given the sometimes small area-wise size of Neolithic/ Chalcolithic houses, roofs would presumably not have offered much privacy when they were used as work space and social space during the day. The necessarily ensuing, and maybe intended, informal sharing of daily activities, experiences, knowledge, social control and maybe resources on the roofscape would have produced intense social bonds (Düring 2011c:69, 117) as well as social control. In this context, it is not even important whether this effect of clustering was intended by the creators of clustered settlements: Living so close together inadvertently created close social ties simply through the fact that people would have witnessed much of each other's lives. Neighbours were able to see who and what passed in and out of the individual houses, they probably could hear at least some of the sounds from the other side of the house walls (Hodder 2014b:18), and this deliberate or unintentional monitoring produced social control (Hodder 2006:108) that Hodder (2014b:18) suggests might also have been an integral part of

maintaining egalitarianism and ensuring that no household cheated the system by amassing undue social or economic resources.

An important weakness of this reconstruction of roofscapes as communal courtyards is the fact that roofs are hardly ever found in Anatolian archaeological excavations (see the discussions of **Theme 4** and **#88** for the planned abandonment and dismantling of houses). In fact, in all the sites discussed here only one (nearly) completely preserved, collapsed roof has been found, that of Building 3 at the top of the Çatalhöyük East Mound (Düring 2011c:69, see Özbaşaran 2012:143 with a possible newly excavated example from Aşıklı Höyük). This roof featured a fire installation as well as areas ascribed to different kinds of activities, probably around food processing. Micromorphological evidence indicates that this use of the roof might have been regular, yet seasonal in the warmer and dried parts of the year (Düring 2006:242, 2011c:116-117; Matthews 2005a:126, 134, 144, 2005b:368, 373, 393, 395). The one available example of a complete collapsed roof therefore supports the roofscape argument. On the other hand, other burnt buildings at Çatalhöyük contained smaller fragments of roofing material that gave indications about different roof types, showing that some roofs had an incline (Stevanović 2013). There further might have been roof height differences created by terracing (in the upper levels of mound sites) and different relative floor heights (Düring 2006:236-237, 243), and the B.3-roof had evidence of a light construction made possible from wood and mats (Stevanović 2012c:49). Height differences, different roof types and small shelters on top of roofs would have made the roofscape a maze with limited visibility rather than a plaza-like open area where everybody could witness everybody. Hodder (2014d:162) takes this to mean that “we can no longer assume the roofs were for intense communal activity”.

These observations suggest that the existence of a communal courtyard-roofscape at clustered sites cannot be taken for granted, but instead an investigation of roof forms, microdebris on roofs (if roofs are preserved) or relative floor levels heights should be conducted to try and verify whether roofscapes in fact functioned, or at least were suitable to function, as often-used activity areas. Even with height differences and some screen walls, however, many of the mechanisms discussed

above for a creation of communal bonds on the roofscape would still have worked, although maybe less strongly. Also the observation correctly noted by Düring (2006:236) that the current state of radiocarbon dating even at Çatalhöyük cannot prove that all buildings within one occupation level of a clustered site were used at the same time does not essentially weaken the argument: the occasional gap in the cluster does not contradict any of the arguments made here.

The third argument for the connection of clustering with suprahousehold ties is that clustering forced households to cooperate in the construction, maintenance and dismantling of individual buildings since these activities necessitated the transport of large amounts of materials across roofs, and the use of adjacent roofs for the storage and/or preparation of building materials (Cutting 2005b:135; Düring 2006:112; Matthews 2005a:134; Russell et al. 2014:119; Stevanović 2012a:174, 201, 2013:112). At the very least, neighbours would have indirectly been impacted by witnessing and tolerating construction and similar activities (Love 2013c:276), but there is also evidence for more active cooperation. Some go as far as to equate clustering with community-wide planning of construction activities (French 1998:68; Stevanović 2012a:203), for example the timing of such activities could be been coordinated so as not to disturb other important activities (Matthews 2005a:134). The roofscape in particular probably needed to be maintained or planned collaboratively: maintaining a usable roofscape without inconvenient gaps or major height differences, while at the same time individual houses were destroyed and rebuilt every few decades (#88), would have necessitated a certain amount of management—neighbouring houses must have coordinated their building activities to a degree. Stevanović (2013:100, 110, 112) further states that to assure the drainage of snow melt and rain from the roofscape it needed to be designed, by communal cooperation, in an adequate way with height differences channelling the water (see also Düring 2006:242). It must be noted that these arguments contradict and discount Rosenstock's (2009:217) suggestion discussed in Section 6.2 that clustering might instead reflect a lack of cooperation between households during house construction (#13).

In conclusion, despite the reservations recorded throughout the discussion of

clustering, which were mainly about the archaeological ability to prove e.g. the regular use of roofs for daily activities, the arguments are convincing that a clustered settlement layout either displayed and/or created social and economic bonds across the borders of residence groups. That clustering might also have had other reasons or purposes, such as defence (indicator **#165**), does not contradict the arguments made here about clustering expressing and/or fostering communal integration.

To what degree can the arguments made here be transferred to non-clustered sites? Other sites in the study area (e.g. Hacılar, Bademağacı) are not clustered to the same degree, but still buildings stand close. I would argue that some of the points made above, specifically social control and about enforced cooperation during house construction and abandonment can also be made about these sites, although these mechanisms might have worked to a less strong degree in less clustered settlements. This thought will be discussed again in **Theme 6**, where indicator **#35** argues to associate non-clustering with household autonomy.

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Figure 21 Reconstruction of the Canhasan 2b roofscape with Karadağ mountain in the background (French 1998:Fig.59)

Indicator **#48** refers to an interesting thought suggested by Düring (2006:281) regarding the development of houses with two (or more) storeys which probably took place in the southcentral Anatolian Late Neolithic and Early Chalcolithic. He suggests that “one of the reasons why people may have started to build two storey buildings may have been their desire to maintain a clustered corporate residence group, while being faced with a lack of space on the ground” – a kind of ‘superclustered’ arrangement. However, the chronological position of this development suggests that it might instead be related to increased household autonomy, and this suggestion will be discussed below (**#40, #42**).

6.3.2 Theme 10: Divide to Unite

Another widely held notion within the southwest Anatolian research community is that the division of settlements into spatially and visually separated house groups is related to a strong level of suprahousehold integration (**#49**). It is particularly worth mentioning for indicator **#49** that the neighbourhood principle (**#49**) has also frequently been suggested for Lake District sites, which is of special importance to this study and indicates that this might be the first indicator discussed here that can with confidence be applied to the Lake District.

From the discussion, two interrelated mechanisms can be extracted by which sectors (also referred to as neighbourhoods e.g. by Düring 2006, 2011c) work for communal integration: First, the clusters are seen as evidence that the people inside the cluster had suprahousehold ties. The arguments for this are very similar to those discussed above for indicator **#47**, clustering. In fact, it is often difficult to tell the two indicators apart in the scholarly discussion. Especially in Düring’s (2006:23-24; 2011c:61) work the ‘clustered neighbourhood settlements’ are presented as a unique form of settlement and community organisation, inherently combining the clustering aspect (**#47**) with the sectoring aspect (**#49**). The second mechanism, and the one the title of this theme alludes to, is that dividing a large village community into sub-groups (as represented by the house sectors) facilitates the self-governance of a large group of people. House groups/ neighbourhoods here

function as the 'middle ground' that has already been discussed in Chapter 3.2 as an important integrating mechanism at the large Early Neolithic central Anatolian sites. Evidence for such a reconstruction is found first, in the fact that neighbourhoods constituted a visualisation of social groupings within the settlement and second, formed exclusive roofscapes. And third, possibly in the genesis of such neighbourhood clusters.

The visual division of neighbourhoods/ sectors would have been especially pronounced at the densely clustered central Anatolian site. Here, individual blocks of houses are divided from each other through streets, alleys and middens at Aşıklı Höyük (Düring 2011c:61, 68); alleys and 'courts' at Canhasan III (Düring 2006:123), and through alleys and middens (Düring 2011c:96), continuous lines of house walls ('radial divisions') as well as terraces (Hodder 2014d:153, Fig.10.1) at Çatalhöyük. At Erbaba and Canhasan I, excavated to a lesser extent, the nature of spatial subdivision is unclear (Düring 2006:257, 265). This spatial arrangement is seen as the expression of a social principle whereby individual households were socially and economically tied to a group of other households, but separated from others. "Thus the neighbourhood would have been a physical manifestation of a group" (Düring 2001:16), a visual display of who belonged to whom inside the village community (Düring 2006:247, 2011a:71; Gérard 2002:107; Hodder 2006:107; Yakar 2011b:174). At Aşıklı Höyük, this division might have been particularly strong, since Düring (2006:246, 301, 2007b:170, 173, 2011a:71, 2011c:117) suggested that access to the roofs and houses might have been controlled by a neighbourhood and the space inside the house cluster normally only used by members of the neighbourhood group. As houses at these clustered sites are reconstructed without doors or large windows, each house cluster would have been closed off towards the outside, featuring a gapless façade towards the alleys and middens. Each house cluster was accessible only by ladder onto the roofscape, making each sector indeed appear nearly fortress-like: "The outer boundaries of the neighbourhoods [at Aşıklı Höyük] were emphasised by the construction of an unbroken outer façade, which symbolised the integrity and unity of the neighbourhood" (Düring 2006:112).

The neighbourhood cluster would form a roofscape that worked as discussed above

in **Theme 9**—but now exclusively to the social group inhabiting house sector, which would thus become a most important sphere of social life if people spent a lot of time on the roofs within a separate house sector. On the roofscape, people would spend most of their daily lives within the neighbourhood community, and the functioning and cohesion of the neighbourhoods would have relied on regular face-to-face interaction on the roof that created collective identity and social control across household boundaries (Düring 2001:16, 2006:112, 231, 246, 303, 312, 2007b:169, 170, 2011c:117, 129; Stevanović 2012c:79-80). This daily contact would have been the foundation of the social and economic collaboration and sharing that is assumed to have existed in neighbourhoods (Marciniak 2008a:108; Steadman 2004:527).

A third argument for indicator **#49** consists in the hypothesis of the genesis of clustered settlements as a contraction of several small-village-sized groups as discussed in Chapter 3.2: In this scenario, each neighbourhoods group functioned similar to an independent village, only within a larger settlement. This principle is maybe best observed at Aşıklı Höyük 2, where the size, location and overall shape of neighbourhood clusters might have been planned, since they each form a regularly built outer façade made up from a ring of buildings which was later filled in, in a more haphazard way, with other structures (Düring 2011c:68). For one such neighbourhood, of which at least three have been excavated at Aşıklı Höyük Level 2, Düring (2006:Fig. 4.10, 2011c:68) estimates a population of 150 people, counting a core family (five persons) per individual house. This is closer to the typical size of known (earlier and contemporary) Neolithic settlements in the Mesopotamia and the Levant, which do not exceed 300 people (Düring 2011c:71). These neighbourhood groupings of up to 300 people would thus have formed an intermediate level of social cohesion inside the communities occupying central Anatolian Neolithic and Chalcolithic sites, of which at least some (Aşıklı Höyük, Çatalhöyük East and West, Canhasan I, Düring 2006:278; Düring 2011c:71, 118) were much larger than 300 people (3.2.2).

Düring (2006:301-302, 2007b:170, 2011c:117-118) supports this reconstruction with analogies to ethnographic studies of (pre-)modern Moroccan towns that

functioned by similar principles, and to anthropological work citing 150-250 people as the maximum number of a social grouping that can rely on regular face-to-face interaction as a cohesive principle. He further (Düring 2007b:175-176, 2011c:120) cites anthropological studies as well as investigations of Bronze Age and Iron Age sites and landscapes from the Near East and Europe to state that “large groups of people can be integrated in two ways: first, by developing social hierarchies; and, second, by subdividing society into more or less egalitarian sub-units of a restricted size, the delegates of which can then negotiate amongst one another on the basis of equality. The clustered neighbourhoods of Çatalhöyük might be considered as such units engaging in decision-making processes”. The ‘divide to unite’ principle (Düring 2011c:115) is presented here as one strategy to maintain egalitarianism. Hodder (2014b) paints a similar picture when describing Çatalhöyük as an egalitarian community divided into moieties, neighbourhoods and kin groups connected by cross-cutting ritual, social and economic ties. Although it might seem counterintuitive dividing the community into smaller units might eventually have helped maintaining overall community integration, where not every household fended for themselves.

Neighbourhoods: a survey of variety

The arguments for understanding the Çatalhöyük and Aşıklı Höyük house sectors (#49) within clustered village scapes (#47) as an expression of social groupings within the village community are convincing. There might however be more variety between sites as to the details of the sectoring principle, and more research bias in the archaeological reconstruction of neighbourhoods than the dominant narrative allows for. Given the importance for the study of Neolithic society ascribed in the research landscape to both #47 and #49, this deserves a debate.

A first observation is that an architectural analysis should compare and cross-reference the spatial subdivision of a settlement (#49) with other social bonds, indicated by the other architectural features discussed throughout Section 6.3. Recent work at Çatalhöyük East has, different from Aşıklı Höyük, shown many

overlapping and criss-crossing layers within the intermediate level of social integration, most importantly between ritual ties (**Theme 15**) and spatial divisions (#49). Düring (2006:229-234, 2011c:117) tried to identify Aşıklı-like neighbourhood clusters at Çatalhöyük, separated by open spaces (middens, alleys). Hodder (2006:101, 2014b:6, 8, Fig.4; Hodder and Farid 2014:29) mentions two additional means of spatial delineation at the site: The outer walls of adjacent buildings sometimes formed a continuous, long wall and thus a linear break in the house landscape ('radial lines;'), and in the later levels there is also evidence of terracing in the large excavation area at the south of the mound ('South'). A holistic analysis of the built environment by Hodder (2014b:8, Fig.6, 2014d:153) shows that the various spatial separations—terraces, middens, continuous walls—cut across each other instead of forming clearly delineated house clusters (Figure 5). Hodder (2014b:8) calls spatially delineated house clusters 'sectors', but questions whether these spatial separations were socially significant since they are not congruent with e.g. the distribution of symbols (#85) or of similar building materials (#56, #57): "we have found no distinctive traits restricted to individual sectors; indeed several of the local neighbourhood traits cut across the sectors" (Hodder 2014b:8). Nevertheless, it becomes obvious from the literature that Hodder (2013a:16, 2014d:153, 2016:2; Hodder and Farid 2014:33) and other members of the Çatalhöyük team (e.g. Love 2013a:92; Stevanović 2012c:79-80) still ascribe some social meaning to the spatial arrangements and separations despite the contrary evidence from mapping ritual ties. And indeed, it is likely that Çatalhöyük in its 'classic' levels was a social mosaic in which households belonged to different groups at the same time, some demarcated spatially, other ritually, and other even differently, as reconstructed by Hodder (2014d). It should, however, also be questioned whether the adhering to ascribing social meaning to spatial subdivisions of the Çatalhöyük house-landscape does not rather reflect adhering to research traditions even in spite of new and contradictory evidence. In any case, spatial closeness or distance, and visual separation of sectors, might only have been one ordering principle within the Çatalhöyük society, and possibly not the most important one.

Second, it is possible to detect research bias based on the location (region) and/or

chronological position of sites. For example, several researchers recognise a similar principle of ordering society into house clusters in the Lake District, but with important differences to both the spatial arrangement and its social interpretation, which is why two extra indicators were created (#50, and see below for #51). Schachner (1999:60, 163) and Steadman (2004:531, 533, 534, 536, 541) observed a system similar to the sectors of clustered sites (#49) at many Lake District sites where they discerned groups of houses clustering around a small unroofed space. The principles by which these 'courtyard clusters' (#50) are related with suprahousehold integration are very similar to that of the neighbourhoods in clustered settlements (#49); for example, the 'courtyards' of these house clusters seem to be envisaged as facilitating the same communal use and integrative socialising as the rooftops of clustered sites. However, the Lake District neighbourhoods seem to by trend be associated with biological kinship, whereby households from the same kin formed house clusters, different to the central Anatolian sites where neighbourhoods are conceptualised primarily as social groupings (but note some isolated suggestions for a biological component to spatial groupings at Çatalhöyük: Hodder 2005e:127; Yakar 2011b:140). Kinship-house clusters have been recognised at Bademağacı ENII3 (Cutting 2005b:129; Steadman 2004:533), Hacılar (Düring 2011c:164, 171; Redman 1978:203) and at Late Chalcolithic Kuruçay 6 (Düring 2011b:803, 2011c:228; Schachner 1999:60) at. In all these cases, the kinship ties are assumed from the village layout with no additional evidence e.g. from biodistance studies on skeletons. A degree of region-specific research bias might be detected in the idea that Lake District neighbourhoods represent biological kin.

In a related example, at least two sites exist in prehistoric southcentral Anatolia, both in Cappadocia, that are spatially subdivided through open spaces between house groups, but no research has yet associated these with social groupings and/or mechanisms of community integration. In Middle Chalcolithic Güvercinkayası, the 'lower settlement' consists of at least two house clusters separated by alleys; at contemporary Köşk Höyük Level 1, buildings are arranged in rows (Arbuckle 2012a:303; Düring 2011c:241-242; Gülçur and Firat 2005:Fig.1). It is

possible that nobody has yet ascribed social meaning to these patterns because they are not considered to be part of the Neolithic or Early Chalcolithic style of architectural expression; however, in the Lake District, socially connotated house clusters were identified by Düring, who clearly uses Neolithic sites as templates for this interpretation, at Late Chalcolithic Kuruçay (Düring 2011b:803, 2011c:228; also Schachner 1999:62) and EBA Bademağacı as well as two other EBA sites in western Turkey (Düring 2011c:283). While it is entirely possible that regional styles existed in prehistoric southcentral Anatolia, and spatial clustering/subdivision meant one thing in the Lake District, but another thing in Cappadocia, this pattern might just as well represent archaeological research bias and it should at least be considered as a possibility, and further investigated, whether the spatial arrangements at the Middle Chalcolithic sites in Cappadocia had any relations with social groupings.

Indicator **#51** refers to a suggestion by Schoop (2005b:49), who proposed a yet different spatial and social subdivision system in the Lake District: “In several instances, the fortunate coincidence of horizontal excavation and well preserved remains has revealed lines of parallel houses facing one another across open squares of various size. Such examples are known from Hacilar II A/B and Bademağacı in the Lake District, Ulucak Höyük in the Aegean Region, and Ilıpınar VI in the Marmara Region. This brings to mind the social organization known in the ethnographic record as the ‘moiety system,’ in which a community views itself as consisting of two competitive halves. I do not wish to elaborate on this, for at the present state of investigation it would only be grasping at straws.” An important difference between **#51** as compared to **#49** or **#50** is that Schoop emphasises competition as an important principle of the moiety system, but competition is not seen as a strong factor in the neighbourhood system as discussed above. As pointed out by Schoop himself, the house rows/moiety system is borrowed from western Anatolian sites, but the more recently shown probable existence of moieties at Çatalhöyük renders further credibility to the at least potential existence of such a principle in southcentral Anatolia. At Çatalhöyük East, the two-coned mound is reconstructed as the existence of two communities who might have exchanged women on marriage, as more recently confirmed by biodistance studies (Hodder

2005e:127, 2012c:247, 2013b:25, 2014d:163; Rosenstock 2014:237). Since the Çatalhöyük moieties have not been identified through architectural evidence (but rather through dental morphology and mound relief), they do not appear on my coding list. But it seems entirely possible that moiety systems existed at Neolithic and Chalcolithic southcentral Anatolian sites and were also expressed in architecturally evidenced spatial arrangements.

In conclusion, overall the spatial subdivision of settlements, reflecting a social subdivision of the village community facilitating its overall cohesion, can be recognised as an important principle at Neolithic and Chalcolithic southcentral Anatolian sites, and all indicators of **Theme 10 (#49, #50, #51)** are accepted here as potentially representing different varieties of this principle. There is however, noticeable regional and possibly chronological research bias in the ways the spatial arrangement of various sites have been understood in previous research. Further, newer results on criss-crossing social groupings at Çatalhöyük that spatial subdivision is ideally cross-referenced with other indicators of social cooperation (e.g. sharing mudbrick recipes and idiosyncrasies, **Theme 11**) for an accurate impression of intermediate social groupings.

6.3.3 Theme 11: Building the House Together

Theme 2 has discussed the mechanisms by which building houses together supports the integration of the individuals and groups that participate in this process: house construction represents an opportunity for socialising, bonding and knowledge exchange. **Theme 11** collects indicators that identify that the 'building group' encompassed more than one household. If it can be shown that a substantial number of people, across household boundaries, participated in the various stages of house building, then this construction process would be a stronger fosterer of cross-household ties. The indicators in this theme can be further subcategorised into three groups: indicators taken to show that two or more houses were built at the same time (**#52-#55**); that knowledge and/or materials were shared (**#56-#59**); and indicators that are supposed to prove that the labour of house construction

was too much for one individual household (#60-#63).

Building at the same time

In the first group, indicator #52 collects text passages relating contemporary construction to suprahousehold ties without stating what physical evidence was found to prove the contemporaneity of construction. That two or more neighbouring houses were at the same time is generally associated with planning and cooperation across household boundaries during construction (Cutting 2005b:82; Hodder 2007:27; Stevanović 2012c:79). It is also evidence that two neighbouring houses were actually inhabited contemporarily, something that cannot otherwise be assumed with certainty in poorly radiocarbon-dated tell sites; and Stevanović (2012c:78) equated contemporary construction and coexistence of neighbouring households as a sign for social relations. While the latter (contemporaneous construction meaning continued relations of the associated households after construction) should better be cross-checked with other indicators of socioeconomic cooperation, such as the ones collected in **Theme 13**, the former seems plausible: if houses located directly next to each other were built at the same time, it is difficult to imagine this happening without at least the occasional and informal exchange of knowledge, services, tools or materials happening between groups, even if each house was built by a separate group of people. Further, time spent building together or next to each other would have created a platform for the informal socialising that has already been mentioned several times (e.g. **Theme 2**, or the roofscapes in **Theme 9**) as an important cohesive mechanism at prehistoric southcentral Anatolian sites (indicators #56-#63).

As physical evidence for contemporaneous house construction are mentioned: shared outer walls (#54), and shared foundations (#53). The sharing of foundation rafts between two buildings were observed in a few cases at Çatalhöyük East, where Hodder (2007:27, 2014d:162; Hodder and Farid 2014:29; Stevanović 2012c:79) interprets this as evidence that “the household in the Anatolian Neolithic was not an independent and self-sufficient unit, but rather was part of a larger social association that inhabited clustered neighborhoods”. It theoretically possible

that the shared foundation does not necessarily mean contemporaneous construction; in that case, however, we would need to imagine that upon the construction of the first house, the construction of a second one was already planned and anticipated, which would also indicate some kind of long-term social relation between the two residence groups.

Shared outer house walls (**#54**) are similarly seen as evidence for contemporaneous construction of two or more houses and further of suprahousehold planning, cooperation and identity (Cutting 2005b:103, 130, 132, 135; Farid 2007:53; Hodder 2007:27; Matthews 2005a:133; Schachner 1999:112 for LC Beycesultan and EBA Demircihöyük, also Korfmann 1983; Stevanović 2012c:79). It must be stated here that shared outer walls indicate contemporary construction with certainty only if the walls are bonded. But wall-sharing would also have had integrating implications if one house was built using a wall of an already existing neighbouring building: Sharing walls means that households invested labour and materials into an object (the wall) that would be shared with another household group (Cutting 2005a:132); this can be seen as a physical demonstration of resource sharing across household borders (Hodder 2006:86, 2013b:25). And finally, could also be argued that wall-sharing hindered the various mechanisms discussed in **Theme 2** for the connection of not sharing walls (**#12**) and household independence. For example, two household groups who shared a wall needed to negotiate and possibly cooperate whenever the wall required maintenance or modification. **#53** and **#54** are therefore accepted as indicators.

Indicator **#55** consists in a statement by Hodder who mentioned the contemporary destruction of two buildings at Çatalhöyük in the context of relations between households: “B.52 was placed over two earlier buildings. The fact that they were demolished as a pair and rebuilt as one building suggests some degree of neighborly relationship between them” (Hodder 2014d:162; Hodder and Farid 2014:29). While this indicator is strictly speaking not about house construction—although generally at Çatalhöyük the dismantling of one building was in a majority of cases directly followed by the construction of a new structure, and the two activities kind of blur into each other (Russell et al. 2014)—indicator **#55** fits best into this theme. I would

object, however, that contemporary destruction alone is not strong enough a reason to claim a relationship between the resident households prior to destruction unless such a relationship can also be proven using other indicators, such as the ones collected here with Theme **13** or **15**.

Sharing materials and idiosyncrasies

A variety of researchers associate similarities in building materials (**#57**) or construction techniques (**#56**) with communal sharing. As with the related **Theme 2**, the only systematic studies of this principle were done at Çatalhöyük East (Love 2013a; Tung 2013), but Cutting (2005b:95, 130) applies the same thought also to Bademağacı and Hacılar. At Çatalhöyük, there are complex patterns of contemporary houses sharing or not sharing similar building materials and techniques, which are interpreted as displaying social differences and alliances (Hodder and Farid 2014:18). However, the details of the social mechanisms behind sharing building materials have not been articulated as clearly in the literature as those behind stating household identity through using unique mudbrick recipes and wood types (**Theme 2**). Generally, the use of similar materials and techniques is equated with the sharing of knowledge, material sources, labour and resources across household boundaries (Hodder 2013a:16, 23; Love 2013a:90, 93, 2013c:270; Tung 2013:67, 78), and/or with the existence of community-wide rules or traditions of building (Cutting 2005b:95; Love 2013a:90, 93; Stevanović 2013:112). Further, the use of the same materials have been mentioned as additional evidence for the contemporary construction of buildings (Cutting 2005b:130; Hodder 2013a:16; Love 2013a:93). Building on the mechanisms discussed above with **Theme 2**, we could tentatively suggest that similar materials/techniques found in different houses also indicate: the community-wide sharing of socialising time and meaningful experiences spent together, and a visible demonstration of suprahousehold ties to all who saw bricks, wood and walls during the construction process. The text passages collected for indicators **#56/#57** often refer to examples of contemporary houses located in close vicinity, but also examples where contemporary houses built

similarly were dispersed across the village landscape (synchronously); or where buildings rebuilt the same spot across subsequent building levels had similar materials (diachronically). The cross-household integration can therefore work also between non-contemporary households.

Markers **#56** and **#57** are accepted here as indicators of suprahousehold ties. It must however be cautioned that the individual opinion of each researcher influences what exactly, and how strongly, is interpreted as ‘similar’ or ‘different’. In the Çatalhöyük example, Tung (2013) and Love (2013a, 2013c) clearly apply different standards when judging ‘similarity’ and ‘difference’; for example, Tung (2013:67, 75, 80)—although noting (Tung 2013:76, 78) the same house-specific mortar and mudbrick recipes as Love (2012, 2013a)—sees the (diachronically and synchronically) shared use of similar clays for pisé⁸ construction, similar plaster (also Stevanović 2013:112) and similar make-up⁹ materials as indicators for the existence of communal building traditions at the site, while Love (2012, 2013a, 2013c) ascribes greater importance to the fact that more often than not houses did not use the same mudbrick materials. I suggest that an architecture researcher might be better off over- rather than underemphasizing architectural differences over similarities: Love (2012:140-141, 2013b:747, 2013c:264-265) makes a strong argument for the fact that the individual builder or building group has a lot of agency while sourcing and mixing materials, their choice of different materials is therefore socially meaningful; and newer architecture research in the study region has started ascribing greater social meaning to even slight differences in the physical appearance of seemingly similar buildings (e.g. **Theme 2, #38**).

Hodder and Farid (2014:18) have suggested interpreting the use of multiple different brick/mortar types within the same house as a possible indication for collaboration between different groups (**#58**): “The walls of B.101 had been built using three types of brick and mortar in groups of courses up the wall (see Chapter 30). This either suggests groups of people collaborating and taking their turn to

⁸ Pisé is a building technique by which wet clay is rammed between boards to construct a wall (Düring 2006:58).

⁹ ‘Make-up’ is a Çatalhöyük Research Project-specific term used for the fine sediment applied the builders before plastering a floor or other feature (see e.g. Hodder and Farid 2014:18).

contribute to the walls, or people running out of one source and changing to another.” The ‘contribution’ here could represent knowledge, recipes and/or materials. However, this interpretation seems to be only one among several possible—others being the use of different sources as pointed out by Hodder and Farid, or possibly structural benefits or repair—and cannot unequivocally indicate the collaboration of different household groups during construction. Indicator **#58** will therefore not be included on my indicator list.

And finally, at Çatalhöyük the sharing of similar idiosyncratic details of house furnishing or symbolic house elaboration between a group of neighbouring or successive houses (**#59**) is taken by Hodder (e.g. 2014b:6, 2014d:162, 2014e:181) to signify social ties between the different household groups; here however on a somewhat smaller level involving a few house groups: “We increasingly recognize that there are similarities between local groups of buildings. These local neighborhoods are distinguished by distinctive and idiosyncratic practices. For example, two pot emplacements were found in the floor just east of the ladder in B.42. The location of these emplacements recalls those near the ladder in the B.65-B.56-B.44-B.10 sequence (see above) which is nearby” (Hodder and Farid 2014:27). Among the many examples for this principle cited by Hodder throughout the sources are unusual oven shapes or pillars (Hodder 2014d:162), walls around platforms (Hodder and Farid 2014:27), the placement of a groundstone fragment in an abandoned hearth or the occurrence of rare wolf bones throughout a house sequence (Hodder 2014e:181) and other features that were not part of the relatively standardised set of furnishing in a Çatalhöyük house. And indeed, the social importance generally ascribed to the internal furnishing and imagery in Çatalhöyük houses (**Themes 3, 15**), to small details of the house configuration (**Theme 2**) as well as to abandonment practices (**Theme 4**), makes it seem likely that such shared idiosyncrasies carried social meaning. Hodder does not detail the mechanisms he envisages for how shared idiosyncrasies worked to create ties between households, but drawing on the material already collected in this chapter, it could be suggested to connect indicator **#59** with shared memory practices, shared symbolism (see **Theme 15**) or simply shared preferences for furnishing the

social and economic spaces inside the house which also would have visibly associated the two (or more) household groups to all who came to see the unusual features.

Sharing construction work

The final subgroup in **Theme 11** collects indicators stated in the literature as evidence that house construction involved so much work that it probably was shared between households. Indicator **#60** collected text passages that simply stated that construction required effort likely to be shared among the community, such as: “The effort required to build the structures [of Canhasan I], together with the likelihood that buildings were constructed together indicates considerable communal planned effort” (Cutting 2005b:82). While Cutting, the source of most statements for this indicator, does not explicitly state how she came to see that some of the sites and occupation levels in her study required communal building effort (and others seemingly not), she generally mentions it in combination with evidence that several houses were constructed at the same time—thus suggesting a scenario whereby a number of households in collaboration built a small neighbourhood. She also seems to mention indicator **#83** only in relation to occupation levels or sites that have been excavated on a large scale and feature what is occasionally referred to as ‘substantial’ architecture (thick walls or roofs, e.g. Cutting 2005b:54, 74, 80, 81), thus revealing research bias since there is no reason to believe that building thin walls was not also a lot of work. While the contemporary construction of several adjacent buildings very likely represents the cooperation of a number of households as already discussed with indicators **#52-#53**, the ‘substantialness’ of architecture can thus not be seen as a clear indicator of suprahousehold efforts. Both Cutting (2005b:130, 132) and Stevanović mention the time investment required for house construction as an argument for suprahousehold coordination; for example, Stevanović (2012a:202) states that house construction likely would have been restricted to the warm and dry parts of the year, thus putting a degree of time pressure on the process which including the

preparation of materials would have taken several months even if done by a larger group of people.

Indicator **#61** refers to Stevanović's (2012a:201-202) hypothesis that the sheer quantities of heavy clay needed to build a Çatalhöyük house indicate collaboration across household boundaries: "During the course of house construction, massive quantities of building materials were needed and it is feasible that communal effort was required for the extraction of clays and timber. For example, procuring hundreds of pieces of wood for roof construction, some of which were massive tree trunks, as well as moving hundreds of kilos of construction clay would have required the engagement of a large group of people. As such, it is likely that roof construction would have been an undertaking not just for house occupants but for a larger group of households" (Stevanović 2013:112). Russell et al. (2014:119) make a similar statement about the dismantling of buildings, which most likely was done as part of the construction process.

Indicator **#61** links into two more indicators: the notion that the use of large pieces of wood in the house (**#62**) or the application of thick internal plastering (**#63**) at Çatalhöyük indicate cross-household collaboration. For the wood argument (**#85**), Stevanović builds on Asouti's work who suggested "that timber used in construction had to be transported to the settlement from some distance upstream. She [Asouti 2005b] suggested that special woodcutting trips would have been arranged at the beginning of spring" (Stevanović 2012a:201). And the weight of the wood required for a single house—mostly in roof construction, including roof beams and pillars to support the roof—makes it likely that such trips included a larger number of people (Stevanović 2013:112, cited above). This example is for Çatalhöyük, but could also apply to other sites in the study area if it is shown that wood sources were at a certain distance from the site. The image painted here by Stevanović is that of a larger group of people setting out for a number of days to fell and transport trees, which would certainly have made wood procurement an event of a nearly festive nature with an abundance of opportunities for socialising and bonding across household borders. This assumption rests on the conclusion that all or most wood needed for the house was procured at the same time. It is, however, also possible

to imagine that since houses were often used for fairly long periods of time at Neolithic/ Chalcolithic sites in the study area¹⁰, house construction was not a frequent occurrence and might have been prepared at leisure over a longer period of time. Wood could have been collected opportunistically over a number of years in smaller-scale operations. This does of course not exclude the possibility of cross-household help for wood transportation, but at the whole, wood procurement might not have been such a large scale, planned and possibly festive event as the procurement trips envisaged by Asouti and Stevanović. Further, at sites where it can be shown that houses were partially dismantled upon abandonment, and wood reused, the procurement of new wood might not have been a regular necessity; and if it happened only seldom, its impact on the social fabric might have been minor. At Çatalhöyük itself, there is good evidence at the site for the regular reuse of the large posts of which each house had one or two (Russell et al. 2014:110; Stevanović 2012a:202) and given this evidence, it does not seem unlikely that also roofing wood was reused after the upper two-thirds of the house had been carefully dismantled—although that is impossible to prove precisely because of the dismantling; post removal on the other hand is clearly visible through the ‘scars’ left in the plaster (Hodder and Farid 2014:17). As already mentioned in Chapter 2, also outside of Çatalhöyük reuse of architectural wood, exactly because wood was so difficult to procure, seems to have been a regular feature in southcentral Anatolian prehistory, and has been proven through the ‘old wood’ effect in radiocarbon dates at Hacilar (Mellaart 1970c:93; Thissen 2002a:333), Kuruçay and Höyücek (Thissen 2010:274-275). These observations serve to assert that the existence of large amounts and/or large pieces of wood in a house cannot be seen as unequivocal evidence for (regular) suprahousehold cooperation.

The notions underlying indicators **#60-#63** seem to a large degree be based on Stevanović’s (2012b) experience with experimentally reconstructing a Çatalhöyük house, for example: “In the process of re-creating a Neolithic Çatalhöyük house

¹⁰ For Çatalhöyük, typical durations of house occupation between 70 and 185 years are reported, e.g. (Bayliss et al. 2014:86; Cessford and Near 2005:175); house durations are not to this degree radiocarbon-dated at other sites, but Chapter 2 documents that excavators routinely reconstruct durations well over 100 years for the use of building levels.

(Chapter 22), it became apparent that plastering the interior wall and floor surfaces was a task that required a group effort or an unreasonably long time if done by an individual” (Stevanović 2012ba:202). Here one should caution that the definition of what a reasonable time for plastering is might have been different in the Neolithic, and that Neolithic builders—who might have replastered houses at least once a year, maybe more often (Matthews 2005a:137)—might also have been more versed, and faster, in applying plaster than archaeologists who do not build mudbrick houses on a regular basis.

To conclude the discussion of indicators **#60-#63**, these are here not accepted as indicators of suprahousehold cooperation because the arguments behind them cannot be verified against other lines of archaeological evidence, and instead seem to rely largely on modern notions of the efforts of house construction. Even if they were accepted, they would probably not prove to be useful indicators to measure temporal or regional pattern in the household-community balance in prehistoric Anatolia: **#60-#63** seem to apply to most Neolithic and Chalcolithic buildings in southcentral Anatolia: nearly all settlements were built from heavy materials such as earth or stone, many rooms would have been plastered, and many houses were sizable enough to need large roof beams. The existence of sizeable stone or earthen structures does then by the logic underlying **#60-#63** only prove that some degree of communal integration existed within all villages, which could also be assumed from the mere fact that these people chose to live in a village in the first place.

As a general remark on house construction that is related to but also independent from **Theme 11**, it shall be stated that most probably house construction at Neolithic/ Chalcolithic Anatolian sites could never have been an entirely independent event that only involved a single household; even if this is not explicitly evidenced by the indicators of **Theme 11**. Within the clustered or at least dense settlements characteristic to the study area, the construction of a new house might always have at least impacted neighbouring structures and household, even if these did not participate directly in construction. As already stated when discussing Theme 2, the transport, dirt and noise involved in house building would have necessitated negotiation with neighbours, and in spatially dense settlements a new

house would have changed the local social as well as physical village fabric significantly and impacted the lives of a number of people: “Whether or not neighbours were physically involved in house building, they would have witnessed and experienced the process in the public sphere” (Love 2013a:276). All house construction in Neolithic/EC villages thus was always at least to some degree an experience shared between different households. Indeed, the process could easily have incorporated both community-making and household identity-making features: For example, Tung (2013:78-80) reconstructs house construction at Çatalhöyük as showing both household-specific traits as well as community-wide shared rules and knowledge, such as the shared unlimited use of common clay resources and the use of similar mortar recipes.

6.3.4 Theme 12: House Standardisation

The standardisation of house layouts as an indicator for communal ties (**#64**) was separated from **Theme 11** because some of the arguments brought forward for this indicator refer to house construction, but not all of them. Three different arguments can be distinguished. First, several scholars have associated the uniformity of house layouts, meaning the shape, sometimes size, and internal structuring of houses, with communal planning which fostered communal cohesion (Cutting 2005b:130; French 1998:68). In a related argument, house standardisation within one occupation layer of a site, or also diachronically within the mound sequence, was referred to community-wide shared rules, taboos, conventions or traditions around building and furnishing which displayed and reinforced communal identities (Cutting 2005a:95, 127, 135; Hodder 2005d:16, 2006:56, 144; Matthews 2005b:396; Stevanović 2012c:67).

Building on the idea of shared rules, a third argument has been made specifically for Çatalhöyük East that standardised house interiors were an important tool in the socialisation of new community members, for example children, into the overall social system and cosmology of the community—working also as a kind of continued socialisation throughout the lives of individuals, whereby community

rules and traditions, and communal identity, were constantly reinstated and reinforced. The individual house is here seen as a microcosm embodying a set of principles central to Çatalhöyük community organisation (Düring 2006:215, 245; Hodder 2005c:184, 191, 2006:128-129, 135-137, 227, 2007:30-32; Stevanović 2012c:67. In this argument, the mechanisms by which house standardisation produces communal identity can be found firstly, in the creation of ancestry, memory and continuity (Hodder 2014e:181; Hodder and Farid 2014:25-26) which were important cohesive mechanisms at Çatalhöyük (**Theme 15**); but, secondly, also and especially in the way the house coerced people into daily repetitive behaviour. This principle has been most thoroughly argued by Hodder and Cessford (2004), who connect repetitive house layouts with the subtle embedding of community social rules into seemingly mundane daily practices and bodily routines. This included a regulation of movement through the house, rules concerning which kinds of activities could be done in what parts of the house, and possibly also regulating who was able to sit or sleep where in the house: Çatalhöyük living rooms were typically structured (Figure 23) into a 'clean' northern part and a 'dirty' southern area with hearth, oven, access to the side/storage room, and microdebris attesting more production activities (Düring and Marciniak 2005:177, Hodder and Cessford 2004:2-27). Among the house-related repetitive routines socialising people into the community is also the regular replastering of interior surfaces (Hodder 2005b:11; Hodder and Cessford 2004:22). That replastering and standardised house layout might also have had more functional reasons or advantages does not essentially contradict a function of these features for suprahousehold integration (Düring 2006:215).

In sum, the arguments brought forward for connecting synchronically and/or diachronically standardised house layouts (**#64**) with community-wide shared practices and traditions are convincing even if the function of the house as a socialisation tool might be specific to Çatalhöyük; or at least the existence of a similar mechanism would need to be investigated at other sites in a wider framework with more evidence. Within the socialisation argument, there however also seems to be a degree of ambiguity as to the status of house standardisation

within the household-community balance that can also be felt in Hodder and Cessford's (2004) discussion: If the house was such an important locus of socialisation, does that not also empower the household? The rules embodied in the standardised house layout might be mandated by the community, but the individual house(hold) is chosen as the locus for the transmission of these rules, not a community building.

figure has been removed due to copyright restrictions

Figure 22 The typical layout of an Early Neolithic house at Çatalhöyük (Düring 2006:Fig.6.13).

6.3.5 Theme 13: Sharing Social and Economic Space

Theme 13 is structured into two groups of related indicators that differ in the scale of suprahousehold integration they refer to: Indicators **#65-#68** describe cooperation between a smaller group of neighbouring houses, while **#69-#77** can either refer to a similar neighbourhood scale as **#65-#68**, but also to a larger scale encompassing an entire village community. Further, this second group of indicators (**#69-#77**) is closely related to **Theme 1**, which introduced what features a Neolithic/ Chalcolithic Anatolian house needed to possess to make its household economically

and socially self-sufficient; the same features return in the discussion of **#69-#77** as evidence for suprahousehold social and economic cooperation.

Neighbourly sharing of space

Indicator **#65** refers to interpretations made by Düring (2006:214, 245, 297, 2011c:98) about a small number of houses from different occupation levels at Çatalhöyük East where one building, its borders indicated by walls, contained two ‘living rooms’—Düring’s term for the typical main room in a Çatalhöyük house which contained a hearth, oven, platforms and sometimes other features. Düring understands this as two somewhat independent household sharing one building and thus choosing to live in closer socioeconomic relation. Düring (2006:214) interprets this in terms of kinship relations, saying “The most plausible interpretation of these multiple living room units, to my mind, is that they were used by close kin, for instance the families of two siblings”—but it would be equally possible to suggest non-biological kin relation for this example. Cutting (2005b:130) relates a similar example from Hacilar II. This interpretation of close socioeconomic cooperation between two households indicated by the deliberate choice of living in the same building in a “ ‘close but separate’ ” (Düring 2006:214) manner is convincing—if it can actually be shown in the archaeological record that the shared building was indeed inhabited by two households, but conceptualised by its inhabitants as one building, for example through shared entrance, shared storage (**#72**) or connecting doors (**#66**) as in some of the examples of ‘twin buildings’ documented by Düring.

A related opinion is that independent houses/households connected by doors closely cooperated during daily life and shared a common identity (**#66**; Düring 2006:245; Hodder 2005d:15, 2007:27, 2013b:25, 2014d:162). Stevanović (2012c:80) suggests for the example of B.3 at Çatalhöyük and neighbouring structures, that such sharing might have become necessitated periodically through the occurrence of events that made one house unusable, such as replastering or burial. The reasons why researchers associate connecting doors with suprahousehold ties remain

inexplicit, but it seems clear that such doors are envisaged as being unpoliced shortcuts by which residents from one house could access the other on an informal and regular basis. If we were to reconstruct such a usage mode, the direct entrance to another residence does indeed suggest an element of social control and informal socialising that would have connected households intimately; and given that such doors are not the norm at any site discussed here, there would have been particular reasons for the installation of a connecting door, making it a meaningful architectural feature. However, it is also possible to imagine that the door was not open to daily, informal traffic—in what case it might not have had much influence on the daily life and mutual relation of residents.

For both indicators **#65** and **#66** I thus see the challenge in archaeologically proving that a structure containing several rooms with interconnected doors did indeed contain two (or more) households who cooperated daily; and not, for example, a large multiroomed building with several different activity areas used by the same household, or two separate houses connected through a not much used door that had little influence on social relations. The fact that many of the examples cited by Hodder and Stevanović are from the top of the Çatalhöyük East Mound, where also multiroomed buildings (**#42**) were found that are instead interpreted as evidence for household autonomy in a post-6500 BC world make this seem at least possible.

Indicators **#67** and **#68** refer to the sharing not of internal space like **#65/ #66**, but rather of parts of the house fabric. Hodder (2014b:6-7, 2014d:162) names one example from Çatalhöyük East where two buildings shared a retaining wall (**#76**) that protected their house walls from the adjacent midden, and connects this within social cooperation between a group of adjacent households. We can here refer back to some aspects of the discussion of indicator **#54**, shared house walls: a common construction project means that two households invested time and resources into shared property, that they communicated over the erection and maintenance of the wall, and possibly that they built together. Shared retaining walls **#67**, or more generally outdoor wall features shared between a small number of houses, are therefore included as indicators. And finally, Düring (2011c:164) has suggested reconstructing cooperation between households at Hacilar VI based on

mutual roof support since some buildings had wattle-and-daub walls (#68): “complete house interiors with wattle-and-daub exterior walls have been found, using the more solid walls of neighbouring structures for roof support. This suggests that within spatially defined house clusters, mutual accommodation was the norm. It is likely that these house clusters were occupied by kin groups”. Apart from the fact that it would require further evidence to rule out that the wattle-and-daub walls were able to carry their own roofs (for example, Mellaart 1970c:19 sees “stout posts” carrying the roof of the structures in question), the evidence discussed with indicator #47 (clustering) suggests that in these dense living conditions neighbours must already have coordinated roof construction to a degree in order to ensure that water could drain off the roofs and not cause puddles that would have impaired house stability by making roofs heavy and instable (Stevanović 2013). These two observations question whether wattle-and-daub walls really had the household-connecting importance Düring ascribes to them; #68 is therefore not included as an indicator.

The incomplete or ‘overcomplete’ house

Theme 1 documented that to reconstruct a village community made up from baseline-autonomous households, each house needed to possess a certain range of internal features (‘the complete house’), and that these features also needed to be present in roughly equal amounts/sizes in all contemporary houses within a village (referred to here as ‘symmetry’). Similarly, **Theme 13** sees a lack of such features (‘incomplete houses’, #69, #72, #73, #76), or asymmetry in their distribution (#75, #77), as evidence that a house(hold) was not fully self-sufficient but must have relied on other households to fulfil important daily tasks. An interesting aspect of research documented in **Theme 13** is that in archaeology’s perception, suprahousehold sharing can be indicated by both a ‘too much’ (#71, #76) of the architectural features recorded in **Theme 1**—hearth, storage, house size—as well as a ‘too little’ (#70, #77).

Indicator #69 collects a few text passages from Steadman (2004:531, 537, 539, 546,

547) who discusses the concept of ‘incomplete houses’ in Neolithic/Early Chalcolithic southcentral Anatolia that Steadman interprets as the ‘incomplete’ house being used by a household that relied on others—possibly related by kinship—for some of their daily needs. #69 was separated from the following indicators #70-#77 because Steadman does not always clearly state what led her to interpret houses as incomplete; #70-#77 represent more concrete criteria.

Indicators #70 and #71 refer to the size of the house. As mentioned when discussing indicator #3, several scholars share the opinion that a house needs a certain minimal size to be fully functional, and with indicator #70 a number of cases have been documented where researchers believed houses too small to house an independent household. A much cited example in this discussion is Aşıklı Höyük, already discussed at length in Theme 1, where many seemingly independent buildings (with their own sets of walls) are very small, which is seen as strong evidence that Aşıklı households were dependant on each other to the degree where they might not even meet the minimal requirements to make a ‘real’ Neolithic central Anatolian household (Düring and Marciniak 2005:174). And although these are not directly related to this discussion of suprahousehold integration, the size criterion for a ‘real’ house also seems to underlie other aspects of architectural reconstruction in the study area, e.g. when Düring (2011c:134, 136, 171) states that the small and “featureless” (thus referring also to e.g. indicator #72) buildings at Çatalhöyük West, Canhasan, Hacilar and Erbaba must have had a second storey to be ‘complete’ houses—and possibly also at Tepecik and Musular (Düring 2011c:150). By contrast, there is also a feeling that there is something like too much space for a single nuclear household (#71), and Düring (2011b:800) connects the large buildings of Middle Chalcolithic Canhasan 1 with a possible use by multiple households (similarly Düring 2007b:163 about large buildings at Çatalhöyük). A related notion can be detected in cases where archaeologists perceive that a large Neolithic or Chalcolithic building cannot have functioned as a normal household residence, and instead interpret it as the residence of an elite group (e.g. Kosk Hoyuk: Arbuckle 2012a:303-304; Düring 2011c:243-244) and therefore also suprahousehold relations, albeit in a hierarchical context.

As already concluded for marker **#3**, house size is not a reliable indicator of household autonomy, since archaeologists cannot be sure about issues such as personal privacy preferences that determine the space requirements of individuals and groups, as well as household size, a generally unknown variable for Neolithic and Chalcolithic sites. From examples (e.g. Düring 2006:112-113 and references therein) where researchers have discussed household size it becomes clear that archaeologists seem to expect a size of at least 4-5 for a normal Neolithic/Chalcolithic household, but there is no evidence to exclude the possibility that some might have been smaller, and consisted only of 1 or 2 people. A hint of unconscious ethnographic analogy might be found in the expectation that in a pre-modern society like those researched here, individuals would have chosen to live with their kin instead of alone, but this cannot simply be assumed. Similarly, some households might have been very large, if a large number of individuals chose to live together for whatever reason (biological kinship or other), and needed a large residence. House size (**#70, #71**) is therefore also discounted as an indicator of suprahousehold cooperation.

Indicator **#72** is the notion that a house(hold) without a hearth cannot function socially and economically independently, a notion shared by a number of researchers. Three somewhat different examples are cited in this context: First, the already discussed small rooms of Aşıklı Höyük, of which only about half have a hearth which is seen by many Düring (Düring 2006:92, 296, 2011c:64; Schachner 1999:46; Steadman 2004:546) as additional support for the reconstruction outlined above of several households working on close daily cooperation. Second, Cutting (2005b:103) points out that in Hacilar Ia “the only two ovens found were both outside, suggesting some form of communal cooking”. And third, a group of neighbouring buildings (B.3 and adjacent buildings) was excavated at the top of the East Mound at Çatalhöyük whose internal furnishing changed several times over the duration of their use lives, and in some phases some houses lacked oven, hearth and/or storage facilities. Stevanović (2012c:79) reconstructs a usage mode whereby a few households would share cooking facilities periodically (also Hodder 2013b:2, 25; Hodder 2014c:17; and see Hodder and Farid 2014:29 with a few more similar

examples from the top of the East Mound). Despite some issues with these examples—for instance, it must be pointed out that a number of Hacilar Ia houses had hearths (Mellaart 1970c:Fig.29) and it would need require further investigation of food consumption patterns to confirm that they also needed ovens to function self-sufficiently—for reasons already discussed with **Theme 1**, I agree that ownership of fire installations for cooking is an essential feature to allow for economic and social independence on a basic level, and household residences without cooking installations cannot be completely independent. I would however caution that oven or hearth could be located in household-owned unroofed spaces, such as the house roof (Çatalhöyük: Düring 2011c:117), or fenced courtyards (Hacilar VI: Mellaart 1970c:15), therefore the non-existence of installations inside the house should be further contextualised.

Indicators **#73-#77** deal with storage space. Storage has already been discussed with **Theme 1**, where it was shown that to reliably reconstruct storage capacity and the food requirements of a household or larger group is archaeologically very challenging; these issues also apply here. Indicator **#73** collects a number of statements by Hodder (2013a:6, 2014c:6) associating the fact that at Aşıklı Höyük there is very little evidence of storage facilities in houses with collective and communal identity. The implication here seems to be that if food was not stored within individual houses, it must have been stored in facilities shared by several households. Other researchers as well understand the scarcity of in-house storage facilities at Aşıklı Level 2—only a minority of rooms had a bin or basin—as a sign for cross-household social and economic sharing: Düring (2006:92) interprets the absence of storage and also the general lack of other productive installations in Aşıklı houses, such as grinding stones, as evidence that much economic activity occurred in the open midden spaces and relates this to a strong communal identity at the site (see also the discussion of middens, **#80**). Steadman (2004:537) suggests two options by saying “The absence of numerous permanent storage areas (bins, etc.) is curious, but storage may have been in baskets or other receptacles not preserved in the archaeological record; alternatively, large silos may be located in unexcavated areas of the site”. Cutting (2005b:45, 46; similarly Steadman

2000b:184) sees evidence for the existence of a large separate storage building that was used collectively. This building will be discussed further with **#91** in **Theme 16**. Here I would like to point out that without the clear proof of a collective storage building, and even then, the mere absence of visible storage inside houses cannot be taken as unequivocal proof for the total absence of household-maintained storage since containers might have been made from perishable materials as rightly pointed out by Steadman. Further, especially at Aşıklı Höyük, where Düring (2011c:64) and Steadman (2004:546) reconstruct that a household or kin group used a number of dispersed rooms, it is possible that some of the very small rooms were used for storage and/or food processing; micromorphological analysis of the floors could clarify this possibility. Therefore, while I agree that collective storage in a shared facility (**#91**) does imply communal ties, such storage needs to be evidenced directly by finding such a facility, and not indirectly by not finding in-house storage.

While **#73** refers to a larger scale of communal storage, indicators **#74-#77** were mentioned as evidence for the sharing of resources in a medium-sized group within the community, such as neighbourhood or larger kin group. Düring (2006:214) sees the fact that some of the already mentioned ‘twin buildings’ (**#65**) at Çatalhöyük shared storage space (**#74**) as further evidence for their close social and economic cooperation. Related are cases where Steadman (2004:531-534) reconstructs groups of houses at Kuruçay, Hacılar and Bademağacı as together forming a ‘complete’ house used by a kin group, which included shared storage space. In the also already mentioned case of B.3 and its neighbours, Stevanović (2012c:79) and Hodder and Farid understand the lack of storage facilities in some houses (**#75**) as evidence for neighbourly sharing: “In some phases of occupation of B.3, storage bins and basins did not exist, suggesting that the house was closely linked to other houses” (Hodder and Farid 2014:29).

And finally, indicators **#76** and **#77** refer to the amount of storage capacity, with both rather small and rather large storage capacities being interpreted in terms of communal ties. While there is general agreement that the house(hold)-owned storage rooms and bins at Early Neolithic Çatalhöyük can be interpreted as evidence

for a baseline household autonomy (**#5**), Hodder (2014d:151, 2014e:174) has pointed out that the typical storage space of a Çatalhöyük house was limited, typically reconstructed to have been an amount that was probably appropriate to support a household for about a year (see discussion of indicator **#6**), so that each household still had to maintain close ties with others as a precaution: “Individual houses seem to have been relatively self-sufficient but without large-scale storage they also depended on tightly-knit networks of various types so that in times of failure or hardship a wide range of links could be called upon” (Hodder 2014e:182). The possibility of storage failure must indeed have been a real threat since especially in dense living conditions the stored food was under constant threat from rodent pests (Bogaard et al. 2013:119; Twiss et al. 2009:888). Hodder portrays moderate storage capacities as both a result of, and incentive for, the maintenance of suprahousehold economic ties: the pre-6500 BC Çatalhöyük household did not need large storage, because it could rely on its social ties as a security system—but also it needed to invest in these ties, many of which were ritual in nature (**Theme 15**) because it did not possess large amounts of stored food (Hodder 2014b:11, 2014d:153, 2014e:175). The relatively moderate amount of storage is also mentioned as a factor that maintained egalitarianism (Hodder 2014e:174), and the role of storage space in the post-6500 BC social competition will be further discussed in Chapter 7. And then there are cases of too much storage: Cessford (2007:541) takes the particularly large storage space in bins and basins of B.1 at the top of the Çatalhöyük East Mound to mean that “these structures were not self contained functional units, but instead served part of the needs of a larger group occupying several structures”. Similarly, Düring (2011c:171) understands a house with particularly large grain storage space at Hacilar Level II as communal storage space.

To sum up the discussion of storage, indicator **#73** was already discounted as not constituting direct proof for communal storage. The notorious problem with archaeologically invisible storage that was discussed in greater detail with **Theme 1** also applies to the other indicators (**#74-#77**) discussed here, which is why they are accepted with precautions. In principle, the resource sharing implied in the sharing

of storage space between two (or a small number of) households (#74), and the social storage necessitated by relatively moderate household-owned food resources (#76) does imply suprahousehold ties if all the necessary parts of the equation can be securely evidenced archaeologically, such as that two or more households actually used the same storage space (for indicator #74), or that the bin space actually represents the entire storage capacity available to the household (for indicator #76). A similar statement can be made about cross-household sharing evidenced by some houses without storage facilities within a neighbourhood (#75) while others had particularly large ones (#77). There is an additional issue with #75 and #77, however, since in some other cases where houses had differently sized storage facilities, this was interpreted as evidence for social competition and incipient socioeconomic inequality (#112). It follows that asymmetrically distributed storage space needs to be carefully contextualised with other indicators to make sense of its social meaning.

6.3.6 Theme 14: On Common Ground

With **Theme 14**, indicators were combined that express the widespread opinion within southcentral Anatolian archaeology that unroofed areas inside the village were by default shared community ground for traffic and a range of activities unless proven otherwise, i.e. unless it can be proven that they were owned by a specific household (for household-owned outside space see #46). Indicator #78 collects all opinions that connect the existence of substantial unroofed settlement spaces in general with cross-household use and interaction, such as alleys, streets or courts. To a significant degree, the text passages collected here express assumed rather than argued interpretation, for example “At Hacilar 2, the construction of buildings with thick party walls grouped around communal open spaces and enclosed by substantial settlement walls testified to a strong sense of collective purpose and shared labour” (Cutting 2005b:136). The origin of such statements might be the inherent in-house = household, outside = community dichotomy that is prevalent in some previous research as already documented e.g. with **Theme 3**.

It however cannot be excluded that unroofed spaces in Neolithic/ Chalcolithic villages were structured by a complex set of rules, and that not every community member was free to use unroofed space at liberty. Several other indicators in this chapter have documented the existence of communal rules, and communal influence on built space that might have determined the inner layout of houses (#64) or the location of symbols and burial location (#86, #87). In such a regulated village cosmos, we cannot assume that space was rule-less simply because it did not have a roof. It should also be remembered that unroofed space played a role in spatially separating different social ('neighbourhood') groups from each other in many or most of the sites discussed here (**Theme 10**), and if the settlement space as a whole is thus reconstructed as a carefully negotiated mosaic of socially segregated territories, it seems questionable why this should not be the case for 'open' areas.

A few studies have scrutinised the use of unroofed spaces in southcentral Anatolia greater detail. Düring (2006:110-111, 126-127) uses access analysis, reconstructing movement patterns through the settlements, to argue that at Aşıklı, Canhasan III and Çatalhöyük people inhabiting different houses and areas/neighbourhoods in the settlement would have often met informally in the larger unroofed areas between house clusters: "It is likely that these large open areas would have served a range of activities and would have been a place where people from different houses could meet on 'common' ground" (Düring 2006:238). At Çatalhöyük, he observed changes in the movement across outside space over time that he related to changes in social organisation around Level V (Düring 2006:238, 244, 245). I have already recorded reservations against the validity of access analysis when used on the settlements studied here, which consisted of a dense maze of (possibly multi-storied) houses, roofs, unroofed spaces, and sometimes alleys or terraces which is moreover always excavated or preserved only in parts (see Section 4.2). And even if deemed reliable, space syntax or access analysis reconstructs only possible movement through space, not actual movement—it seems to be founded on the assumption that the only thing keeping many people from using a place are physical access restrictions (for example, having to pass many doors) (Cutting 2003; Düring 2006:32-33), and thus does not include the possibility of social rules and taboos for

movement in unroofed spaces as suggested by me above. Indicator **#78** is therefore discounted here as too general; and this by association also discounts the validity of indicator **#79**, in which Cutting (2005b:99) and Steadman (2000b:190) have argued that if the doors of individual houses opened directly from the main living room onto open spaces, this should be associated with a lack of privacy and therefore with collective identity.

Middens

To reconstruct actual use of outdoor space necessitates an examination of outdoor spaces and the archaeological deposits left in them to assess what activities were actually carried out there, and how regularly. Three indicators were identified that attest to activities performed in unroofed spaces: cooking and storage installations (**#81**, **#82**, to be discussed below), and the shared use of 'middens' (**#80**). Indicator **#80** was separated from **#78** because the arguments behind it are different: For both, their position as unroofed space between different buildings was one argument for their identification as communal space, but the argument for **#80** also rests on the artefacts found inside 'midden' areas. The discussion of 'middens' (**#80**) rests on studies of micro- and macro-debris left behind in the large unroofed areas at the Çatalhöyük East, Boncuklu and Aşıklı Höyük settlements. At no other sites within the study area have outdoor activities been studied to the same degree of detail, which is unfortunate because especially at non-clustered sites, where it is argued that the 'open' space between residences was of great social importance (**#33**), it seems crucial to study this space in greater details.

The reason why 'midden' is set here in quotation marks is that this denomination of the large open areas at Aşıklı, Boncuklu and Çatalhöyük could be incorrect insofar as that what archaeologists see (mainly layers of refuse) does not constitute the entirety of the significance that these places had to people in the past (Shillito 2011:106). Refuse disposal was clearly a main use of these areas: At Çatalhöyük East, small and medium-sized midden areas were regularly interspersed between the houses. They were often used for long periods of time (Hodder and Farid 2014:30) and are mainly made up from thin, ashy layers of domestic refuse

(Yeomans 2014a:524, 2014b:532, 536) attesting that houses, hearths and ovens were cleaned regularly, and the middens used often. The Aşıklı Höyük settlement included a number of large midden areas (the largest of which was 'JA', see Figure 5) characterised by accumulated domestic refuse such as animal bones and charred botanic remains (Düring and Marciniak 2005:171; Özbaşaran 2012:139). At Boncuklu Höyük, the more open settlement fabric included a significant amount of 'midden' space between houses, which was used for regular refuse disposal (Baird et al. 2012:223-224).

Additionally, however, midden studies have identified these areas as important suprahousehold socialising and production places. Midden areas might have played a role in the negotiation of cross-neighbourhood, communal ties in at least three ways. First, it is likely that within the dense southcentral Anatolian settlements, waste management, as well as (in the case of clustered sites) access to the middens via paths on the roofs, necessitated the negotiation of rules involving the entire community (Martin and Russell 2000:67-68). For example, the middens probably were managed and levelled intentionally (Hodder and Farid 2014:29).

Second, there is evidence that middens held symbolic and economic value; and that they were intrinsically intertwined with built space. Yeomans (2005:548) points out that rubbish accumulation so close to living quarters would have increased nuisance from odours, scavenging animals and pests, which she interprets as an indication that keeping the waste close was considered socially important, potentially signifying wealth and continuity of occupation. The materials that enter the site often seem not to leave it again, but become part of the village organism, where they are used and recycled and finally find their place in midden. Not only domestic refuse, but items of symbolic value were also deposited in middens, such as burials at Boncuklu Höyük (Baird et al. 2012:223-224), and at Çatalhöyük figurines which might also have been made out of sediment from middens (Nakamura and Meskell 2013:210-211, 220). Middens might thus constitute physical archive of household or community activities, displaying past and present affluence (Martin and Russell 2000:67-68). And at Çatalhöyük especially, refuse areas overlap with built space, when middens were placed over the remains of abandoned houses, and houses

were built on top of middens (Farid 2014; Martin and Russell 2000) despite this causing structural challenges (Stevanović 2012a:174-175). Middens were sometimes mined for building materials, and thus used to make houses (Love 2013a:82; Shillito 2011:107; Stevanović 2012a:176; Tung 2013:74). Accumulating waste inside the settlement would also have aided the building of a *höyük*, and it has been repeatedly suggested that living on mounds, raised above the landscape has practical as well as symbolic value in the Neolithic (Rosenstock 2005:255; Yeomans 2005:548).

And third and probably most importantly for the present purpose, regular production activities are attested in the Aşıklı Höyük, Boncuklu and Çatalhöyük middens that would have fostered the daily, informal forging of social ties across neighbourhood and household boundaries. Contrary to Düring's (2011c:97) statement that middens "were not used much for domestic or group activities", research has shown that the Çatalhöyük midden areas were used for a range of activities other than disposal or storage, including defecation (Matthews 2005b:381, Shillito 2011:102-103; Shillito et al. 2011a), plant food processing (Hodder 2014c:17; Ryan 2013:185), lighting of fires (Shillito et al. 2011:1035; Shillito and Ryan 2013:692) to burn lime (Matthews 2005b:381, 387-389, Matthews et al. 2013:125), parch plants (Matthews 2005b:381, 384), and fire pottery (Hodder 2013a:19; Shillito 2011:Tab.8.1). Furthermore, it was used for animal penning (Matthews 2005b:381, 389-391; Shillito 2011:Tab.8.1, 107-110; Shillito and Ryan 2013:692). Matthews (2005b:387, 391) observed that some lime burning areas and animal pens might have been equipped with some kind of superstructure, just as some of the compacted surfaces observed in the middens might have been created on purpose (Shillito and Matthews 2013:43-45; Shillito and Ryan 2013:688), giving the activities in middens a more than ephemeral character. Similarly at Boncuklu Höyük, midden areas feature fire spots and also a number of constructed features: stone hearths, a plaster container, clay surfaces and a wattle-and-daub structure that is interpreted as a—probably roofed—workshop (Baird et al. 2012:223-224). The 'midden' areas at Aşıklı Höyük also contained primary refuse¹¹ from the

¹¹ The term 'primary (deposit)' (after Schiffer's 1987:58 definition of 'primary refuse') is used here to refer to

processing of bone, antler, obsidian, plant and animal foods, attesting to their use as production areas (Düring and Marciniak 2005:171; Özbaşaran 2012:139). Because of their position between household clusters, the Aşıklı Höyük middens are interpreted in terms of collective use (Hodder 2013a:6; Özbaşaran and Duru 2015:48) which would make them communal activity areas (Düring 2011c:62; Özbaşaran 2012:139).

In sum, the Çatalhöyük team in particular reconstructs (some) middens as public spaces to perform important daily activities (Shillito et al. 2011:1035-1036) and meet others while doing so (see Regan 2011:21 for an imaginative account of children playing in midden areas) for an imaginative account of children playing in midden areas). The intense regular use of midden spaces for a whole range of vital activities makes it more likely that at least informal interaction across household borders took place. With people moving to, from, and across midden areas several times during the day for different purposes, informal encounters between members of different household were unavoidable, and people were able to observe each other, fostering the mixture of social control and informal socialising that has already been argued as soliciting communal integration when discussing marker #47, clustering and the shared roofscape. In fact, at clustered sites middens might have functioned very similarly to the communal roofscape—an extension of the roofscape that was suitable for some activities that might have preferred to not have happen on house roofs, such as defecation, pottery firing and animal penning—while other activities like cooking might have avoided the less clean midden spaces (Hodder 2014c:18).

Returning to the above proposed possibility that unroofed space in Neolithic/ Chalcolithic settlements might have been regulated by social rules just as roofed space was, a final matter of discussion is: how communal and integrative were middens really? The Çatalhöyük team has tried to investigate whether the use of middens was restricted to certain houses (households) or neighbourhoods by comparing distinct patterns of material culture use between houses and nearby

what is in much of the literature consulted here otherwise called 'in situ': items that were left in the place where they were originally used.

middens, but found no evidence—other than that it seems likely that houses used the closest midden for convenience (Hodder 2014d:165; Hodder and Farid 2014:30-31). Hodder and Farid (2014:31) state that this opportunistic use of middens diminished the collective nature of these places, but alternatively they could be reconstructed as important for cross-household interaction precisely because of their informal nature, as I argued above. The only rules and regulations around midden use attested at Çatalhöyük might be of a more practical nature: Hodder (2014d:29; Hodder and Farid 2014:163-165) observes that middens were used in different ways: “Some show little evidence of traffic and activity and contain fresh human and ovicaprid fecal remains. Others have more fire spots, extensive areas of burning and a range of specific activities and have evidence of trampling; these are closer to what Mellaart called courtyards. Many middens seem to have been managed by dumping clay and ash, by leveling and perhaps burning. Overall, it is clear that middens are very diverse at the site.” The differential use of the Çatalhöyük middens is evidence for the existence of rules or conventions around the use of outdoor spaces, which in this case however might be more of practical nature, e.g. separating latrines from production areas, and less due to social segregation or compartmentalisation.

Outdoor cooking and storage installations

The use of outdoor settlement areas for production activities can further be archaeologically attested through cooking and storage installations. In keeping with the general trend to associated unroofed spaces with communal use, cooking and storage installations located outside of residences (**#81**, **#82**) are also commonly associated with sharing of space and/or resources between household. However, an inspection of the text passages coded here reveals that the association of outside storage (**#81**) or cooking facilities (**#82**) with sharing between households (e.g. Cutting 2005b:95, 103, 135-136 for Bademağacı and Hacılar II; Hodder 1987:54 for Hacılar II; Steadman 2004:534 for Aceramic Hacılar) rests on the assumption that these facilities were used by more than one household. There seem to be mainly

two reasons for researchers to assume the shared use of a facility: the location of facilities in unroofed areas outside of residences, and not directly attached to the outer wall of a residence; and also often the size of facilities. For example Umurtak (2007b:7) hypothesises that “Due to the fact that the silos of Bademağacı EN II/ 3 are found in the open areas between the houses, it may be conjectured that they were meant for common use”. The context in which Umurtak (2007b:7-8) discusses the Bademağacı silos makes it seem likely that her interpretation is also supported by the fact that these were larger than needed for a single nuclear household, but such calculations have already been found very problematic when discussing storage with **Themes 1** and **13**. Size was also a factor in many of the cases where outdoor ovens were attributed to communal use (**#81**): At Aşıklı Höyük, a large oven was found close to the large community buildings T and HV which indeed makes it more likely that it was connected to the communal activity taken place in those large courtyard buildings (Özbaşaran 2011:108). At Hacılar II, the only two ovens found were large and located outside and accordingly connected to “some form of communal cooking” by Cutting (also 2005b:103; Hodder 1987:54).

For reasons already discussed for indicator **#78**, the automatic interpretation of outdoor facilities as communal cannot be accepted. I have argued above that unroofed space might always have been regulated ground within southcentral Anatolian prehistory whose use was not necessarily open to any and everyone, and that specifically after 6500 BC it might have become an item within the negotiation of new social relations between households. And within the text passages coded for this project there is actually some evidence that outdoor cooking facilities in particular might have been used in such negotiations of household status: Specifically, the claim that outdoor ovens indicate communal sharing (**#82**) clashes with the observations that private productive outdoor space (**#46** ‘yards’, which included ovens) formed as part of increasing household independence after 6500 BC, and that large ovens might have been an attractive feature for newly competitive households to acquire and display status (**#45**, **#114**).

Many of the text passages coded with **#81** actually refer to Çatalhöyük East, where relatively large ovens were found in the upper levels of the site and connected to

communal use, and the Çatalhöyük outdoor ovens have undergone a number of interpretive changes that show just how difficult it is to interpret these features within the household-community balance. Initially seen as communal facilities (Cutting 2005a:161, 2005b:136; Düring 2006:240; Hodder 2006:99, 182; Sagona and Zimansky 2009:88), newer research has shown that most of the outdoor ovens are found post-6500 BC levels, and many in the newly developing private 'yards' (#46, (Bogaard et al. 2014:133, 147), a phenomenon linked with increased household autonomy and socioeconomic competition e.g. by Hodder (2014b:15, 2014d:19): "As houses became larger and more concerned with social display so other functional features such as ovens were pushed outside or into side rooms, and the numbers of side rooms increased as did the number of activities out in yards. All this suggests a greater economic independence of houses". Trying to reconcile the tradition view of outdoor ovens as communal (most recently maintained e.g. in Bogaard et al. 2014:133, 145, 146; Hodder 2014d:18) with the realisation of their location in private yards, Bogaard et al. (2014:133, 145-146) have most recently tried to identify the juxtaposition of private (yard) and communal (oven) as a feature of the delicate and changing balancing of household independence and communal ties: "An enclosed yard, however, might contain a large outdoor oven to accommodate the baking requirements of multiple households, suggesting that the negotiation of individual household versus wider group obligation was an intricate process".

It remains to be seen what the next years of research can clarify regarding the roles of the Çatalhöyük outdoor ovens, but this example serves to make the point that outdoor cooking and storage facilities are possibly among the architectural features within the context of household autonomy vs. community integration that are most difficult to interpret. Noting that except for the Aşıklı Höyük outdoor oven, all other examples named in the discussion of #82 post-date 6500 BC, it is possible to suggesting a completely alternative interpretation of outside storage and fire installations and to instead interpret them in terms of increased social productivity of each household, or maybe even competition between households whereby they were compartmentalising outdoor space into household parcels. In sum, the wider

architectural and social context that these features were embedded in is crucial to their interpretation. For example, it is entirely possible that outdoor facilities were differently used at different sites and in different periods: a large oven close to a communal congregation building dating to ca. 7400 BC (Level 2 at Aşıklı Höyük) could very well have a different social connotation than large ovens in private yards from ca. 6500 or 6000 BC (Çatalhöyük East, Hacılar).

To conclude the discussion of indicators **#80-#82**, it can be stated that they can verify the, possibly intense, use of outdoor spaces for production activities, but such activities cannot unequivocally be ascribed to a communal sphere, i.e. it cannot be seen as certain that outdoor activities would have involved the sharing of facilities, knowledge, resources or socialising time between different households. These indicators are still, however, tentatively included on the indicator list for two reasons: First, the role of outdoor spaces is poorly understood within the context of the community-autonomy balance and further research therefore necessary. In particular, it is now clear that after 6500 BC, unroofed space in at least some settlements studied here might have become a commodity in the increasing competition between households, and it cannot be excluded that its use was negotiated, regulated and compartmentalised also before 6500 BC. In order to holistically research outdoor settlement spaces, indicators **#80-#82** should be included into an architectural analysis, also as possible counterparts to the role of private outdoor spaces (**#46**). And second, it could be argued that even if the use of outdoor areas and facilities was not shared between households, the performance of activities in an unenclosed space by itself must have resulted in informal socialising and social control. This mechanism was already described for indicator **#47** (clustering) whereby the mere fact that people conducted much of their daily lives outside necessarily meant sharing time and experiences with others at least informally, and enabling social control across household borders could be transferred also to outside-the-house installations which show that households conducted activities regularly outside of the privacy of their own home. Cooking and tending to their stored items in front of their house, members of different households would have been able to see and hear each other, and even if that did

not foster conversation or other social exchange it can be seen as a form of communal interaction.

6.3.7 Theme 15: Symbols of Community

In the previous section, **Theme 3** introduced the role of architectural items with symbolic value in the household autonomy-community integration balance. The discussion of **Theme 3** refuted the notion that symbols by default should be associated with household identity since they are located in the house (**#14**) and introduced that newer research has concentrated on studying the synchronic and diachronic distribution of symbolic items across the settlement space. As with **Theme 3**, the discussion of **Theme 15** mainly builds on Çatalhöyük East, the central Anatolian Neolithic site with the most symbolic elaboration of architecture.

Beginnings of the 'symbols of community' discussion

Indicator **#83** collects text passages that connect the Çatalhöyük symbolism in general with community ties, usually arguing that the widespread symbolism indicates shared ritual which served to bind the community together (e.g. Redman 1978:186; Schoop 2005b:48). In light of the more nuanced and sophisticated newer discussions around the social role of symbolism (discussed later in this theme), these never thoroughly argued opinions lose their importance. Indicator **#83** is nevertheless interesting in terms of intellectual history since it records that even when the leading research opinion was that symbolic elaboration of the house strengthened the household (**#14**), there were already suggestions to (also) connect it with the community scale and sometimes the two interpretations are juxtaposed in the same sources, for example when Hodder (2005b:9, 11) sees symbolism as controlled by households, but also playing a role in building shared ancestry and memory that regulated alliances between households. Hodder (2005b:9, 2006:57-58) sees a tension expressed here, whereby individual Çatalhöyük households tried to gain or maintain (ritual, but also social and economic) independence against the

overall close-knit, communal system at the site. At least partially, this seems to be based on the content of some of the paintings, which clearly show groups of people involved in activities such as hunting or teasing of wild animals, thus displaying what seems to be ritually and/or socially important collective action (Hodder 2005d:15, 29). Discussing the actual content of the imagery is beyond the scope of this thesis, but it also seems to play only a minor role in the household autonomy discussion, where by far more arguments are based on the relative location of symbols within the village landscape (e.g. #86, #87 in this theme)—although the content of the images plays a role in indicator #85.

Another artefact of the beginnings of the symbolism discussion was Hodder's opinion that at sites without symbolic house elaboration, ritual was organised and controlled at a communal level (#84). This opinion, too, is related to that documented with indicator #14: It formed part of the general trend that Hodder reconstructed for the central Anatolian Neolithic whereby the first settlements, like Aşıklı Höyük, had a strong collective identity that is evidenced for example by the fact that ritual was bundled in large communal facilities (#89) and individual houses were not ritually elaborated (Hodder 2006:58). Later, at Çatalhöyük, the individual household grew more independent and households controlled ritual at least to a significant degree (#14, #83); but during the Early Chalcolithic, at Çatalhöyük West and Hacilar, symbolic house elaboration disappears again and instead pottery is elaborated by painting, which signifies a return to more communal forms of ritual at the loss of independence by the individual household (Hodder 1987:54-55, 2005a:13, 2006:177): "In fact these later walls seem not to be painted except perhaps in one-colour washes. The pottery, however, becomes elaborately decorated. These changes suggest a gradual wresting of history away from the house. The symbols that refer to myth and history now come to be used to create and exchange relationships between houses" (Hodder 2006:168). This reconstruction, too, can be seen as outdated in light of more recent research which has adjusted and nuanced these interpretations (#26, #102). Indicators #83 and #84 mostly refer to the presence or absence of symbols inside houses; as already outlined with **Theme 3**, newer research has instead concentrated on studying the

synchronic and diachronic distribution of symbolic items across the settlement space, and the remaining indicators in this theme refer to distribution patterns.

Shared motifs

In the most recent Çatalhöyük publication cycle, Hodder (2014d) postulated the existence of important cross-ties between individual households that were displayed in form of shared imagery, with contemporary, non-adjacent houses displaying the same or similar motifs, especially animal imagery (**#85**): “if we connect buildings with leopard reliefs, bear (splayed figure) reliefs, painted hands, horned benches and so on, we find complex cross-cutting relationships” (Hodder 2014b:8; and displayed in Chapter 3, Figure 6. Hodder reconstructs this in terms of “secret societies or medicine societies” based around the identification with a specific (wild) animal connecting different households that were dispersed over the site (Hodder 2013a:25, 2014d:160, 161, 2014e:174, 182). These ritual connections also had social and economic importance since Hodder (2014d:151, 153) reconstructs them as a social security system in which households could obtain support and resources if needed.

The suggestion of ‘animal groups’ represents a variation on an earlier notion suggested by Forest (1993:15) and Hodder (2006:56) who had pointed out that there was a common symbolic repertoire at the site, and a high degree of motif repetition, and connected that with communally shared identity of beliefs or shared rules/conventions respectively. In this reconstruction, shared symbolism was more generally an expression of a more general shared belief system of the Çatalhöyük village community, different from the above painted scenario of ‘secret societies’, where shared symbolism is at the same time more exclusive (the larger community is subdivided into ritual sub-groups, which makes **#85** part of the ‘middle ground’ of social integration, see Chapter 3.2) but also much more concrete and stronger than the more diffuse shared belief system which, including all inhabitants of the site, might not have had the some concrete social and economic implication by enabling people in need to solicit or demand help from their animal group.

While there is evidence for the social and ritual significance of the animals included in Hodder's reconstruction of the secret animal societies in form of hunting taboos (Hodder 2014d:167) and a general rarity of these animals—e.g. bears, wolves and leopards—in the imagery (2014d:151), it would require additional evidence to show that this significance was within the suprahousehold sphere; and especially to show the social and economic (food-sharing) implications of 'animal groups', for example through comparison with diet patterns as reported below of 'history houses' (**#86-#88**), or with patterns of hearth, oven and storage distribution (**Theme 13**). In a more general way (sharing ritual) and the wider context of **Theme 15, #85** can still be accepted as an indicator of suprahousehold integration.

Asymmetric ritual, building continuity and focal houses

Indicators **#86** and **#87** describe an interpretation of the asymmetric synchronic distribution of features with symbolic charge (burials, paintings, mouldings) across the village of Çatalhöyük in terms of crossties between intermediate-sized social groupings within the village community. Symbolic imagery (**#86**) was divided here from burials (**#87**) as a separate indicator because the two could theoretically occur independently from each other. However, the reconstruction of their social meaning is closely related and also connects to indicator **#88**, building continuities. The three indicators are therefore discussed here together.

The distribution of burials among Çatalhöyük houses is extremely variable, from none to 62 burials per building (Düring 2003, 2008b; Hodder 2014b:5). When a large number of burials was present, the sheer number of skeletons renders it likely that not every buried person had been a resident of the building prior to death (Düring 2011c:110; Hodder 2014b:5). Hodder (2014b:5; Hodder and Pels 2010:167) sees 10-15 buried individuals as the cut-off mark and interprets houses with more than 10-15 burials as 'multiple-burial houses' that collected the deceased from suprahousehold groups. Similarly, moulded features on walls, and installations that were composites of moulded clay and animal bones/horns are interpreted as ritually charged imagery at Çatalhöyük. These items are irregularly distributed

between contemporary houses as well as in diachronic perspective, for example only about a quarter of houses had moulded features (Düring 2006:201, 217, 2011c:106). Often, these moulded features showed wild animals (bull, leopard, bear) and/or incorporated bones or horns of such animals (Düring 2011c:103-106). Paintings as well added to the ritual charge of a building, although Düring (2006:217, 2011c:102-103) has shown that these probably were more equally distributed between Çatalhöyük houses (#17) and might therefore not have played a role in the context of #86, the unequal distribution of symbolic items.

That not every house had its equal share of symbolism was noticed early in the research history of Çatalhöyük, and although in-house symbolism was traditionally connected to household identity (#14), its asymmetric distribution became the basis for first suggestions that it also was part of ties and negotiations between households. Mellaart (1967:78) reconstructed elaborate houses as 'shrines' in a hierarchically organised, yet community-integrating ritual system (see discussion of #122 in Chapter 7). Last (1998a:371-372) suggested that although "the principal significance of the images lay within the household", the imagery in the house might have displayed the household's acquired status in the community and therefore "also implies something about social relations between households. If the acquisition of images depended on communal acts then their presence would contribute to the cohesion of the community". Likewise, the asymmetric distribution of subfloor burials became apparent soon after the start of the Hodder excavation, which documented them in greater detail than Mellaart had (see Düring 2003:4-7 for issues with the Mellaart burial data): "There are too many individuals buried in Building 1 to have been produced by deaths within a small nuclear family in this time period. We assume that a larger, extended group had rights of burial in this building" (Hodder 1999a:161). More recently, these observations have been confirmed through work mapping more systematically the synchronic and diachronic distribution of symbolic items and burials synchronically and diachronically across Çatalhöyük which clearly shows that they are often concentrated in particular houses (see especially Düring 2006; Hodder and Pels 2010). As a consequence, the dominant interpretation of these items has shifted

during the last 10 years nearly completely towards their interpretation as important features of creating community cohesion, rendering the earlier notion that they support household identity (**#14**, **#18**) out-dated.

The asymmetric distribution of ritual imagery and burials at Çatalhöyük is now interpreted as evidence for a system whereby some houses served as the ritual focus for a group consisting of several households. Hodder and Pels (2010) identify houses with particular ritual charge (see Carleton et al. 2013 with a critique; Hodder 2016 with a reply), named 'history houses', which controlled ritual that involved a number of households. In a similar interpretation, yet using a different term, Düring (2005:22, 2011c:115-116) suggests that symbolically charged houses were 'lineage houses' that concentrated status and prestige and served as a ritual focal point for a group of households that defined themselves in relation to particular focal houses. Mainly based on burial numbers, Düring (2006:303, 313) suggests that the groups centring on one focal ritual house might have comprised seven households. Likely, these were the residents of the houses clustered around the history house: physical proximity might have been important for households to assert their membership in a particular history house group, and also vice versa the sense of shared identity and history might then have led to a wish of households to remain close to their ancestral centre (Düring 2001:2, 15; Hodder 2012:309). These ritual groups consisting of several households were thus part of the important intermediate scale of social integration at Early Neolithic Çatalhöyük. Although much of the original reasoning for the identification of such ritual focus houses as community-integrating institution were based on ethnographic analogies and anthropological models (e.g. Düring 2006:210, 225-226, 300, 2007a, 2009:33, 2011c:115-116; Hodder 2006:161-162), they have since been verified thoroughly in the archaeological record. The 'history house' reconstruction was long in the making, as evidenced by the many remarks by the Çatalhöyük research team coded for **#87** and **#86** in publications from ca. 10 years ago, when symbolism was still in majority attributed to the household level (**Themes 3-4**), but the asymmetric distribution of symbolism and burial was already recognised as being related with the suprahousehold sphere (Baird 2005:71; Hodder 2005d:29, 2006:161), for example:

“Thus domestic houses used for large numbers of burials, and those houses which are more elaborate, may have been more closely tied to continuity and the preservation of a collective memory” (Hodder 2005e:136).

Three separate, yet related, arguments can be extracted from the discussion of history houses, lineage houses or ritual focal houses of how a system of bundling ritual in one place, or a few places, would have integrated households. First, the workings of history or lineage houses are reconstructed as a fascinating interplay of mutuality and control or monopolisation, both functioning as cohesive mechanisms. The element of status difference between different houses, and control that a highly elaborated, high-status house exerted over a number of associated households will be further discussed in Chapter 7 (**Theme 19.5**). Despite, or maybe precisely because of, the competitive element ingrained in the ‘lineage house’ system did it also work as an inclusive force by binding the loyalties and resources of a larger group. Particularly, the monopolisation of ritual by some houses (and their resident households) seems to have been part of an exchange system in which items of ritual as well as socioeconomic value were passed forth and back and that bound a group of households together: “It is possible that these history houses came to provide or control ancestors and rituals for a larger kin or other group or ‘house’ (some larger collection of buildings in a ‘house society’). The central history houses may have had less productive and storage space because others in the kin, ancestral or ‘house’ group provided resources and food for them” (Hodder and Pels 2010:178, similarly 183). Hodder (2012a:309; Marciniak et al. 2015a:96) tentatively suggests that access to resources and similar rights might have been organised through history house groups. In such a somewhat unequal (Hodder and Pels 2010:183) exchange system, individual households needed to rely on history houses to obtain a resource that seems to have been vital to life at Çatalhöyük: history, ritual, memory, or ancestry. And if ritual, memory and ancestry is seen as a resource (e.g. Hodder and Pels 2010:183), then the fact that the ritual capacity of several households were bundled in one place also means a form of investment of this group into one house, and the investment would have bound households to place, and to each other—and the history house itself visualised, displayed and this

reinforced this mutual ritual, social and economic commitment and shared identity (Düring 2006:300).

Second, the ritual charge of focal houses was partially created by events and practices such as burial, but also the removal and circulation of body parts from burial (Hodder 2014e:182) and parts of wild animals (Hodder 2013a:25); creating paintings with ritual meaning on house walls and then hiding paintings under new white plaster; creating mouldings and scouring them out (see **#24**, **#25**); and probably feasting (Hodder 2013a:25, 2014e:182). The fact that ‘history houses’ were places where ritual took place makes it, although they were also residences (Hodder 2014b:4), likely that they were at least at some occasions used for congregations combining several households: “It would be implausible to suggest that only the inhabitants of those buildings containing burials and mouldings performed the rituals of burials and those with which the mouldings were connected” (Düring 2001:11, also 2006:225). Sharing such meaningful, powerful events with each other on a probably regular basis must have constituted another element of the cohesive force of history house groups. And the inclusive force of shared ritual events would have projected past the conclusion of the event itself since the collective memory of them lasted, especially if its physical traces were archived and displayed in the house itself in form of visible and invisible deposits (Hodder 2005e:136, 2006:161-162). Third and importantly, the system of sharing ritual seems to have incorporated an element of shared history (Hodder 2014e:182). If a group of households perceived themselves as having a long, shared history, this sense of history would have functioned as additional cohesive glue, and the terms chosen by Hodder (Hodder and Pels 2010:, ‘history houses’) and Düring (2011c:110-111, ‘lineage houses’) show how integral the idea of a historic component was to the way these social institutions functioned. The element of history-making is indicated particularly by the fact that subfloor burials cluster in history houses (**#87**) and that these had particularly long rebuilding histories (**#88**).

Building continuity **#88** (see **Theme 4** for a description of building continuity) has also been related with community integration for other reasons that will be discussed below, but it also forms part of the history house concept. There is a clear

correlation between building continuity, burial and symbolic elaboration which leads to the conclusion that continuity was an important element of how the ritual focal houses amassed their ritual charge: “An interesting pattern at Çatalhöyük for continuous buildings is an increase of their ritual elaborateness over time. Put simply, we can follow buildings that started out as more or less average domestic units and see how they gradually became invested with symbolism. This can be done by tabulating the occurrence and frequency of mouldings, wall paintings, and burials. In this manner, we can note a clear increase in these ‘ritual features’” (Düring 2011c:114-115). This marks history houses, and the groupings they represent, as entities with a history (Hodder and Farid 2014:33, Hodder and Pels 2010:178). This history somewhat naturalises the present, in that it serves as justification for continuing social, ritual and economic traditions ‘as it always was’ (Düring 2011c:116): “I have suggested that buildings may have been deliberately kept the same as a strategy in which the present was legitimised by presenting it as an immutable timeless past” (Düring 2006:300). Düring (2011c:115) states that the origin of history houses might have become mystically clouded, and the very long duration of some of these houses certainly makes that likely (some continuous houses lasted up to 420-700 years, see **Theme 4**): 400 years or longer is long enough for the origins of a house and social institution to be beyond human memory. Such a principle was already suggested by the visionary paper by Heinrich and Seidl (1969), who reconstructed the elaborate houses of the middle levels as the continuation of the ‘original buildings’ founded by the first settlers at Çatalhöyük, which were through building continuity continued upwards as the mound grew and also became the focus of a kin group that clustered around them (**#47**). In this scenario, ‘history houses’ would always refer back to the deep history of the Çatalhöyük settlement through the very physical connection of houses stacked on top of each other. Hodder (2012a:309) has more recently suggested a very similar scenario and sees a sense of shared history as one main component for the integration of history house groups. The preferential burial of people inside houses of ritual focus (**#87**) would also have served as a practice of impregnating them with history, in a very real way by depositing ancestors and community members with whom one had shared daily practices and meaningful experiences

inside the continuous house stack.

Shared burial (#87) further supports the first argument made above: that the 'history house' system worked to integrate different households by inducing them to invest ritual resources—here deceased people, ancestors—into one shared place, where this ritual capital was held for them; and that the history house group also had a social and economic, every day component that projected past the ritual sphere. The latter has received some compelling new evidence in form of studies of the genetic relation and diet of individuals buried under floors. These human remains allow some further insight into how the history house groups might have been constituted and tied together. Biodistance studies based on dental morphology combined with isotope studies have shown that people who were buried together were in most cases not closely related – but they shared the same diet (Hodder 2014b:8-9). Isotopic evidence demonstrates that the diets of humans buried beneath floors of the same house were often similar, but compared between burial groups were quite different (Hodder 2014b:6; Pearson 2013; Pilloud and Larsen 2011). Hodder (2014b:8-9) suggests to reconstruct this evidence in the way that history house group represented a suprahousehold 'practical' kin—people brought together not through genetic ties, but by cooperation and the sharing of daily lives and food. He envisages a system in which “the complex links between buildings included the separation of children from biological parents at some point soon after birth” and the adoption by another kin group. This conclusion, still being tested by ongoing research, would suggest that the Early Neolithic society at the Çatalhöyük purposefully separated families in an effort to create non-family social groupings (3.2.3). This could be interpreted as a strategy to break up what could be 'natural' social groupings and ancestry lines—those based on shared genetic heritage—in order to create an artificial, or a different system of kin-making and history-making.

In sum, the integrative force of the Çatalhöyük Early Neolithic 'history houses' was based on the ritual control they exercised over a group of households, on the exchange of items within the history house group, shared experiences and a sense of shared history. The history house concept, or the asymmetric distribution of

burials and elaboration across the 4D space of Çatalhöyük has received a lot of scholarly attention over the last years, as evidenced in the large number of text passages coded in Appendix 4 and also the fairly extensive discussion here which still only represents a brief summary of the matter. The various lines of evidence brought together in the history house discussion, specifically the correlation of **#86**, **#87** and **#88**, and the independent genetic and diet evidence, make the reconstruction of these architectural indicators as related to communal integration very convincing.

Intermediate summary: History houses and beyond

As reconstructed by Hodder (2013a:25, 2014b:7-8, 2014d:151-153), the ritual, social and economic bonds created by sharing symbols (**#85**) and sharing a ritual focal house (**#86**, **#87**) are not mutually exclusive or contradictory. Instead, Hodder combines all these different kinds of communal ties to reconstruct Early Neolithic Çatalhöyük as a society in which individuals and individual households were participating in different systems of social integration at the same time: They were part of ritual networks around 'history house' groups (**#86**, **#87**), but also of 'animal' groups (**#85**) and of neighbourhood groups (**Theme 10**) whose integrating strength was based on physical closeness. He further mentions other cross-ties that do not become manifest in architecture, such as feasting or the circulation of human body parts from burials. Düring (2007a:141) further suggested that even membership in a 'history house' group was not exclusive, but households might have had loyalties with a number of groups. These many different social ties made for a very resilient social security system, which also maintained egalitarianism (Hodder 2014b:17). They might become archaeologically visible in form of symbolism, but included economic and social meaning: "The implication is that a person or house could get food (or obsidian or wood or clay) from people on their terrace, in their sector, in their burial group, in the group of people that have bears or leopards on the walls, in their bull-feasting group, in their neighborhood and so on" (Hodder 2014d:153).

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Figure 23 Building continuity within a house cluster in the South excavation area at Çatalhöyük (Düring 2011c:Fig.4.14).

A conclusion of importance for this present discussion is that the three components, #86 asymmetric elaboration, #87 asymmetric burial and #88 building continuity would also work for community cohesion when occurring independently from each other, i.e. not within the history house framework. And a related issue: Although the ritual cross-tie system discussed here is specific to Çatalhöyük, the principles and mechanisms that make indicators #86-#88 indicative of communal integration could also work at other sites, possibly in modified form, although this has not been systematically researched at most other Late Neolithic/ Early Chalcolithic sites. For example, building continuity #88 could still have had a connotation of history construction even if not coupled with the 'history house' principle. It seems possible that social groups chose to express their association through shared burial #87, even if they did not share other rituals (#86). It seems further possible that the same mechanism, e.g. the construction of a shared history, could have been reached at other settlements by other means, becoming manifest in different architectural form. And there are concrete indications that building continuity #88 marks communal integration also at sites other than Çatalhöyük, albeit by a different mechanism since it was not connected to the history house concept there.

Aşıklı Höyük building continuity

There is a line of argument connecting building continuity #88 with communal integration that is independent from the 'history house' principle, and this mechanism has been detected also at Aşıklı Höyük where building continuity was an important characteristic of the built environment and a deep section has identified up to eight rebuilding episodes (Düring 2006:97, 2011c:65; Özbaşaran 2012:139). Düring (2005:23, 2011c:129, 2014:132) concludes that building continuity operated differently at Aşıklı Höyük than at Çatalhöyük, and that for example the sense of long history might not have been as important at Aşıklı. Here, and also at Çatalhöyük building continuity has been described as the outcome of communal control over built space (Cutting 2005c:131, 135). Düring (2005:21, 24, 2006:235, 246, 298, 313)

argues that had households been at liberty to adjust their residences according to their own wishes and needs, archaeologists would observe more modifications of the house over time (#39), especially across the different rebuilding episodes—even in the tightly clustered conditions at Aşıklı and Çatalhöyük. At Çatalhöyük, this line of argumentation does not essentially contradict the role of building continuity in the history house context, and indeed Düring (2005:24, 2006:92-93, 97, 228-229, 298-299; Düring and Marciniak 2005:175, 179, 181; Marciniak and Czerniak 2007:118) reconstructs a system at Çatalhöyük and also Aşıklı whereby an intermediate social group, neighbourhood or ‘lineage group’, collectively owned a group of houses and distributed them amongst households, or distributed people between the houses; where households moved between houses over the years, and households might have been in competition to acquire residence in one of the high-status history houses with a long history (long building continuity). It is noteworthy that in this scenario, households did not actually own the house they lived in, which if accepted sheds a different light on some of the discussions around privacy and ownership of storage or hearths that were so central for the **Theme 1** and **Theme 13** discussions. Building continuity would in this scenario serve to create group identity by binding this group to place, to their collectively shared houses and the history of those houses, at Çatalhöyük especially the long-lasting high-status house (Düring 2005:24, 2006:246, 2007b:169)—thus contradicting attempts to argue for building continuity as a household identity marker (#23), which does not work if the house is owned by a suprahousehold group, and households shifted between residences. Similarly, Hodder (2014b, 2014d) sees continuity and memory as being anchored in the built environment itself, while people moved between houses according to rules or conventions made on suprahousehold scale, such as the already mentioned possible separation of children from their biological family, or movement of the dead into a focal house.

Summary: research trends and temporal trends in the symbols of community vs. household ritual balance

Where does it leave us in the greater discussion of whether symbolism and ritual should rather be associated with the household or the community sphere? As a general trend shown by the publication dates of the sources coded with **Themes 3-4** vs. **Theme 15** show clearly that earlier research tended to favour the connection of symbolism with strong household identity, while current research sees its main function in the upholding of egalitarian community ties. At the same time, the discussion of symbols and their function for community cohesion (**Theme 15**) is to a large degree based on their asymmetric synchronic and diachronic distribution at Çatalhöyük, so that does not essentially contradict the possibility that symbolic items (paintings, mouldings, burials) just by themselves did not also have a household-supporting function.

And indeed, there are many indications to support such a notion, and/or to show that symbols could have had dual function in the household independence vs. community integration balance. For example, while the content of a painting might display group activity (Hodder 2005d:15), the fact the fact that it was located inside the private space of a household could show that the particular image and its social/ritual connotation were being appropriated by a household towards building its specific identity (**#14**), especially if every house had an equal share of paintings (**#16**). And if it is accepted that symbolic items located in (nearly) every house were administered by the individual household (e.g. wall paintings, **#16**), but unequally distributed items were controlled by a suprahousehold group (e.g. wall mouldings, **#86**), then sometimes items located directly next to each other on a house wall could display very different alliances. Other researchers seem to share my impression that it is not possible to make a clear-cut attribution of house-related ritual to either the communal or the household sphere; there are cases where the same scholar, sometimes in the same source, ascribes the same indicator to different social levels. For example, Cutting states in her thesis that at Çatalhöyük "the considerable continuity in building alignment through time and the closely packed architecture indicated that (as at Aşıklı Höyük) the occupation of particular

structures was passed down from one generation to another, signifying the importance of family identity and inheritance” (Cutting 2005b:127), but also that the “repetition of the agglomerated architecture over time suggests a close-knit society with inherited occupation patterns and a strong collective purpose” (Cutting 2005b:131, 2006b:97). And while Hodder (Hodder and Pels 2010) sees building continuity as an important ingredient of forging history houses and their inclusive force, he also (Hodder 2013b:16, 17, 2014d:155) observed idiosyncratic continuities and memory-making by individual non-history houses and interpreted this as evidence for the relative independence of households.

And to make things more complicated, there seem to have been changes over time. An important one could be related to subfloor burials: based on the discussions of **#18** and **#87**, it is possible to reconstruct a development by which subfloor burials first started out as a household practice, forging household identity by placing household members under the floor, as possibly evidenced at Aşıklı Höyük (see **#18** discussion, including remark of doubts about the Aşıklı Höyük burial evidence) and Boncuklu Höyük, where Baird (2012a:460) sees evidence to connect burial with the timing of house rebuilding and household cycles. But in the later Early Neolithic, the control over subfloor burial location was appropriated by suprahousehold groups at Çatalhöyük, where it served to bind households to each other. Similarly, Boncuklu Höyük already had building continuity with up to six continuous houses in evidence, but this is interpreted by the excavators rather as a practice that strengthened household identity and an asserting of its place within the village and community (Baird et al. 2012:234). If this interpretation will be confirmed by ongoing research at the site, this too could represent a case where one architectural ‘indicator’ changed its meaning for the household-community balance over time. There are further indications that building continuity **#88** and the concentration of subfloor burials under some houses **#87** changed their meaning around 6500 BC at Çatalhöyük (**Theme 5**).

I would therefore summarise the discussion around the symbolic/ritual element of Neolithic/ Chalcolithic southcentral Anatolian architecture by saying that house-related rituals had great power in forging social alliances, and seem to have

undergone important changes over the millennia of the Neolithic and Chalcolithic when different levels of social grouping negotiated in obtaining control over symbolism. Having to make a decision as to the placement of the various indicators on my indicator list, I choose to prioritise the time period that is in the focus of this thesis. The clear trend that emerged while discussing **Themes 3-4, 15** and **5** is that the intense ritual use of architectural space is set within an Early Neolithic, tight-knit community egalitarian framework, while much of this ritual seems to have been abandoned when households became more independent. This has led to my decision to tentatively treat all the ritual indicators discussed here as evidence for community integration. The observation that newer research has tended to ascribe much of the control of the ritual sphere to the community only further supports this decision. It must be explicitly remarked that having made this decision, this specific part of my indicator package is specific to the investigation of the centuries around 6500 BC and might not be valid for other time (earlier) periods. Finally, the discussion of symbolism here has shown that architectural symbolism should always be investigated holistically and cross-referenced with the more social and economic elements of social life (e.g. diet as shown in the discussion of ‘history houses’ and **#86-#88**).

6.3.8 Theme 16: Constructing Community Space

Theme 16 collects indicators that move away from a focus on houses, and describe how communal integration at southcentral Anatolian settlements was architecturally expressed by constructing buildings and spaces not owned by a household, but meant for shared use: buildings for (possibly ritual) congregation **#89**; for workshops **#90** and storage **#91**; settlement enclosure walls **#92** and finally burial places outside the individual houses **#93**. Another reason to collect these indicators into one theme, and to list this theme as the last under the community integration headline, is that the sites and evidence discussed for these indicators are—with the exception of Aşıklı Höyük—chronologically late, starting with the Early Chalcolithic and especially incorporating, as the only theme in this chapter, an appreciable amount of Early Bronze Age examples. **Theme 16** therefore

characterises communally built and used space as a chronologically late form of architecturally fostered communal integration within the context of Anatolian prehistory.

(Ritual) congregation buildings

Indicator **#89** refers to the large courtyard houses HV and MI at Aşıklı Höyük Level 2 that are in the research community interpreted as places where shared ritual was carried out by a larger group of people (Düring 2011c:72-73; Özbaşaran and Duru 2015:49) encompassing several household, or even several neighbourhoods since the largest court, HV, could have gathered around 340 people in Düring's (2006:304, 2011c:72) estimates. At last during its later occupation, Aşıklı further had a satellite site just across the river, Musular, which is interpreted by the excavators as an additional feasting place (3.2.2; Özbaşaran 2011:110, also Düring 2011c:78-80). An important difference between indicator **#89** and the shared ritual documented in **Theme 15** is that **#89** refers to buildings that were non-residential, but instead only used for group ritual. Four mechanisms by which such shared congregation buildings fostered community cohesion can be identified in the literature.

First, Asouti (2005a:79) sees the regular performance of ritual in a larger group as a regular reminder and display/performance of the dominant collective ideology that is reconstructed for Aşıklı and also recognised through many other architectural indicators, with clustering **#47** and sectoring **#49** as two prominent examples. She mentions in this context that the Aşıklı Höyük ritual buildings are spatially set apart from residential areas, and Düring (2006:105-106, 2011c:62, 71-72; Özbaşaran 2011:108) has further described how they are distinguished by their size, layout and using special materials and building techniques. Related to this argument, Düring (and Marciniak 2005:181) seems to point out that also at times when no ritual performance was actually underway, the building itself was a visual manifestation and display of communal spirit. Second, connecting to what was discussed with **Theme 3**, and especially indicator **#14**, Hodder (2005c:186, 2005e:131, 133,

2006:58; also Asouti 2005a:81) sees Aşıklı as part of a wider trend whereby ritual was first controlled and managed on a community level during the earliest Neolithic, but then appropriated into the household sphere by the time of Çatalhöyük. In this line of argumentation, the control of ritual, like a resource, empowers the community or suprahousehold group over the individual household, similar to what is now reconstructed for the history houses (**Theme 15**) at Çatalhöyük. Indeed, Düring (2005:23, 2006:300, 305) sees the Çatalhöyük 'history houses' taking over much of the community-binding function that had been supported by the separate ritual buildings at Aşıklı Höyük.

Third, Özbaşaran and Duru (2015:50) have most recently interpreted the communal congregation and feasting that is reconstructed to have happened in the large courtyard houses as a mechanism to alleviate tensions arising during daily social and economic interactions in dense living conditions: "Such collective ceremonies could have reinforced the collaborative way of living by easing some of the many stresses that inevitably came with a sedentary lifestyle". It should be noted in this context that Aşıklı Höyük is the earliest so far known site of this size (Level 2, start dated 8000 BC, Quade et al. 2014:Fig.S1; Stiner et al. 2014) until 7400 BC (Düring 2011c:59), is estimated at 1500-3000 people by Düring (2011c:71), and living together permanently in such large numbers did indeed constitute an experiment without precursor. And last, Cutting (2005b:46) and Düring (2006:309) think that these buildings were most likely built collaboratively, which is rendered likely by the fact that they were used collectively. Building these large complexes together would have fostered social ties across household and neighbourhood boundaries through the mechanisms discussed at length with **Themes 2** and **11**: shared informal socialising time, shared meaningful experiences, as well as the investment—of knowledge, time, and in this case especially elaborate materials and techniques (Düring 2006:305)—into what was probably shared property. In conclusion, the evidence is convincing in favour of interpreting shared ritual buildings **#89** as indicative of communal integration. Another matter is how to archaeologically recognise a building as a shared building used for ritual, but that will be discussed further in Appendix 12.

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Figure 24 Building HV at Aşıklı Höyük (Düring 2006:Fig.4.11).

Workshop and storage buildings

At Tepecik Level 3 and Hacılar Level II, the excavators identified non-residential buildings interpreted as a food processing building (Bıçakçı et al. 2012:93) and pottery workshop respectively (Mellaart 1970c:31) that because they were detached from houses are interpreted to have been used collectively. Apart from these workshop buildings (#90), Tepecik 3 and Hacılar II both also had what was identified as large shared storage buildings (#91) (Bıçakçı et al. 2012:93; Mellaart 1970c:28), which were also found at Kuruçay 6 (Schachner 1999:60) and EBA Bademağacı (Bachhuber 2015:79) and possibly Aşıklı Höyük (Cutting 2005b:46; Schachner 1999:48). We will leave aside here the question whether or not these buildings can indeed be identified as workshops/storage facilities, and whether or not they were shared between households: these identifications are by no means uncontested, for example Düring (2006) and Bartl (2004:447) doubt the identification of the storage building at Aşıklı Höyük, and the Hacılar II example will

be discounted in Appendix 12. Instead, assuming such buildings did exist, can they be identified as architectural markers of suprahousehold integration?

First, Cutting (2005b:46, 130) mentions “supra-household activities” associated with the Aşıklı and Hacılar II storage and workshop buildings. This might refer to the construction and maintenance of the buildings themselves, as well as to the fact that the workshops allowed members of different households to conduct daily work activities in a place shared with others. This might also be what Hodder (1987:54) means when mentioning “socialised production” occurring around the Hacılar II storage building and pottery workshop. And indeed, similar to what was argued for **Theme 14**, members of different households processing food and making pottery either collaboratively or at least in each other’s company would have enabled much socialising and knowledge-sharing that fostered for social cohesion, as well as social control. Further, the mere fact that such shared-use buildings existed speaks for some collective investment in a place where shared production activity could be carried out.

Second, the Tepecik storage and food processing buildings have been interpreted by Bıçakçı et al. (2012:93) as evidence for “for common activities and pooling of food supplies”. It would, however, require further contextualisation and evidence to equate shared storage with shared ownership of the stored items: it cannot be excluded that while a storage building was used collectively, its contents were owned by individuals or individual households. The multiple problems with safekeeping especially plant staple foods, evidenced by the Çatalhöyük microfauna studies that recorded mouse infestations in many storage contexts (e.g. Bogaard et al. 2013:101, 117, 119), show that storage was a daily challenge to the inhabitants of the here studied villages. It is not impossible to imagine a solution whereby several households shared one storage facility and the work of caretaking of the stored items, but not actually shared the ownership of these items. In such a scenario, the ownership of food might not actually be shared, but suprahousehold integration would still be fostered by the shared work and knowledge that went into storage, and shared storage facilities also indicates an element of trust between households.

In conclusion, while collectively used storage or workshop buildings (**#90**, **#91**) do not necessarily imply the shared ownership of resources, they do indicate the suprahousehold sharing of socialising time, knowledge and work. They are therefore integrated on my list of architectural markers of communal integration, with the reservation that the shared use by several households needs to be archaeologically proven first.

To contextualise the discussion of **#89**, **#90** and **#91**, it is worth noting that large buildings and large plazas or courtyards inside the settlement where congregations and feasts could be held and large shared granaries are discussed by Bachhuber (2015:33, 67, 81-82, 114) as being of central importance to the cohesion of EBA villages and citadel towns, albeit here in an increasingly hierarchical context, whereby elites sought to integrate the residents of settlements as well as the more dispersed rural population into a community that could be more easily administered. For example, Bachhuber (2015:79, 114), coded with **#89** and **#90**) interprets the large multiroomed building ('palace', Duru 2008:146) located in the centre of EBA Bademağacı as one example for such a central institution, including storage space, with the following function: "There was a centre, whether in the form of buildings, court areas or arena-like spaces. These were 'high-level' integrative spaces where activities with commemorative or administrative significance were held. These could be places of community-wide feasting as part of celebratory occasions like marriages or harvest. They were also places of governance, where a specific kind of authority could be negotiated that was directly related to the production, circulation and consumption of farming products." It is tempting to interpret the Early Chalcolithic examples (Hacılar II, Kuruçay 11, Tepecik 3) mentioned in the discussion of **#89-#91** as the first intimations of such collective social-ritual-economic building complexes as found on EBA citadels, but at the same time it is possible that the knowledge of such EBA contexts has influenced the way Early Chalcolithic buildings are interpreted.

Enclosure walls

The enclosure walls #92 identified by the excavators of Aşıklı Höyük (Schachner 1999:48, 50), Hacılar II (Cutting 2005b:132, 137; Hodder 1987:54) and Hacılar I (Cutting 2005b:103) and Kuruçay 11 (Duru 2007:336, 2012:2) have likewise been associated with suprahousehold collaboration, as have those of EBA Acemhöyük and Bademağacı (Düring 2011a:79-80) and many other EBA places outside the study area, where they were a fairly regular feature. Again, the identification of such walls is in many cases by no means secure (see e.g. Düring 2006, 2011a; Rosenstock 2010a), but a discussion matter for Appendix 12.

How do enclosure walls indicate community integration? First, there is a notion that enclosure walls were built in communal collaboration (Cutting 2005b:103, 137). While I would object that it seems likely, but cannot securely be assumed, that a larger group of households pooled resources and labour in order to build such a wall, it seems difficult to imagine such a wall being built around the settlement without at least a process of consultation and decision-making that involved all of, or a large part of, the settlement community. This notion seems to be inherent in Duru's (2012:6) statement that "the fact that the settlement [of Kuruçay 11] was surrounded by thick walls highly suggests pre-planned organization" and Cutting's (2005b:137) "strong sense of collective purpose" evidenced by the Hacılar II wall.

Second, Cutting (2005b:132) mentions for Hacılar II that its "sense of a strong community organisation [...] is reinforced by the extent to which this fortified settlement was inaccessible to outsiders". This very interesting statement brings into focus one aspect of Neolithic/ Chalcolithic community integration that has so far not been discussed here: The research landscape as portrayed so far in this chapter clearly shows that the research community is focused on discovering the mechanisms that held Neolithic/ Chalcolithic communities together against the centrifugal forces that are presumed to have existed through the ingrained desire of households and individuals to be independent. Less attention is paid to the fact of how communities living in different villages related to each other, and whether and how they differentiated themselves from each other. There is clear evidence of

contacts between the so far excavated contemporary villages, e.g. through the distribution of Cappadocian obsidian discussed in Chapter 3.2.1. Further, the Hacilar II mentioned by Cutting co-existed with Kuruçay (Levels 12-8 in my chronology, see Chapter 2) which was located only 10km away, a distance that makes it seem impossible that they did not know of each other (see Umurtak 2011b:6 and Duru 1994c:110-111 for thoughts on a relationship of collaboration between Kuruçay and Hacilar). Indeed it is likely that once the cultural landscapes became more densely settled and diverse—see Chapter 3.3.4 for reconstructions of the EC Lake District and Konya plain as landscapes with many neighbouring settlements of different sizes and socioeconomic strategies—‘community’ was defined from the outside as much as from the inside, and in this context a display of community boundaries as inferred by Cutting might indeed have become meaningful for community cohesion. In this context, the scholarly debate of the EBA and its enclosure walls again becomes interesting. Their role in fortification will be discussed in Chapter 9, their connection with elite building in Chapter 7, but EBA enclosure walls have likewise been associated with “socio-ideological benefits, reinforcing a group identity within the settlement and simultaneously demarcating a social boundary of residents and non-residents (Düring 2011a:79).

Extramural burials

The final indicator in this theme refers to EC Tepecik 3, where only neonates were buried under houses but other individuals on unroofed spaces around the settlement, a practice understood by Bıçakçı et al. (2012:93) to mean that “the burials, encroaching upon common outside areas instead of being kept inside the privacy of the households” indicate communal social ties. Burials inside the settlement, but not inside houses, are so far in the context of Neolithic/ Chalcolithic southcentral Anatolia reported from Tepecik and Köşk Höyük (Öztan et al. 2010:256), and since investigations there are still ongoing and incompletely published, it is not possible to interpret this burial custom holistically. Burial location has however been shown in the **Theme 3** and **15** discussions to generally

be socially very meaningful in the study area, and therefore it will be very interesting to observe what ongoing excavations will reveal about the Tepecik 3 burials. While discussing **Theme 14**, I asserted that unroofed space inside the settlement cannot by default be seen as communal space, and so it would be possible to argue contra the statement made by Bıçakçı et al., and for example suggest that households reinforced their claim over unroofed spaces by interring their dead, in the same way as an encroaching of productive household space onto outside areas was seen in the context of new household autonomy (#46).

This is of course conjecture, but used here as an example of one possible alternative interpretation that is inspired by an interpretation of extramural burials in EBA Asia Minor as territorial markers by Bachhuber (2015:23, 84, 89, 94-95, 185). He sees the EBA cemeteries, of which a number has been excavated on a significant scale, in a dual function as both an arena where households negotiated their positions within the community by displaying burial goods and sponsoring feasts while interring their dead, and also a way for village communities to mark their territory in the landscape by asserting or invoking ancestral rights; this assertion of rights to land and ancestry then in turn also reinforced communal identity. It is of great interest here that Bachhuber (2015:94) explicitly contrasts the EBA cemeteries with Neolithic subfloor burials: “A useful distinction can be drawn between the extramural location of the cemeteries associated with EB I-II villages and the subfloor location of most known burials from Neolithic farming communities in Anatolia. One obvious contrast may be seen in the spatial disassociation from individual households and their life cycles. [...] If human remains in Neolithic settlements were bound into the life cycles of individual households, then human remains in the extramural cemeteries of the EBA were bound collectively into a village's historical claim to the landscape”. Bachhuber here relies on the now outdated interpretation of subfloor burials as being by default associated with household ritual, overlooking that in newer research burial location at Neolithic sites is interpreted as an items of negotiations between households (see **Theme 15**) not dissimilar to the way he sees burial during the EBA period as an opportunity for households to negotiate their relationship. He also overlooks the fact that also

during the Neolithic an appreciable part of the population of e.g. Aşıklı Höyük and Çatalhöyük might have been buried outside settlements (Düring 2003:8, 2006:89, 211). Nevertheless his remark indicates that the disappearing of subfloor burials (**Theme 5**) could indeed signify a new social-economic role of burial in negotiating relations between settlements instead of inside village communities. And this changed meaning could slowly have developed during the Early Chalcolithic: for example, the Tepecik burial pattern of babies inside the house and adults outside is reminiscent of EC Çatalhöyük West, where only two burials were found inside the settlement, both of neonates (Biehl et al. 2012b:85). At LN/EC Hacilar, very few burials were found inside the village, and only a very small number at LN/EC Kuruçay despite sizable exposures which is generally reconstructed as indicator for extramural burial places (Kuruçay: Duru 1994c:101; Hacilar: Mellaart 1970c:6, 37, 85). However, what exactly the change from subfloor to extramural burial meant for the Anatolian Chalcolithic has to be further researched, and is only partially accessible to a study of architecture. For the present purpose, burial in places other than the house seems (#93) might be of great, if under-researched, significance in the context of the LN/EC social transformation in southcentral Anatolia, but cannot currently be associated with either communal or household control over settlement space and burial, and is therefore here discounted.

6.4 Post-6500 BC household autonomy

Themes 5-8 are specifically about architectural changes at sites and levels dating to after 6500 BC, which have been connected to an increased household autonomy in the Late Neolithic and Early Chalcolithic. These thus describe the extension of the 'baseline' Early Neolithic household autonomy described in Section 6.2, and partially constitute a shedding of the community-integrating mechanisms described in Section 6.3. A substantial amount of the evidence and interpretation documented in this section relies on Çatalhöyük, not the only central Anatolian site that spans the EN-LN transition, but the one where the 6500 BC change has in recent years become a research focus. Some arguments from the discussions of

Themes 5-8 already transition into the discussion of household competition in Chapter 7.

6.4.1 Theme 5: Breaking with the Past

Theme 5 collects Çatalhöyük-specific architectural changes occurring after 6500 BC (upper levels of the East Mound, West Mound) that constitute a ritual breaking with the past or breaking with the rituals of the past. In particular, **Theme 5** describes a number of interrelated changes that together suggest an abandonment or weakening of the strong ritual ties between households that had been so efficient at integrating the Early Neolithic community at Çatalhöyük (**Theme 15**).

Decreasing symbolic house elaboration

The discussion around the decrease in symbolic house elaboration **#26** after 6500 BC at Çatalhöyük is partially related to, but also partially independent from, that of the abandonment of history houses which connects it with **#27/#28** and **#29** and which will be discussed in subsequent sections. It is understood as further proof for the abandonment of history houses (Hodder and Pels 2010:184) and history-making more generally (Hodder 2005c:12), but also indicates a weakening of the ritual ties between households displaying the same animal (**#85**) and has been related to a wider change in the socioeconomic relations between households towards more competitiveness and display. All these arguments combined clearly indicate a relation between decreasing elaboration and increasing household independence.

The last point listed here, that of increased competitiveness and display between households is based on an argument contrasting the decrease of house elaboration with the beginning of pottery painting. The Çatalhöyük team has suggested that when around 6000 BC more symbolic imagery was produced in mobile form, on pottery and stamp seals that might indicate body or textile decoration, this was related to the changing household-community balance (e.g. Hodder 2014d:167; Marciniak et al. 2015b:173). When symbolic house elaboration was still seen as evidence for household autonomy, this developments was seen as evidence for

a decrease of household independence: “First, stamp seals take the wall designs into a new mobile context, and then, right at the end of the occupation of the East mound and in the following Chalcolithic West mound, the designs that had graced walls within houses are found on pottery. In fact these later walls seem not to be painted except perhaps in one-colour washes. These changes suggest a gradual wresting of memory away from the house. The symbols that refer to myth and history now come to be used to create alliances and exchange relationships between houses” (Hodder 2005e:138, similarly 2005c:191, 195, 2006:167-168). Now, it is instead seen as evidence for the contrary, the increase of household independence: “Rather than placed on walls, the motifs are now on small mobile objects, perhaps transferred to skin and cloth. They perhaps became part of the new emphasis on building relations between independent productive units. Much the same can be said of the through time increase in the diversity of pottery forms and fabrics [...] and by the time of the West Mound, the symbols that had earlier occurred on house walls and had then been transferred to stamp seals, occur in abundance on an ebullient painted Chalcolithic pottery” (Hodder 2013a:23, similarly 2014e:182). Chapter 3.3.3 discussed competitive hospitality as one interpretation of the beginning of pottery painting in the southcentral Anatolian Chalcolithic. The decreased concern for house elaboration is seen in the context of this development: In mobile form, it is argued (e.g. Hodder 2013a:23), imagery now was used, or was used more pronouncedly, to assert household status during commensal events and thus lost its role in suprahousehold integration. **Theme 8** will discuss more architectural evidence for increased social display and competition.

Decreasing (asymmetric) subfloor burials

A decrease/abandonment of the practice of clustering burials in a few houses (#27), and finally a complete abandonment of subfloor burial (#28) has been observed for the upper levels of Çatalhöyük including the West Mound. The wider context of these changes is more complex: Düring observes a gradual development in the upper levels of Çatalhöyük, whereby the location of burial clusters is first (in

Mellaart Level V, dated to ca. 6400 BC, Hodder 2014b:Tab.1) disconnected from building continuity, i.e. buildings with many burials (#87) do not also have long rebuilding histories (#88). He interprets (Düring 2006:228-229, 247, 300-301, 313, 2011c:132) this as a sign that patterns of social/ritual dominance changed, and now individuals were able to command enough authority to collect burials in their house even if they did not reside in a building with a long history. And further, “after level V, buildings containing large populations of sub-floor burials are no longer attested” (Düring 2011a:132, also 2006:300), which Düring (2011c:132, 2013c:88) understands as an abandonment of the system whereby a group households are integrated by their shared relation to a ritually elaborated ‘history’ or ‘lineage house’ (#87).

Hodder (2014c:19; also Marciniak 2015a:91; Marciniak et al. 2015b:173) agrees that an abandonment/decrease of burial clustering (#27), or subfloor burial in general (#28), indicates greater household autonomy, but also attributes this change more generally to a decreased concern with constructing social relations through ancestry and memory (Hodder 2005b:12, 2006:58, 2013b:21, 2014c:19)¹²: “The long-term trend is that the prevalence of house burial and ancestry-making declined and transformed in the upper levels: in TP multiple burials and a ‘tomb’ [#19] have been found, and by the West Mound adult burial in buildings seems to have ceased. One possible interpretation is that this overall trend is linked to the decreasing emphasis on house-based history-making the upper levels” (Hodder 2014e:179).

The newest research at Çatalhöyük has also detected other changes related to burial location in the upper East Mound levels, for example that burials more regularly occurred not under platforms (Hodder 2014b:15); the already mentioned (#19) burial chambers in the TP excavation area (Marciniak and Czerniak 2007:120-121) as a new burial form; and an increase in the use of burials as foundation deposits (Hodder 2013b:21, 2014e:181) which included two unusual foundation deposits that combined human and animal bones (Marciniak and Czerniak

¹² Note that in the copy of Hodder (2006) used by me, there seems to be some errors (misplacing of paragraphs and pages) in the printed version between p.252-254, which happens to be where the authors discusses changes in the upper levels of the East Mound and the West Mound, a full understanding of which is impaired by the printing error.

2007:120-121). The increase of burial foundation deposits seems to contrast with the overall trend towards less history making and the decrease in building continuity **#29**; and the TP burial chamber attests to a continued importance of group burials. These observations suggest that the patterns and developments of burial changes in later Çatalhöyük, and the connection with household autonomy changes, might be more nuanced than currently understood, and the complex changes to burial and burial location in the upper East Mound, which is still being excavated at the time of writing, will probably become much better researched soon. At the moment, however, there is nothing to contradict Düring's and Hodder's observations of a decreased concern post-6500 BC with forging suprahousehold ties through co-burial.

Decreasing building continuity

Further evidence for the decline of history-making, and history house-making, and thereby increasing household independence, comes from the decrease in building continuity **#29** and building lifespans **#30** which can be observed in post-6500 BC houses at Çatalhöyük in general (Hodder 2005c:190, 2006:254, 2014b:15, 17; Marciniak 2015a:96) as well as in history houses in particular (Düring 2011c:132, 2013c:88; Hodder 2014c:19; Hodder and Pels 2010:184). With indicator **#27**, I already discussed the decoupling of building continuity and burial clustering observed in Level V around 6400 BC, which indicates that ritual/burial was no longer controlled by the residents of houses with long histories. There is also a second argument for a connection of decreasing building continuity with increasing household independence: With **Theme 7**, I will discuss that as households grew more independent, they were able to modify their houses more freely and more regularly according to their changing needs (**#39**), and it is logical that larger changes to the house necessitated an abandonment of following the footprint of the previous building. Düring (2006:229, 298, 313) therefore sees **#29** and **#39** as evidence that households now came to actually own the houses they lived in, whereas previously houses might have been owned by a group encompassing

several households (see discussion of **#88**). Düring (2006:228-229) seems to see the abandonment of burial clustering **#27** and thereby ‘lineage houses’ as additional evidence for the fact that households came to independently own their residences after 6500 BC; the two arguments are therefore related.

In sum, a decrease in symbolic house elaboration **#26**, in building continuity **#29** as well as the life span of buildings **#30** and an abandonment of the clustering of burials **#27** together indicate an abandonment or weakening of the ‘history house’ concept—and/or a change in the social role of such houses more towards a socioeconomically dominant position (Düring 2006:247; Hodder 2014e:175, 182, 2013a:25; Hodder and Pels 2010:184), that will be further explored in Chapter 7. The two interrelated trends towards less history-making, and less history house-making can confidently be associated with increased household autonomy: the individual household seems to have become more independent from the ritual ties binding it to other households, as well as from the shared history that was identified in **Theme 15** as so significant for maintaining and naturalising the strong collective identity of Early Neolithic Çatalhöyük. Hodder’s (2014f:179) remark about a decrease of history making is particularly interesting in the context of this theme ‘breaking with the past’: it suggests that in order to become more socially and economically autonomous, the Çatalhöyük households of around 6500 BC had to rid themselves of some connections to the past; a past in which they had not been that independent.

Ritual house burning

The final indicator in Theme 5 relates to remarks by Hodder who tentatively connected the 6500 BC-change at Çatalhöyük with an increased rate of intentional houseburning **#31**: “Whether the change at 6500 BC was sudden or drawn out needs to be substantiated by new excavation of the South N and O levels. These levels are associated with a horizon of burning of individual houses that seems to have been controlled and managed, rather than the result of largescale violence. Debate remains as to whether the burning could have been accidental (Cessford,

Near 2005; Twiss et al. 2008), but, given its restriction in occurrence in the sequence, some link to changing rituals and to the tensions in South N and O and North G seems possible” (Hodder 2014b:17, similarly 2014c:19, 2013b:22). This statement can be compared against an observation by Düring (2011c:103): “The richest assemblages of moulded features and installations are found in burned buildings. An interesting question is whether these buildings are so rich in these features because they were burned, or whether these buildings had to be burned because they had been charged with so many of these features.” These careful suggestions receive more traction when seen in the context of **Theme 5** which has so far collected clear evidence that the 6500 BC social change was connected to the shedding of ritual ties that bound households to each other, and of ritual ties to the past. In this context, it can be suggested that the burning of elaborate houses, which had come to signify the ritual relations between a group of households, was a particularly drastic way to shed these ties. It also connects to some other rather drastic changes at the site that will be discussed with **Theme 6**, for example the fact that a substantial number of people seem to have left the settlement around 6500 BC, and that the clustered layout that had characterised the site was abandoned.

A connection of houseburning to the 6500 BC-change as suggested here can be tested by showing that first, intentional houseburning was indeed limited to, or particularly frequent in (as indicated by Haddow et al. 2015:22; Hodder 2014d:159, 2014e:170, 2014c:19), the middle levels of the site that date to around 6500 BC (i.e. Mellaart levels VI-V, equalling South N-O and 4040 G-H); and that second, the burnt buildings had previously been distinguished by having particularly many burials (#87), particularly much elaboration (#86) and/or a long rebuilding history (#88) (Hodder 2013a:18-19, 2014d:159). To check this, I tabulated (Table 6) all buildings that were reported as ‘burnt’ by the Mellaart and Hodder teams, as well as their date (level), elaboration status and building continuity status, i.e. whether they followed the footprint of a predecessor building. The table, necessarily limited because limited to an expedient survey of published information, displays clearly that houseburning is restricted to the middle and upper levels of the site, was particularly prevalent in the centuries around 6500 BC (Mellaart Level VI, Hodder

Levels South N-O), and that a majority of burnt buildings can be classified as elaborate. Although taphonomic processes might distort these results, for example many more buildings were excavated from the middle and upper levels than from the lower ones, and also burnt buildings are better preserved and might therefore more easily be recognised as ‘elaborate’ (Hodder 2014e:177), the table clearly indicates that the relation between house burning, elaboration and the 6500 BC-social change is an interesting subject for further, more holistic research that could also for example include studies of the genetic relations and diets of those buried in burned houses; the ways in which houses were prepared for abandonment prior to the fire; the re-organisation of the local settlement fabric after the fire; and the ways in which they were burned, for which a variety was recorded by Harrison et al. (2013). To foster further research, indicator #31 has been included on my indicator list; however, this indicator might be specific to Çatalhöyük and the above outlined processes of how the community of Çatalhöyük constructed a new social system after 6500 BC unless at other sites houseburning can also be cross-referenced with elaboration and building continuity in a similar way as described here.

| building number | Level (Hodder) | building category after Hodder or Mellaart | building continuity status (possible predecessor buildings) |
|-------------------------|----------------------|--|---|
| B.79 = VIB.70 | South O | shrine | no information |
| B.80 | South O | no special status mentioned | no information |
| B.77 | 4040 ?G | large/elaborate | no information |
| B.45 | 4040 H | large/elaborate | probably no direct predecessor building |
| B.52 | 4040 G | large/elaborate | probably no direct predecessor building |
| B1.2c | 4040 ?G | history house | part of the history house sequence B1.2b-B 1.2c-B.5 (Hodder and Farid 2014:Tab.1.2) |
| B.63 | IST (Late Neolithic) | no special status mentioned | no information |
| A.III.1 | TP6 | shrine | no information |
| A.II.1 | TP6 | shrine | no information |
| A.III.8 | TP6 | shrine | no information |
| VI.31 | South N-O | shrine | a predecessors in Level VII (Düring 2006:Fig.6.27, 2011c:Fig.4.14) |
| VI.44 | South N-O | shrine | built on VII.44, both with leopard reliefs (Düring 2006:199) |
| A.VI.1 = A.VI.61 | South N-O | shrine | no information |

| | | | |
|---------------------|-----------|--------|---|
| E.VIA.1 = E.VI.1 | South N-O | shrine | two predecessors in Levels VII and VIII (Düring 2006:Fig.6.27, 2011c:Fig.4.14) with similar painted motifs (Düring 2006:193-194, 2011c:102) |
| E.VI.5 = VIA.5 | South N-O | shrine | no information |
| E.VI.7 = VIB.7 | South N-O | shrine | two predecessors in Levels VII and VIII (Düring 2006:Fig.6.27, 2011c:Fig.4.14) |
| E.VI.8 = VIB.8 | South N-O | shrine | two predecessors in Levels VII and VIII (Düring 2006:Fig.6.27, 2011c:Fig.4.14), with similar painted motifs and reliefs (Düring 2006:193-194, 2011c:102, 106) |
| E.VI.10 | South N-O | shrine | succeeded by V.3 (Düring 2006:197) |
| E.VI.14 = VIB.14 | South N-O | shrine | two predecessors in Levels VII and VIII (Düring 2006:Fig.6.27, 2011c:Fig.4.14) |
| E.VI.25 = VIA.25 | South N-O | shrine | a possible predecessors in Level VIII (Düring 2006:Fig.6.27, 2011c:Fig.4.14) |
| E.VIA.50 | South N-O | shrine | no information |
| VII.23 | South M | shrine | no information |
| VII.32 | South M | house | no information |
| E.VII.24 | South M | shrine | a predecessors in Level VIII (Düring 2006:Fig.6.27, 2011c:Fig.4.14) |

Table 6 Burnt buildings at Çatalhöyük, and their date and elaboration/building continuity status. Information collated from Cessford and Near 2005; Düring 2006; Farid 2014; Harrison et al. 2013; Hodder 2014d; Hodder and Farid 2014; Hodder and Pels 2010; Mellaart 1962b, 1963e, 1964, 1966b, 1967. Also note Düring (2006:Tab.6.1) for the concordance of different numbers used by Mellaart for the same building.

6.4.2 Theme 6: Giving each other Space **Breaking apart**

Theme 6 combines three markers that describe a spatial disassociation of houses and connect it with a high or increased household autonomy. Indicators **#32** and **#34** describe the breaking-up of clustering and neighbourhoods/sectors at Çatalhöyük East after 6500 BC. The somewhat independent indicator **#33** refers to never-clustered sites like Tepecik or Bademağacı.

De-clustering Çatalhöyük

At Çatalhöyük, **Theme 6** is set within a larger development after 6500 BC, when the settlement's population shrank substantially and there was a local and regional trend toward greater population dispersal within the landscape (see Chapter 3.3.4;

Düring 2011c:155-156, 199, 2013c:88; Hodder 2014e:183, 2013a:21). Concurrently, the remaining population also dispersed across the mound of Çatalhöyük East, with large gaps forming between houses and house clusters (**#32**, Düring 2011c:132; Farid 2014:110-112; Hodder 2014b:12, 2014e:183; Hodder and Farid 2014:32, Fig.4.2). This re-organisation of society and settlement space also resulted in a diffusion of the spatial subdivisions (sectors/ neighbourhoods) that had existed before 6500 BC (**#34**). The breakdown of spatial clustering and sectoring (**Theme 6**) is closely related to the breakdown or abandonment of ritual ties (**Theme 5**). Both were in Section 6.3 identified as the possibly strongest suprahousehold integrative factors at Neolithic Çatalhöyük. The population dispersal and settlement shrinking is in current research portrayed as either a result or a cause of the trends captured in **Theme 5** and **6**: Düring (2007b:176, 177) has suggested that the population dispersal might have been caused by the breakdown of the various cohesive ties at Çatalhöyük, after which living in such a large agglomeration might not have been viable any more: “The size of the community at this site began to decline when the social filter of the neighbourhood community disappeared”. Somewhat differently, Hodder (2014b:11, similarly 2014b:16, 2014d:167, 2014e:179) formulated that people were free to leave after the various cross-ties had disintegrated: “Because the focus was more on individual house production, the dependence on large cohesive populations to provide a safety net declined: population decreased and dispersed”.

From an examination of the text passages coded for **#32** and **#34** it appears that the reason why previous researchers have interpreted these trends as indications for the increasing autonomy of individual households or small groupings of households is quite simply that the abandonment of clustering and sectoring would have meant a dissolving of the mechanisms that have been explored in **Themes 9/10** of how clustering and sectoring bring about social cohesion in the first place. These integrative mechanisms would increasingly weaken as houses moved further away from each other: informal daily interaction decreased as well as social control (Düring 2011c:132), and the latter is especially interesting in the context of increasing social competition and the ‘hiding’ of household property that will be

discussed with **Theme 8** and in Chapter 7. And while households might still have been part of larger groupings, this was no longer expressed and reinforced by co-residence in a house cluster (Düring 2006:234; Gérard 2002:107). Hodder (2006:254) further points out that de-clustering also meant that households spatially disassociated themselves from their 'history house'; in **Theme 15** it was argued that the drive to cluster might also have been promoted by the desire to be spatially close to the ancestry and memory each household deposited in the history house. Together with the abandonment of building continuity and the 'history house' system (**Theme 5**), the de-clustering and breakup of neighbourhoods is seen by Düring (2006:247, 298) as an indication that households now came to own the house they inhabited. The abandonment of clustering **#32** has further been connected (e.g. Hodder 2013a:21; Marciniak 2015a:91) with the increased spatial needs, also of unroofed space around the house, that households had once they became economically more independent and increased their independent productivity (**Theme 8**), becoming "literally and productively more isolated from one another" (Bogaard et al. 2014:123). The physical distancing would therefore have developed alongside with less sharing of resources and labour (Hodder 2013a:24, 2013b:26, 2014c:6, 2014d:150).

The fact that **#32** and **#34** can be cross-referenced with so many other developments and indicators that together show a breakup of intermediate and larger social groupings at Çatalhöyük after 6500 BC, prominently those of **Theme 5** and **Theme 8**, makes it possible to confidently see them as indicators of increasing household autonomy. That this was not necessarily a straightforward process is indicated by an interesting case from Level 4040 G, dated exactly to the time of the large social change between 6500-6400 BC (Hodder 2014b:Tab1), where "one of the most distinctive of these radial lines in the 4040 Area was broken by the construction of B.52, to be followed by a reinstating of the radial division during the construction of the following B.51. It is also of interest that we have evidence in the 4040 Area for the movement of radial divisions" (Hodder and Farid 2014:29). These developments suggest an adjustment period during which the change or abandonment of sectoring was negotiated, possibly reflecting an adjustment period

in the dissolving of the previous 'sector' groups, or changing affiliations of individual households with such groups.

Non-clustered site

How about Neolithic and Chalcolithic sites that never were clustered (i.e. there is more than a few centimetres of space between houses)—can their non-clustered appearance be seen as evidence for a lower level of communal integration (**#33**) as compared to clustered sites? Indicator **#33** forms part of this overall theme of interpreting detached settlement layouts, but importantly describes a very different cultural context (and a wider chronological and geographical radius, referring to a range of Neolithic and Chalcolithic sites) as compared to **#32** and **#34**: Different from the process at Çatalhöyük, reasons to choose non-clustering at other sites might have been entirely different since they were set in a completely different cultural framework; the village community did not abandon clustering—they never had been clustered.

Although several researchers have associated the non-clustered appearance of some southcentral Anatolian sites with household autonomy, this interpretation is not clearly argued but more assumed. One reason for this assumption seems to be a dichotomy (clustered = strong community integration, not clustered = no strong community integration) based on a comparison and contrasting with clustered sites, noticeable for example in Bıçakçı et al.'s (2012:92) characterisation of Tepecik 3 in comparison to EN Aşıklı Höyük and Çatalhöyük, or Schoop's (2005b:48) contrasting of LN Lake District and Konya plain settlements. Such comparisons and interpretations seem to partially base on researchers' perceptions of larger patterns whereby some regions (e.g. Lake District vs. central Anatolia, Schoop 2005b) or time periods (earlier prehistory vs. later prehistory, Bıçakçı et al. 2012:92; Düring and Marciniak 2005:178; Steadman 2000b:190) are primarily characterised by clustering and others not. For example, Bıçakçı et al. (2012:92) state while discussing Tepecik 3 that "the Early Chalcolithic architectural layout does not follow the static honeycomb organization of households that characterized the aceramic period in

Aşıklı [...] and later on at Çatalhöyük”, thereby contrasting the Neolithic with the Early Chalcolithic. Such thoughts can be easily disqualified since it has already been shown that the occurrence of clustering is not clearly chronologically/regionally patterned (Düring 2006:281, 2011:77; Rosenstock 2014:237, Fig.12): for example, Boncuklu Höyük (dated 8400-7800 BC, Baird 2014:8703), was not clustered while contemporary Aşıklı Höyük Level 2 (dated 8000-7500 BC, Stiner et al. 2014:8405) was; and in the above cited statement Bıçakçı et al. overlook that Tepecik Level 3’s contemporaries Çatalhöyük West and Canhasan 2 (see Chapter 2) were clustered.

Setting aside such potential research biases, based on the material already collected in this chapter, a number of reasons can be found why the existence of unroofed spaces separating individual houses from each other could indicate a weaker communal integration: social control, and informal socialising and sharing would be weakened if people did not spend their days in close proximity of each other, and inadvertently meet members of other households often while going about their daily tasks. The physical detachment could also symbolically signify a greater socioeconomic detachment. At this point however, it is possible to object that clustered/ nonclustered are not absolute categories; within the particular study region of Neolithic/ Chalcolithic southcentral Anatolian, all settlements were very dense, ‘clustering’ might rather work on a gradient and the clustered-unclustered distinction might have been exaggerated in previous research. How much independence would households really have gained through the 2-4m between houses at Bademağacı ENII3 (Duru 2008:Fig.45), or the between 1m and 3m that separated individual houses at Tepecik 3 (Bıçakçı et al. 2012:Fig.5)? Or asked differently: At what point are houses far enough to assume that their inhabitants were not able to monitor what and who entered or left the other group’s house, or to informally socialise while walking to and from their houses or sitting in front of the house? And that they must also have cooperated or at least communicated when one of them wished to build, modify or dismantle a house? And especially if a study of outdoor spaces (**Theme 14**) shows the area between houses to be busy production areas, villagers might not gain any privacy from detached house walls. In conclusion, while spatial closeness can be associated with social closeness for

reasons discussed in **Theme 9**, the mere fact that house walls are detached from each other, or had a few meters of space between, might not make a substantial difference for household autonomy (cf. Steadman 2000b:190). Indicator **#33** is therefore discounted here, specifically because the settlements within the study region that are typically described as non-clustered were still very dense.

6.4.3 Theme 7: Building independently

Theme 7 describes attempts to discern at Çatalhöyük that house building techniques changed over time alongside social changes to more household autonomy. Two subgroups of indicators were identified: those dealing with building materials and techniques (**#35-#37**), and those describing changes to house layouting (**#38-#39**).

Material changes

In an earlier publication, Hodder (2006:252-253) related shrinking average brick sizes (**#35**) to greater household independence: “The bricks get gradually smaller through time until in the upper part of the sequence there are small rectangular bricks that can be held in one hand. Placing them on the wall with mortar could be done more quickly and with just one person. This is just one small example of how houses became more independent and self-sufficient” (Hodder 2006:252-253).

More recently, Hodder (2013a:25, 2013b:28, 2014e:175) observed that as houses grew in size (**#40**, below), they needed more durable wood to hold up the roof and therefore the preferential choice of wood changed from oak to juniper (**#36**), even though the latter required more effort in processing. Marciniak et al. (Marciniak 2015a:94; Marciniak et al. 2015a:159, 163) further point out that the Late Neolithic levels at Çatalhöyük also show a shift towards a preference of riparian woodlands, i.e. from the banks of the Çarşamba river next to the site, over more distant sources; and further discerned “changes in architectural practices and construction techniques which, unrelated to wood availability, were less timber-dependent

compared to earlier periods". Both changes, that to nearer sources and to less wood used overall in building (**#37**), are interpreted by Marciniak et al. as a possible shift from construction practices that needed a larger group of people to more independent building by the individual household.

Although it is interesting to consider how house-building techniques might have changed in the wake of households becoming economically more independent, as well as competitive, the evidence basis for **#35**, **#36** and **#37** seems thin for a number of reasons. First, without wanting to discuss this in detail, the above mentioned trends and changes might not have been as clear-cut at Çatalhöyük; they seem to be called into question for example by Love's (2013a:Tab.5.3) tabulation of brick sizes that indeed shows shrinking sizes between the lower and middle levels, but also shows a clear increase in brick size after the middle levels, and also by the fact that **#37** and **#36** are to a certain extent in contradiction: more and harder wood needed to roof larger houses (**#36**) seems to somewhat contradict the claim of less timber-dependent construction techniques (**#37**).

Second, even assuming that these changes did indeed take place, the basic notion that markers **#35**, **#36** and **#37** are based on might be flawed as already pointed out in the discussion of **Theme 11**: large effort, or large building components (timber, bricks) cannot be automatically equated with the involvement of a suprahousehold group, just as more easy-to-handle components cannot be equated with household-independent building. Just because a large brick might require 2-3 people to carry it, does not mean that these people were from different households; or vice versa, people might choose to share building with others (and other households) even if they would be able to carry the smaller bricks themselves. Just because it would have been easier and faster to build a house with a large group of people (Stevanović 2012b:201-202, 2013:112), does not mean that this is what people chose to do. Love (2012:140-141, 2013b:747, 2013c:264-265) repeatedly points out that builders have a high degree of agency when choosing how to build, as shown in ethnographic work, and her work on Çatalhöyük has also revealed that Neolithic builders possibly chose to exert that agency in ways that were not as rational/functional as the ideas behind **#35-#38** seem to imply. For example, she suggested

(Love 2013c, discussed with **Theme 2**) that household-specific mudbrick recipes played a role in displaying household identity during construction. In this scenario, the construction process becomes a stage for the negotiation of relations between independent households—and that necessitates the involvement of other households in the process, precisely to create an audience. Such processes might have stayed important or even increased in importance after 6500 BC, especially also taking into account the increasing economic and social competition (Chapter 7) that arose between Late Neolithic and Early Chalcolithic households; conducting house building completely independently might therefore not even have been desirable to a household wanting to assert itself.

Third, based on the discussion so far, it would be possible to interpret the evidence completely differently and hypothesise that changes to construction techniques post-6500 BC, or the processes behind them, might have looked very different from what has been suggested in the literature. For example, it could be argued that these changes (**#35, #36, #37**) do indicate increasing household autonomy, but by different mechanisms and processes than those suggested in the literature: The fact that households in the TP period (dated between 6300-6000 BC, Marciniak et al. 2015b:163) started to use large amounts of local wetland wood to build their houses, access to which seems to have been by communal agreement restricted in the centuries prior (Asouti 2013:131-132, 152-153, Tab.8.3; Marciniak et al. 2015a:159, 163), might be interpreted in terms of status assertion and competition by/between households. And whether or not other households were actually involved in the construction of homes after 6500 BC, or just onlookers, the spectacle of handling many large bricks to build large houses (**#40**), cutting juniper close to the settlement and then laboriously processing it (**#36**) could be seen as the newly independent and competitive households taking an opportunity to show off to others.

Or alternatively, the same evidence could also be interpreted as showing greater suprahousehold control over building processes: Sourcing wood from the river close to the settlement can either be seen as a way to render unnecessary the involvement of a large working group (although see my remarks about wood

procurement trips for indicator **#62** in Theme **11**), as by Marciniak et al., but alternatively it could be argued this might have required more coordination between different households and groups to ensure the stability of the local environment (see discussion of **#10**). The increasing brick sizes observed by Love could be seen as a return to communal building, if following the same logic that equates small bricks with household independence. By the same logic, the increased effort in house building that would have gone along with larger and more complexly structured (multi-roomed) houses (see **Theme 8**) and harder juniper wood would be additional evidence for the involvement of a suprahousehold group into the construction of Late Neolithic houses.

Without wanting to claim that any of these ideas are any more likely than the suggestion by Hodder and Marciniak et al., I wanted to make the point that it is possible to interpret the available evidence on changing building techniques in the upper levels of Çatalhöyük East in completely different ways; and even though many of the hypotheses I noted here still essentially argue for an interpretation of the observed changes in terms of growing household independence, the exact processes and mechanisms by which house construction changed as households became economically independent, yet connected by competition, are poorly understood at Çatalhöyük and even more at other sites. For this reason, markers **#35**, **#36** and **#37** will be discounted here. Nevertheless, this brief discussion has shown that the change of construction techniques in the context of household competition is a potentially fascinating research topic that deserves more research in the future.

House idiosyncrasies and idiosyncratic use lives

Further, an increasing idiosyncrasy of internal house layouts and house use lives in the Late Neolithic at Çatalhöyük was potentially related to increasing household autonomy. Hodder (2005d:29, 2013b:25, 2014d:156; Hodder and Farid 2014:27; similarly Stevanović 2012c:67 has interpreted the way that houses at Çatalhöyük are all designed similarly (**#64**), yet differ in small details of their internal

arrangement or furnishing (**#38**; see also **#59** which discusses evidence for ties between a number of houses sharing the same idiosyncrasies), as an expression of household autonomy that existed in balance with the tight communal integration: “overall, we see at Çatalhöyük a tension between the individual and the group, seen most clearly in the standardization of house layout, while at the same time each house is slightly different in its internal arrangement” (Hodder 2006:232). Examples given by Hodder include pot set into floors, oven shape, as well as items of more ritual nature such as which animal bones were included into mouldings in the house, or burial custom. These examples of indicator **#38** are often discussed by Hodder in combination with the idiosyncratic use of building materials (see **Theme 2**, ‘Constructing individualities’) and might indeed have worked by similar mechanisms, supporting an independent household identity through household-specific knowledge, practices and also the display of such idiosyncrasies to others who visited the house. Further, house idiosyncrasies can be contrasted with the community-integrating force of house standardisation (**#64**); **#38** is therefore accepted here as in indicator of household autonomy. Since the examples given by Hodder all date to the middle and later levels of Çatalhöyük East, they have been combined with this theme in the Late Neolithic section of this chapter, instead of with **Theme 2** that describes the Early Neolithic, even though Hodder seems to describe **#38** rather as a general feature of the site, not as a particular change after 6500 BC. My observation about the dating of the examples listed with **#38** might however indicate that this particular way of expressing household independence only developed as households grew more independent around 6500 BC.

A number of scholars suggested that regular small-scale modifications to the house (**#39**) indicate household independence: Matthews (2012:215) attributes changes of the use of different areas in B.3 (also post-6500 BC) as evidenced in micromorphology to “different rhythms of the household”. Similarly, Stevanović (2012c:67) attributes changes of the furnishing of B.3 and its neighbours to changes in household composition. An issue with these examples is that there seems to be little evidence other than the modifications themselves to prove that they were initiated by changes within the resident household. A different line of

argumentation is provided by Düring, who contrasts frequent modifications to the house with the practice of building continuity (#88) which indicates suprahousehold control over built space, accordingly arguing that independent, idiosyncratic changes to a house should indicate the ability of households to maintain and change their residential space (Düring 2006:97, 112, 228, 298, 313; Düring and Marciniak 2005:179). This understanding is based on ethnographic analogies, since “in virtually every ethnographic study it is demonstrated that households are very dynamic units when analysed diachronically, expanding and shrinking in size and adapting their houses accordingly” (Düring 2009:31; similarly Asouti 2005a:87). Although Düring connects this observation primarily with building continuity (#88), and does not explicitly refer to examples of changes to the house between rebuilding episodes as Stevanović and Matthews do, the ethnographic “dynamic cycles of waxing and waning of individual structures” (Düring 2006:298) sounds similar to the remarks made by Stevanović and Matthews and they will be discussed together here. Since Düring explicitly records that an adjustment of house space to household needs is generally absent at Early Neolithic sites (Çatalhöyük and Aşıklı Höyük, Düring 2006:228, 313, 2005:21), but recognisable at post-6500 BC sites (Çatalhöyük, Tepecik and Köşk Höyük, Düring 2006:298, 2011c:156), indicator #39 has been combined with this post-6500 BC theme.

The contrasting of (idiosyncratic, or idiosyncratically timed) modifications of the house (#39) with building continuity (#88) is interesting, although it could be argued that both are not completely mutually exclusive, since the two could constitute independent processes working on different timescales: it is perceivable that the larger-scale abandonment and rebuilding of houses was seen as a very different matter as compared to the ad-hoc rearranging of internal space; one might have been administered by a community, the other by the resident household, thus constituting another example of community-household balance. This observation does not, however, essentially contradict an interpretation of #39 as supporting household autonomy. There is also a further argument in favour of indicator #39 in the fact that household-administered modifications to the house might not only clash with suprahousehold control over the continuity of the house ‘shell’ (building

continuity, #88), but also over the standardisation of the house interior (#64). Altogether, the issue of house modifications seems incompletely explored in the context of the household-community balance, and such questions need to be addressed through further research; indicator #39 is therefore included into the analysis.

6.4.4 Theme 8: More Productive Space

Theme 8 describes how houses changed in the Late Neolithic when households became economically more independent, and their residences had to change alongside this development in order to facilitate the higher household-specific productivity that characterised the post-6500 BC world: changes in house size (#40, #41), internal structuring (#42, #43), the size or amount of storage and cooking installations (#44, #45) as well as a more intensive use of unroofed areas adjacent to houses (#46). **Theme 8** already has some connotations of social competition that transition into the discussion of the next chapter (**Themes 17, 18**). In fact, some architectural indicators (e.g. increasing house size #40 and number of rooms #42) have been in the literature connected to increasing household autonomy and with increasing social competition; they will therefore be discussed here and in Chapter 7.

House size and internal subdivision; storage and ovens

That houses on average increase in size (#40) after 6500 BC was noticed as a trend in southcentral Anatolian archaeology in general, comparing sites from different periods (Cutting 2005b:137; Düring 2006:314, 317; Hodder 2014b:10; Steadman 2000b:178, 182), as well as studying house sizes at Çatalhöyük East in particular (Hodder 2014c:12, 2014e:175), which has the largest sample of houses from either side of the 6500 BC mark. As houses at Çatalhöyük and other sites grew in size (#40), they also became more complexly structured by including a larger number of rooms, including second stories (#42) than they typically had before 6500 BC. One

text passage was coded that seems to state the opposite of **#40**, instead relating smaller houses to increased household autonomy (**#41**), but Marciniak's (2015a:96; Marciniak et al. 2015a:163) remark that "This typically Neolithic system came to an end some time after the middle of the 7th millennium cal. BC and were [sic] gradually replaced by smaller, less permanent and more self-sufficient houses" can probably be seen as a typing error because in the same sources he describes larger houses as being connected to increasing household independence (Marciniak 2015a:91, also in the TP description following that), and thus be discounted easily.

As a general trends, increasing house size and number of rooms (**#40, #42**), have been explained with a number of causes that link it with household autonomy: Since social competition increased at the same time as household autonomy, and each household building larger houses might also have played a role in this competition (Düring 2006:314, 317; Hodder and Farid 2014:34). Moreover, the increased size would also have supported the increased desire to shield household resources and activities from social control that will be discussed with **Theme 17** (Steadman 2000b:182) as well as accommodating the competitive hospitality that will be discussed with **Theme 18** (Hodder 2014c:19). An alternative explanation for the increasing house size trend of the Late Neolithic was tentatively suggested by Düring (2006:314) who remarks that the increase in house size could instead be due to an increase of the average household size. When discussing **Theme 19** in Chapter 7, I will outline that these two explanations are not necessarily mutually exclusive: households could have grown in size and become more autonomous, or possibly they grew in size because they became more autonomous and competitive.

At Çatalhöyük specifically, both trends, increasing house size and number of rooms (**#40, #42**), have been related to increased household autonomy by attributing both to the fact that the now more autonomous households needed more space, as well as functional subdivision, to accommodate increased independent productivity (Hodder 2006:58, 256, 2013b:21, 2014b:10, 12, 2014c:19). Increased household productivity became necessary when the social security system (**Theme 15**) that had allowed individual households to rely on help from others in times of hardship came to an end around 6500 BC (**Theme 5**); but also became possible or attractive

when households were able to work for their own benefit (Hodder 2013a:21, 22, 25, 2013b:28). At the same time, also the average (architecturally visible, built) storage space per house increased (#44) which is equally interpreted by Hodder (2013a:2, 24, 25, 2014b:10, 2014e:182; Hodder and Farid 2014:34; similarly Steadman 2000b:182 about Çatalhöyük and Hacilar) as part of the increase in independent household productivity. Within the broader discussion about increased household-specific productivity at Çatalhöyük after 6500 BC, it is of particular interest to consider the relationship of increasing house size and subdivision (#40, #42) as well as possibly storage capacity (#44) to two kinds of economic activities that grew to be of major importance in enabling the new household autonomy, and later competition and stratification (see 3.3.3): sheep herding and meat production, and craft specialisation.

Hodder (2013a:21, 2013b:28) has considered a relation of the Late Neolithic Çatalhöyük house size/room increase (#40, #42) to the increased reliance on animal products, and animals as a regular subsistence source and wealth marker: “The final processing of sheep bones for meat, marrow and grease took place inside the house associated with hearths and cooking pots. The house became an increasingly active location for the processing of sheep and cattle meat and protein. This may be one reason that the sizes of houses gradually increase through time” (Hodder 2013b:18, 2014b:14). The evidence basis for this relation of increasing house size to increased pastoral productivity will be scrutinised in **Theme 24**; it cannot be seen as certain, but is interesting to consider especially given the significance sheep and their production came to have for increasing household autonomy and social competition between the Late Neolithic and Middle Chalcolithic (Chapter 3.4). It seems possible that houses changed in order to facilitate a higher pastoral productivity.

And finally, increased productivity might also have included some craft specialisation whereby individual households specialised on the antler tool, bead, chipped and ground stone production (Hodder 2013a:19-20, 2013b:22, 24, 2014b:14) and probably exchanged these items with other households (Hodder 2014b:17, 2014c:19). Such increased production of quantities of tools or bead

beyond the household needs might have further increased the need for larger houses as well as more functional subdivision (**#40, #42**) (Hodder 2014d:167, Steadman 2000b:178) if, again, it can be shown that this production was actually carried out in the houses which seems to be evidenced in at least some cases where workshop assemblages were found in houses (Hodder 2013a:19). Earlier, Hodder (2005a:19, 2006:214) also suggested seeing the appearance of large ovens (**#45**) in the upper levels in the context of specialisation by individual households, suggesting specialisation into certain kinds of food production, but this idea is not mentioned any more in the newer research on specialisation (as summarised e.g. in Hodder 2013a) and should therefore be discounted. Further, many of these large new ovens seem to be located outside of houses, which adds complexity to their interpretation (**#82**).

To conclude the discussion of indicators **#40** and **#42**, a causal relation between an increase in average house size/subdivision during the Late Neolithic/Early Chalcolithic and the increasing household autonomy and competition is strongly suggested by the evidence outlined here, but not conclusively proven. Particularly, at Çatalhöyük the increasing average house size has been linked with household autonomy by explaining it with increased in-house productivity, but this link can only partially be verified. Both indicators are however included on the indicator list. An increase in either the number of or size of storage facilities (**#44**) can likewise tentatively be linked with increasing household productivity and autonomy, but an earlier suggestion as to a similar process affecting ovens (**#45**) can probably be seen as outdated.

Finally, it shall be pointed out that the multiple changes to house size and layout at Çatalhöyük that have been described in this theme, as well as others that will be discussed with **Themes 17-19** in Chapter 8, for example the movement of hearths to the centre of the main room, and of wall paintings across all house walls, essentially meant an abandonment of the fairly standardised house layouting observed at the site prior to 6500 BC (**#43**) (Düring 2006:313, 2011c:132, 136; Hodder 2014b:15). Given both the meaning of idiosyncratic house design for independent household identity buildings discussed with **Theme 2**, and the supposed role of house

standardisation in enforcing community-wide rules (**Theme 12**), this change can also be connected to the growing independence of households.

Yards

The remaining indicator in this theme is **#46**, the increasing use of outdoor spaces around the house for production activities. This development has been observed in the upper levels of Çatalhöyük East: through the unclustering (**#32**) of the settlements, houses had more open areas around them, and these continued to be used in similar refuse disposal/productive fashion as has been described for pre-6500 BC 'middens' in **Theme 14**. A possibly even more intense use of outdoor spaces than before 6500 BC is indicated by the increased frequency of fire spots in outdoor 'midden' areas, and more constructed features found near buildings such as hearths, ovens and a mudbrick platform (Bogaard et al. 2014; Hodder 2014b:12). The primary refuse of charred botanic debris from these fire spots indicates dehusking, sieving and handsorting of grains and legumes as well as woodworking, and other artefacts in primary position show bead, figurine and chipped stone manufacturing (Bogaard et al. 2014:133, 144) and the stratigraphic evidence shows that these outdoor activity areas were constantly being modified (Bogaard et al. 2014:131). Bogaard et al. (2014:123) see in these upper levels a functional division between 'real' middens for refuse disposal and 'yards' used more for production, although this might not be entirely relevant because they also state that "The difference between yards and middens can be a subtle one," and since it was shown while discussing **Theme 14** that already before 6500 BC, different 'middens' seem to have been used for different activities. This paragraph also attests that architecturally, household-owned outdoor production areas (from now on called 'yards' for simplicity) might be quite diverse and marked by a range of different features; and more different forms of yards are introduced as more sites are discussed throughout the following paragraphs. I decided to combine these into one indicator (**#46**) instead of creating different nodes (e.g. mudbrick platform, fence, hearth), in order to focus this discussion stronger on the principle of yards as

indicators of household autonomy. The discussion of whether a space constituted an outdoor activity area, and whether or not it was owned by a particular household, will therefore be a matter for the actual site discussions in Appendix 12.

Hodder (2013b:24, 28, 2014b:12 2014c:19) links the development of yards (#46) to the formation of larger, more complexly structured and functionally subdivided houses that is also indicated by increasing house size (#40) and subdivision (#42): “Thus not only did houses get larger, but they also became part of productive complexes that included yards, outside ovens and hearths, and middens on which activities took place” (Hodder 2014b:12). And indeed this reconstruction seems reliable since all these developments (house size increase, multiple rooms, increased use of yards) occurred concurrently. It must however be pointed out that also the Çatalhöyük Early Neolithic houses most probably already featured a functional subdivision into inside and outside through an intense use of the roof (**Theme 9**). Is it possible that the movement—or extension, since roofs might still have been used even if yards were available—of this outdoor activity area to the ground next to the house, instead of on top of the house, did not actually create such a large change in the functioning of the house, or in the amount of productive space available to the household? On the other hand, **Theme 24** will discuss that such open areas on ground level might have been more suited to activities such as the management of animals than roofs were; maybe yards also became significant in the context of households owning increasingly large sheep herds in the Late Neolithic at Çatalhöyük.

Schoop (2005b:49) brings a second point into this discussion, the privatisation of outside space. At Hacilar II and Bademağacı ENII3 in the Lake District, he understands the outdoor activity areas evidenced by ovens and storage facilities with “a pronounced tendency to invade and appropriate public space”, especially at Hacilar II, where he interprets the wattle-and-daub/wooden walls found around some oven and hearth arrangements (Mellaart 1970c:Fig.20) as screen walls by which these outdoor areas became “fenced off against intruding neighbors until passage within the settlements became virtually impossible. It is easy enough to imagine what this must have meant in terms of intra-community conflict. Thus what

we see here is a focus upon the single independent household with a pronounced claim for private space". While the discussion of whether or not this is a viable reconstruction of the Hacilar IIa community is a matter for Appendix 12 (e.g. Mellaart 1970c:Fig.22) reconstructed the structures in question as houses), we will here consider this suggestion in theory. It could be objected that even if screen walls were boundary markers between different outdoor areas used by different households, they would presumably not have afforded a great deal of privacy; members of other households on the other side of the screen walls were still able to overhear conversations, and observe who and what was moved to and from this yard area. In this context it is important to note that other researchers have interpreted these same outdoor installations at Hacilar II and Bademağacı ENII3-4 as evidence for communal ties by arguing that they show the wish of households to spend time socialising with other households (#79, #80). That said, Schoop's argument seems to be less about privacy/socialising, but more about the visible appropriation of communal property (the unroofed space inside the settlement) by individual households. Here it is possible to suggest that the fencing-off of outdoor space by individual households for their independent use might not have been the dramatic change Schoop makes it out to be, because with **Theme 14** I discussed the possibility that outdoor spaces in Neolithic southcentral Anatolia might already have been not freely usable communal property, but instead socially regulated even before such access regulations became more clearly archaeologically visible through fencing. However, even if communal ground was segmented in (archaeologically) invisible ways before 6500 BC, the visualisation and assertion of these boundaries through walls after 6500 BC can be seen as a more confident assertion of the rights of individuals, households or maybe small groups over households over village space. It must further be remarked that my first argument, that of non-existing privacy behind the fences, does not essentially contradict a connection with household autonomy if seen in the context that will be discussed further in Chapter 7: the careful interplay between social display and social hiding that seems to have characterised a lot of the early competition in Late Neolithic sites (**Themes 17** and **18**). Here it would be possible to argue that fenced-off yards inside the settlement served a dual function of asserting household independence while displaying

household resources, which essentially both asserted autonomy.

Schoop's point also raises another interesting question: How private were the above mentioned outdoor spaces at Çatalhöyük East? At least some houses in the upper levels had what is described as 'yards'—unroofed areas showing signs of middening, pit digging, ovens, hearths and fire spots—are enclosed by walls and least sometimes attached to houses (Bogaard et al. 2014:123). Hodder (2014b:12) gives the example of B.52, which was remodelled a few times but “at what appears to be the peak of its function, B.52 also comprised seven spaces, five of which were internal and two external”. Other yards do not seem to have walls, but are still reconstructed as probably household-owned. With the de-clustering, doors/crawlholes as groundlevel entrances started appearing in the later Çatalhöyük houses (Düring 2006:159), and some of these opened directly onto yards (Bogaard et al. 2014:123-127). In this spatial arrangement, it seems likely that the household living in the house preferentially used this area directly in front of their door (Bogaard et al. 2014:127, 133). The scale of these plant food processing observed in these outdoor spaces is small, and therefore probably does not represent the processing of food for a large (suprahousehold) group of people (Bogaard et al. 2014:133). These are reasons why Bogaard et al. (2014:147) overall interpret the new 'yards' as evidence for “a broad tendency towards household formalization and isolation [that] encompassed the privatization of outdoor activity space as well”, and therefore clearly in the context of increasing household autonomy.

There are, however, also very large yard spaces that Bogaard et al. (2014:127, 145) reconstruct as more probably shared between a number of houses/households. Some of the outdoor ovens are further large, which Bogaard et al. (2014:133, 145-146) see as a possible indication for suprahousehold cooking and therefore for a delicate balancing of household independence and communal ties: “An enclosed yard, however, might contain a large outdoor oven to accommodate the baking requirements of multiple households, suggesting that the negotiation of individual household versus wider group obligation was an intricate process”. Although in **Theme 14** I have argued that their outdoor location cannot be seen as unequivocal

proof for their communal use, especially not in a time period where outdoor space seems to have become increasingly segmented and partially appropriated into household property-this is an interesting suggestion that seems to fit with some other observations already made in this section. Altogether, it seems that the unroofed areas of the upper levels at Çatalhöyük East, and possibly other sites such as Hacilar II as suggested by Schoop (2005b:49), can be reconstructed as having being brought into the negotiation of relationships between households, both the independence-dependency balance as well as for socioeconomic competition. The sometimes shared, sometimes non-shared use of the outdoors, and the social display that also took place here, might have been parts of this. For these reasons, indicator **#46** is tentatively connected to increasing household autonomy here; however, this section together with **Theme 14** has made fairly clear that the reconstruction of social relations in outdoor spaces is complex, only partially in the domain of an architectural analysis, and requires a rich contextual backstory (of e.g. botanical evidence) to make sense of outdoor ovens and walls.

To sum up the **Theme 8** discussion, with the exception of **#41** and **#45** all its indicators were found to most probably be related to increased household autonomy and are therefore included on my indicator list. It must however be pointed out that all indicators in Theme 8 refer to developments over time (more space, more rooms, more outdoor space, more private outdoor space). Therefore, to be able to confidently observe an increase in household autonomy, archaeologists would need to be able to observe growing average house sizes/ storage sizes/ room numbers etc. over a number of occupational levels at the same site, ideally having a larger sample of houses from each level to compare. The indicators of **Theme 8** can therefore not be confidently applied to, say, a site where only one or two levels were excavated on an appreciable scale. For this reason, I suggest to exercise caution when interpreting the general trend of increasing house sizes over the course of the southcentral Anatolian Neolithic and Early Chalcolithic, based on connecting evidence from several, often only fragmentarily excavated sites, to a general trend towards greater household independence (Cutting

2005b:137; Düring 2006:314, 317; Hodder 2014b:10, Steadman 2000b:178, 182) especially when transferring these indicators to the Lake District, as was done e.g. for **#40**, **#44** and **#46** (see Appendix 12): at Çatalhöyük East, the increase in household independence is confirmed through so many different strands of evidence that the concurrent changes to house size and layout after 6500 BC discussed in this theme can relatively be confidently related to this development. On the other hand, the people who started building the first villages in the Lake District might not have been part of this same cultural process (see Chapter 3.3.1 for a discussion of whether or not the early Lake District farmers came from central Anatolia or not), and when they chose to build their houses larger than the Early Neolithic people of central Anatolia, this might have had absolutely nothing to do with household autonomy.

6.5 Summary of Evaluation

The discussion of **Themes 1-16** has discounted 20 of the initially documented indicators of household autonomy, and 16 indicators of community integration, as not (currently) being founded in sufficient archaeological data. A further four indicators (**#1**, **#2**, **#52**, **#69**) function more as headlines or guidelines than as concrete criteria for architectural analysis. This leaves 24 indicators of household autonomy, and 29 indicators of community integration (Appendix 8) that can be applied in an analysis of architectural data.

6.6 Reflections

A look at the publication dates of the sources coded in the household autonomy discussion (Appendix 3) shows clearly that this is a relatively new discussion within the archaeology of LN/EC southcentral Anatolia. Moreover, many of the comparatively few older sources (e.g. Hodder 1996a; Mellaart 1967) that contain text passages on household autonomy mention household autonomy or identity

rather in passing, instead of devoting a more detailed discussion to it. This shows that an explicit scholarly debate around the household autonomy/community integration balance, which newer research (Chapter 3) has found to be of such fundamental importance to the understanding of social change during the LN and EC, has only evolved during the last approximately ten years. Reasons for this can be found in statements made by Düring (2006:41; Düring and Marciniak 2005:166-167), who stated that the existence of autonomous household in the Anatolian Neolithic was simply assumed by researchers, and therefore not explicitly discussed and scrutinised; neither were the exact mechanisms by which individuals and households are integrated into larger communal structures. Düring ascribes this lack of research to an uncritical use of Flannery's (1972b) model which portrayed household autonomy as a core feature of Neolithic economy since neolithisation is seen here as facilitated by the emergence of economically autonomous households, a hypothesis that does not fit the southcentral Anatolian trajectory (Chapter 3.2.1, 3.3.1).

The first sources to dedicate longer discussions to untangling the household-community balance for the central Anatolian Neolithic were published ten years ago (Düring 2005, 2006; Düring and Marciniak 2005; Hodder 2006). Subsequently, this research problem was incorporated into new studies, also of non-architectural materials (3.2.1, 3.3.3), and since, archaeological knowledge about the balance has grown significantly. As a result, Early Neolithic households are now seen as less autonomous, and more bound into a web of suprahousehold dependencies than previously; for example, Hodder (2006) saw the Çatalhöyük (Early Neolithic) household as more autonomous than he sees them in more current publications (e.g. Hodder 2014b). And the nature and significance of the 6500 BC change at Çatalhöyük has also only become more fully understood as part of this inquiry: Previously, cultural changes and architectural changes around Çatalhöyük Level V were routinely noted in the literature (e.g. Düring 2006:159-160, 190, 228-229; Hodder 2006:249-255), but still appeared somewhat unarticulated. The other side of this balancing system, the different levels of suprahousehold integration, has also received much more research attention during last 10 or 15 years, with in-depth

studies asking whether and how exactly the inhabitants of Neolithic/ Chalcolithic southcentral Anatolia sites were integrated to form communities (Cutting 2005b; Düring 2006; Hodder 2006).

Possibly because of the newness of the household autonomy debate, and the centrality of the issue for understanding the 6500 BC-change, it can currently be characterised as complex, bordering on disordered. The number of architectural indicators (93) collected here (Appendices 3-4) was a surprise. This number, and especially the fact that some markers were only mentioned once or twice by one author (e.g. indicators **#7**, **#19**) clearly shows that a range of researchers have been exploring, across a wide range of themes and in a trial and error-fashion, the same question this thesis is asking: how can we recognise household autonomy in the architecture? An issue with the disordered state of the discussion is that often indicators suggested, or mentioned in passing, by one authors are seldom systematically addressed, discussed and either verified or contradicted by others; as a result, a number of research opinions floats in the literature without clear discussion. There is also a number of indicators that directly contradict each other, and that, too, is not always explicitly discussed in the literature: Different authors ascribe (at least seemingly) conflicting social meaning to architectural markers, for example when subfloor burials (**#18**, **#87**) or building continuity (**#23**, **#88**) are interpreted by some as strengthening the identity of an autonomous household, and by others as signals of suprahousehold control over built space. While it is, of course, theoretically possible that the same architectural expression had different social meanings in different temporal/geographical contexts, or that meanings overlap and e.g. burial practices do in fact strengthen several levels of social integration at the same time, households and community, such inconsistencies need to at least be explicitly addressed and debated in the archaeological research process. The somewhat chaotic state of the current debate, now documented clearly here, also supports what was stated in Chapter 1: the significance of this thesis for improving tools for an architectural contribution to a discussion of Late Neolithic and Early Chalcolithic social organisation.

Although the coding has documented a lively and broad academic debate around

the household autonomy-community integration balance, there is only a limited range of authors partaking in this discussion; particularly, there is only a limited range of researchers who explicitly and at length address this question in their architecture research. Further, the debate is clearly focused on material from Çatalhöyük East, and the 6500 BC- transition observed at this site; only a small number of indicators are not drawn mainly or entirely from Çatalhöyük East studies. This represents a real research dilemma, and particularly it raises doubts as to what degree the list of markers extracted here can be used to research household autonomy in the Lake District, which presumably followed its own social trajectory precisely because the newly arrived farmers there possibly did not bring with them the pre-6500 BC legacy of the central Anatolian Early Neolithic (3.3.1). To a degree, this gearing towards central Anatolian material, and the overpowering interpretive dominance of Çatalhöyük in the debate, are understandable, because the issue of increasing household autonomy seems to be foremost a central Anatolian process and among the few sites that were occupied across the 6500 BC mark, Çatalhöyük East has been most intensively researched. At the same time, the role of this transition in the establishment of the Lake District Neolithic could be better understood if the weighting of the household autonomy-community integration balance was better understood at Lake District sites post-6500 BC. A more diverse debate, including more different sites and research voices, would be ideal to move the debate forwards in future research.

Chapter 7 SOCIAL COMPETITION AND SOCIAL STRATIFICATION

[T]he built environment can be used not only to demonstrate power but also to establish positions of power, control the freedoms and actions of others, and indicate shifts in power. (Steadman 2015:221)

7.1 Introduction

Chapter 3 has described household autonomy, competition and stratification as subsequent segments of a gradual process, and it is therefore not surprising that in this analysis, the three cannot always clearly be distinguished. For example, some architectural indicators were associated with both household autonomy and with competition between households. In an attempt to display the ‘related, but different’ relationship between these three concepts, the themes in this chapters were divided into two parts, Competition and Stratification. Competition starts where the autonomy (**Theme 8**) discussion left off, and the first theme, **Theme 17**, actually purposefully collects indicators that have been associated with household autonomy and with competition.

The content analysis has identified 12 architectural indicators of social competition, and 36 indicators of social stratification that can be separated into five themes (**Table 21**). The largest **Theme 19**, describing indicators for recognising an elite residence, is further subdivided into five subthemes. Chronologically, the two themes describing social competition (**Theme 17, 18**) are specific to the Late Neolithic and Early Chalcolithic, while **Themes 19-21** collect examples from the Early Neolithic to Early Bronze Age.

| | | |
|------------------------------|------------------------------|-------------------------------|
| Social competition | | Theme 17 The deep house |
| | | Theme 18 Social display |
| Social stratification | Theme 19 The elite residence | Theme 19.1 Visual dominance |
| | | Theme 19.2 Building materials |

| | | |
|--|--------------------------------------|-------------------------------------|
| | | Theme 19.3 Furnishing |
| | | Theme 19.4 Mobile items |
| | | Theme 19.5 Ritual house elaboration |
| | Elite influence on settlement layout | Theme 20 Ruling the settlement |
| | | Theme 21 The pre-citadel |

Table 7 Themes identified in the social competition/ stratification debate.

7.2 Social Competition

7.2.1 Themes 17 and 18: Hiding and Displaying

Theme 17 describes archaeological indicators for increased privacy whereby households sought to shield some of their activities and resources from social control, whereas **Theme 18** describes architectural changes that went along with the increased competitive hospitality that is reconstructed for the Late Neolithic/Early Chalcolithic. Both themes are discussed here together since they describe the complex balance of hiding and displaying that was noticed as an important feature of early social competition in southcentral Anatolia.

Hiding

The discussion of **Theme 17** and architecturally created privacy is dominated by Steadman's (2000b) study of increasing social competition and stratification in southcentral Anatolia around the Early Chalcolithic. Steadman's work had a focus on the increasing 'privacy' that will be discussed in this theme. Indicator #94 is a headline node; it refers to Steadman's hypothesis that increased depth of residences evolved between the Early Neolithic and Late Chalcolithic in central Anatolia and the Lake District as a result of economic inequality. 'Depth' refers to internal layouting that creates divisions between a more public part of the house, and a private part whose use is presumed to have been exclusive to household members. Steadman (2000b:189-191) reconstructed that it became increasingly important to limit access possibilities for non-household members as socio-economic differences grew; the increasing 'depth' of the house shielded some parts

of it, and some of the resources kept in the house, from the view of others.

How was 'depth' architecturally created? Steadman (2000b) outlines that houses on average became larger (#98) in the LN/EC with more internal partitioning. The division of the house into several rooms or compartments screened off by walls (#100) had the effect that parts of the residence were hidden from view from the entrance and also from the 'living' areas that are presumed to have seen visits from members of other households; a similar effect was reached by the construction of two-storied houses (#99), whereby the storey that had the door to the outside is reconstructed as a more private area, and the other as a more publicly accessible one. Additionally, privacy was increased when, progressively, doors were located in places where they did not allow immediate line of sight into the entire house (#95); by not sharing party walls (#96) or even detaching the walls of adjacent houses from each other, creating a less dense settlement layout (#97).

Cutting (2005b:29, 31, 122) used Steadman's markers of social complexity in her study, but concluded that the trends observed by Steadman were not consistently present in her larger data set. However, she does not seem to, in principle, disagree with Steadman's model, since she for example detects such 'privacy measures' in the offset entrances (#95) of houses at Hacilar II (Cutting 2005b:130) or the abandonment of clustering at Late Neolithic Çatalhöyük (Cutting 2006b:99). Indicators #95, #96 and #97 are discounted here since the basis for their connection with privacy and further with social competition (Cutting 2006b:99; Steadman 2000b:190) includes too many doubtful variables, particularly related to the use of unroofed spaces around residences. For example, it requires a more detailed analysis of use patterns and social rules or conventions that regulated the use of outdoor spaces to assume that adding a few meters of unroofed spaces between residences (#96, #97) would have significantly altered the social control neighbours exerted over each other (see discussion of #32). The assumption that a door opening directly from the outside into a household's living room facilitated social control—and accordingly that doors were offset to prevent this (#95)—seems to be based on the assumption that unroofed space was open to communal use, and that much public traffic passed by house doors, allowing views inside; this assumption

has already been critiqued (**Theme 14**).

Indicators **#98-#100** describe interrelated changes that will be discussed here together. Apart from Steadman, they have also been mentioned by other researchers in relation with social competition. Four mechanisms can be extracted from the literature to argue that larger (**#98**) houses with several rooms or stories (**#99, #100**) played a role in social competition. First, the increased size and functional subdivision would have supported an increased productivity of the household, and this productivity was used for competitive purposes. For example, Steadman (2000b:187, 188) points out that adding a second storey nearly doubled the space available inside the house, and connects this with increased space requirements in the context of specialisation and competition. Düring (2006:314, 317) also tentatively connected the larger (two-storied) houses at Erbaba and Canhasan with social competition. Chapter 3 has identified increased household-specific productivity as an important driver of LN/EC social competition, and **Theme 8** has already at length discussed the connection between larger (**#98**) and more partitioned (**#99, #100**) houses and increasing productivity; this argument can therefore be accepted here.

Second, both house size and the addition of an upper storey might have had a connotation of status, as will be discussed below (**#106, #109**). In the context of competition between households, it could be conjectured that villages dominated by second-storied houses (e.g. Erbaba 1, Canhasan 2a-b: Düring 2006:259, 267; Çatalhöyük West: Biehl et al. 2012a:55-56) might have developed when some households started expanding vertically, and others did not want to be left behind. At this moment this remains conjecture, but further research into connections of status with house form (**Theme 19**) might be able to provide clarity.

The third argument in favour of connecting second stories **#99** and multi-roomed houses **#100** with increasing socioeconomic inequalities, and the one that the title of this theme alludes to, is that these allowed households to 'hide' resources and activities from the eyes of non-household members behind several barriers (doors, walls, partitions, ladders), and control more easily who had access to or knowledge

of these resources (Steadman 2000b:189-191). For example, the lower storeys at the clustered sites of Çatalhöyük West or Canhasan 2b are reconstructed as basement storage/working spaces under an upper storey used for living (Biehl et al. 2012a:55; Düring 2006:273-274). At these sites, the entrance to the house would have been through the roof into the living room, and the basement could only be reached through another entrance and another ladder. In these basements, and also in 'back rooms' e.g. at Hacilar VI, things could be stored securely out of sight away from the more public, socialising area of the house (Steadman 2000b:190): "living space [at Canhasan 2] was available on the upper storey, while storage of movables such as tools, small objects and grain was possible on the ground-floor to which, of course, access was limited to members of the household" (French 1998:66). Baird (2012a:452) seems to say that the storage-basements also increased the storage space available to households, and connects this with "households show[ing] a new interest in aggrandizement".

In principle, the argument is convincing that large storage facilities, at safe and relatively inaccessible locations inside the residence (either in a basement, or a back room), might become important when households first, started accumulating more property than they had needed during the Early Neolithic when they relied on a tight-knit social security system; and second, started to compete for resources and social influence. The possibility to 'hide' resources in the house was probably important during the emergence of economic inequalities, either because displaying economic differences was not (yet) deemed feasible, or as part of a hiding-displaying strategy of status asserting (Chapter 3). It is plausible that house layouts changed to facilitate this strategy. Since storage capacities are notoriously difficult to archaeologically reconstruct (see **Themes 1, 8**), it is however possible that the impression that larger and more hidden storage developed in the LN/EC is incorrect. For example, Early Neolithic houses at Çatalhöyük already had side rooms used for storage (Düring 2006:171). Also, the assumption that the basements at Çatalhöyük West, Canhasan 2b and Erbaba were storage rooms is based mainly on the fact that they seem little suited to another kind of use (Biehl et al. 2012a:55; Düring 2006:273-274), see longer discussions in Appendix 12), but is not directly proven

through e.g. studies of microdebris; it is therefore essentially unclear whether storage was really located in the more hidden areas of the larger (#98) and more subdivided (#99, #100) residences; not least also because the upper stories are preserved only in exceptional cases, essentially leaving it to the imagination what was done and stored in them. Both observations call into question how much larger, and how much more private, average storage spaces really grew after 6500 BC.

To sum up the discussion of **Theme 17** so far, this discussion has established that these changes to residences most probably can be related to an increase in household productivity, and possibly to the desire to keep some of this productivity hidden from the eyes of competing households. Issues remain with some of the evidence basis (storage spaces, upper stories); but for now, the indicators of **Theme 17** can and should be used towards further research that will also help to verify their validity.

Displaying

With the fourth argument in favour of indicators #98 and #99/#100, this discussion transitions into **Theme 18**, Social Display: Hodder (2014c:19) has connected both the size increase (#98) and addition of rooms/storeys (#99/#100) at LN/EC Çatalhöyük with an increased use of the house in social display. This new focus on display necessitated changes mainly to the main, 'living' room of the house, but side rooms were also transformed as a result of changes to the main room. Hodder (2014b:15, 2014c:19, 2014e:179) reports, apart from size increase and addition of rooms, the following changes that he links with social display: production activities were relocated out of the living room into an increasing number of side rooms (#99) and outdoor production areas (yards, #46) and the architectural features associated with them, for example ovens, also moved into side rooms or outside (#103). This freed up space in the main room, and also went along with a loosening or abandonment of the clear social/ritual subdivision of Çatalhöyük houses (#101) that was described in **Theme 12**: "Overall, it seems clear that the earlier strict divisions

in the house between secular (south) and sacred (north) break down in the upper levels and the main rooms of houses come to have a more open character, a trend seen in the large central rooms in the TP Area houses and in B.25 on the West Mound” (Hodder 2014b:15). This included a change in the location of wall paintings, which had tended to concentrate on the house corner where platforms and burials were located, but in the upper levels could be found on all walls of the house (#102). This might signify a change in meaning of such wall paintings, from ritual (associated with burial) to a role in social display during commensal events in the living rooms, as seems to be tentatively suggested by Hodder (2014b:15; 2014c:19). In some houses, the hearth came to be located in a central position in the main room (#104), which facilitated social exchange during commensality. Other groups of material culture also changed to facilitate competitive hospitality, such as the increasingly varied and decorated ceramic and stone vessels (Hodder 2014e:179; see also discussion of painted pottery in Chapter 3.3).

As the last indicator of **Theme 18**, Asouti (2005a:88) stated that in some Çatalhöyük houses, storage containers were found in the living rooms (#105) which “seems to suggest that in some cases they might have been used as a vehicle for the display of household wealth, by being appropriately placed in those spaces most likely to be accessed by non-household members”. Asouti’s observation of storage display is very interesting to consider in combination with **Theme 17**, the tendency to construct more private storage areas. Rather than being a contradiction, this could indicate a dual strategy developing in the Later Neolithic whereby households chose to hide some resources, but display others—a strategy also suggested in general by the concurrently observed architectural trends to greater access control (**Theme 17**) but greater commensal display (**Theme 18**). Düring’s (2006:186-187) systematic compilation of the location of storage installations at Çatalhöyük East shows that actually a majority was located in living rooms. Because that is unfortunately not separated by levels, it cannot be asserted whether the preferential location of storage bins changed after 6500 BC either towards greater display (#105) or greater hiding. A possible ‘displaying’ function of living room storage must at the moment remain a hypothesis; indicator #105 is accepted in order to foster further research

of the hiding-displaying dynamic.

In conclusion, the developing social competition after 6500 BC was characterised by the careful balancing of social display and privacy as shown in newest research at a number of LN-EC sites, and using a range of different evidence (e.g. Arbuckle 2012a; Hodder 2014c). At the moment, the ways in which the display/ hiding strategy manifested itself in architectural changes is not securely known, but it is hoped that by applying indicators **#101-#105** in future research that will change. Based on the current state of research, it appears that certain parts of the house might have become more 'hidden' as households started to compete for status and resources, while others were readied for competitive hospitality. As display and hiding became more important, the house might have become 'layered' in ways similar to that suggested by Steadman (2000b). The 'functional subdivision' detected by many researchers in the increasing number of rooms (**Theme 8**) might also have translated into a social subdivision that allowed households to open some parts of their house to others, but keep some hidden. It is interesting to consider the function of the new private or semi-private yards (**#46**), or unroofed space in general, in this scenario. In **Theme 8**, I have already discussed the possibility that the open nature of outdoor areas might have been used deliberately to display household resources in a non-overt fashion. Steadman (2000b) suggests a division of the house into two, named by her 'front/back'—but including the outdoor spaces, there might have been three: the outdoor areas where people, activities and resources were or near-public display; a living room for controlled socialising between households; and a back area that was for use only by the household. Households could have used these different levels to display and hide whatever they chose. But again, it is worth questioning whether this was really a novel development after 6500 BC: for example, Early Neolithic houses at Çatalhöyük already had a roofscape, main room and side room, thus also somewhat three levels. It is an issue that much of the display/hiding discussion seems to be around storage and other features that remain archaeologically difficult to grasp. For example, it would be fascinating to research whether the display/hiding differentiation can be asserted between the two stories of houses at Canhasan 2b

or Çatalhöyük West, but without the upper storey preserved, this remains impossible.

7.3 Social Stratification

The themes identified through content analysis show that archaeologists have concentrated on identifying an economic, social and/or ritual elite from the architectural record by identifying elite residences (**Theme 19**), or ways in which an elite was able to reshape the settlement as a whole (**Themes 20-21**).

7.3.1 Theme 19: The elite residence

The content analysis identified that the research community expects that elite residence between the Late Neolithic and Early Bronze Age were in several ways distinct from, and better than, the houses on the non-elite. There is a common perception that uniformity of residential architecture within a village means the absence of status differences (e.g. Özbaşaran and Duru 2015:48 for Aşıklı Höyük; French 1998:68 for Canhasan 2; Eslick 1988:37 for Hacılar; Hodder 2014c:2 for Çatalhöyük; Schachner 1999:47, 49 for Çatalhöyük and Hacılar II), and differences between residences could indicate social differentiation; that the emerging elites would have sought to provide themselves with, and maybe distinguish themselves through, better living space. The markers collected to show social competition are different from **Theme 19** differs from **Themes 17-18** insofar as the latter describe changes that transformed all or many houses in a settlement as a result of household competition; while **Theme 19** describes one or two houses in the settlement that were distinct from all others: the elite residence. This thought is mostly clearly expressed by Eslick (1988:38), who states “it is its distinction relative to the other houses in that settlement that is important” in creating an elite residence.

Exactly how ‘better’ houses looked like seems to have varied between sites, regions and periods; or archaeologists cannot yet see clear patterns: many of the indicators

discussed throughout **Theme 19** are based on only one or two sites, and some were only mentioned once or twice. Another substantial number of the text passages coded for **Theme 19** refer to 'hypothetical statements': They for example express that a certain architectural feature could indicate status differences, but that no direct evidence was found at a given site or occupational level. For example, Hodder (2005b:13, 2013a:18, 2014b:5) reports various attempts at Çatalhöyük to statistically correlate potential markers of social difference such as house size, furnishing or symbolic elaboration and concludes that no clear patterns could be found. Text passages like this were still coded because they document expectations and opinions that prevail in the research community; but they do not contain evidence that could be discussed here to debate the validity of such opinions.

The observation of hypothetical statements points to a further issue: If there is little clarity and evidence to distinguish elite residences, what did researchers base their hypotheses on? How can we know what 'better' residences looked like?

Considering the spread of indicators, it seems as if some are based on (conscious or unconscious) comparisons either with elite residences of the Bronze Age, or even on (probably unconscious) modern preferences. For example, a variety of researchers hold that larger houses with several rooms (**#106, #107**) could be elite residences, often without discussing exactly why that should be so. More promising seem attempts to understand 'from the inside' what 'better' could have looked like, i.e. to discern what features of residences were valued highly by these village communities, and a number of such indicators have also been documented (e.g. **#120, #122**, examples within **#110**). It can be expected that as new material is unearthed, and especially when new future studies are dedicated to the issue of elite residences, it will be possible to assemble a denser internal reference system for determining status from residential architecture; also in collaboration cross-references with studies outside of the realm of architecture research itself.

Theme 19 has been divided into subthemes describing different ways in which an elite residence might differentiate itself from others: Visual Dominance, Material Differences, Internal Differences, Mobile Wealth, and Ritual Differences.

Chronologically, this theme is diverse since it combines indicators that seem to refer

mainly to the Late Neolithic (e.g. #122) all the way to Early Bronze Age examples. I have attempted to incorporate the chronological component into the discussion by showing potential developments in the architectural expression of status leading from Late Neolithic beginnings to their full manifestation in the EBA. Such thought experiments run the risk of interpreting LN/Chalcolithic evidence through a Bronze Age lens; but can also identify longer term developments.

Theme 19.1 The elite residence: visual dominance

One of the most commonly mentioned features of status assertion through architecture is the size of residences (#106): the notion prevails in the literature that early elites had larger houses than the non-elite, and such differences have been recognised at a number of sites (Appendix 5). To identify why researchers equate larger houses with a higher social or economic status requires looking at the context in which the indicator is mentioned, since the connection of house size and status is not explicitly discussed. That in itself is problematic—given that house size is one of few indicators of status differences that the southcentral Anatolian research community seems to be relatively confident of, one would expect there to be a clearer idea of why. Based on what can be extracted from the coded passages and additional evidence, it is possible to tentatively suggest two reasons why elite residences could have been larger than others.

First, house size seems to have a connection with economic status, since it is most often associated with differences in ‘wealth’. Arbuckle (2012a:303) mentions the large houses and potential elite residences at MC Köşk Höyük and Güvercinkayaş in connection with wealth, as does Steadman (2000b:182-183) at Hacılar II. Hodder (2013a:18, 2013b:26, 2014b:5, 2014d:156, 160; 2014:27) reports on attempts to correlate house size at Çatalhöyük East with other indicators such as the distribution of obsidian, plant foods, storage capacity, diet markers in sub-floor burials, burial goods or ritual elaboration, therefore also putting it in the context of economic differences as well as differentiation of ritual power.

A link of house size with wealth is reminiscent of the discussion of a link between household productivity and house size at the end of Chapter 6 (**Theme 8**), where it was established that and why more productive households require larger houses that can accommodate different production activities. With **Themes 8** and **17**, house size was discussed in the context of household autonomy and competition, and in the context of this chapter it would be possible to suggest that once this competition had turned into inequality when some households had more than others, house sizes started to differ as well: early southcentral Anatolian elites first differentiated themselves through higher economic productivity (at Late Neolithic Çatalhöyük East, Hodder 2013b:27, 2014b:14) that might have been translated into social power through competitive hospitality (as recognised at Late Neolithic Çatalhöyük, Hodder 2013b:25, 2014b:17; and Early Chalcolithic Köşk Höyük, Arbuckle 2012a) and then later also by some degree of control over the productivity of other households, that included the storage of agricultural products created by the wider community within the elite residence (Middle Chalcolithic Güvercinkayası: Arbuckle 2012a; Early Bronze Age Asia Minor: Bachhuber 2015:77, 79). To accommodate the higher amount of production activities, storage and hospitality that marked their status, high-status households would have needed larger houses than less productive, lower-status households. There is evidence to support a connection of productivity with socioeconomic status, for example at MC Güvercinkayası, where the large buildings that were identified as elite residences contained more storage facilities, grinding stones, ovens and stamp seals than others (Arbuckle 2012a:304, 310). The possibly emerging socioeconomically more powerful households living in Late Neolithic ‘history houses’ at Çatalhöyük (see **Theme 19.5** for a discussion of post-6500 BC history house-groups as potential elites) seem to have been more productive than others; their residences contained stone workshops (Hodder 2013a:19-20, 2014d:161) and their members might have been more mobile (Hodder 2013b:27, 2014d:159-160).

Another point worth mentioning here is household size: Düring (2006:213, 214, 278), and Cutting (2005a:167, 2005b:127) state that larger houses can point to either larger, or higher-status households. In the context of household productivity

being linked with status it would be interesting to consider whether the emerging elite households might not have differentiated themselves through both: larger number of members and higher status, or maybe higher status through a larger number of members. Here it is relevant to remember Hodder's (2014b:11) reconstruction that leading up to 6500 BC, Çatalhöyük households increased their fertility levels in order to be more socially and economically productive. The competitive households of the Late Neolithic and Early Chalcolithic might also have chosen to increase their productivity by birthing or recruiting more members; and this might have been an additional reason for larger houses. Since consideration of household composition are not within the scope of this thesis, this can remain a hypothesis for now, and does not change the conclusion that house size probably is indicative of both social competition (**#36, #98**) and emerging status differences (**#106**) in prehistoric southcentral Anatolia.

Second, since a range of researchers associate large houses with social influence and power (e.g. Düring 2011c:244; Mellaart 1970c:36), it could tentatively be suggested that the relative size of houses (**#106**) functioned as a visualisation of status: the large house, visually dominating over others, demonstrates large status. Although this does not seem to have been explicitly suggested yet in the literature consulted for this analysis, Chapters 6 and 7 have collected several examples of how visual properties of houses were used in the Anatolian Neolithic/ Chalcolithic to communicate and manifest social relations, for example the use of building materials as markers of household independence (**Theme 2**); or the visualisation of community and sub-communities through the clustering/neighbourhood arrangements of Early Neolithic settlements (**Themes 9/10**). If Neolithic/ Chalcolithic people thus modified the visual appearance of houses as an expression of social organisation, it seems possible that house size also worked as a status marker in this way. Further, the two last indicators in this subtheme (**#108, #109**) explicitly refer to the height of houses as a visualisation of status, and by association also overall house size could be interpreted as such. In any case, the link between house size and productivity makes **#106** a reliable marker of potential status differences.

The discussion of indicator **#107**, large buildings with many rooms that have been identified as elite residences, is closely related to the discussion of **#106**, house size. In fact, in the examples documented in my content analysis, overall house size and number of rooms were often mentioned together (e.g. “large complex with multiple rooms”, Duru 2008:150). In addition to the overall size of residences, their functional subdivision can also be connected to high productivity and the ownership/control of resources (see **Themes 8, 17**): Hodder (2013b:27, 2014d:160) describes that some former ‘history houses’ might have acquired higher socioeconomic status at Late Neolithic Çatalhöyük (see discussion of **Theme 19.4**) by being productively more competitive than others, and this is architecturally visible through a larger number of rooms, including yards, and functional subdivision. The already mentioned highly productive probable elite residence at Güvercinkayası had several rooms with different furnishing and therefore probably different function (Arbuckle 2012a:304; Gülçur and Firat 2005:43). Duru (2008:150, Fig.304) identifies a large building with at least 17 rooms and a courtyard at EBA Bademağacı as a combination of elite residence and social and economic administrative centre: “Probably the complex served both as a residence for the ruling persons or groups of the settlement and as a public building, i.e. a palace, serving the administration of the settlement.” This example brings into the discussion the fact that EBA elite residences did indeed take the form of large building with many rooms and functional subdivision that included residential quarters as well as public areas for the ritual, social, and/or economic use of a larger group (Bachhuber 2015:75-77, 107, 148-149). In this context it would be tempting to reconstruct a gradual development from the Late Neolithic/ Early Chalcolithic large houses with several rooms and functional subdivision that have been described in **Themes 8** and **17/18** to have evolved as a result of household autonomy and then competition; to the first differences in house size, number of rooms and maybe number of stories that indicate the emergence of first socioeconomic inequalities; and finally to the articulation of ‘palaces’ that were elite residences as well as administrative, productive and storage centres as identified at Güvercinkayası and Bademağacı. On the other hand, the knowledge that Bronze Age palaces took the form of large, multi-roomed and multi-functional buildings can

influence the interpretation of large, multi-roomed buildings found at Late Neolithic or Chalcolithic settlements. As a consequence, I suggest that the interpretation of differences in house size (**#106**) and number of rooms (**#107**), if observed at Neolithic/ Chalcolithic sites, be cross-referenced and verified with other markers of economic productivity (e.g. differences in storage capacity, **#112**, or number of ovens, **#113**) or visual status assertion (e.g. differences in building materials, **#110**) to confirm that the size of the house was actually related to higher productivity or social status.

Indicator **#108** refers to Cutting's (2005b:131) and Steadman's (2000b:184) statements that one or two buildings at the Hacilar II settlement (Q.2-4, Q.5-7, Mellaart 1970c:Fig.20) can be, among other reasons (size, furnishing, see **#106**, **#111**), identified as residences of higher status because they were located in a dominant location in a slightly raised area of the village. By itself, there is little to verify or discount this interpretation, but in combination with the discussed possible relation of visual house appearance with status assertion, there is ground to tentatively integrate **#108** on my list of indicators. For the same reason, indicator **#109** can be tentatively accepted as a possible status indication. This indicator refers to a thought mentioned in passing by Düring (2006:280-281) while discussing Canhasan I: the possibility that the vertical extension of houses by adding second stories (**#109**) might have been connected to prestige, but concludes that this was unlikely. In the context of this chapter, there is a ground to support such a speculation: so far in this theme, it has been argued that larger buildings would have been associated with social status because they attest greater productivity, but also because larger houses display large status. The second storey would have aided with both: it added more rooms, and made houses stand out—quite literally—amongst others similar to the effect a raised located would have had (**#108**).

Theme 19.2 The elite residence: building materials

The discussion of **Theme 19.1** has identified economic productivity and visual dominance as two important elements of status assertion in the study region.

Theme 19.2 is strongly associated with the latter: a visualisation of status differences. A number of authors have hypothesised that the residences of people with higher status in Neolithic/ Chalcolithic southcentral Anatolia might be differentiated by having different (better) building materials (**#110**). At Çatalhöyük East, this hypothesis was investigated in recent years by systematically plotting material types by building, and although Love (2013a:86, 94-95, 2013c), Tung (2013:79-80) and Hodder (2013a:18, 2014d:159) conclude that no status differences can be read from the different use of mudbrick or plaster at the site, these publications discuss how in principle differential social status might have translated into differential use of building materials: Tung (2013:67, also Love 2013a:81) hypothesised that possibly “dominant groups had preferential access to certain building materials”. Love (2013c:274; based on ethnographic studies) further points out that building materials can communicate social status to onlookers: “When all the architecture is the same size and shape and made from the same materials, subtle differences represent variants on a common theme and can be used as a social expression, of status, independence, inclusion or wealth”. Such a possibility for a subtle expression of status differences might have been important during the formation of socioeconomic differences when a more overt status assertion might not yet have been socially accepted, as suggested by Arbuckle (2012a:310) and also by the hiding-and-displaying strategy in **Themes 17/18**. Depending on where in the house they were used, different building materials might have communicated status in different fashion or intensity: materials that become hidden once the house is finished (like mudbrick) were only visible during the construction process, but even after they were hidden the knowledge of their presence might have continued to be of relevance (Love 2013c:274, also see **Theme 2**). If the high-status materials were visible on the outside of buildings (e.g. external plaster), this would have been a constant visual reminder/proclamation of the household status to all onlookers; and if high-status materials were located on the inside (e.g. plaster, large

timbers), they would have surrounded the daily routines of the elite households itself and thus be a status reminder to the elite itself and to all visitors to the house. These observations are relevant in relation to the displaying/hiding strategy that has above been discussed as an important mechanism in the construction of early status differences in southcentral Anatolia.

And what were high-status building materials at the sites studied here? A few suggestions have been made in the literature: Mellaart (1970c:34; also Steadman 2000b:184) interpreted the wattle-and-daub buildings at Hacilar II as being of lower status than the walls built from mudbrick: "this entire sector should be regarded as being the quarter of the poorer section of the population, who constructed their buildings with simpler materials but no less neatly" (also Eslick 1988:32, 36 about LC Bağbaşı south of the Lake District; see critique of opinions about wattle-and-daub building in Chapter 8). Timber is mentioned a few times as a potential high-status building material, for example by Düring (2006:190) who observed that in Çatalhöyük houses "we should not exclude the possibility that in some buildings, posts may have been placed along the east and north wall for non-structural reasons, for instance because to do so was prestigious". Mellaart (1970c:36) as well regarded the many wooden posts in building P.1+3 in Hacilar II as markers of a special (ritual) status of the building. Large pieces of timber are also seen as a potential high-status material by Stevanović (2013:98) who suggests "that the sizeable presence of timber in house construction may indicate a difference in the status of buildings, since the procurement of timber implies a large labour investment", and also mentions that "wild plants may have been more highly ranked resources for construction materials" (Stevanović 2013:105¹³), wood being one of the wild plants in question. Also at Çatalhöyük, Matthews (2005b:368) hypothesised based on ethnographic parallels that "variation in the type, thickness and frequency of plastering may also relate in part to availability of vegetal stabilizers and, thereby, individual wealth".

Since value is always socially constructed, including the 'value' of building materials

¹³ Please note that Stevanović cites Asouti (2005b) and Ryan (2013) respectively as sources for these ideas, but neither author makes the relation to social status as clearly as Stevanović does.

(Love 2013a:94-95) architecture researchers would do well to try and understand ‘from the inside’, from inside the value system of a Late Neolithic or Early Chalcolithic village community. Such research probably requires cross-referencing with materials other than architecture; one example for such an understanding ‘from the inside’ is Stevanović’s suggestion that wild plant materials might have status at Çatalhöyük, which could be backed up e.g. by observing that wild animals were important in ritual imagery and commemorative deposits as well as in feasting (Hodder 2006:19, 24; Last 2005:201-202; Russell et al. 2009). Rarity, or the degree of difficulty of obtaining something, might be one factor that makes materials desirable, such as timber, but does not necessarily need to be (also see discussion of timber procurement in **Theme 7**). In the absence of a clearer understanding of building material status, and since all of these examples—plaster, wild plants, large timbers—are only mentioned in a handful of text passages and in rather tentative fashion, I conclude that in principle social status might have been expressed through the preferential use of high-status building materials at the sites studied here, but that it is not (yet) possible to determine how and what materials might have been used to mark status differences in the context of Neolithic/ Chalcolithic southcentral Anatolia. Indicator **#110** will be tentatively included to foster further research into the matter, but its application to the architectural record in Appendix 12 might be less successful since it remains unclear what ‘high status’ materials to look for in an architectural analysis.

Theme 19.3 The elite residence: furnishing

Theme 19.3 describes the notion that elite residences might have distinguished themselves through different internal furnishing. Indicator **#111** codes general remarks about status differences being expressed through different furnishing, for example Mellaart (1967:225) concluding that at Çatalhöyük “Social inequality is suggested by sizes of buildings, equipment and burial gifts, but this is never a glaring one”. Indicators **#112-#116** describe examples of what pieces of equipment might have been part of such status differentiation. Apart from one tentative suggestion

by Yakar (2011b:176) about Çatalhöyük platforms, saying that “The question as to whether differentiation in the size of houses or spatial details (such as the orientation, size, and height of platforms) [#116] could also be reflections of a social stratification presumed to have existed in a ranked cosmos is difficult to answer”, which can easily be discounted because mentioned by him in a hypothetical manner, the other examples identified in the content analysis can all be described as production facilities: suggestions have been made that houses with more storage capacity (#112), more or larger ovens (#113) or more private/ semi-private unroofed space (#114) can be identified as residences of households with a higher status. This observation reinforces a conclusion already noted in this chapter, that early southcentral Anatolian elites differentiated themselves through higher productivity, and the display of productivity. This section will focus on discussing this conclusion further.

The asymmetric distribution of storage capacity between houses (#112) is mentioned particularly often: There were suggestions to reconstruct the few houses that had storage bins at Aşıklı Höyük Level 2 as elite residences (Cutting 2005b:41; Esin and Harmankaya 1999:126). Hodder (2013a:24, 2014d:160), reports that at Late Neolithic Çatalhöyük, the post-6500 BC history houses that probably became socioeconomically more powerful than others (**Theme 19.5**) had more productive facilities than others: “Some history houses in the upper levels now had more evidence of storage and external yards [#112, #114]” (2013a:24) and “In the upper levels, the history houses do seem to be able to convert ritual status into storage and productive advantage” (Hodder and Farid 2014:34). Interestingly, prior to 6500 BC, when they functioned as the central nodes in an egalitarian suprahousehold exchange system, “The central history houses may have had less productive and storage space because others in the kin, ancestral or ‘house’ group provided resources and food for them” (Hodder and Pels 2010:178). This suggests that at least in theory socioeconomically more powerful households in southcentral Anatolian prehistory might command less storage or productive space because they were able to rely on provisioning by others. Middle Chalcolithic Güvercinkayaı comes to mind, where Arbuckle (2012a:309) reconstructs that the elite were

provisioned with already butchered meat from the main settlement. However, the building complex that is reconstructed as an elite residence at the site did in fact have substantially larger storage than other houses: “The upper settlement at Güvercinkayası seems to have functioned as a specialized storage complex and Çaylı (2009, p. iii) has suggested that the site may represent a type of small chiefly estate. The elaborate enclosure wall protecting this area from both internal and external intrusion, along with concentrations of prestige objects, suggests the presence of a surprisingly complex and hierarchical political economy at MC Güvercinkayası characterized by the presence of emergent managerial elites with the ability to control significant agricultural surpluses” (Arbuckle 2012a:304). It is thus possible to conclude that overall there is good evidence to correlate larger storage space with greater status (#112). Eslick (1988) as well relies strongly on this indicator to identify socioeconomic differences, for example stating that “In [Kuruçay] level 4 one building, the XVI-XVII complex, appears to be different from the other buildings of the level. It had more floor area [#106] and evidence that some of this was devoted to storage [#112]. The large number of ovens and hearths may also be significant [#113]. This complex may indicate emerging economic differentiation within the community (Eslick 1988:30).

The other indicators in **Theme 19.3** can also be seen in the context of early southcentral Anatolian elites establishing their status by producing and commanding larger amounts of (agricultural) resources: it has been suggested that building complexes that included more (semi-)private outdoor space (#114) and more ovens (#113) than others, or had preferential access to a well (#115) might have been elite residences. While these architectural features would have enhanced elite productivity, they can also be explored in their relation to a display of productivity and competitive hospitality. It is of special interest that these three indicators seem to refer to outdoor locations: courtyards, wells, and most of the examples of ovens coded for indicator #113 were also located outside. If these architectural features became the object or the stage for status negotiations, such negotiations would have been set in a relatively high-visibility forum. Stronger than status assertion through features located inside houses, these might have been

associated with the displaying part of the hiding/displaying strategy identified in **Themes 17** and **18**.

It was already mentioned that Hodder (2013a:21, 24, 2013b:27, 2014d:160), observed Late Neolithic socioeconomically dominant ‘history houses’ with more yard space (**#114**) than other houses. He also in earlier publications (Hodder 2006:182-183) suggested that the newly emerging large ovens located in yards (**#114**) could identify more productive and powerful households: “large ovens in open areas that could have served several houses were found by Mellaart (1967, 63) in Levels IV and V. Thus some houses may have become dominant over others partly through an ability to provide more food” (Hodder 2005a:14-15). The interpretation of these outdoor ovens in upper Çatalhöyük East is far from secured (compare **#82** with **#45**, **#46**), but the discussions of **Theme 8** and **Theme 14** concluded that they probably after 6500 BC became items of socioeconomic competition that displayed productivity and also might have been used in competitive hospitality. More powerful households of the Late Neolithic/ Chalcolithic could have owned larger cooking facilities for use at large commensal events. Whether a number of households came together to cook (as Bogaard et al. 2014:146-147 seem to suggest for the Çatalhöyük outdoor ovens), maybe pooling resources for the meal, or whether the more powerful household provided the meal (as reconstructed for MC Köşk Höyük and Güvercinkayaşı by Arbuckle (2012a:307, 310) cannot be decided through architectural research alone, but might also not actually be that important because the large cooking facilities still indicate that at least part of the commensal event (meal preparation) took place at the residence of the powerful household, and that alone might have increased its socioeconomic status. The fact that it is nearly exclusively ovens that have so far been mentioned in the context of asymmetric distribution of cooking facilities (**#113**) and social competition/ inequality (Eslick 1988:30 is the only one to mention hearths in a Kuruçay 4 building) is especially interesting, since it could indicate that a certain type of food—food that was prepared in ovens rather than hearths—was preferentially consumed during competitive hospitality.

The mention of competitive hospitality taking place at elite residences leads into

another thought: Is it possible that large storage (#112) and oven facilities (#113), and large courtyards/yards (#114) with wells (#115) not only allowed the elite to increase their productivity, but also to visually communicate their wealth to others? Or in the context more generally of status being asserted by differential furnishing: Who would have seen the inside of elite houses? It might never be possible to fully reconstruct who, under what circumstances, would have entered the residences of Late Neolithic/ Chalcolithic elite households or adjacent courtyards, but there are some indications that these were only semi-private buildings that also at least periodically functioned as public facilities. For example, the possibly emerging more powerful households residing in Late Neolithic Çatalhöyük history houses (**Theme 19.5**) inhabited what is reconstructed as ritual centres for a number of households, which makes it likely that others would have convened there for ritual occasions. Late Neolithic/ Early Chalcolithic households at Çatalhöyük probably also asserted their socioeconomic position during commensal events that took place in houses (**Themes 17-18**) and therefore were opportunities to show off the interior of the residence. The Güvercinkayaşı 'upper settlement' is reconstructed as much as an elite residence as also a busy administrative, productive and feasting facility and the already mentioned large ovens and storage facilities were not meant for the exclusive use of the elite household (Arbuckle 2012a:304, 310-311). These observations make it likely that differences in furnishing were at least sometimes meant to be seen, although not all parts of the residential complex might always have been open to public access.

Some early elite residences have here been characterised as also being partially, or occasionally, public places used for ritual, commensal, festive and production activities. This part-public use would have brought members of other households into (parts of) the elite residence, which would have offered opportunities to strategically show off the house itself and its furnishing as part of the displaying/hiding strategy of social status creation (**Themes 17-18**). The fact that many examples discussed throughout this section were set outdoors only supports the impression that public display was important in the functioning of e.g. large ovens (#113) in elite-making.

At Hacilar II, Mellaart reconstructs building P.1+3 as the residence of a religious elite, but also a building for use in communal ritual: “it is extremely unlikely that this elaborately constructed edifice was just another private house. Its position, controlling the access to the only well, its size and its graves suggest a public building of major importance” (Mellaart 1970c:36). This is the only text passage coded for indicator **#115**, preferential access to a well, and Mellaart’s reconstruction of Hacilar II is problematic in many respects (Appendix 12), which is also why the Hacilar II examples coded for indicators **#113** and **#114** were left out of this discussion. Despite this, based on this present discussion it does seem at least in principle possible that a production facility meant for communal use, such as a well, was part of a building complex also used as the residence of an elite.

To conclude, indicators **#112-#115** can be related with elite-making through higher productivity, and possibly also with the competitive display of this productivity. This section has already touched on the notion of elite residences as semi-public places which will be discussed further in **Theme 21**, where it will be outlined that many of the elements of elite residences discussed throughout this section were also characteristic of later EBA citadels.

Theme 19.4 The elite residence: mobile items

Artefacts and prestige items

Related to the debate of differences in socioeconomic status resulting in, or being communicated through, the differential distribution of features in the house interiors, mobile items have been discussed as well. Hodder (2013b:26, 2014d:156; Hodder and Farid 2014:27) reports that the Çatalhöyük team checked for status differences by mapping the number of artefacts and botanic remains per house (**#117**), not finding significant differences. They did, however, find in the post-6500 levels concentrations of workshops for the production of beads, figurines or chipped stone in some houses, which has been connected to household autonomy

(Hodder 2013a:19) and probably can also be connected to emerging competition, especially because there seems to be a correlation of ritual house elaboration and such workshops (discussed in **Theme 19.5**).

Even more researchers believe that the differential distribution of objects with high socioeconomic prestige (**#119**) can identify status differences. What items are prestigious is not for architectural research alone to decide; but prestige items can be identified by other architectural sub-disciplines, which however probably includes some element of discussing their spatial distribution or context and therefore overlaps with architecture research. The Çatalhöyük team mapped obsidian caches (Hodder 2006:183), obsidian projectile points (Hodder 2013a:18, 2013b:26, 2014b:5, 2014d:156, cf. Hodder 2005d:26, 2006:152; Hodder and Cessford 2004:30), obsidian processing debris (Hodder 1996b:361 cf. Asouti 2005a:86; Hodder 2005e:127, 2006:152, 182; Hodder and Cessford 2004:30) and figurines (Hodder and Farid 2014:27 cf. Asouti 2005a:86, Hodder 1996b:362, 2005d:26, Hodder 2005e:127, 2006:152, 182-183) without finding that they concentrated in ritually elaborate (**#122-#126**) houses (cf. Becks and Jakob 1996). At Early Chalcolithic Hacilar II, Mellaart (1970c:38, 115, 149) and Steadman (2000b:183-184) claim that a differential distribution of elaborate ceramic vessels or marble vessels indicate status differences. At the Güvercinkeyası elite residence, “stamp seals with stylistic links to the Ubaid tradition, copper tools, and imported painted ceramics indicate that this portion of the settlement was associated with a unique range of potentially high status activities” (Arbuckle 2012a:304).

Since socioeconomic status in prehistoric southcentral Anatolia has so far in this chapter been identified with higher productivity and ownership of more resources, assuming that the residences of people with high status had particularly many things in general, including food and production debris (**#117**), and in particular had more items with a high socioeconomic status (**#119**) than other houses seems like a straightforward and reliable way of identifying elite residences. Whether all the items named above really were prestige items is not for this thesis to decide, but the range of items can be used to draw out some themes for the discussion of how emerging LN/Chalcolithic socioeconomic inequality might have proceeded. The

items can be distinguished into five categories:

First, items of ritual nature: some of the differentially distributed vessels at Hacilar II are interpreted as ritual by Mellaart (1970c:29-30). The differential distribution of ritual items will be explored more fully in **Theme 19.5**. Second, items related either to agricultural productivity, as suggested by the Çatalhöyük team's attempt to find differences in the distribution of botanic remains or diet markers in subfloor burials (2013a:18); or higher productivity of non-food items, for example the chipped or ground stone produced in the workshops at Late Neolithic Çatalhöyük East. Third, items connected to hospitality; for example, stone and elaborately painted pottery vessels, such as the ones that Mellaart (1970c:29-30) found differently distributed at Hacilar II, were in newer research connected to competitive hospitality, meant to communicate status during commensal events (Hodder 2013a:23; Last 1998a:272-275). Fourth, items that were imported and/or laboriously obtained through travelling, such as Cappadocian obsidian at Çatalhöyük, or imported ceramics at Güvercinkayası. And fifth, items that indicate direct control over resources, such as the Güvercinkayası stamp seals which were probably used for managing the flow of agricultural resources (Arbuckle 2012a:304). Some LN Çatalhöyük seals or small clay objects are also interpreted as accounting devices (Bennison-Chapman 2013:273-274; Hodder 2013b:22). Other stamp seals are interpreted as tools to decorate textiles, so that their differential distribution might also indicate that some households specialised in textile production (Türkcan 2013:245), thus linking back to the examples of specialised workshops listed above. It is of interest that many of these activities also characterised EBA elites, which build their elite status from administering agricultural products (Bachhuber 2015:130-138), among which was wool that was used for textiles which also started to play a role in social display (Bachhuber 2015:23, 39-41, 50-51, 81); by obtaining and conspicuously consuming difficult-to-obtain goods such as metal (Bachhuber 2015:50-51, 105-106); and through sponsoring commensal events during which ceramic and metal tableware was displayed (Bachhuber 2015:63, 138-143).

Interestingly, one indicator in this theme seems to contradict the narrative of more productive elite households: Hodder (2013a:18, 2014d:159) reports that some

tentative evidence points to houses with less ritual elaboration (**#122-#126**) having been used more for work and production activities: “Mitrovic and Vasic [2013] find some evidence of variation in heavy-residue densities in different house types. There is a slightly lower diversity and density of material in floors in the more complex categories than in other houses. Such evidence fits some of the evidence from the analysis of human remains (Volume 8, Chapters 17 and 18 [Hillson et al. 2013; Larsen et al. 2013]): that those buried beneath the floors in less complex houses had undertaken more work and labour, although other evidence contradicts this pattern (ibid). A difficulty here is that the heavy residue densities from floors are partly the result of use and of cleaning, but they are also the result of the adding of micromaterials into floors and plasters during construction. Thus densities of materials on floors are not a direct indication of the amount of activity that took place on floors.” This interesting observation could either indicate status differences marked by a differential distribution of workloads, or a differential use of building materials (**#110**). Two other examples come to mind: the evidence already mentioned in **Theme 19.3** that the Güvercinkayası elite did not butcher their own meat, but were provided with already butchered meat from the main settlement (Arbuckle 2012a:309). And second, Mellaart’s reconstruction of Hacilar II as a settlement divided into two parts, of which the ‘poorer’ part had more installations for the presentation of food and drink (also Steadman 2000b:183-184).

Indicators **#117-#119** together suggest that at least in some cases, emerging LN/Chalcolithic elites might not have distinguished themselves by generally higher productivity, but by strategically choosing to focus their productivity on some economic activities while not performing others. Certain economic activities might within this process have become associated with higher status; for example, wool production and hospitality might have become such high-status activities. However, these conclusions are tentative and not for this thesis to work out. For the present discussion, it suffices to conclude that the differential distribution of either artefacts in general, including microdebris (**#117, #118**), or of particularly prestigious objects (**#119**) can indicate socioeconomic status differences because it can point to differences in resources ownership, productivity and workloads. These indicators

are therefore here accepted. In the application (Appendix 12), I will limit myself to research the distribution of items that have in the literature about the site explicitly been referred to as marking status differences. Finally, I would like to point out that the mapping of artefacts onto the house landscape needs to take into account formation processes. For example, a simple mapping of pottery vessels found in the roomfill of buildings (Mellaart 1970c:51-56) is not reliable because the fact that these vessels came to be deposited in the house does not mean that they were used/stored in the house during its use livf (see e.g. the Çatalhöyük East abandonment rituals, **Theme 4**; see discussion of Hacılar II in Appendix 12).

Commemorative deposits

There are other categories of prestigious items that have in the literature been related to status negotiation and that have been separated here because they were, differently from indicators **#117-#119**, embedded into the fabric of the house itself: foundation and commemorative deposits (**#120**) and the high-status burials (**#121**). Their deposition in the house fabric makes these items different to research, for example, there is less doubt as to their correct attribution to a house; and probably also means that these items functioned differently in the negotiation of social relations.

‘Commemorative deposits’ (**#120**) is a term used by Russell et al. (2009:103) to describe animal parts that were embedded into the fabric of Çatalhöyük houses as caches, foundation deposits, in retrieval pits (**#25**) and in moulded clay features; and is used here more generally for all items found in such deposits, for example also obsidian. In earlier publications, Hodder (2006:170) suggested that such prestigious items hidden in the fabric of the house would have played some role in the negotiation of social status: “much of the status and prestige of individuals and families may have been linked to their ability to reveal what has hidden behind walls, or buried beneath floors”. For example, the ritual-social-economic importance of obsidian might have been enhanced by hiding it in caches in the house, and “when the obsidian returned it may have had special meanings, which

may have added to the authority of those that hid and revealed it” (Hodder 2005a:13). There were also attempts to map obsidian caches and thus determine high-status residences, but the results were ambiguous (Hodder 2005c:189, 2005d:26; Hodder and Cessford 2004:31).

There were clearer results, however, for commemorative deposits interpreted as feasting remains: Feasting deposits occur all throughout the sequence of the East Mound, and Early Neolithic feasting has been identified as part of the ritual-social-economic exchange system that created intense ties between household and upheld a tight-knit, egalitarian system (Hodder 2013b:28, 2014b:9, 11), **Theme 15**. After 6500 BC, however, feasting might have transformed into a more competitive practice, and Hodder (2013b:25; similarly Russell et al. 2014:121) suggests that feasting remains deposited in or under houses functioned as displays of differential household status: “In Levels South P-Q and in 4040 G-H and BACH, some houses have large collections suggesting a certain differentiation and build-up of competitive display, feasting, and memorialization. So at least in the mid to upper levels, sharing through feasting seems to become associated with differentiation – with keeping rather than with giving. The pile of 13 horn cores in a niche in B.52 is a good example”.

The relation of items embedded into the house fabric with social status is currently a tentative one: no clear results were found to suggest that obsidian caches are related to status at Çatalhöyük, and a competitive build-up of feasting remains after 6500 BC has only recently been suggested and needs to be further researched. In combination with the above discussion of prestige items in general, however, there is grounds to accept **#120** as an indicator of social status: that prestigious items should be weaved into the house fabric is congruent with the hiding/displaying strategy observed so far in this chapter for the construction of wealth and social power in Late Neolithic/ Chalcolithic southcentral Anatolia. How exactly for example feasting remains or obsidian were handled, circulated, hidden and removed as part of a hiding-displaying process can be subject of further research; but tentatively the presence of prestige items inside the house fabric, or as foundation deposits, can be identified as rendering socioeconomic status to the house residents, and indicator

#120 can be included on my indicator list.

Burials

Much like prestige items in general, differences in burial form or burial gifts feature prominently in the discussion of the emergence of social stratification in prehistoric Asia Minor. Of course burials and their relation to social status is a much larger topic (e.g. Bachhuber 2015:83-106 with a recent summary on the EBA), but burials are within the realm of architecture research only if the burials are located inside houses, or at least inside settlements. Indicator **#121** thus refers to the expectation that Neolithic or Chalcolithic houses featuring high-status burials could be the residences of high-status households (e.g. Hodder 2014b:5; Mellaart 1966b:183, 1967:82). Here, again, research that is not in itself architectural research (e.g. human remains studies, artefact studies) needs to establish how a high-status burial is to be identified, and these can then be mapped onto the architectural record. Two categories of high-status burials have been claimed for Neolithic/ Chalcolithic southcentral Anatolia. First, at Çatalhöyük Mellaart (1964:94, 1966b:182-183, 1967:82, 207, 1975:27, 1979:27, 1998a:35-36; Steadman 2000b:181; Yakar 2011b:175-176) believed to have found socioeconomic status differences between houses and people according to the presence of many burial gifts or of high-status burial gifts. Possibly, this ready (and now disproven, Hodder 2005d:26-27; Hodder 2006:179, 191, 2013b:26, 2014b:5, 2014d:156) observation of burial and status differences can be attributed to the fact that burial goods have traditionally been a main factor in the research of social hierarchies in the European and Anatolian Bronze Age (Bachhuber 2015:93-84).

Second, a differential treatment of the bodies of the dead was also connected to status differences. For example, at EC Köşk Höyük Level II-III, plastered skulls were found and Öztan (2003:74; also Özbek 2009b) interprets that “This treatment must have been undertaken for people of special status and the skulls treated in this manner were either preserved on the platforms or buried under them”. These publications do, however, not clearly state that this also identified the houses

where such skulls were found as high-status residences, and therefore these insights can probably not be used towards architectural research. At Neolithic Çatalhöyük as well, the post-mortem head removal, and occasional head plastering, observed with some burials has been related to a higher social status of the deceased individual (Hodder 2005c:188, 193, 2005d:27, 2005e:135-136, 2006:179, 224), but again without these publications clearly indicating that this should be understood to mean that either the houses where burials with removed head were found, or the houses where those heads were found buried under floors, should be identified as high-status residences. Rather, Hodder (2013a:16, 25, 2014b:8, 11) sees the circulation of body parts from burials, which included also body parts other than the head, as part of the ritual exchange system described with **Theme 15** which is situated in an egalitarian social context. I would like to, however, point out that the clear majority of the examples of head-less burials, body part removal and plastered skulls mentioned in the text passages coded for this content analysis (Hodder 2005d:27, 2013a:16, 2013b:21, 28; Hodder and Farid 2014:19, 26) or listed by Boz and Hager (2013:Tab.19.4) are from the middle and post-6500 BC levels, which could indicate that these practices functioned in the cultural context of increasing household autonomy and competition, not egalitarianism. However, a systematic re-interpretation of headless burial is well beyond the scope of this thesis.

In sum, the evidence of status differences being expressed through high-status burials in the house is too unclear at present to be confidently taken as an indicator of social status, and indicator **#121** is therefore discounted here: Newer research has not found clear indications of the use of burial gifts as status markers at LN/EC site; and the conceptual relation of burials with high-status head treatment (head removal and/or plastering) to the houses they were found in is unclear, so that it cannot be assumed that burials with special head treatment demarcate high-status houses.

Theme 19.5 The elite residence: ritual house elaboration

Theme 19.5 refers nearly entirely to Çatalhöyük East, where ever since the first uncovering of particularly ritually elaborated houses there have been suggestions to connect differences in the amount of ritual elaboration between houses with status differences (e.g. Becks and Jakob 1996:68; Mellaart 1967:80, 82, 207; Yakar 1991:209, 210; for summaries of research history see Düring 2013a:30-31; Love 2013a:94). The Çatalhöyük Research Project as well soon started testing this idea by cross-referencing ritual elaboration with other status markers (e.g. Hodder 1996b:361, 363-364), and the debate around the interpretation of differences in ritual status has continued uninterrupted (note the many publications from 2005-2007 in Appendix 5). Currently, the discussion has progressed to the conclusion that pre-6500 BC, ritual elaboration probably did not translate into socioeconomic status (Hodder 2013a:18, 2013b:26, 2014b:5, 2014d:160), but after 6500 BC particularly the 'history house'-households (**Theme 15**) seem to have been among the first to distinguish themselves in the emerging competition, translating their long-accumulated ritual status into socioeconomic advantages. Importantly, this distinction shows that social hierarchies are expected in the current research landscape to be of socioeconomic nature or have a socioeconomic component; potential differences (only) in ritual authority are not classified as social stratification or hierarchies (Hodder 2014b:15), for example: "the inhabitants of some houses seem to have been 'successful' in that they lasted longer (were rebuilt more times [#124]), had more burials [#123] (perhaps largely as a by-product of longevity [#125]) and collected many bull and other animal parts that were installed in houses as part of architectural elaboration [#122] (again perhaps as a by-product of longevity [#125]). But these houses did not seem able to convert their roles in relation to ancestors into other forms of social power and status. There seems to have been a fierce egalitarianism" (Hodder 2014d:160; but see Düring 2011c:116 with a somewhat different assessment).

It is this development changing the role of history houses around 6500 BC at Çatalhöyük that this discussion will focus on and use to draw out how socioeconomic status and ritually elaboration houses are related. The 'history

house' concept, as summarised in the above cited text passage, combines the indicators of asymmetric distribution of symbolic imagery (**#122**), asymmetric distribution of subfloor burials (**#123**) as well as building continuity (**#124**) and house longevity (long use lives of houses, **#125**), which add the 'history' component to the ritual power of these institutions (**Theme 15**). Therefore these indicators will be discussed here together. It is important to stress that indicator **#123** refers exclusively to the number of burials per houses; not potential status difference that relate to the manner of burial, which was captured here with another indicator (**#121**). Indicator **#126** will also be subsumed here as part of 'ritual house elaboration', since it refers to Hodder and Cessford's (2004:31; Hodder 2006c:189, 195) hypothesis that ritually elaborate houses adhered particularly closely to the standardised house layout (**#64**) that also had a ritual component by dividing the house into a more ritually elaborated and a less elaborated part. The remaining two indicators in this theme (**#127**, **#128**) can also be discussed in relation to the changing role of history houses around 6500 BC; they will thus be drawn upon later in the section.

Changes of the significance of ritual status around 6500 BC

Some of the history houses that post-date 6500 BC can be characterised as more productive than other houses; they are for example larger, have more rooms and yards; more storage space (Hodder 2013a:21, 24, 2013b:26; Hodder and Farid 2014:34). Many of the post-6500 BC buildings that Hodder (2013a:19) describes as containing specialised bead or ground stone workshops were also history or elaborate houses (B.18, B.49, B.52, B.65 with yard, B.77: Hodder 2014c:Tab.1.1), and elaborate houses might have specialised in stone production (Hodder 2013a:19). Hodder (2013a:25; 2013b:22, 26; Hodder and Farid 2014:34) understands this as evidence that when socioeconomic competition between households developed after 6500 BC, some of the history houses were among the first to become more socioeconomically powerful than others. It is likely that their ritual power (**#122-#124**) played a role in this development, and that history-

households were able to convert their ritual authority, in some cases amassed over the course of several re-building episodes (#88), into socioeconomic advantages.

This development around 6500 BC could either be understood to mean that ritual house elaboration (#122-#124) at Çatalhöyük only became entangled with social and economic status during the Late Neolithic. It is possible to imagine that in the Early Neolithic, some people might have been stronger involved in ritual activities than others, for example in a form of labour division whereby some people focused on tending to fields and animals while others tended to ritual (see e.g. Hodder and Pels 2010:183 with suggestions that ritual specialists existed at the site); but that their special ritual authority did not translate into socioeconomic advantages.

Alternatively, it could be argued that the post-6500 BC development is an argument for postulating that ritual elaboration at least in principle also constituted a status marker before 6500 BC, even if that ritual status did not translate overtly, in archaeologically visible ways, into other spheres of life (see Hodder and Pels 2010 who seem to reconstruct some status differences related to ritual already during the Early Neolithic). In other words, ritual authority might always have been an important way for households and individuals to acquire social status, even if it might not have been feasible to display that status in ways recognisable for archaeologists, for example through better diet, burial goods or access to obsidian (some of the possible socioeconomic status markers suggested by Hodder 2014b:5).

There is some argument for the importance of ritual authority for acquiring social status in form of the competition for elaboration observed in particular by Düring. He noted that the different elements that mark Çatalhöyük houses as ritually elaborate—concentration of burials (#87), concentration of symbolic elaboration (#86) and building continuity (#88)—are not distributed in clear patterns whereby some houses have all and others none; for example, some buildings that lack symbolic imagery still have many burials and some elaborate buildings are not continued through rebuilding (Düring 2006:225-226, 2011c:115; Hodder 2014b:5, 2014c:3). This is interpreted as the status of ‘history’ or ‘lineage houses’ having been subject of constant social negotiation and competition (Düring 2005:20, 22, 2007a:141; Hodder and Pels 2010:178). Especially the ability to continue the house

through building continuity (#88) might have been important within this competition since demonstrating a long history of houses (and thereby the related social relationships and household) —termed ‘history making’ or ‘amassing history’ by Hodder (2014b; Hodder and Pels 2010)—was apparently an important part of accumulating status (Düring 2007a:148, 2009, 2011c:114-116). Düring (2007a:141) especially points out that households might have entertained ties with multiple different ‘history house’ groups; taking this thought further, the competitive element of accumulating ritual charge might have been fuelled by either various households competing for the opportunity to contribute towards the charge of a particular history house, for example for the opportunity to be buried there; or by competing history houses trying to acquire as much as possible of the available ritual resources; or by both.

There even is some anecdotal evidence for a socioeconomically distinct role of some history houses also before 6500 BC. For example, Hodder (2014b:160) reports that the elaborate house B.77, dated between 6700 and 6500 BC (Farid 2014:119; Hodder 2014b:Tab.1) had particular large storage spaces. Studies of the diet and pathologies of skeletons from subfloor burials attest that some individuals buried in history houses had preferential access to protein-rich foods, and that on average individuals buried in history houses did different types of physical work. For example, individuals from elaborate houses seem to have engaged stronger in mobility and injury-prone activities, but less in load-carrying activities than individuals from non-elaborate houses (Hodder 2013b:26-27 citing work by Larsen et al. 2013; Pearson 2013). It is tempting to interpret this evidence in terms of some type of status-relevant division of labour, with history-households monopolising work that might have had socioeconomic higher status, such as hunting, fighting and travelling to distant places to procure resources. But there is also contrary evidence, for example the residents of the non-elaborate B.54 might have had preferential access to meat (Hodder 2013b:25).

Possibly future research might allow for a clearer idea of the chronological development of such status differences and their relation to history houses and ritual status; for example, it might be interesting to focus stronger on chronological

patterning in the isotope and skeletal data cited above in order to map how distinct diets and workloads developed over time. Based on the current evidence, it could be concluded that most likely there was no sudden change in the social meaning of ritual house elaboration around 6500 BC, but rather that ritual probably became increasingly important in the establishment of socioeconomic status in the centuries leading up to 6500 BC. Since the ritual charge of houses was to a not unimportant degree created by their longevity over multiple rebuilding episodes (**Theme 15**), it is possible to imagine a scenario whereby the longer the site existed, and the longer individual history houses existed, the more overpowering their ritual authority might have become, and the more it also transcended into other aspects of social life, and into a special status of those living in such a building.

Open questions also remain about how the observation that history house-households might have among the first to acquire a higher socioeconomic status at Late Neolithic Çatalhöyük because of their ritual power is to be reconciled with the fact that history-making in general, and the history houses as a social institution in particular, started to decrease after 6500 BC (**Theme 5**). That is the reason why a decrease of building continuity was also mentioned in relation with increasing social differentiation at Late Neolithic Çatalhöyük (**#127**), which is only seemingly in contradiction with the other indicators (**#122-#126**). Combining these, it would be possible to suggest that ritual elaboration was the (or a) chosen means of establishing status at Çatalhöyük for only a short adjustment period in the centuries after 6500 BC, after which this particular form of status assertion went out of fashion and maybe made way for others. Maybe precisely because ritual house elaboration (**#122-#124**) had been an established method of asserting status already before 6500 BC, as argued above, was it an opportune way to acquire status during the 6500 BC changes: a new socioeconomic reality expressed in already existing architectural 'vocabulary'. Düring (2014:133-134) has recently suggested that in Neolithic Anatolia "houses as manifestations of social groups made it possible to have profound power differences between people cloaked in a vocabulary of kinship and belonging" (similarly Arbuckle 2012a:310 about the Köşk Höyük and Güvercinkayası elite residences). Applying this to the present discussion,

groups seeking socioeconomic power after 6500 BC could have chosen to employ the architectural vocabulary of history houses which originally had been imbued with connotations of social inclusion in an egalitarian system.

Some of the changes related to building continuity and burial location observed at Late Neolithic Çatalhöyük (**Theme 5**) could be interpreted in terms of such a period during which individuals and households competed for ritual resources. For example, Düring observes a gradual development in the upper levels of Çatalhöyük, whereby the location of burial clusters was around 6400 BC disconnected from building continuity, i.e. buildings with many burials (#87) do not also have long rebuilding histories (#88); afterwards some individuals were able to command enough authority to collect burials in their house even if they did not reside in a building with a long history interprets (Düring 2006:228-229, 247, 300-301, 313, 2011c:132). Even the ritual house burning that characterised the middle levels (**Theme 5**) might have been part of this. There have been suggestions that house burning (#128) might have been in some way an attempt to assert social status, maybe marking the control over powers such as fire, or a particularly form of conspicuous consumption: the destruction of an elaborate house (Cessford and Near 2005:182; Russell et al. 2014:121). Speculatively it could be suggested that the horizon of house burning marked a time when those who sought to amass ritual power organised spectacles such as the burning of a ritually charged house; or similar to what was suggested in **Theme 5**, the house burning might have been a counter-reaction against attempts to gain power by amassing ritual charge and history.

Translating ritual into socioeconomic status

In the text passages coded for indicators #122-#124, researchers have named a number of ways in which ritual status and authority might have been constructed; and it is possible to draw on some of these, and on the discussion of ritual house elaboration in Chapter 6 (**Themes 3, 4, 5, 15**), to identify ways in which ritual status might have been translated into socioeconomic power, and therefore have been

relevant for the formation of social hierarchies. This translation essentially seems to be based on ritual charge (history, memory, ancestry) being a resource, as identified in the discussion of **Theme 15**. Those who controlled it might have been able to exchange it for social or economic resources: food is mentioned by Hodder (2014d:151, 153), other imaginable options are non-food items, labour, or social resources such as having one's opinion respected in group decision-making. Control over ritual, preferential access to ritual, was probably achieved by control over the built space that contained the ritual charge (burials, images, history **#122-#124**; Hodder 2016:2; Hodder and Cessford 2004:31, 36; Hodder and Pels 2010:178); and being resident of a history house or elaborate house might have provided individuals and groups with particularly much ritual resources that they were able to exchange for particularly many social and economic resources. For example, Hodder and Pels (2010:183) seem to suggest that the primary caretakers of history houses and ritual would have been groups or individuals that can be described as 'elders' that were respected also as social authorities.

Conversely, social and economic resources were needed to create ritual items; Hodder and Pels (2010:175, 178) in particular portray ritually elaborated houses also as archives of productive success. Contributing to the creation of ritual items therefore was one opportunity for households to show off their socioeconomic productivity; displaying socioeconomic success has in this chapter (especially **Theme 18**) identified as an important means of acquiring even more socioeconomic success. The various activities might have provided a particularly conspicuous stage for such display. For example, clay mouldings containing parts of wild animals were one of the ritual items that were irregularly distributed between houses (**#86**, **#122**); and making these necessitated obtaining the bones or horns of wild animals: "Access to the wild animals from which these parts were taken may have been obtained by scavenging and hunting [...] We also know that feasting remains on-site include a disproportionate number of wild bulls. The provision of installations in houses thus suggests an ability to provide significant economic and social resources in the form of feasts" (Hodder and Pels 2010:175). The installation then also worked as a continuous visual reminder of the contribution made by the household or

individual that provided the animal piece, and therefore displays their ability and skill in leading for example a wild bull hunt. If feasts were involved in the chain of events that lead from the hunt to animal bones and horns becoming parts of house installations, as suggested by Hodder and Pels (and also Russell et al. 2009, 2014) this was yet another event for social display. Both hunts and feasts are high-arousal group events (hodder 2006:92, 165, 197, 203; Russell et al. 2014:117, 119, 121) during which households could show off their success.

In conclusion, at Late Neolithic Çatalhöyük the ritual elaboration of residences might have become part of a strategy of asserting socioeconomic status, and indicators **#122-#124** are therefore here accepted as potential architectural indicators of social hierarchies. This discussion has focused entirely on Çatalhöyük, but also at Hacilar II (Mellaart 1970c:36) and Höyücek (Umurtak 2000a:688) 'shrines' are reconstructed as elite residences; thus there is some tentative evidence that also at other sites that the ritual elaboration of houses gave special status to its residents. Indicators **#127** and **#128** seem be specific to Çatalhöyük East and the re-ordering of society occurring there around 6500 BC; they are therefore here tentatively included but require a thorough contextualisation when applied to other sites.

As an overall conclusion of **Theme 19**, I would like to reiterate that all indicators are meant for cases where one or two buildings within the settlement stand out from the others (not when an indicator applies to all or many buildings); and that to identify an elite residence, a building would need to feature number of different indicators, maybe also across themes. The **Theme 19** discussion has already identified some potential regional and chronological patterning in the architectural expression of socioeconomic differences, for example ritual house elaboration might have been a means of status assertion mainly at Çatalhöyük, and there only for a short period of time around 6500 BC. An application of the **Theme 19** indicators to the archaeological record in Appendix 12 might identify more such patterns.

7.3.2 Theme 20: Ruling the settlement

Theme 20 collects indicators that have been interpreted as indicating the presence of an elite group that took influence on the spatial arrangement or construction of a settlement. Mellaart's (1979:27) isolated remark that at Çatalhöyük "signs of authority abound—standard-size bricks, measurements, [...]" can be discounted because standardised or similar brick sizes (**#129**) have not by other researchers been connected to elite influence (e.g. see Love 2013a:93; Stevanović 2013:98-99 discussing brick standardisation) and there further probably was no such standardisation at Çatalhöyük (Love 2013a:94, 96). Further, the hypothetical remarks by Hodder (1996a:46, 2006:99; Hodder and Cessford 2004:36) that either the agglomeration of a large number of people into a densely clustered settlement (**#130**) or the standardised layout of houses (**#132**) could be related to the attempt of an elite to control a large number of people can relatively easily be discounted since there is instead reliable evidence to see these two indicators in the context of an egalitarian communal integration (**#71**, **#87**).

Interestingly, contrary to indicator **#130**, Eslick (1988:37, 39) has tentatively connected the unclustering of settlements (**#131**) with emerging socioeconomic differences, however without explicitly discussing the reasons for this assumption. The reason might be a dichotomy between the clustered, egalitarian villages of the Neolithic and Early Chalcolithic and the typically less dense layouts of later settlements which might be stratified, a development she for example observes at Canhasan (Eslick 1988:39). In this thesis, clustering has been identified as fostering communal integration (**#47**). Communal integration is however not by default an opposite of social hierarchies; rather, communal integration might have been used as a strategy in status assertion by elites, as will be discussed in more detail further below in this section. Indicator **#131** is therefore here discounted.

That leaves two indicators in this theme: the regular layout of settlements (**#133**) and enclosure walls/fortification systems (**#134**). Unfortunately, none of the text passages coded with **#133** or **#134** discuss exactly how elites would have asserted status by regulating settlement space or building fortifications; but material already

collected throughout Chapters 6 and 7 can be used to discuss these indicators.

A regular settlement layout (**#133**) is often understood as an arrangement of buildings and unroofed spaces that did not grow organically, and has sometimes been related to the existence of a central authority that somehow planned or monitored the settlement layout (Arbuckle 2012a:310; Duru 1996e:118, 138), for example by Duru (2008:9): “Consequently it is certain that Kuruçay [6] town was ruled by a strong authority able to implement plans and execute them in a way that determined the form of the whole settlement in this period”. Similarly, Mellaart (1970c:77) found that “the extensive levelling operations conducted with such precision that over a length of 70 m the variation is a mere 15 cm, and the intricate layout of the buildings erected by the Hacilar I people, show conclusively that this was not a village of individual houses sheltering behind a defensive wall, but probably a fortress of a ruler who had command of considerable human resources”. Here, it is assumed that the level of coordination recognisable in the competent execution of a large-scale construction necessitated a central power. The existence of enclosure walls (**#134**) as well has been connected to the presence of a central authority based on the amount of coordinated labour it took to erect such constructions (Duru 1996e:118; Mellaart 1970c:77 as cited above).

These notions can be contrasted with the discussion of clustering (**#46**) and **Theme 11**, where indications for the coordination and cooperation around house construction were interpreted rather as signs for suprahousehold cooperation in an egalitarian society. And in **Theme 16**, enclosure walls (**#92**) were interpreted as a sign for the construction of a communal identity through differentiation from the ‘outside’ and other communities. Although the two interpretations are not directly in contradiction—both assume some level of coordination between households regulated on a level above household-decision making—it is noteworthy that the sites that dominate the **Theme 11** discussion tend to be older than those coded with **#133**, and there are also two different sets of researchers that can be found in the **Theme 11/#47** vs. the **#133** discussion. This suggests that the interpretation of building coordination in either a community/egalitarian direction or an elite/centralised direction is possibly personal preference by researchers. It also

seems to be influenced by the chronological position of the site, with later sites more likely to be interpreted in terms of an elite regulation of settlement space: examples named for **#133** are Early to Late Chalcolithic, while the discussion of clustering (**#46**) focused on Early Neolithic to Early Chalcolithic sites, which are also the most prominent in the discussion of **Theme 11**.

That said, it is actually possible that coordinated construction first functioned in an inclusive way, and later became appropriated by emerging elites as a means to establish influence over settlement space, as well as influence over people. If the regularity of the settlement (**#133**) is seen as evidence that the entire village was constructed in one large-scale construction event (as in the case of Hacilar I as portrayed by Mellaart 1970c:75-76), a possible coordination of such an event by an elite would have constituted a very conspicuous performance (see Love 2013c and **Themes 2, 11** for a discussion of construction as performance) and display of their control over human as well as non-human (stones, mudbrick, wood) resources. If individual buildings were constructed consecutively but according to some central plan, this could display a continued degree of control of a central authority, which had to be consulted before house building, over the settlement. Similarly, if an enclosure wall (**#134**) was indeed erected under instruction from an elite, this would have constituted a conspicuous display of elite authority as outlined in the previous paragraph. It must be stated clearly again, however, that coordinated construction could also have been achieved through communication between groups and households of equal status.

To conclude, coordination and cooperation of construction activities in a settlement community alone cannot be seen as unequivocal evidence for the existence of an elite, although it is possible that elites chose to regulate and initiate building activities as a way to demonstrate their power over human and other resources. Communal construction events and enclosure walls might also have functioned in creating community cohesion that facilitated governance: Bachhuber cites several examples of EBA governance strategies that included fostering a communal identity among non-elites, or sometimes only selected groups among the non-elites in an inclusion/exclusion strategy (details see Bachhuber 2015:53, 77-78, 114-115).

Bachhuber focuses on discussions of feasting and celebrating, but it seems at least in principle possible that elites also employed for their own purposes the community-creating effects of shared construction activities that have been explored in **Themes 2, 11 and 16**. Indicators **#133** and **#134** are therefore very tentatively included on the indicator list. They need to, however, be thoroughly cross-referenced with other indicators of the presence of elites and status differences; a regular settlement layout or fortification walls alone cannot prove the presence of a central authority.

That none of the indicators of **Theme 20** can actually securely be associated with the influence of an elite on settlement arrangements could mean a number of things: First, that socioeconomic status differences did not (yet) have an impact on settlement layouting in Neolithic and Chalcolithic southcentral Anatolia; this is however somewhat contradicted by a few examples from **Theme 21** (especially **#135-#137**), with which **Theme 20** partially overlaps. Or second, that status differences were articulated in the conceptualisation of settlement space in ways that are not yet, or maybe never will be, known to archaeology. For example, with **Theme 14** I have discussed the possibility that the movement of people through the settlement would have been regulated by many rules that did not translate into the archaeological evidence; this is also imaginable for a compartmentalisation of settlement space by social status. An interesting third possibility is that the archaeological difficulty of adequately proving an relationship of the indicators in **Theme 20** with socioeconomic status differences, and the fact that many indicators of **Theme 20** were also coded for **Themes 16, 10 or 12** results from an attempt of early elites to cloak their influence on communal construction activities into the architectural 'language' that had previously been used to build suprahousehold ties in an egalitarian setting (see also **Theme 19.5**). These thoughts should be explored in further research.

figure has been removed due to copyright restrictions

Figure 25 Plan of two subphases in Kuruçay Level 6 (During 2011c:Fig.6.8).

7.3.3 Theme 21: The Pre-Citadel

Theme 21 is an experiment in trying to discern, at Neolithic/ Chalcolithic settlements, features that later came to characterise the EBA citadels as places of elite-making that have been characterised by Bachhuber (2015) as so central in the construction of social stratification. **Theme 21** is similar to **Theme 20** insofar as it describes potential elite influence on settlement layout. **Theme 21** has two parts that capture two features of EBA citadel settlements: the first indicators (**#135-#137**) describe how settlements were divided into two parts; the second part describes the 'central complex' (**#138-#141**). EBA citadels and also non-citadel settlements had what Bachhuber (2015:55, 77, 107-129) terms 'central complexes' that combined elite residences, large storage facilities, larger open area and temples, and functioned as administrative centres and places for congregation; the social inclusion and integration that took part in these places was instrumentalised

and transformed by EBA elites into part of their power-assertion strategy. Although I repeatedly caution throughout Chapters 6-9 against attempts of projecting Bronze Age concepts over Neolithic or Chalcolithic evidence, if done carefully it is a useful research issue to try and discern the origins and development of architectural arrangements that came to mark socioeconomic inequalities. This is my contained experiment in trying to discern such a process.

Dividing the settlement

Indicator **#156** collects statements that connect a division of the settlement into two parts, a residential area and an area that was elite residence and/or public congregation space, with social stratification. For example, Mellaart (1970c:34, also Cutting 2005b:131-132; Steadman 2000b:184), saw Hacilar II divided into two parts, with wealthier residents on one side and a “poorer” area on the other. The western, wealthy part was distinguished by large and regular houses with solid mudbrick walls, and it also had more “public buildings”: a shrine and granary. Mellaart 1967:71, cf. Hodder 1996a:46; Schachner 1999:47) had also postulated such segregation for Çatalhöyük Level V, of which he had excavated particularly richly elaborated houses that he identified as the quarter of a priestly elite, segregated from lower-status residents elsewhere in the unexcavated parts of the level. Suggestions have also been made that the division of Aşıklı Höyük Level 2 into a residential area and one with larger buildings for public use represents the presence of an elite at the site (Schachner 1999:46, 109; cf. Cutting 2005b:33).

There are also examples where the subdivision of the settlement was further solidified through dividing walls (**#137**) or differential heights, with the elite residing in an elevated part of the site (**#136**): At Güvercinkaya, a building complex located at the highest point in the settlement terrain (**#136**), with walls separating it from the rest of the settlement (**#137**), is reconstructed as residence of an elite (Arbuckle 2012b:304, 2014:217). Cutting and Umurtak have both suggested that the small walled settlement of Hacilar II might have been only the centre of a larger settlement: “Is it possible that the well- defended Hacilar II settlement could have

been a nucleus centre where the more privileged people lived? It can be assumed that the people involved in farming, animal rearing and pottery making would have lived outside of this defence wall in an area around 300-400 m in diameter” (Umurtak 2011b:7). Cutting (2005b:131) cites this as Mellaart’s idea: “Mellaart’s view (Mellaart, pers. comm.) that it may have been the citadel of a much larger settlement cannot be discounted”.

Leaving the discussion of the validity of this reconstruction of Hacilar II to Appendix 12: What could have induced early southcentral Anatolian elites to spatially segregate themselves inside the settlement? It is possible to recognise two elite-making strategies that were already discussed throughout this chapter. First, spatial segregation (#135) and especially walls (#137) could have been employed in a hiding-displaying strategy. The physical segregation would have removed the elite from some of the naturally ensuing social control generated by close living conditions that probably was an important instrument for regulating egalitarian communities in the Early Neolithic (see especially **Theme 10**). It is possible that access to the higher-status part was controlled, as it likely was at Güvercinkayası, with solid walls around the upper town. At the same time, this upper settlement is also reconstructed as a ‘central complex’ (see **Theme 19.3**) and thus was probably at least periodically open to access by non-residents. In sum, being spatially separated, elites were able to hide more of their activities and resources from the eyes of others, and regulate access to them as suited their status-reinforcement strategy of hiding/displaying.

Second, such a spatial subdivision would work as a visual manifestation of status differences; it would visualise that the community was divided into people with higher and with lower status. Height elevations between a higher and lower settlement would make this even more obvious. ‘Visual dominance’ has already been identified as a potential strategy of asserting social status at LN/Chalcolithic sites. By the EBA, it would have become a regular and important feature of elite-making: Bachhuber (2015:107-111, 128) describes how EBA citadels, located on elevated terrain and reinforced with walls and glacis, became a visualisation of EBA elite status, displaying a permanent message about the presence of such elites and

built “to encode information related to the permanence, solidity and strength of the edifice, and, ultimately, the power of the people who quarried, transported, finished and set the many thousands of tons of stone invested in the façade” (Bachhuber 2015:111). This is a reminder that certainly by the EBA, the dominance communicated by walled and elevated elite areas was meant to project beyond the settlement itself. Also Güvercinkeyası is reconstructed at the centre of a larger economic unit that also incorporated pastoral groups in the surrounding (Arbuckle 2012a). In conclusion, the spatial separation of elite residences, especially if reinforced by walls (#137) or elevation differences (#136) in prehistoric southcentral Anatolia can probably be accepted.

The ‘central complex’

The existence of buildings specifically intended for ritual (#138), production (#139) or storage (#140) at Neolithic/ Chalcolithic sites has been connected to the existence of a socioeconomic elite. From the discussion of these indicators, two main arguments can be extracted for relating non-residential buildings with socioeconomic hierarchies, and these relate to a number of elite-making strategies already discussed throughout this chapter.

First, especially communal ritual buildings (#138) have been connected to centralised control over the people, labour and resources it took to build such structures; and/or to control over ritual itself. Some researchers have interpreted the Aşıklı Höyük large ritual/ congregation buildings as evidence for a powerful elite that controlled the labour necessary to erect such structures (Asouti 2005a:79; Schachner 1999:46, 51, 109; Steadman 2004:539). Likewise, Schachner (1999:47) cites the absence of such ritual buildings as evidence for the absence of social hierarchies at Çatalhöyük. Erdoğu and Ulubey (2011:9) seem to reconstruct a ritually constructed elite at Çatalhöyük West, where they identified B.78 as a ritual building: “Ritual buildings can be seen as an instrument of power, used to create and maintain inequalities within society, possibly by control of ritual authority and access to the supernatural”. These arguments relate to two elite-making strategies

already encountered in **Theme 20** and **Theme 19.5**: construction as a performance that display elite influence over people and resources; and ritual itself as a resource that can be monopolised and be translated into socioeconomic advantages.

Second, the centrality created if several communally used buildings and the elite residence are concentrated in one place could have been instrumental in a hiding/displaying strategy of elite making. At Late Chalcolithic Kuruçay 6, Duru (2008:124, 127) reconstructs a central complex of 'shrine' (**#138**), elite residence and a large storage facility (**#140**) attached to the shrine. He (1996e:16, 2001e:45, 2008:124, 127) described the settlement as follows: "Of the approximately 25 structures, several buildings which were very probably the residences of the ruling class, a temple and a temple storage facility were found in the centre of the settlement encircled by a series of houses. The structures in the outer circle must have been housing for the subjects. [...] A separate system of several gates was made for entrance to the temple and the residences of the rulers" (Duru 1996d:56). It remains somewhat unclear how these houses were recognised as elite residences because "Buildings nos. 5 and 6, [...] thought to be the 'Lord's House Mansion' are no different from regular houses" (Duru 2008:127). This suggests that their location in the centre of the site (**#141**) and close to the 'shrine' and 'temple storeroom' (**#138**, **#140**) was in fact the main reason for their identification as high-status houses. Although many details of Duru's reconstruction of Kuruçay 6 have been found rather conjectural (Düring 2011b:803, 2011c:227-228; Schachner 1999:160), if accepted it could be argued that such an arrangement supported an elite-making strategy already observed in **Theme 19.3**: By placing the elite residence in the centre of the village (**#141**) close to communally used buildings, it would quite literally have been in the centre of attention and become a stage for the display of socioeconomic differences that were at Kuruçay 6 apparently communicated by non-architectural means, given that the elite residences were architecturally not distinct. That a large storage building formed part of the Kuruçay 6 'central complex' also brings an element of elite-making through control over resources and productivity into the picture (as at Güvercinkeyası, Arbuckle 2012a:310; Cutting 2005b:137; or EBA Bademağacı: Bachhuber 2015:79, 131). It is interesting to

consider a peculiarity of this reconstruction of Kuruçay 6, because in such a spatial arrangement, the elite residence and 'central complex' were very much in the centre of attention of the village itself. Contrary to for example Güvercinkayası, the elite here was spatially segregated, but rather more open to social control by the surrounding commoners. If such a reconstruction can be verified, it could attest to the existence of different strategies of elite-making in Chalcolithic southcentral Anatolia, some relying more strongly on the displaying strategy.

It is possible to contrast such interpretations with those collected for **Theme 16** in Chapter 6, where ritual, storage and workshop buildings (#138-#140) were identified as facilities for suprahousehold integration. Although the two are not mutually exclusive, as already noted several times in this chapter, it is noteworthy that the same sites and examples are often mentioned in both **Theme 16** and **Theme 21**. For example in the case of Aşıklı's large ritual buildings, the field is divided with some researchers preferring to see a socially inclusive function (e.g. Cutting 2005b:28, 46; Düring 2006:304-305; Özbaşaran 2011:108; Özbaşaran and Duru 2015:50), while others recognise an elite (Asouti 2005a:79; Esin and Harmankaya 1999:128; Schachner 1999:46, 51, 109; Steadman 2004:539) or are undecided (Asouti 2005a:79; Düring 2011c:72-73).

Referring back to the discussion of **Theme 20**, it can be suggested that the ambiguity over the archaeological interpretation of 'central complexes' could be a result of an intentional architectural ambiguity as part of elite-making: the masking of socioeconomic differences into the costume of kinship by choosing architectural forms that had originally, in the earlier Neolithic, been associated with egalitarian community integration. Interestingly, Bachhuber (2015:23, 55, 77, 114-122) as well states that some EBA central complexes were architecturally and archaeologically ambiguous in that it is not always clearly recognisable whether or not they were related to social hierarchies: "The meaning behind an architectural hierarchy in a settlement can also be ambiguous. Does a large building that likely served public functions reveal a socially integrative, corporate institution consistent with a village social logic, or a socially exclusive one that is consistent with a citadel social logic? Or some combination of both?" (Bachhuber 2015:107). For these EBA examples as

well it is interesting to consider in this respect whether such ambiguity was not intended by elites who created 'central complexes'.

To summarise **Theme 21**: While most of the Neolithic and Chalcolithic examples mentioned throughout this discussion can be seen as problematic, the discussion has identified a number of elite-making strategies also identified through the other themes in this chapter, and which seem to be bundled in 'pre-citadel' settlement arrangements. Being aware that mine is a particular view of the evidence, I will accept here all indicators of **Theme 21** and conclude that some of the mechanisms that made EBA citadel into central places of elite-making can already be observed at Chalcolithic sites.

7.4 Summary of Evaluation

In summary, of the 12 potential indicators of social competition, and 36 indicators of social stratification, documented in the content analysis, 10 and 31 respectively have been accepted as probable indicators of socioeconomic differences; of the 31 indicators of social stratification, one (#94, deep house) functions as a headline indicator. Seven indicators (#95, #96, #116, #129-#132) were discounted because they could not sufficiently be verified with archaeological evidence (Appendix 9).

7.5 Reflections

A first observation is that less indicators overall have been identified in the content analysis for Chapter 7 as compared to Chapter 6. Further, a significant number of the text passages coded for this chapter refer to hypothetical statements, such as "Differences in building size can also signal unequal household wealth and the growth of hierarchical organisations. This seems unlikely to have been the case at Çatalhöyük, where building size differentials were perpetuated through many generations" (Cutting 2005b:128). Together, the lower number of indicators, and the higher number of hypothetical statements can be interpreted to mean that

there is less knowledge of the process of elite formation in Neolithic and Chalcolithic southcentral Anatolia as compared to the community-household autonomy balance, a less lively academic discussion around the matter, and also a discussion that often remains hypothetical with little firm evidence to draw upon. For this thesis, this meant fewer possibilities to cross-reference evidence, to compare and contrast opinions, and therefore fewer opportunities to either completely verify or completely exclude possible indicators. A lot of the indicators that were eventually included on the indicators list (Appendix 9) can only very tentatively be seen as possible indicators of increasing socioeconomic differences. Since this thesis intends to contribute to building an indicator or referencing system for future research into the development of social stratification in LN/EC southcentral Anatolia, I also deemed it better to, when in doubt, include indicators on my list and then further explore and evaluate them in further research.

Discussing social stratification, it could have been expected that more examples from the EBA would be found on the coding list (Appendix 5), but the EBA is curiously underrepresented on that list. One reason is certainly my choice of literature to code, which is geared towards the Neolithic and Early Chalcolithic. Another important reason is the low number of excavated EBA sites in southcentral Anatolia compared to other areas in Asia Minor (see Chapter 3.6.1). For example, while coding Bachhuber (2015), I came across many relevant examples and discussions, but these were almost never based on southcentral Anatolian evidence and true to my self-prescribed 'blinker'-strategy, I necessarily need to ignore them although I have included the occasional reference to Bachhuber's research on elite-making into the above discussion. The few excavated EBA settlements from inside the study region (Bademağacı, Beycesultan) are only mentioned sporadically in Bachhuber (2015); his main storyline and research opinions are clearly based on other sites. This might partially be due to the fact that most of the southcentral Anatolian EBA settlement excavations are comparatively recent: Acemhöyük is still being excavated, the final Bademağacı publication is not yet available, and the new EBA excavations at Hacılar Büyük Höyük only started very recently. Instead, EBA sites outside of southcentral Anatolia have become classics because they were

excavated to a larger degree several decades ago (Demircihöyük, Karataş, Troy, Alacahöyük, Poliochni), and they dominate the discussion. As more EBA research is being done and published in southcentral Anatolia, it might become possible to study a development of regional elite-making strategies; at the moment, one needs to either look outside the study region in order to be able to draw a long-term perspective from the Neolithic to the Bronze Age; or accept that the latter part of that sequence is weakly articulated in a research project such as this, which is however regrettable especially in the case of this chapter.

Chapter 8 MOBILITY

A house without people in it is not a proper house. [...] Houses that are abandoned decay surprisingly rapidly and may be a source of anxiety, just as the people without houses [...] give rise to another kind of alarm (Carsten and Hugh-Jones 1995:44)

8.1 Introduction

Based on Chapter 3, the types of mobility, and types of sites related to mobility, that most likely existed in Late Neolithic and Early Chalcolithic Anatolia are: First, the mobility model whereby people are based in a permanently inhabited site, but some members of the community leave for some parts of the year during which they roam the landscape to perform certain (mostly economic) activities and live in—probably regularly re-visited—camp sites (the ‘Çatalhöyük model’, Hodder 2013b, 2014; and see Baird et al. 2011 who identified such a camp at Pınarbaşı B). In that case we would expect to find campsites and possibly an architectural signature of mobility also at the main site (henceforth called ‘the base settlement’ as a modification of the term ‘base camp’ suggested by Wendrich and Barnard 2008:5, Fig.1.2 for this type of mobility). Second, the model of some sedentary and some mobile peoples who live parallel in the same landscape, but do not live together (the ‘Güvercinkayası model’, Arbuckle 2012a). In that case we would expect to find campsites, but no architectural signature of mobility at the permanently settled sites. And third, there are also prevailing suggestions as to the existence of entirely nomadic landscapes in southcentral Anatolian prehistory, for example in the Lake District and Konya plain the lack or scarcity of sites for much of the Chalcolithic period can possibly interpreted in terms of an entirely mobile, probably pastoral, landscape (see discussion in Chapter 3.4, 3.5, and especially DeCupere et al. 2015; Duru 2008:8-9, 186; Vandam 2015). In that case we would expect to find campsites, and no permanently inhabited sites. Some such temporally inhabited campsites might have been regularly re-visited over a period of time, for example Canhasan I Level 1 (Düring 2011b:800-801; 2011c:246).

8.2 The architecture of mobility in prehistoric Anatolia

Based on Chapter 3, it thus appears two types of sites related to mobility existed in the study region—the campsite and the ‘base settlement’—and both might have specific architectural signatures attesting to mobility. And indeed, the content analysis identified indicators for both types of sites. It has documented 21 architectural indicators for mobility, which can be divided into four themes. **Themes 22** and **25** describe seasonally used campsites; **Themes 23** and **24** permanently inhabited sites from which groups of people left periodically for weeks or months to perform certain activities in the landscape (‘base settlements’). Examples and case studies related to **Themes 22** and **25** are from different periods in Anatolian prehistory, while **Themes 23** and **24** are more specific to the Late Neolithic.

| | |
|----------------------------|--|
| The campsite | Theme 22 Living light Theme 25 Ritual in the landscape |
| The base settlement | Theme 23 Shortening house histories Theme 24 Pastoral homes |

Table 8 Themes identified in the content analysis of the mobility debate separated by site types.

| | |
|--|--|
| Early Neolithic to Early Bronze Age | Theme 22 Living light Theme 25 Ritual in the Landscape |
| Late Neolithic mobility | Theme 23 Shortening House Histories Theme 24 Pastoral homes |

Table 9 Chronological relevance of themes identified in the content analysis of the mobility debate.

8.2.1 Theme 22: Living Light

Theme 22 describes architectural indicators for recognising that a site represents a camp site. Indicators **#142-#143** function as headlines to this theme, and summarise the notions underlying the other indicators in this theme. Indicator **#142** collects text passages stating that mobile peoples would be “building slighter and

archaeologically less visible structures” (Gérard 2002:106, similarly Baird in Gérard 2002:112; Özbaşaran 2011:114; Yakar 2011b:81). Indicators **#143** and **#144** refer to Düring’s recent re-interpretation of Canhasan Level 1 as a Late Chalcolithic campsite. Among other pieces of evidence that will be discussed in the following, he stated that “The buildings of level 1 at Canhasan are transient in nature. They were poorly constructed and were modified on a more or less constant basis. As a result, no comprehensive plans were obtained in the excavations. [...] [T]he poor quality of construction [**#143**] and the frequent modification and alteration of buildings [**#144**] could suggest that occupation at the site was episodic rather than permanent. One model that springs to mind is that of pastoral nomads who might have used the site for a short period during seasonal movements” (Düring 2011c:246). The author does not specify what is meant by ‘poor’ construction (**#143**), but it can be surmised that this term refers to the frequently altered (**#144**) thin walls (**#146**) characteristic of Canhasan Level 1. It also remains open in what way exactly the regular modifications (**#144**)—described by French (1998:50) as replastering of floors, ‘strengthening’ of walls and changing of building layouts by breaking down walls and re-erecting new walls elsewhere—were the result of residential mobility. It could be suggested that they were the result of repairs necessitated by the ‘low quality’ of the construction combined with the fact that the structures were often left alone and without maintenance and care for months at a time. Frequent renewal or repair of structures was also observed at the campsites of Pınarbaşı A and B (Baird et al. 2011:381; Özbaşaran 2011:114).

Together, these three indicators attest that campsite architecture is overall seen in the literature as non-permanent. The prevailing idea seems to be that because campsite habitations were not meant for year-round use, less effort was invested in their construction (**#141**) and they were less solid than ‘real’ houses designed as permanent shelters (**#142**); this ‘lightness’ of construction resulted in regular need for repair (**#149**). Both the ‘light’ construction and the frequent modification capture in essence what is often referred to as the ‘ephemerality’ or ‘transience’ of mobile campsites (e.g. Düring 2011c:246). The following discussion will specify how exactly such transient architecture could have looked like: Summarised, the

indicators in this theme describe campsites as having no architecture (**#145**) or non-solid architecture (**#146-#148**) that might resemble tents (**#149-#150**) and provide large storage capacities (**#151**) to store items during the temporary absence of the inhabitants.

Living shelterless

Indicator **#145** refers to the interpretation of the Bademağacı excavators that the mound was used as a campsite during the Late Chalcolithic based on the observation that Late Chalcolithic sherds were present in a stratigraphical level, but no architecture (Umurtak 2005c:66; also Clare and Weninger 2014:17): “The fact that no architectural evidence has been found at [LC] Bademağacı that can be linked to these new arrivals can be understood to indicate that these newcomers were either nomads or that they only lived here for a very short period of time” (Duru 2008:122). Umurtak (2005c:66) cites other sites south of the Lake District with a similar find of LC sherds without architecture to postulate a generally mobile pastoral lifestyle for the region during the Late Chalcolithic.

That mobile peoples would not erect shelters at sites where they only stayed for a short time makes sense. Indicator **#145** goes beyond a mere architectural analysis, though; as a criterion, it requires the accurate dating of pottery and other small finds, and a good understanding of formation processes at the site to verify that the levels were not disturbed. Accepting **#145** as an indicator of mobility, I would also like to point out that the observation of Chalcolithic nomadic peoples choosing as campsites the mounds and ruins of then-already-ancient settlement places probably deserves a closer examination (that is however beyond the scope of this present discussion) as an interesting feature of prehistoric use of a cultural landscape; it would be interesting to consider, for example, how the Early Chalcolithic mound of Bademağacı would have been perceived by LC nomads camping there a few thousand years after the end of the EC settlement.

Living light

Indicators **#146-#148** specify how architectural ‘lightness’ might have looked like: thin earthen walls (**#146**) as at Canhasan 1 (Düring 2011b:800-801, 2011c:246; Yakar 2011b:283), organic building materials (**#147**) as at Pınarbaşı B (Baird et al. 2011:386; Özbaşaran 2011:114), or a mixture of organic materials with earthen rendering, i.e. wattle-and-daub (**#148**), as at Pınarbaşı and possibly Gelveri (Schachner 1999:61; Yakar 2011b:81; see Appendix 12 for a discussion of whether such wattle-and-daub houses existed at Gelveri).

Trying to detect why previous researchers have connected thin and/or organic walls with seasonal use and mobile living, the essence of the argument seems to be that these buildings are reconstructed as tent-like without a solid roof. For example, Düring (2011b:800-801, 2011c:246) postulates that the thin walls of Canhasan Level 1 would not have been able to carry roof beams of the size needed to span the rather large buildings; and using analogies to submodern pastoral camps, suggests reconstructing these structures as consisting “of moderate height walls of stone or loam bricks, above which a tent or a temporary roof is raised, thus creating a hybrid building” (Düring 2011b:801). The Pınarbaşı buildings, a main example cited in the discussion of **#142-#150**, are generally conceptualised as tent-like as well (see **#147-#150**).

The core of the argument thus seems to be the lack of a stable roof. The non-existence of a solid roof is indeed an argument in favour of seasonal use of these buildings during the warmer months. Given the strongly continental climate of the Anatolian interior, and especially the cold and heavy snowfalls in winter (Düring 2011c:12; Kuzucuoğlu 2002:33), it is likely that structures without solid roofs were not used during the colder months, although winter use cannot be ruled out and should be verified e.g. by micromorphological study of rain layers on house floors (see e.g. Matthews 2005a, 2005b for a such a study of a Çatalhöyük roof, summarised in the indicator **#47** discussion), or the seasonality of plant and animal remains found (e.g. Fairbairn et al. 2014 for Pınarbaşı A).

Drawing on the text passages coded for **#144-#150** as well as the headlines nodes

#142-#143, it is possible to summarise the thought process probably often driving the interpretation of ‘light’ structures as used only seasonally as follows: Light structures are easier and/or faster to construct, and people would have chosen to build light—i.e. faster and with less effort—precisely because these structures were not meant for permanent use, or for use over a longer period of time. But also, the non-substantial structures could easily be renewed and repaired, therefore they did not have to be well-built, e.g. “A mass of reed phytoliths and carbonised reed stems suggest an easily refurbishable light superstructure of reeds [at Pınarbaşı B]” (Baird et al. 2011:381). Even apart from the fact that prehistoric building cannot always be explained in such rational ways (see e.g. **Theme 7**), such a characterisation of campsites as impermanent might not fit the southcentral Anatolian context, however, where Neolithic and Chalcolithic ‘campsites’ might more often than not have been locales re-visited seasonally, but used over an appreciable period of time, such as the examples of Canhasan Level 1 and Pınarbaşı B. Accounting for such relatively long-term used seasonal habitations, it would however be possible to counter the above outlined rationale of ‘light architecture’ by arguing the contrary: that mobile peoples re-visiting certain sites regularly needed to build especially sturdy shelters precisely because they were not there to care for the buildings, and to monitor and maintain them throughout the year. For example, how well would the Canhasan 1 structures, and the wall plaster and installations in their interior (Düring 2011c:246; French 1998:52-53), have survived an Anatolian winter without a roof?

It follows that structures without solid roof can probably within the climatic conditions of the Anatolian interior be identified as seasonal or short-lived habitations; but it is possible that some seasonal habitations, used for a type of mobility where the same camp-site is re-used regularly, were still solidly built with a stable roof. With the lack of a stable roof at the main criterion, buildings without stable roofs, such as houses made from reeds and branches (**#147**) or thin walls unable to carry the roof beams indicated by the building size (**#146**) should probably be seen as seasonal. Wattle-and-daub architecture (**#148**), on the other hand, cannot necessarily be reconstructed as not being able to carry a roof—unless the

walls are very thin and the house very wide without posts, which would fall under indicator **#146**). But not all wattle-and-daub architecture can be seen as impermanent (see also longer discussion of wattle-and-daub building in below section on 'neo-evolutionary connotations'. Indicator **#148** is therefore excluded.

The final and somewhat isolated indicator in this theme (**#151**) refers to Düring's suggestion that the particularly large storage facilities found at Canhasan Level 1 support its identification as a non-permanent settlement: "the large storage bins at the site could also have functioned for keeping goods in this location while absent" (Düring 2011b:801, also 2011c:246-247). While this argument makes sense in principle, large storage facilities (**#151**) can only, as also in Düring's discussion, be seen as an additional factor supporting an interpretation as mobile camp if other mobility indicators are present; in a different architectural and social context, large storage facilities have instead been understood very differently, for example as communal storage (**#77**), the storage of newly autonomous and competitive households (**#44**) or of an elite household (**#112**).

Neo-evolutionary connotations

A degree of neo-evolutionary judgement can clearly be detected in some of the adjectives used in the text passages codes for **#142-#150**, for example when the architecture of Pınarbaşı A is described as "flimsy" (Yakar 2011b:81), that of Canhasan Level 1 as "poor" (Düring 2011c:246), or the possible wattle-and-daub buildings at Gelveri as "not substantial houses" (Schachner 1999:61, translated). Especially wattle-and-daub construction is often treated with a noticeable degree of unwarranted disapproval by central Anatolian architecture researchers. One example is Schachner's interpretation that the Gelveri wattle-and-daub buildings were "only seasonally used huts" (1999:61, translated) based on solely their method of construction (not e.g. archaeobotanic or -zoological evidence for seasonality). Other examples that are not related to the mobility debate, but display the same idea, are Mellaart's (1970c:34) belief that the residents of the Hacilar II wattle-and-daub buildings must have been poorer than those residing in the solid

mudbrick houses of the same settlement level (Appendix 12), and also Düring's (2011c:164) suggestion that the wattle-and-daub structures of Hacilar VI could not have carried their own roofs despite having thick posts (#68).

The lack of a rational basis for an equation of wattle-and-daub villages with mobility is called out by Bachhuber who stated that "Wattle-and-daub architecture was almost certainly more prevalent in prehistoric contexts than what is preserved in the archaeological record. Nevertheless, the architectural differences between wattle-and-daub structures versus mudbrick 'longhouse' structures have been exaggerated in the literature on Karataş [an EBA site south of the Lake District]. The purported impermanence of wattle and daub [sic], for example, has supported reconstructions of transhumant pastoralism among the inhabitants of the Karataş village (Yakar 1998), even though a well-constructed and maintained wattle-and-daub hut can be expected to last for 20 to 30 years (Ammerman et al. 1988)" (Bachhuber 2015:75; but also note that he himself describes wattle-and-daub architecture as "impermanent" and "insubstantial" in other parts of the book, Bachhuber 2015:39, 42, 71, 74).

Not only does a quick survey of Bachhuber's (2015) book attest that wattle-and-daub architecture was the main construction technique at several EBA sites in southwestern Anatolia, but also wattle-and-daub was the most common building method used at Neolithic sites in western Turkey, where they are reconstructed as permanent habitations with solid roofs, sometimes carried by posts, and use lives of substantial lengths (Çilingiroğlu and Çakırlar 2013; Çilingiroğlu et al. 2012; Düring 2011c:175-176, 184, 186). This calls into question the notion by central Anatolian Neolithic archaeologists that mudbrick or stone architecture is somehow the default construction style for permanent, year-round residences. Possibly some regional-specific research bias against thin or organic walls is created because sites like Canhasan 1 and Pınarbaşı are explicitly or implicitly compared against the visually solid stone and mudbrick architecture characteristic of the sites that are typically chosen for excavation, for example: "The structures at Pınarbaşı [B] contrast with the substantial mud-brick buildings at Çatalhöyük and, with the strong seasonality indicated in the fauna, suggest that Pınarbaşı was a seasonal campsite" (Baird et al.

2011:387). Such statements also disregard the fact that Neolithic mudbrick building was not always stable, for example see Hodder's (2012b:65-68) description of structural problems and leaning/collapsing walls at Çatalhöyük. In short, some architecture research in the study region works with the false dichotomy of stone or mudbrick architecture being stable and permanent, and organic/daub architecture being impermanent.

Re-creating the tent

A notion detectable in the discussions of #142-#143, but also and especially in that of #146 and #147 is that structures that visually resemble tents in that they are oval (#149) and/or partially sunk into the ground (semi-subterranean, #150) should be interpreted as seasonally or non-permanently used habitations. For example, Özbaşaran (2011:107) has considered that the oval structures (#149) currently being excavated at Aşıklı Höyük in Levels 4-3 "may have been seasonal in nature; this hypothesis will be tested by future work at the site". She goes on to state that "Subsistence may have been similar between the early [Levels 4-3] and later [Levels 2-1] occupations of the mound that have been excavated", therefore clearly indicating that it is not archaeobotanical and -zoological evidence driving the interpretation of Levels 4-3 as a seasonally used site, but mainly the architecture. And Baird (cited in Gérard 2002:12) describes the semi-subterranean buildings at Pınarbaşı B as tent-like: "In Trench B at Pınarbaşı there were fragments of Neolithic structures that are very slight in character. They are basically cuts into underlying deposits lined with stone uprights. They look exactly what you might expect for tent foundations and that sort of thing. We see a very similar thing on nomadic pastoralist sites in the Southern Levant, for example".

Other than that they visually resemble tents, there does not actually seem to be a reason to interpret oval and/or oval dwellings as the residences of mobile peoples. Until more recently, it could have been argued that while oval dwelling does not directly indicate mobility, such architecture was only found at sites in the study area that are otherwise (e.g. through their plant and animal remains) proven to have

been campsites; but new results on some of the oldest sites with oval houses have now also discounted this argument. All three of the oldest sites with oval houses seem to be entirely or nearly sedentary: Pınarbaşı A is a nearly year-round occupied Epipalaeolithic site (Baird et al. 2012:220-221; Fairbairn et al. 2014); Boncuklu Höyük a year-round occupied Early Neolithic site (Baird et al. 2012:232); and Aşıklı Höyük 4-3 probably a permanent Early Neolithic village (Özbaşaran 2011:107). The only two examples of seasonal settlements with round and semi-subterranean huts are chronologically rather late: a Late Neolithic camp of mobile pastoralists (Pınarbaşı B, Baird et al. 2011:387), and a seasonal EBA settlement of tin miners in Cappadocia (Göltepe, Bachhuber 2015:38-39, 42). It can be concluded that among the so far excavated five southcentral Anatolian examples of prehistoric villages made up from oval dwellings, about as many are seasonal as are permanently occupied. There is thus no correlation between seasonality and oval/semi-subterranean structures, and indicators **#146** and **#147** are discounted.

The idea that oval, semi-subterranean residences indicate mobility might sometimes have a neo-evolutionary connotation, whereby Neolithic and Chalcolithic mobile peoples and their architecture are perceived as somehow re-using, or still using, material culture (here architectural) traditions that had evolved in an older, hunter-gatherer time period (e.g. Acar 2001:12). This idea is also the basis for Steadman's (2004) paper in which she builds on Flannery's (1972b) model of the formation of early settled life in the Near East as a gradual sedentarisation of mobile hunter-gatherers in which early village architecture represents a sort of solidification of nomadic camps. As remnant hunter-gatherer architecture, recognisable in early Levantine permanent villages, Flannery (1972b:29-37) names small (sometimes semi-subterranean) circular or oval huts, arranged in compounds occupied by a kin group that also shares production and storage facilities. Steadman adjusts Flannery's model to the Anatolian context to try and recognise nomad-style settlement patterns at Early Neolithic Anatolian sites. Stating that circular buildings seem to be the exception at early Anatolian settlements (2004:545), Steadman identifies as architectural remnants of mobile forager building and settlement layout foremost the co-dwelling of multi-family kin groups in house compounds or

clusters (#49 or #51, see **Theme 10**) in which each house is 'incomplete' (#69), thus indicating close daily social and economic cooperation within a kin group. She (2004:546-548) recognises this settlement pattern at a number of Early Neolithic sites in central Anatolia (Aşıklı Höyük Level 2, Canhasan 1 Level 5, Er Baba Level 1), but especially in the Lake District (Kuruçay Level 12, Bademağacı ENII4-3, Hacılar Aceramic V). These multi-dwelling compounds were not coded for this project because Steadman does not see them as evidence that the residents were mobile; but her paper was still summarised here as a prominent example of the idea that hunter-gatherer architectural styles prevail into the Anatolian Neolithic.

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Figure 26 Plan of the built structure at Pınarbaşı B (Baird et al. 2011:Fig.4).

8.2.2 Theme 23: Shortening House Histories

Themes 23 and **24** refer to recent thoughts by Hodder on connections between the increasing mobility of Late Neolithic Çatalhöyük residents and changes in architecture. Both themes thus describe architectural signatures of mobility not at campsites, but at permanently occupied settlements, where only some community members were mobile while others live there permanently ('base settlements').

Theme 23 specifically collects three indicators that link the already discussed (**Theme 5**) decreasing investment in ritually maintained house continuity and history-making during the Late Neolithic with increasing mobility. In **Theme 5**, these same architectural processes were already interpreted as indicating increasing household autonomy and competition; **Theme 23** now adds mobility into the equation.

Hodder portrays the connection between mobility and indicators **#152-#154** as follows: "[T]his wider use of the landscape was associated with and perhaps facilitated by a shift in social organization. [...] Bucrania installations and reliefs of bears and leopards were less common in the upper levels, but bull heads appeared as reliefs on pottery and bulls are shown in paintings. Leopards and bears appeared on mobile stamp seals. There seems to be a change from the stable fabric of the house to the mobile elements of material culture **[#151]**. A possibly related shift is seen very clearly in a decreased focus on house continuity. Düring (2006) has noted that there is less continuity of buildings in the upper levels **[#153]**, and Cessford (Volume 5, Chapter 4 [Cessford 2005]) has shown that the use-lives of houses decreased **[#154]**" (Hodder 2014e:178, also 2014b:15). In this reconstruction, Late Neolithic mobility is part of the wider trend to population dispersal across the landscape observed at and around Late Neolithic Çatalhöyük; a dispersal caused by, but also adding to, the gradual abandonment of the ritual cross-ties that had made Early Neolithic Çatalhöyük a tightly integrated community (**Themes 5-6**).

Because so much evidence from Late Neolithic Çatalhöyük can be cross-referenced to verify this scenario, **#152-#154** can with confidence be seen as indicators of increasing mobility and economic use of the wider landscape at least at Çatalhöyük;

at other sites, the social context of decreasing ritual investment in houses would need to be scrutinised before postulating a link to mobility. At Çatalhöyük itself, **Theme 23** is of interest because it draws attention to the close interrelation of three of the social processes researched in this thesis: increasing household autonomy, emerging social competition, and mobility.

8.2.3 Theme 24: The Pastoral Home

With **Theme 24**, I bundled indicators that might describe how settlement architecture changed when pastoral mobility became increasingly important during the Late Neolithic. Drawing this out as a separate theme seemed important given the social and economic significance of the new reliance on sheep for increasing household autonomy and emerging social competition. The indicators of **Theme 24** describe the pastoral home as large with several rooms (**#155**, **#156**) and unroofed spaces (**#157-#160**) that could be used to care for animals and process animal products.

Theme 24 connects closely to **Theme 8**, which already described architectural changes that went along with increasing household-specific productivity at Late Neolithic Çatalhöyük. Hodder (2013b:21, 24, 2013a:21, 25, 2014b:14, 2014e:177) suggested that part of this increased productivity might have been around the pastoral sector. Specifically, he describes that houses became larger (**#155**) and more subdivided (**#156**) as more meat was more frequently processed in houses as well as in unroofed areas adjacent to the house, either privately owned yards (**#158**) or nearby middens (**#159**); more of these unroofed production spaces were created by the un-clustering of the village (**#157**). Interestingly, a similar process has also been tentatively suggested by Gérard (2002a:106) for Aşıklı Höyük, where in his suggestion a use of courtyards for sheep penning precedes the eventual abandonment of this and other settlements in the region which signals the onset of a nomadic, pastoral time period in Neolithic Cappadocia (**#160**, the only indicator in this theme that does not relate to Late Neolithic Çatalhöyük).

To demonstrate that the Late Neolithic development larger houses with more

outdoor production areas was indeed (partially) caused by increased pastoral mobility requires evidence that animals were really penned in yards, middens or courtyards (#158-160), and that their products were really processed in yards or in houses (#155, #156, #158). Given the typical formation processes of most sites in the study region, where houses were kept clean and macro-refuse deposited in secondary and tertiary locations (e.g. Çatalhöyük: Hodder 2013b:22, 2014d:156, 165; Russell and Martin 2005:35), such evidence could come from micromorphological studies of inside and outside floor areas (see e.g. Matthews 2005b; Matthews et al. 2013; Shillito et al. 2013) for discussions of micromorphological signatures of animal penning or meat processing). A systematic compilation of penning and meat processing traces from floors could be an interesting research focus for the future; but is not currently available from any Late Neolithic or Early Chalcolithic site.

At Late Neolithic Çatalhöyük, there is at least indirect evidence meat was processed in the house. Studies of microdebris have, not surprisingly, shown food-processing in general taking place in Çatalhöyük houses (Bogaard et al. 2014:132; Demirergi et al. 2014:101, 107; Matthews 2005b:370, 372, 391), but there currently is no information published to prove that specifically the intensified meat processing of the upper levels also took place inside houses. A combination of pottery and faunal evidence shows that meat processing and consumption became more intense after 6500 BC, but also smaller scale (Hodder 2013a:23, 2014b:10, 14, 2014c:19, 20, 24,25; citing Demirergi et al. 2014:102-103, 107, Fig.7.10a, 7.10b; Pitter et al. 2013; Russell et al. 2013b:242; Yalman et al. 2013). While these changes do not actually clearly prove that the meat processing activities were carried out in the house, they at least make it likely that processing and consumption of meat after 6500 BC at Çatalhöyük was done in small groups, possibly household, and therefore that it might have taken place in (#155, #156) or around (#158) the house.

Similarly, there is tentative evidence that the new private yards (#156) created by settlement unclustering (#157) were used for animal tending and processing. While herds must have spent much of their time outside the village finding food as evidenced by human and sheep mobility (skeletal and isotope evidence, Pearson et

al. 2007, 2015a, 2015b), the use of pens in the settlement might have been made necessary occasionally when animals were sick, giving birth, or about to be slaughtered or exchanged. Lambing in pens at the settlement edge is in evidence from different points within the Çatalhöyük sequence (Charles et al. 2014:79); after 6500 BC, it is not unthinkable that also the newly abundant pen spaces inside the settlement were used for such activities of animal caring. Much better than the roofscape of pre-6500 BC Çatalhöyük, open space around the house were suited to keeping animals near the house. In at least one case (B.65), penning is evidenced in a midden next to a Late Neolithic Çatalhöyük house (Bogaard et al. 2014:144) as well as in some abandoned houses of the post-6500 BC levels (Matthews et al. 2013:135-136), indicating probably the use of unroofed areas between houses for penning. Bogaard et al. (2014:145) envisage 'yards' as more clean production areas that were not used for animal penning; but they might have been used for meat processing and thus have been part of the pastoral house-complex. There is evidence of cooking in yards in form of firespots, ovens and hearths. Botanical debris from these areas attests that at least plant foods were processed in yards (Bogaard et al. 2013:114, 117, 2014:133; Demirergi et al. 2014:102, 107). The evidence from post-6500 BC 'yard' animal bone assemblages is less conclusive at present, but Bogaard et al. (2014:144) see a possibility that larger amounts of meat were prepared and possibly consumed in yards.

In sum, there is tentative evidence that the architectural changes in **Theme 24** might at Çatalhöyük have been the result of increasing pastoral mobility and the necessity to changes houses and their surroundings into places where animals could more easily be kept for short periods, and their meat processed. Indicators **#155-#160** are therefore accepted as potential indicators of pastoral mobility. More research into micromorphological traces of use of houses and their yards is desirable in the future in order to fine-tune the evidence at Çatalhöyük East, and to check for similar processes at other Late Neolithic and Early Chalcolithic sites in the study area.

8.2.4 Theme 25: Ritual in the Landscape

Theme 25 is similar to **Theme 24** in the way that it describes a particular reason for mobility; a reason for people to seasonally use specific places in the landscape outside of their main settlement. **Theme 25's** first indicator (**#161**) refers to a suggestion by Thissen (2002b:25) that Early Neolithic Musular was the ritual meeting place for nomadic pastoral groups that lived in the area after the end of permanent Early Neolithic settlements such as Aşıklı Höyük in ca. 7400 BC. A ritual site such as Musular then became a spatial reference point for otherwise mobile peoples to return to for rituals. The architectural signature in this case consists in the existence of structures for ritual use, but a lack of residential structures (**#161**).

The theme title 'Ritual in the landscape' is borrowed from a recent paper by Baird et al. (2011) on Late Neolithic Pınarbaşı at the foot of Karadağ mountain in the Konya plain, the example for the second indicator (**#162**) in this theme. They interpret the site as a seasonally used camp occupied by groups travelling from Çatalhöyük (ca. 25km to the north of Pınarbaşı) to Karadağ in order to herd sheep, hunt, obtain stone and wood, and perform ritual activities that included the plastering of the bones of domestic and wild animals. These bones are not reconstructed as ever having been fixed parts of architecture (Baird et al. 2011:390) and they were found deposited in clusters outside of the structures (Baird et al. 2011:387); indicator **#162** is therefore similar to **#145** in that it refers to artefacts not found attached to architecture. It might therefore be a stretch to code this as an architecture indicator; however, the Pınarbaşı B example is important to consider in relation to Thissen's interpretation of Musular. Together, these examples suggest that apart from economic activities it was also ritual that inspired people's movement around the landscape. In Baird et al. (2011)'s Pınarbaşı B reconstruction, ritual was a main purpose that attracted people to spend some time in this locale away from the main settlement. The archaeological signature (**#162**) at Pınarbaşı consists in seasonally used residences (with architecture as that described in **Theme 22**) within a site that also contained evidence for ritual performances. This differs from indicator **#161** which refers to a supposed non-residential site (Musular).

The Pınarbaşı example also serves to exemplify that in order to reconstruct the type of mobility Thissen attaches to Musular, an entirely nomadic landscape, one would have to prove that this ritual facility was in fact set in a fairly large region without any permanent settlements. The reconstruction of Late Neolithic Cappadocia as a landscape void of permanent settlements is now probably outdated (Allcock and Roberts 2014:46-47; Düring 2011c:78) and Thissen's interpretation of Musular as the ritual centre of a nomadic people is not shared by many other researchers (see e.g. Düring 2011c:78-80; Özbaşaran 2011:111; these different opinions are based on different understandings of the dating of Musular relative to Aşıklı; and of the function of the Musular buildings). Including this newer information of settlement distribution into an interpretation of post-7400 BC Musular, it could merely have been a site that an otherwise sedentary population living in a nearby settlement visited occasionally and for short periods of time to perform rituals, as reconstructed for the Höyücek 'Shrine phase' by Duru and Umurtak (2005:171-172; also see critique of this reconstruction in Appendix 12). In conclusion, indicator **#161** might not testify to the type of landscape-wide nomadism envisaged by Thissen; but it could attest to some kind of, maybe quite limited, mobility whereby people travelled to perform ritual and is therefore tentatively accepted here. Importantly, applying indicator **#161** to a settlement analysis (Appendix 12) necessitates integrating architectural research with survey data that show settlement pattern around the non-residential ritual site.

8.3 Summary of Evaluation

In summary, of the 20 indicators documented in the content analysis, 17 have been accepted as probable indicators of an architecture of mobility; of these 17, two (**#141, #142**) function as headline indicators. Three indicators (**#148-#150**) have been discounted since they were found to be based too strongly on neo-evolutionary notion, and too little on archaeological evidence (Appendix 10).

8.4 Reflections

The content analysis has identified architectural signatures of both campsites, and 'base settlements', therefore at last theoretically covering the entire breadth of mobility types defined in the introduction to this chapter. However, the understanding of architectural signatures cannot be characterised as very thorough or certain; and the content analysis has foremost attested that research into the architecture of mobility is not a main concern of southcentral Anatolian prehistoric research. There are only a small handful of researchers, sites and publications involved in this debate. Only a small number of text passages describe the architecture of mobility, and the topic has not yet been subject to targeted research e.g. in form of a thesis or paper. Three reasons are conceivable for this state of matters: First, mobility was not an important socioeconomic factor in prehistoric southcentral Anatolia. Second, the kind of mobility practiced in the study region did not leave recognisable traces in the architecture. And third, archaeological research bias prevents more intense research of mobility. Based on the literature review in Chapter 3 as well as this chapter, I believe that the first possibility can be discounted entirely, and the actual reason is probably a mixture of the second and the third option: current archaeological research is not well equipped to recognise the architectural signature of the various kinds of mobility practised in the study region, which is partially due to a lack of research into the topic. This assessment is discussed in the following.

Although researching mobility might not have been a main concern of Anatolian prehistoric archaeology previously, newer publications have started to draw more attention to the fact that, to different degrees and in different variances, mobility was a very important factor driving socioeconomic processes in southcentral Anatolian prehistory. For example, Düring (2011b; 2011c:254-255) recently drew more attention to the relative frequency of seasonal sites and pastoralism in Chalcolithic Asia Minor. The new Çatalhöyük publication cycle has integrated the newly recognised Late Neolithic mobility into the official storyline of this site (see especially Hodder 2013a, 2013b). The Pınarbaşı project published its final results a

series of papers (Baird 2012b; Baird et al. 2011, Fairbairn et al. 2014). Arbuckle (2012a, 2014) recognised the importance of pastoral mobility in Chalcolithic Cappadocia.

These newer publications prove that studying mobility patterns should be a main concern for Anatolian prehistorians, and yet architecture research does not yet seem to have caught up with this development. Quite in contrast to the other social factors or processes researched in this thesis (household autonomy, community formation, social stratification, warfare), architectural evidence takes a side role in the mobility debate. Instead it is mostly other items of material culture that are used to prove mobility in southcentral Anatolia. Mobility has been recognised from isotopes in human and animal bones and the range of nutrition indicated by them (Arbuckle 2012a:308; Bachhuber 2015:39; Hodder 2013a:21, 2013b:18, 21, 2014b:12; Larsen et al. 2015; Pearson et al. 2007); animal age group and sex distribution (Arbuckle 2012a:309, Baird et al. 2011:383-386) and human skeletal evidence (femoral midshaft index; Hodder 2014b:15; 2013b:21; Larsen et al. 2013:400-402). Further, faunal and botanical evidence are studied to assert whether sites were used seasonally or year-round (Baird et al. 2011:383; Düring 2011c:36; Hodder 2006:72). Even more common are mobility claims based on settlement distribution reconstructed by survey data: The absence of sites in a certain region or period is often interpreted as evidence for mobility (Duru 2008:8-9, 188; Gérard 2002:106, 109; Hodder 2005d:14; Mellaart 1971a:681; 1971b:407; Steadman 2004:545; Yakar 1985:378, 2011b:103). Site location also plays a role, with sites located in environmentally remote or upland regions more readily being interpreted as seasonal camps (e.g. Bachhuber 2015:39, 103; Mellaart 1972:280; Vandam 2015:294). Small sites and/or sites with thin cultural deposits (Baird 2005:64; Düring 2011c:254; Yakar 1991:6), and human occupation in caves or rock shelters (e.g. Bachhuber 2015:38; Baird 2002:148; Duru 1996e:140; French 2008; Rosenstock 2014:227; Schachner 1999:72; Yakar 2011b:331) is also routinely attributed to temporal/seasonal occupation. To a lesser degree, abiotic resources sourced from a wide radius in the landscape (e.g. stone, obsidian, shell; Hodder 2013a:212, 2014b:14, 16; Mellaart 1972:281; Ostaptchouk 2014; Özbaşaran

2011:106) can be evidence for mobility, although they can also reach sites by trade and exchange, i.e. very small-scale mobility where theoretically only individual people migrated between sites.

Now that mobility has become a newly interesting topic, architecture research in the study area should strive to refine its toolkit for recognising mobility signatures in the architectural record. To some degree, a lack of suitable sites for such research is probably partially responsible for the present lack of insight; especially a lack of excavations at seasonal or short-term sites ('campsites'). Southcentral Anatolian archaeology is as a rule geared towards excavating large *höyük* sites that were formed by permanent occupation over a large period of time (Allcock and Roberts 2014:37; Düring 2011b:200; Rosenstock 2014, 225-226). As a result, seasonal and/or short-term sites are neglected. To a degree, the neo-evolutionary undertones that seem so difficult to shake (see Chapter 1, and also above discussion) are probably responsible for a lack of archaeological interest in seasonal or short-term sites. Neolithic and Chalcolithic mobility does not seem to fit into the established story line of how the development towards the 'complex' Bronze Age should go; again something that might change in the near future now that pastoral mobility is becoming a real factor for the study of the Early Bronze Age and formation of 'complexity' (Chapter 3; Arbuckle 2012a, 2014). This chapter as well has documented many links of mobility and the household autonomy-competition process.

Until very recently, however, Neolithic/ Chalcolithic mobility has suffered from a lack of dedicated research. Among the examples of seasonal/ short-term Neolithic and Chalcolithic sites documented in the content analysis (Appendix 6), none seems to have been excavated with the purpose of researching Neolithic and Chalcolithic mobility: Late Chalcolithic Canhasan and Bademağacı happened to be excavated because they were parts of large mounds—made large by the remains of architecture from other periods. Musular was chosen because of its relation to Aşıklı Höyük Özbaşaran (Özbaşaran 1999:49). Pınarbaşı B was a small trench dug at a site where the Epipalaeolithic Pınarbaşı A and its contribution to the study of sedentarisation was the main target (Watkins 1996:47).

While a better understanding of campsite architecture might thus have to wait until more seasonal/ short-term sites are excavated, architecture research of the near future could focus on discerning architectural signatures of mobility at permanent sites, trying to identify 'base settlements'. Recognising signatures of mobility in permanently occupied sites is clearly a very new development given that with one exception (Gérard 2002), all text passages coded for **Theme 23** and **24** are from 2013 and 2014. And they also all refer to Late Neolithic Çatalhöyük, where research first identified mobility signatures in other items of material culture (e.g. human and animal bones), and only subsequently recognised potential signs of mobility also in the architecture. Similar research is here suggested for other Neolithic and Chalcolithic sites, for example Tepecik (Bıçakçı in press), or even Köşk Höyük and Güvercinkayası (Arbuckle 2012a), although these are not currently reconstructed as having a mobile element within the resident population. Such future research could build on the indicators collected here in **Themes 23** and **24**; but also go beyond that to look for architectural indicators for mobility in 'base settlements' other than those found at Çatalhöyük.

Chapter 9 WARFARE

Is history the conflict-ridden surface covering a deep, peaceful prehistoric [European] continent? Or have warfare and violence always been with us in some form? (Armit et al. 2006:7)

9.1 Introduction

In Chapter 3, warfare has been discussed as one important transformation, or social novelty, emerging since the Late Neolithic in southcentral Anatolia—one social novelty that made society a complex, Bronze Age society. There is disagreement as to whether warfare existed in LN/EC southcentral Anatolia, and to review the architectural evidence for warfare in the study region is the main objective of this chapter.

To a much larger degree than the other three factors of social organisation studied here, early Anatolian warfare is in the public (extra-archaeological) sphere of interest. As mentioned in Chapter 1, recent overviews (Ferguson 2013:218-220; Hamblin 2006:24-27) on the history and origins of European and Near Eastern warfare routinely refer to the very sites studied here to assert that warfare started with or even before neolithisation. And probably because it is set in a larger arena of archaeological, historical and anthropological research on early warfare, warfare has probably the longest train of ideological and emotional connotations and complications among the four social processes researched here. Armit et al. (2006; Gilchrist 2003; O'Brien 2013) have demonstrated that archaeological research on warfare has undergone changes during the last few decades in reaction to events in the present. Specifically, they state that under the impression of wars and civil wars since the 1990s, archaeologists rediscover early warfare as a topic of research, and seem more ready to recognise it in the available evidence. Selover's (2015) recent thesis on *The Archaeology of Conflict in Early Chalcolithic to Early Bronze III central and southeastern Anatolia*, as well as Clare et al.'s (2008) paper on *Warfare in Late*

*Neolithic/Early Chalcolithic Pisidia*¹⁴ and Düring's (2011a) critical discussion of fortifications attest to the fact that southcentral Anatolian Neolithic/ Chalcolithic archaeology is also currently rediscovering warfare as a potential factor transforming Late Neolithic/ Chalcolithic societies in the study region.

The archaeological research of warfare relies on various categories of material culture, of which architecture is a not unimportant one. Material traces of warfare in prehistoric Anatolia fall into two broad categories: First, preparations for war, which includes the creation of weapons and armoury, and of defences in form of built settlement fortifications as well as the choice of specific settlement places in the landscape that enhance the defendability of settlements. And second, results of warfare in form of skeletal trauma; destruction of and sometimes abandonment of settlements; and sometimes imagery recounting the events (Bachhuber 2015:55, 68; Clare et al. 2008:71; Selover 2015:9). It follows for this present analysis that architectural structures labelled in the literature with the word 'defence' were also counted as indicators of warfare. Defensive structures do not prove that warfare took place, but they demonstrate that it was an expected possibility and therefore that warfare was present on the social stage.

9.2 Architectural indicators of warfare

The content analysis has identified 20 architectural indicators of warfare, which can be separated into the two broader categories as outlined in the previous paragraph, preparation for and results of warfare; and further into three themes: **Themes 26** with two subthemes describe a variety of architectural means for fortifying settlements against attacks, **Theme 27** the less discussed possibility of fortifying individual houses; **Theme 28** describes results of warfare.

¹⁴ The classic Greek/ Roman term for the Turkish Lake District (Duru 2008:2).

| | |
|-------------------------------|--|
| Preparing for warfare | Theme 26 Fortifying the settlement Theme 26.1 Settlement perimeter fortifications Theme 26.2 Entrance protection |
| | Theme 27 Fortifying houses |
| The results of warfare | Theme 28 The results of warfare |

Table 10 Themes identified in the content analysis of the warfare debate.

9.2.1 Theme 26: Fortifying the settlement

The architectural means of protecting a settlement against hostile attacks can be described as broadly falling into two categories: enclosing the settlement with a wall or with different architectural variations of the enclosure wall (**Theme 26.3**); and/or protecting the entrances to the settlement (**Theme 26.2**).

Theme 26.1: Settlement perimeter fortifications

The content analysis identified several architectural variations of the enclosure wall; all are discussed here together since the main arguments for their identification as defensive structures are the same. Two main arguments can be identified: For all variations of the enclosure wall, an important argument for their identification as defensive structures seems to be that they limited access to the settlement.

Enclosure walls (**#163**), sometimes built as casemates (**#164**), stone-built slopes ('glacis', **#167**) or ditches (**#168**) are all structures, standing separate residential architecture, that encircle the settlement. Another variation of perimeter defence is represented by cases where it has been argued that the house walls themselves represent a perimeter fortification (**#165**, **#166**). Two variations of either the enclosure wall (wall with towers, **#169**) or the house wall perimeter (saw-toothed perimeter, **#170**) were separated here because there is a second argument in favour of their being defensive: they provide advantages during a battle. This section will start with a description of the different architectural variations of the

enclosure wall; and then discuss the two arguments of their identification as defences: access limitations and combat advantages.

Architectural variations of settlement perimeter fortifications

As a variation from the settlement enclosure by means of a free-standing wall (#163, #164), indicators #165, #166 and #170 all refer to settlement layouts where the settlement edge represents a near-gapless façade formed by a series of house walls that restricts access to the settlement. In other words, they represent an architectural variation of the enclosure wall whereby the enclosure is not formed by a separate, free-standing wall, but by the body of houses itself. Such an argument has been made multiple times about clustered sites (#165), first by Mellaart who stated that “To the outside the city of Çatal Hüyük presented a blank wall, not specially designed as a fortification, but acting as such against enemies as well as floods” (Mellaart 1975:101, similarly Joukowsky 1996:96; Mellaart 1978:17; tentatively suggested also by French 1972:232-233 for other clustered sites). And indeed he outlined that house clustering might even have had a defensive advantage over the free-standing enclosure wall, since “[e]ven if an enemy succeeded in breaching the wall he found himself in a closed room from which the ladder had no doubt been removed with the defenders waiting for him on the roof. To take the settlement would involve close fighting from house to house in a maze of dwellings which would be enough to discourage the attacker. The efficacy of the defence system is obvious and, whatever discomfort it involved for the inhabitants of the city, there is no evidence for any sack or massacre during the 800 years of the existence of Çatal Hüyük” (Mellaart 1967:68-69). In this scenario, the sheer mass of densely clustered houses had a defensive aspect also apart from the gapless outer façade, an argument also made by some other authors about Çatalhöyük and Aşıklı Höyük (see citations in Baird 2012a:448; Düring 2006:289, 2011a:70). In fact, Düring (2001:2) uses the often large size of the central Anatolian clustered settlements as an argument against a defensive function of clustering, asking “one is left with the question; who could have threatened the inhabitants of Çatalhöyük? The site

measures 17ha, and even if only part of it was occupied at one point in time the population probably numbered in the thousands rather than the hundreds". A variation of indicator **#165** observed at not(-so-densely)-clustered sites is a continuous façade formed by a ring of houses around the perimeter of the settlement (**#166**). Such house perimeters have been identified, and interpreted as defensive architecture, at Hacilar I, Kuruçay 6 and EBA Bademağacı. Kuruçay 6 is actually reconstructed as a mixture of house ring (**#166**) and enclosure wall (**#163**), featuring short free-standing wall fragments wherever there was a gap in the outer ring of houses (Duru 1996d:56, 1996e:114).

The only possible example of a glacis (**#167**), i.e. a sloping surface built with or strengthened with stones, at EBA Bademağacı has unanimously been found to not be a defence structure. The settlement was surrounded by a 4-7m wide paving of loose stones (Duru 2008:Fig.45, 2012:Fig.54; Duru and Umurtak 2011b:Resim 1) that the excavator Duru (also Düring 2011a:77, 81, 2011c:281) interpreted as a protection against spring floods: "This sloping pavement could not have been built as a defence measure as in medieval castles because the inclination of the slope varies from 10-15 degrees on the east slope to almost none in other places. That is, the inclination of the pavement is not steep enough to discourage intruders, nor is it steep enough to make it more difficult to approach the town. Consequently, it must have been built for some other purpose. Our opinion is that this pavement was made in order to protect the settlement from flooding" (Duru 2008:154, cf. Duru 2012:7), where he seems to describe the glacis as part of the Bademağacı defence system). Indicator **#167** is mentioned in the coded text passages as a hypothetical interpretation of the Bademağacı stone paving since glacis were regularly used as defensive architecture in EBA Asia Minor (Bachhuber 2015:107-111). Therefore, indicator **#167** will still be included here because defensive glacis must be seen at least as a theoretical possibility also in southcentral Anatolia, even if no example was uncovered yet. By contrast, no example of settlement enclosure by ditches (**#168**) was actually observed in the study region: this indicator is only mentioned once by Hodder in hypothetical manner, stating that none was found at Çatalhöyük (Hodder 2006:206). Ditches as defensive structures do not seem to have

been a feature in prehistoric Anatolia at all (also compare Bachhuber 2015), but will still be included here since they, in principle, can be argued as defensive for the same reasons as the other structures. The following section will summarise this scholarly debate around the defensive nature of settlement perimeter fortification.

Access limitation

The content analysis (Appendix 7) has identified the enclosure wall (#163) and its variations as the most mentioned architectural indicator of warfare, and similarly Clare et al. (2008:75) observed that “The erection of fortifications around settlements has often been regarded as one of the most reliable indicators for the occurrence of warfare in prehistoric societies”. Enclosure walls, and variations thereof, are interpreted as signs that warfare was a feature of social reality and that assaults were expected (Clare et al. 2008:75), for “[during the Chalcolithic,] [d]eliberately planned fortification walls are constructed at a few sites, enclosing the settlements and broken only by stout gates. This development signals the introduction of the cultural ethic of community defense from invasion, e.g., at Hacilar and Mersin XVI. A heightened need for protection against aggression as manifested in such city walls is worth noting” (Joukowsky 1996:116). The other way around, the lack of such walls is sometimes taken to mean that there was no need for defence, hence no threat of warfare, and these statements account for some of the hypothetical statements (marked grey in Appendix 7): For example, Öztan (2012:45) stated about Köşk Höyük that “Furthermore, there is no evidence regarding the existence of a fortification wall in the settlement. This could be explained by the fact that the place of the settlement is partially a secure area, and, since there was not any outside danger, such a wall was found unnecessary” (similarly French 1998:68 about Canhasan; Hodder 1996a:46 about Çatalhöyük).

Enclosure walls, and variations thereof, are perceived in the research landscape as defensive features because they fortify the settlement perimeter in a way that facilitated deterring hostile parties from entering the settlement (e.g. Bachhuber 2015:113, 127; Mellaart 1964:40, 1970c:25; Yakar 1991:178). That is

straightforward enough, but several authors have pointed out that the function of this access limitation might not (always) have been necessarily to keep hostile groups out. Instead, the enclosure might have been a protection against wild animals, adverse weather (storms) or flooding (Bachhuber 2015:55; Clare et al. 2008:75; Düring 2011a:79; Duru 1996e:119; Eslick 1988:14; Mellaart 1975:101; Schoop 2005b:50). Further, the access limitation would have also applied to outbound traffic, and enclosures of any sort (**#163-#170**) might therefore have functioned to keep domestic animals or children inside the settlement (Baird 2012a:448; Clare et al. 2008:75; Düring 2011a:79; Eslick 1988:14). Moreover, the previous chapters discussed that settlement enclosure walls have also been interpreted as communal building projects and visualisations of community identity (**#92**) (Baird 2012a:448; Düring 2011a:79; Hodder 2005d:16, 2006:106) or a visual representation of elite status (**#134, #137**). At least by the EBA, many fortifications would also have served to consolidate the flanks of sizeable *höyüks* (Bachhuber 2015:55, 111; also see Düring 2011a:69-70; Ivanova 2007, 2008; Rosenstock 2009:217-220 with discussions of interpretations of fortification walls in European and Near Eastern archaeology more generally). These might have been secondary functions of walls built as defences; but it cannot be excluded that sometimes these secondary social uses might actually have been the primary reason to build settlement enclosures. Bachhuber (2015:107-108, 111, 128) in particular ascribes great importance to the secondary function of EBA fortification walls (**#163**) and glacis (**#167**) in elite-making (Chapter 3.6).

Similarly, the house ring (**#166**) and clustering (**#165**) variations of the enclosure are also, or foremost, interpreted to have had different social functions. Düring (2001, 2007b:160, 2011a:70, 71), as many other current researchers (Hodder 2005d:15, 2006:95; Sagona and Zimansky 2009:78), prefers a social, community-supporting meaning of clustering (**#47**) over an interpretation as defensive measure; however, the two do not exclude each other and Rosenstock (2009:220, 2010a:24, 2014:237, 239) continues to consider a defensive function of clustering as possible. Similar to the discussion of enclosure walls in general (**#163**), it can thus be concluded that the protective aspect of clustering could have constituted a defence against non-human

intruders (weather, floods; Todd 1976:25), a means for creating communal cohesion (#47), or maybe even some more metaphorical protective feeling evoked for the residents of the solid body of houses.

As difficult as it is to exclude the possibility that Neolithic and Chalcolithic perimeter fortifications (#163-#170) might (also) have had any of the non-defensive functions listed here, this does not in itself exclude the possibility of a defensive function and it also would be difficult to argue that a wall built e.g. to keep animals from straying would not also have worked as a defence against potential human aggressors. As correctly pointed out by Baird (2012a:449; similarly Schoop 2005b:50), enclosure walls might in fact have fulfilled multiple purposes at the same time. This also goes for Düring's (2011a:72-73) argument that the Kuruçay 11 walls were not defensive because they were (also) used for domestic activities. Acknowledging the multiple different interpretations of settlement enclosures, it is possible to identify based on the text passages collected in the content analysis four features of such enclosures that make them more likely to be more widely accepted as a defensive structure; or in other words: features that made a settlement enclosure suitable as a defensive structure.

First, enclosure walls are in the literature more readily accepted as defence structure if they are particularly thick (e.g. Duru 1996e:116, 2008:130 for Kuruçay 4; Duru 1996d:57, 2012:12 for Kuruçay 11; Duru 2008:154-155 for EBA Bademağacı; Cutting 2005b:101; Düring 2011a:73; Eslick 1988:22, for Hacılar II), or—in a mostly mudbrick settlement—built from stone, with stone foundations (Clare et al. 2008:76 for Hacılar I) or stone buttresses (Clare et al. 2008:75 for Hacılar II); in sum, if they are perceived as particularly sturdy. The underlying notion here must be that defence walls need to be thick and stable walls so that they cannot easily be breached; for example see Eslick (1988:31) stating that an enclosure wall in Kuruçay 6 is too narrow to have a defensive function. And further, that the thickness was not actually needed for any of the other possible functions of enclosure walls, for example: “Enclosure walls are not always designed to protect a settlement from hostile human actions. They may simply mark the settlement area, keep in domestic animals or keep out wild ones. For these purposes, however, the wall does not need

to be very thick, so that we can be confident that a substantial wall with limited or especially protected entrances [#171] probably served as a fortification wall” (Eslick 1988:14).

Thickness and sturdiness are one reason why casemate walls (#164) are sometimes particularly singled out in the literature. ‘Casemate’ describes a wall feature created by two parallel walls, with small perpendicular walls in between that form a series of small compartments (Selover 2015:251). Such walls have been tentatively identified at Bademağacı ENII3 (Duru 2012:17, Umurtak 2011b:5), and Kuruçay 6 (Duru 1996e:114). In the research area, the term casemates seems to sometimes also be used for a variation called *Kastenbauweise*, where the small compartments between the two parallel walls are filled in with rubble and stones (Selover 2015:251). For example, Esin (1993b) refers to the Aşıklı Höyük walls as both casemates and *Kastenbauweise* without specifying whether rubble was found as fill inside the wall; and Duru’s impression (Duru 1996e:114, 2012:17; Umurtak 2011b:5) that the rather thin parallel walls describes as casemates at Kuruçay 6 and Bademağacı ENII3 were fit for defence suggests that he might envisage them as well with rubble in between, i.e. not casemates in a strict sense. This terminology is insofar important as the thickness of an enclosure wall was above identified as a main criterion for verifying its defensive function; in that respect, *Kastenbauweise*-walls seem to have an advantage over casemate walls. Overall, however, it is probable that their enhanced thickness, whether created by several parallel thin walls, or rubble fill between those, has been seen as an argument in favour for ‘casemates’ (#164) as defensive—even if that this never actually expressed in the text passages coded here. For Aşıklı Höyük, Esin (1993b)¹⁵ also evoked comparisons with Hittite casemate fortification walls as an argument to identify them as defensive; that is however rejected by Düring (2006:102, 2011a:71) because of the large time gap between the Early Neolithic and Hittite period, which makes it uncertain that the one had anything to do with the other. In all cases of possible

¹⁵ Note that Esin never clearly describes either the Aşıklı Höyük casemate walls that form part of a building complex, or the free-standing stretch of wall referred to as a perimeter wall, as defensive in the publications (Esin 1993b, 1996) that Düring cites when critiquing the Aşıklı Höyük defensive structures. I however agree that a defensive function is clearly evoked by Esin’s comparison with the wall and tower at Jericho (1996:42), and defensive structures at Mersin and Hittite sites (Esin 1993b:128) respectively.

casemate walls listed here, we deal with rather short stretches of walls that hardly qualify for the title of ‘enclosure’ wall; it might therefore indeed be the particular nature of their construction that qualifies them as defence structures in the eyes of some researchers (see Appendix 12 with a discussion of Bademağacı, and Düring 2011a for Kuruçay and Aşıklı).

Second, enclosures that actually go around the entire perimeter of the settlement are more likely to be accepted as fortifications (Clare et al. 2008:76 for Hacılar I); or, the other way around: those who do not encircle a substantial part of the site perimeter are more often re-interpreted as not likely being fortifications, for example Düring (2006:104, also 2011a:71) doubts that a free-standing wall at the boundary of Aşıklı Höyük Level 2 was a defensive wall because “[t]he stretch of wall excavated is short and isolated, and does not form a clear and coherent defensive line” (also Eslick 1988:31 about Kuruçay 4, and Rosenstock 2014:239 about Hacılar II). Or in other examples, supposed fortification walls are found within a settlement, surrounded by residential areas, which in Düring’s (2011a:73, 80, also Rosenstock 2014:239) eyes makes them more likely social boundaries between social groups rather than defensive structures; on the other hand, these two functions are not necessarily mutually exclusive, for example Arbuckle (2012a:304) stated about the walls surrounding a supposed elite residence in Güvercinkayaşı that “The elaborate enclosure wall protect[ed] this area from both internal and external intrusion”, i.e. that it represented a defence against potential hostilities from non-elites within the settlement as much as from outsiders; by the EBA, that is a very likely function of fortifications, as pointed out by Düring (2011a:79-80) himself.

Third, settlement enclosures are more likely accepted as defensive structures if the enclosure has particular features that would have given defenders an advantage in a possible battle: saw-tooth (**#170**) or towers (**#169**). And fourth, if the wall feature is combined with protected entrances (**#171-#173**), e.g. both Rosenstock (2014:239) and Düring (2011a:71) point out that a defensive function of the Aşıklı Höyük perimeter wall is unlikely also because this feature contrasts with the wide street entrances into the settlement. These aspects will be discussed in the following sections.

Fighting advantages

Two variations of the enclosure, free-standing walls with towers (**#169**) a saw-toothed defence rings (**#170**) have been identified in the study region and were separated here because in addition to the argument of access limitations, another argument can be made for their interpretation as defence structures: they offer defensive advantages during an actual attack.

At both Hacilar I and Kuruçay 6, the site perimeter was formed by offset house walls forming a saw-tooth pattern (**#170**; Rosenstock 2010a:24 and references therein; Duru 1996e:114; Düring 2011a:75, 2011c:227-228 with a critique). The saw-tooth ring was coded here as a separate indicator separate from **#166**, because the saw-tooth pattern can be seen as a particularly defensive architectural feature; similar to towers (**#169**), it would have aided the defence of the site perimeter by giving defenders several angles from which to fight attackers, although this is again not clearly said, but invoked by Duru (1996e:114). Enclosure walls with towers (**#169**) have been identified at Kuruçay 11, Hacilar II and Bademağacı ENII3. In all three cases, the existence of such towers or their defensive function is contested; but leaving a discussion of the particular evidence to Appendix 12, we will here discuss the defensive function of such protrusions in general. Interestingly, reading the text passages coded for **#169** it appears that enclosure walls with towers are relatively readily accepted as defensive architecture, possibly more so than the other architectural variations documented here (for example, DeCupere et al. 2015:Tab.1 single out the Kuruçay 11 towered wall while ignoring other possible defensive structures at Hacilar, Bademağacı, or other occupations levels of Kuruçay), but without a real explanation of how the towers enhance defendability.

Reading between the lines, a main argument for towers or saw-toothed perimeters as defensive features is that these give defenders standing on the wall a variety of angles from which to fight attackers by shooting or the like (Bachhuber 2015:111 for the EBA); this seems to be expressed for example in Duru's comparison of towers and saw-tooth walls (**#170**): "Without towers or bastions, the community [at Kuruçay 6] must have depended on the sawtooth plan of the residences for

defence. This protruding and retreating outline of the settlement may perhaps be regarded as an early prototype of the fortification wall with bastion, a forerunner of the encircling walls with towers, revetments and other architectural features seen in later Anatolian prehistory. This is to say that the deep recesses at the corners may have served as a tower/bastion in reverse” (Duru 1996e:114). This text passage, citing ‘later’ parallel as support for the interpretation, highlights that Neolithic/ Chalcolithic structures might be more easily interpreted as defensive if they resemble later defensive architecture, as already pointed out for the casemate walls above. The saw-toothed house-ring defence façade has parallels in the Early Bronze Age (Demircihöyük: Selover 2015:252; Hacılar Büyük Höyük: Umurtak 2012; Umurtak and Duru 2014), which might have influenced the readiness to recognise a similar function at Neolithic and Early Chalcolithic sites. But as with casemates, the observation that these architectural features later (Bronze or Iron Age) became used in defensive architecture, which is sometimes overtly used as an argument for the supposed defence function (e.g. Duru 1996e:114; Esin 1993b), and might in other cases also have had influence on the interpretation, cannot serve as an argument that they were defensive in the Neolithic and EC.

Another argument could be that especially walls with towers (**#169**) looked like strong defences, expressed for example in statements about Kuruçay 11 such as “its south facing exterior was reinforced with semicircular towers / bastions, giving this settlement a ‘castle-like’ appearance” (Duru 2008:42) or “Impressive fortification wall with a pair of semi-circular towers” (DeCupere et al. 2015:4; similarly Sagon and Zimanksy 2009:99). And indeed, a strong and impressive physical appearance of defensive architecture should certainly not be underestimated as a factor to ward off potential aggressors; although in some of these statements it remains unclear whether they mean that the Kuruçay 11 wall had a daunting effect on enemies, or whether it is impressive to archaeologists.

In sum, in contrast with the ready acceptance (although see Düring 2011a:72, 2011c:171; Thissen 2010:273 with alternative opinions) of especially the Kuruçay 11 towers as defensive features, it is poorly explored how exactly towers or saw-tooth walls would have added to the defensive strength of an enclosure walls, how they

would have been used in defence (a discussion also lacking in Selover 2015). Despite the lack of explicit discussion, two arguments could be extracted from the literature: towers enhance the defensive visual appearance of a settlement, thus possibly discouraging attacks, and give defenders an advantage in combat. Indicator **#169** can therefore with confidence be placed on the indicator list.

Conclusions

In conclusion, it cannot be excluded that the Neolithic/ Chalcolithic settlement perimeter fortifications in the study region had functions other than defence, but likewise it cannot be excluded that such structures also had a defensive function. Except for the ditch (**#168**), all indicators of **Theme 26.1** are therefore accepted here; but the above discussion has also pointed out ways to assess the defensive aspect of structures. Enclosure walls (**#163**) and similar features (**#164-#170**) are more readily accepted in the research community as defensive architecture if they are of a nature that made them particularly efficient at limiting access to the settlement—maybe even to a point that would also have obstructed the resident’s daily business; then the idea is that these people sacrificed some comfort and ease of access in order to be protected, e.g. Eslick (1988:26) about Kuruçay 6: “In phase 6A1 the settlement plan remained essentially the same as in A2, although the small unit IV was replaced by a unit with three small rooms (XI). The lanes between the houses were blocked with cross-walls and the doorway in XXII was also blocked. According to the excavator, this was to increase the defensive qualities of the settlement. It would certainly have made it difficult for people to move around the settlement and impossible for animals to do so (if sheep and goats were indeed domesticated and kept in the village at this stage).” It is more likely that the primary purpose of an enclosure was defence if it was particularly thick, enclosed all of the settlement, and also had towers/protrusions (**#169, #170**) or protected entrances (**#171-#173**).

Theme 26.2 Entrance protection

‘Entrance protection’ is here used for different architectural forms that facilitate defending entrances to the settlement in case of an attack. Indicator **#171** represents a headline node, and **#172-#173** two different variations of protected entrances. I summarised the different entrance features encountered during the content analysis into two indicators; the main difference is that ‘gates’ (**#173**) incorporate rooms built specifically for defensive purposes; ‘narrow entrances’ (**#172**) are spaces or passages between otherwise used structures.

Defendable entrances (**#171-#173**) stand in an interesting relation to enclosures (**#163-#170**). Protected entrances are in most cases formed by one of the various enclosure variations discussed above, as in the examples named in the discussion below. They can therefore (often) not be seen as architecturally independent from enclosures; but they are somewhat separated in the architectural discussion and interpretation. Specifically, the content analysis has identified a number of text passages that state either that an enclosure can be regarded as defensive because it is combined with protected entrances; or that the defensive function of an enclosure should be doubted because it left the entrances unprotected. In other words, protected entrances **#171-#173** seems to be regarded as more reliable indicators of defence than enclosures, although the two are often not actually separate architectural features. For example, Düring (2011c:228, also Eslick 1988:30) said about the combined ‘house ring’/enclosure wall defence at Kuruçay 6 that “Even if the defense wall is accepted, many ‘ungated’ entrances to the settlement remain, such as that between buildings 15 and 14” (similarly Düring 2011a:71; Rosenstock 2014:329 about Aşıklı and Çatalhöyük). Baird (2012a:448) registers reservations against most of the possible defensive structures in southwest Anatolia, but accepts structures at the perimeter of Middle Chalcolithic Mersin as fortifications because they “include a gate with substantial flanking bastions/gate towers which is the strongest indicator for a potential defensive role amongst these early enclosure walls”. Mersin is not in the study region, but these citations serve to capture the intellectual notion underlying many researchers’ approach towards early defensive architecture. This notion is well summarised with

the words of Eslick (1988:14) who expressed that “Enclosure walls are not always designed to protect a settlement from hostile human actions [...] [but] we can be confident that a substantial wall with limited or especially protected entrances probably served as a fortification wall”. This same notion also speaks from some other statements cited in the following paragraph, which displays the architectural variety of protected entrances.

Narrow entrances (**#172**) are the most mentioned form of entrance protection. Examples are Hacilar II, where in Mellaart’s (1970c:Fig.20-22; also see Cutting 2003:16 who confirms this assessment through access analysis) reconstruction the enclosure wall left only a few entrances of limited width, that further led into narrow and windy passages between houses that one had to pass through before entering the settlement; i.e. the protected entrance was formed by both an enclosure wall and house clustering. Eslick (1988:22) concludes that “The enclosure wall of level II may be regarded as a fortification. It is substantial and the north-west and south-west entrances lead into corridors that would be defensible”. A similar narrow entrance formed by walls and houses is reconstructed for the ‘fortress’ of Hacilar I: “The entrance itself is exceedingly simple. A triangular area is narrowed at the outer end by a cross-wall leaving a doorway about 2 m. wide, which in case of danger could easily be blocked” (Mellaart 1959:54, also 1960:96). At Kuruçay 11, the narrow entrance between the enclosure walls was additionally formed into a passageway by adding protruding walls (Umurtak 2011b:6). Another much discussed example is Kuruçay 6, where access to the settlement was only through relatively narrow alleys between houses (Duru 1996e:114-115) that might in one subphase additionally have become narrowed or blocked off with walls across alleys and doorways, and Duru (1996e:116; also Eslick 1988:26) insinuates that this additional protection was done under the impression of an impending attack (but see Düring 2011a:75-76; 2011b:803 with doubts as to the defensive efficiency of the Kuruçay 6 entrances).

The content analysis has identified several examples of buildings/rooms added to settlement entrances to enhance their defendability, here summarised as ‘gates’ (**#173**). At Hacilar II, two buttresses left and right of the northern entrance are

reconstructed by Mellaart (1960:90, 1970c:25) and Umurtak (2011b:4) as towers from which the gate could be defended (see also **#169**). That same entrance is described by Mellaart (1960:90; 1970c:29) as a gate-like construction including a 'guardroom' on the inside of the gate from which the passage could be blocked, and a platform over the gate that might also have served for defence (also Cutting 2003:16). He also recognised a similar structure at Hacilar I (Mellaart 1970c:81) and Çatalhöyük East (Mellaart 1967:69-70). Duru reconstructed a gate building with guard room at EBA Bademağacı (Duru 2008:155-156) and a guard room protecting one of the entrances to Kuruçay 6 (Duru 1996e:114).

These should probably all be seen as problematic reconstructions, and the LN/EC examples among those listed above will be closer examined in Appendix 12. Here it shall suffice to conclude that several researchers have reconstructed gate-like features in the study region, and in principle such structures do enhance the defendability of settlements. Entrances were most vulnerable point of the site perimeter (Bachhuber 2015:111). 'Narrow entrances' can easily be closed off to prevent entrance into the settlement when needed, and in many of the examples described below the narrow entrances actually form corridors or passages that could additionally have used to trap offenders. 'Gates' might add other defensive advantages, e.g. hidden vantage points and shooting angles. Both **#172** and **#173** are therefore accepted here as potential indicators of warfare.

To contextualise the discussion of settlement perimeter fortifications, I would like to mention that settlement location is also regularly mentioned in the debate of Neolithic/ Chalcolithic settlement defence, but these were not coded here because they were not architectural indicators: the choice to build settlements on natural hilltops (Cutting 2005b:82; Düring 2011b:805; Duru 2008:42; Umurtak 2011b:7) or on top of settlement mounds (Bachhuber 2015:52; Rosenstock 2009:223; Steadman 2000b:175) has regularly been interpreted as having a defensive aspect, and indeed such locations would have both impeded access to the settlement and offered vantage points to defenders during an attack, similar to the built structures discussed here. Baird (2005:68) also considered whether the location of Çatalhöyük in a seasonally flooded plain had a defensive aspect.

I added to this theme an indicator that was isolated and did not really fit into any theme, but can probably best be described as another feature that shows preparation for warfare and makes a settlement better able to withstand an attack: a well inside the settlement (**#174**). Clare et al. (2008:76) cite ethnographic accounts to state that a secure water source, without the need to leave the settlement, would have been beneficial for safety, and interpret the wells at Hacilar VI and II in this manner. In this interpretation, the well is built because areas outside the settlement are unsafe, and villagers avoid venturing outside; additionally it could also be suggested that access to water inside the settlement would be an advantage in a siege. Mellaart (1967:69) also seems to imply that wells might have been useful for putting out fires set by attackers. Since quick access to water inside the settlement would of course also have been advantageous for many daily activities in a peaceful settlement, a well (**#174**), can, if at all, only be seen as an additional evidence for warfare in a settlement already featuring many other indicators.

9.2.2 Theme 27: Fortifying houses

Theme 27 describes possible ways to fortify individual houses against attacks either in the absence of settlement perimeter fortifications, or in combination with such. An example for the former is Kuruçay 7, where the excavator (Duru 1994c:100; Steadman 2000b:184) has suggested that thick house walls (**#177**) served as defences in the absence of a perimeter fortification; although he also (Duru 1994c:100) speculated that additionally, a perimeter wall might also have been present at Kuruçay 7, only not preserved. In the 'house-ring' defence of Kuruçay 6, the outermost house walls, i.e. the line of defence, is also described as particular thick (Duru 1996e:114). The 'fortress' of Hacilar I is portrayed by Mellaart as an example of a combination of settlement perimeter fortification with a strengthening of individual buildings: it is described as hybrid of a house-ring defence (**#166**) with narrow entrances (**#172**), but each individual block also had defensive features (thick walls **#177**, rooftop entrance **#175**, stone foundations **#176**) to offer protection once the enemy had already breached into the settlement

(Mellaart 1960:96).

This opening paragraph has already introduced the three indicators of **Theme 27**: in combination, they suggest that individual buildings were prepared for possible attacks through sturdy walls—thick walls **#177**, possibly with stone foundations **#176**—more likely to withstand attacks (Cutting 2005b:103; Mellaart 1970a:320; 1978:25), and a lack of entrances or large window openings on ground level that made it easier to defend the entrance (Mellaart 1967:68; Steadman 2000b:182). These are essentially the same ideas as those about settlement perimeter fortifications: architecturally creating the possibility to block entrance to a structure through entrance protection and sturdy walls. With these attributes, the indicators of **Theme 27** could indeed be seen as defensive; but just as with those of **Theme 26**, there is equally a wide range of other reasons of why houses were built that way. Building durable walls (**#176**, **#177**) might seem desirable for the more benign reason of reducing the danger of damage and repair. The rooftop entrances (**#175**) at Çatalhöyük and Hacilar I were necessitated by house or room clustering, which might have been stronger motivated by community-building purposes (**#47**) than defence (**#165**). In conclusion, none of these building traditions can unequivocally be described as having been preparations for warfare.

9.2.3 Theme 28: Results of warfare

The content analysis has identified six architectural indicators that show the results of warfare: destruction of architecture (**#178**, **#179**); victims of violence found inside destroyed architecture (**#180**), settlement abandonment (**#181**) and rapid culture change (**#182**). This section will first briefly discuss indicators individually and then debate their use as indicators in the conclusion.

Destruction

The destruction of a settlement, i.e. of built structures, is the most cited architecturally visible result of warfare for the study region. More specifically, this

refers to destruction by setting fire to the settlement (**#179**). A few text passages discuss destruction without mentioning fire (**#178**); but the examples coded for indicator **#178** actually all refer to examples of fire destruction, even if that is not always clearly stated. In short, conflagrations, i.e. cases where all or many houses in an occupational level were burned, are often seen as evidence for intentional destruction during warfare. Clare et al. (2008:73) have in fact described large-scale fire destruction as particular reliable evidence for warfare: “The main line of evidence for the occurrence of LN/ ECh warfare in Pisidia is twofold. On the one hand, it comprises the occurrence of major conflagrations, and on the other it involves the construction of fortificatory walls around settlements”. They draw on archaeological warfare research from the Southwestern USA to suggest that (fire) destruction could be either inflicted by the attackers in an attempt to kill or weaken the attacked group; or by the defenders in order to deny the site to the enemy.

The other possible interpretations of Neolithic/ Chalcolithic house fires indicate that caution is required in their interpretation. First, house fires could have been accidentally caused by the inhabitants of a settlement; kitchen fires gone out of hand was Mellaart’s preferred interpretation of the many fires he observed at Hacilar and Çatalhöyük (Mellaart 1967:69, 1970c:16). Although readily recognising fortifications in the architectural record of both sites (**#163**, **#165**), he was actually rather conservative in the interpretation of fire destruction; only in combination with other indicators of warfare (for example, destruction followed by rapid culture change **#182** between Hacilar II and I, Mellaart 1970c:75, 148) did he interpret fire as the result of a hostile attack. Or second, newer research has instead tended to recognise house fires at Çatalhöyük as intentionally caused as part of house-related ritual (**#22**, **#31**), and recently Düring (2011c:165) has tentatively suggested this might also have been the case at Lake District sites.

In only a small a minority of cases have the causes of Neolithic/ Chalcolithic house fires in the study region actually been investigated (Düring 2011c:165). All examples where this has been done are at Çatalhöyük; and all houses studied at Çatalhöyük were most probably intentionally set on fire during ritual because some important inventory was removed from the buildings before the fire; because other objects

seem to have been deliberately placed within the house in a ritually meaningful way; and because the nature and progress of the fires is suggestive of a controlled process (Cessford and Near 2005; Harrison et al. 2013; Twiss et al. 2008). This result can probably not be directly extrapolated to other sites, but the fact remains that direct evidence for the hostile burning of sites has yet to materialise. There seems to be only a vague impression of how such a signature of hostile destruction might look in the architectural record: architectural wood and burnt mudbrick attest to the impact of fire; houses collapsed with the interior furnishing and equipment still in place; and people were trapped inside and their remains are found in between the collapsed material (#180) (Mellaart 1959:54; Clare et al. 2008:73-74). None of this, however, really contradicts an interpretation as accident (see Cessford and Near 2005:174; Düring 2011c:165) with discussions of signatures of accidental house burning). Further, often the fact that several adjacent buildings were burned seems to be seen as evidence that they burned at the same time and therefore for intentionality (Clare et al. 2008:73-74); but a contemporary use/ construction of buildings cannot automatically mean that they also burned at the same time. Clare et al. (2008) and Duru (2008:8) additionally gain confidence by observing roughly contemporary conflagrations at several neighbouring sites, thus relying on a chronological framework that has been characterised as very shaky in Chapter 2. In any case, even if a number of buildings and sites were burned at the same time, this does not exclude accident or ritual.

In short, even though a destruction (by fire or otherwise) of some or all built structures within a village could be the result of a hostile attack, warfare is only one of three possible reasons for such destruction. Not enough research has been done to determine the cause of fires, or to develop a checklist for determining the cause of fires in the first place. In absence of such a checklist, house fires are typically classified as evidence for warfare if they can be cross-referenced with other indicators of warfare. This cross-referencing has been explicitly suggested by Clare et al. (2008:73), but is applied also by other researchers: Apart from the example already listed above (rapid culture change #182, skeletons in the house fill #180), other examples mentioned are an investment in fortification either just before or

just after the destruction event (Duru 1996e:116, and see Bachhuber 2015:55 with EBA examples), or the abandonment of the settlement following the fire (Duru 2008:8, Clare et al. 2008:73-74). Cross-referencing is certainly a suitable procedure; it would however be desirable to develop a toolkit to investigate causes of house collapse and fire independently from such cross-reference with other indicators- precisely because conflagration are perceived as such reliable evidence for warfare.

Victims of violence

There have been a number of claims that skeletons were found unburied within houses (**#180**), and that this is evidence for warfare because these individuals were killed during a hostile attack, and left unburied because they were trapped within a collapsing building. For example, Mellaart reports charred bones found between other collapsed material in Rooms 5 and 6 of the burnt Hacilar I fortress, and interprets them as victims of an attack that became trapped within the upper storey of the structure (Mellaart 1959:54, 1960:96, 1965b:112). Clare et al. (2008:74-75, Fig.5) interpret a number of skeletons found within the roomfills of buildings at Hacilar IIb and Bademağacı ENII3 as victims of warfare.

To recognise evidence for interpersonal warfare on the skeletal remains themselves is entirely matter for physical anthropology (see the following for evidence of interpersonal violence found on skeletons from burials: EBA: Bachhuber 2015:55, 68; Çatalhöyük: Baird 2012a:448; Hodder 2013b:28; Larsen et al. 2013:407-410); if however the stratigraphical position of the skeleton is used as evidence for hostilities (**#180**), it becomes a matter for architecture research in the manner defined in Chapter 4: architecture researching including stratigraphy. It seems that in none of the cases cited in the discussion of indicator **#180** any physical anthropology study was done (or none reported) to determine evidence for a violent end on the skeletal remains; that means that stratigraphical evidence is actually the only evidence to claim these individuals as evidence of warfare. Stratigraphical evidence is thus key; specifically, stratigraphical research needs to show that the building in question collapsed around the supposed victims. This

suggests potential for a re-interpretation of stratigraphical evidence (Appendix 12). Even if such a collapse with people trapped inside the house can be demonstrated, however, warfare could not be the only reason; the event might as well have been an accident, and in fact in other cases within the study area that was done: the skeleton of a woman “fallen below the wooden staircase as the house collapsed” (Mellaart 1998a:36) was found within a burnt Çatalhöyük house (Cessford and Near 2005:174) and interpreted as a victim of an accident.

Settlement abandonment

Especially if following a destruction event (**#178**, **#179**), the abandonment or temporary abandonment of a settlement can be interpreted as evidence for warfare (Clare et al. 2008:74, Mellaart 1970a:323) especially if many neighbouring settlements are abandoned around the same time (Duru 2008:8-9; Mellaart 1978:25). Site abandonment is not or not foremost an architectural indicator; since all Neolithic/ Chalcolithic sites were abandoned at some point, determining the reasons thereof requires holistic research into social and environmental processes (e.g. Rosenstock 2009:157-158, 235-236). However, determining the presence of a hiatus is, unless there is a solid sequence of radiocarbon dates available from a site, based on observing stratigraphic breaks and the erosion/ collapse of built structures (see examples in Appendix 1: after Höyücek 4, after Höyücek 3, after Hacilar ‘Aceramic’). Therefore temporary site abandonment (**#181**) was counted here as a potential architectural indicator of warfare. The process reconstructed by those who associate site abandonment with warfare is the same for either permanent or temporary site abandonment: following a violent attack, residents leave the settlement to live elsewhere and never return (e.g. Alkım 1969:71; Clare et al. 2008:74). The hiatus reported in the discussion of **#181** are all long enough to postulate that the people who resettled the sites were not the same as those who left it: Clare et al. (2008:73-74) insinuate that settlement interruptions of 100 or 200 years at Höyücek, Hacilar and Kuruçay as the results of warfare. Duru (2008:8-9) reconstructs a violent end of all (excavated) Early Chalcolithic settlements in the

Lake District, followed by 1500 years of no or no permanent settlement in the region and finally a resettlement by a culturally different people in the Late Chalcolithic. It might therefore be incorrect to refer to these hiatus as ‘temporary’ settlement abandonments, since for the people who packed up and left, it was in fact a permanent relocation.

As already mentioned above, to truly understand reasons for permanent settlement abandonment in Neolithic/ Chalcolithic Anatolia is a matter of great complexity; many other reasons beside warfare are possible. Indicator **#181** can therefore only be accepted tentatively; and architectural research can only be of assistance in determining that a hiatus is present, not (or not alone) in finding out why the site was left. It can therefore, if at all, only be an additional indicator.

Rapid culture change

Indicator **#182** describes a thorough and rapid (e.g. from one occupational level to the next) change of material culture. It has been interpreted as an archaeological means of recognising that a new group of people replaced the original inhabitants of the settlement; and, especially if preceded by a destruction event (**#178, #179**) as evidence for a hostile takeover and population replacement. Rapid (material) culture change refers not only to architecture, but also to other items of material culture; a sudden change of architectural styles (**#182**) is however besides pottery the most cited class of material culture in this context. For example, the ‘invasion’ that destroyed Hacilar II and created Hacilar I is based on the supposedly different pottery styles of the two levels (Mellaart 1970c:75, 148) and on Mellaart’s reconstruction that the founders of Hacilar I removed a good part of the already accumulated mound before erecting their settlement, and built in a different style (Mellaart 1970c:75, 120; also Joukowsky 1996:121-122; Yakar 1991:178-179). Clare et al. (2008:73, 74; based on Schoop 2002:422, 2005a:173-174, 2011:153) debate Mellaart’s reconstruction of the Hacilar II-I change as being caused by an invasion, instead reconstructing a hiatus between the two phases—which is also, however, seen as different evidence for a hostile attack ending Hacilar II. They instead (Clare

et al. 2008:74) however insinuate that the change from monochrome to painted pottery between Hacilar VI and V might have been caused by a hostile takeover. Similarly, Duru (1983b:48–49, also Steadman 2000b:191) originally considered whether the architecturally very different Kuruçay 6 might have been built by people who destroyed Kuruçay 7, but finally reconstructed a long hiatus between both (Duru 1994c:96, 2008:13, 2012:5) that forms part of the already mentioned (see discussion of **#181**) storyline of resettlement of the Lake District in the Late Chalcolithic after a long occupational gap following a violent end of Lake District Early Chalcolithic.

The notion that can be reconstructed from many text passages coded for indicator **#182** (e.g. Joukowsky 1996:121-122; Mellaart 1970c:75, 148) is that a sudden change of material culture must have been caused by the influx of a culturally different group of people; and that such population replacement, or cultural subjugation of existing residents, cannot have happened peacefully. This chain of thought actually connects a lot of often precarious pieces of evidence: Was a particular change in material culture really as substantial to people in the past as it might appear to archaeologists? How secure is the dating of the site; how rapid was the change really? Is there another possible reason leading to a relatively rapid and substantial change in material culture? Much like site abandonment (**#181**), postulating that rapid cultural change was a result of warfare requires a holistic investigation of its causes that must combine several groups of material culture; it is therefore difficult to use as an architectural indicator, but nevertheless included on the indicator list.

Conclusion

None of the indicators in **Theme 28** can be unequivocally described as a result of warfare; all could also have been caused by something other than warfare. Therefore for a reliable interpretation requires the presence of several indicators of **Theme 28**; and that is actually how it has been used by most researchers: For example, the destruction of Hacilar II (**#179**) is considered as hostile because an

unburied skeleton was found in a building (#180) and because it is followed by rapid culture change (#182, Clare et al. 2008:74; Mellaart 1970c:36, 75), contrary to fire in previous levels of Hacilar where such additional indicators were not present, such as “the destruction [of Hacilar IV], which in the absence of skeletons, does not appear to have been of a violent nature” (Mellaart 1970c:24, similarly Cessford and Near 2005:174 about Çatalhöyük). All indicators in **Theme 28** are therefore accepted as potential indicators of warfare, with the precaution that more than one needs to be present for a more secure interpretation.

9.3 Summary of Evaluation

In summary, of the 20 indicators documented in the content analysis, all have been accepted as potential indicators of warfare, with one (#171, protected entrances) being a headline indicator (Appendix 11). None of them was found to be unequivocal evidence for either preparation for warfare or a result of warfare; but also, none could be completely discounted as evidentially not connected to warfare. This analysis has confirmed that archaeological indicators for warfare can be categorised into two overall groups, preparation for warfare and the results of warfare; stronger than previous analyses (Clare et al. 2008; Düring 2011a; Selover 2015), this chapter has documented and reflected on the variety of defensive structures present in the study region. In terms of application these two groups are independent from each other: destruction proves warfare even if the settlement was not fortified; and fortification proves the expectation of warfare even if it never actually took place (see Clare et al. 2008:75 with a similar statement). Further, not being able to detect warfare in the architectural record does not mean that there was none; it could, for example, have taken place outside settlements.

9.4 Reflections

A first thing to note about the debate on warfare in the southcentral Anatolian Neolithic and Chalcolithic is how disconnected it seems from that of the other three social processes or factors researched here in Chapters 6-8. With the exception of indicators **#165** (clustering), **#174** (well in settlement) and to a degree indicator **#179** (fire destruction), none of the architectural features related to warfare were mentioned in any of the other chapters; clearly, the warfare debate focuses on different aspects of architecture as compared to the autonomy, community, stratification and mobility debates. To a degree, this seems straightforward; for example, discussions of defence are bound to focus stronger on the settlement perimeter and less on the interior of individual houses than a discussion of households like in Chapter 6, where many indicators refer to the house interior.

On the other hand, the observed disconnection might suggest the presence of archaeological research bias. It could be suggested that the warfare debate is missing some entire themes; in other words, that it fails to perceive the possibility that preparation for warfare might have encompassed other aspects of architecture that are missing in the warfare debate but are routinely discussed in the previous chapters. For example, this chapter was also the first where none of the indicators were related to ritual; while it may well be that ritual did not play a role in defence against hostilities, the other chapters have clearly shown that many other areas of Neolithic/ Chalcolithic social organisation, and their expression in architecture, were infused with a ritual component. This suggests that, if warfare was indeed a feature of Neolithic/ Chalcolithic life, ritual might somehow have become part of either warfare preparations or the recovery from warfare. Other areas of architecture that seem underrepresented in the warfare debate are building materials and techniques; again, if warfare was or increasingly became a Neolithic/ Chalcolithic reality, we could expect to see house construction changing in preparation for assaults, for example a preferential choice of less flammable and more sturdy building materials.

Potential for research bias is also suggested by the observation that it is a different

set of people that is prominent in the warfare debate as compared to Chapters 6-8. For example, Refik Duru and James Mellaart have majorly carried the archaeological research into warfare in the study region, but are less represented in the Chapter 6 and 8 discussions. On the other hand, researchers that were prominent in the debates summarised in Chapters 6-8 are remarkably underrepresented in the coding list for this chapter (Appendix 7), and when they discuss architectural indicators of warfare it is more often than not in order to debate and discount warfare evidence suggested by others: this includes Ian Hodder and all of the researchers that specialise in architecture research: Düring, Cutting, Schachner and Steadman.

Personal research preference, or experience, seems to play a role in how researchers have approached the topic of Neolithic/ Chalcolithic warfare in the past. From statements such as “As very few architectural remains were found in this settlement [Kuruçay 12], the general plan and how the defence problem was solved is not clear” (Umurtak 2005b:7) or “A defence system is seen at Hacilar for the first time in level II. However, it would be natural to expect that a settlement in the middle of a completely flat plain would have been surrounded by some kind of a defence wall from the earliest settlement period. The fact that the excavations were carried out in such a small area would have limited the information that could be gained about the defence of the period before level II” (Umurtak 2011b:4) it becomes clear that a number of researchers in the area expect that the need for defence, and by association warfare or some kind of violent interaction between groups, was present in the study area from the beginning of settled life in the area (Mellaart 1965b:104 with a similar statement about Hacilar VI, 1967:69 about Çatalhöyük). By contrast, there is a large part of the literature landscape that does not concern itself with warfare, showing that quite a number of Neolithic/ Chalcolithic researchers do not see this as a feature of these periods. For example, the Çatalhöyük team is remarkably underrepresented in the coding list for this chapter (Appendix 7), while it dominated large stretches of the previous chapters. Similarly, the directors of other excavations in the Konya plain or Cappadocia do not even mention warfare in their publications, or only mention it in order to point out

that there is no evidence for it (e.g. Baird 2012a:448; French 1998:68; Öztan 2012:45). There are also differences in how the existing pieces of evidence for warfare or interpersonal violence are handled; for example, the Çatalhöyük team chooses to stress the evidence for continuity and peace over the few cases of skeletons carrying traces of interpersonal violence (e.g. Hodder 2014d:166-167).

A possible explanation for this pattern are regional differences in prehistory; for example, the Lake District appears particularly war-torn in the existing debates. If that was actually the case, it could explain that excavators of Lake District sites, i.e. Mellaart, Umurtak and Duru, are more likely to discuss warfare than others are. It would appear however equally possible that the apparent difference between a war-troubled Lake District and a peaceful Konya plain and Cappadocia during the Late Neolithic/ Chalcolithic is an artefact of the research history, of the fact that different sets of people dominated research in the different areas; not the other way around (10.4).

The potential for regional/ personal research bias is one factor that leads me to conclude that the existing research on Late Neolithic/Early Chalcolithic warfare in the study region might not yet have a reliable grasp on the matter; another factor is that the existing research is often rather superficial. Specifically, I mean that there is little actual discussion of the processes that lead to the material culture signature that is being interpreted as evidence for warfare. In the other chapters, I was able to document in much greater depth how the built structures were actually used towards the social use connected to them; for example, how a control of house-related ritual could become a means of either binding community (**Theme 15**) or establishing social status (**Theme 19**). In the case of defence structures, this connection might be more of a technical nature, seeing built structures as tools of defence, but that aspect of architecture is also poorly explored. There is, for example, little actual insight into the actual mechanism of how walls, towers etc. defended settlements. The only one to really describe how the functioning of these defensive structures is to be envisaged is Mellaart, who offers descriptions such as the following for Hacilar I:

“However, the main reason for the lack of doorways on the ground floor of the fortress was evidently defence, and raising the main floor about 3 metres above ground level not only gave the defenders extra height, but also a better view over the surrounding countryside. Even if the enemy managed to penetrate into the courtyards he would still be confronted by a baffling lack of doorways and the one or two that did present themselves could easily be barred. Each block could have been defended as a single unit, and as in the case of Norman keeps, their peculiar method of construction turned them into death-traps for the defenders. Charred human bones, mainly of children, were found in Rooms 5 and 6, among masses of greasy black material, burnt brick, charcoal, pots and objects, all collapsed from the upper storey into the rooms below” (Mellaart 1960:96, similar descriptions: Mellaart 1959:54, 1967:69-70, 1970c:29).

To a lesser degree, Duru (1996e:114-116) and Eslick (1988) discuss the details of the functioning of defence structures; but this is outweighed by a much larger number of sources that argue for warfare without venturing into the details of combat and defence. Even Selover 2015 and Clare et al. (2008) are surprisingly vague as to how one has to imagine combat and defence unfolding around these structures. More detailed research into the use architecture in defence and battle seems necessary.

In conclusion, there can be no certainty as to whether warfare was present in the study region, and as to whether warfare was a major feature transforming LN/EC lives and societies until research of architectural signatures of warfare matures and becomes more detailed. I recommend that this topic should be researched and discussed in greater depth. Researchers who seek to find evidence for the existence of warfare could look for such in other aspects of architecture as suggested above (building materials, architecture-related ritual). There also needs to be a clearer discussion as to how the defensive structures actually worked. Also researchers who prefer to doubt a defensive function of many or most of the possible fortifications need to engage in closer discussions of how these structures worked. The content analysis for this chapter documented a higher degree of overt debate than in any of the other chapters; I mean statements in which one research party directly addresses and engages with a statement made by another researchers,

such as “Mellaart suggested that the plan of this settlement [Hacılar I]—with the back walls of the houses forming an unbroken façade—is defensive. But there is no evidence to support this idea” (Sagona and Zimansky 2009:134). Such statements are coded in Appendix 7 as hypothetical (in grey); there are further comprehensive scrutinisations by Baird 2012a:448; Düring 2011a; Rosenstock 2014:239; Selover 2015:251-277 of many of the possible early fortification structures discussed here. For none of the other chapters have I documented so much overt discussion in the literature; this, together with the fact that the examples cited here are rather recent, supports my impression that warfare is increasingly a topic of discussion in Neolithic/ Chalcolithic research during recent years. Overt discussion is crucial in moving the debate forwards. I suggest that also such critical voices might, however, benefit from a closer engagement with the exact workings of potentially defensive structures, and architectural signatures of hostile destruction.

Chapter 10 NEW ARCHITECTURES OF SOCIAL ORGANISATION IN CENTRAL ANATOLIA AND THE LAKE DISTRICT 6500- 5500 BC

This research has investigated how architecture was socially used to construct communities between 6500 and 5500 BC in the Lake District, Konya plain and Cappadocia. It has taken the initial steps needed to translate this information into an archaeological epistemology for researching architecture. This chapter focuses on five outcomes of this thesis: The first section summarises how new social realities were created through architecture during the LN/EC. The second part reports the result of an application of the indicator packages created in Chapters 6-9 to the archaeological record (Appendix 12). The remaining three sections reflect on the methods used in this thesis (10.3), and on architecture research in the study region more generally (10.4) and make recommendations for future research (10.5).

10.1 Building blocks of the Late Neolithic and Early Chalcolithic

The architectural indicators and themes recognised through content analysis can be used to capture important features of the social use of architecture in the Neolithic and Chalcolithic. **Community integration** in an egalitarian framework was architecturally created in the Neolithic/ Chalcolithic through first, asymmetry in the distribution of vital features, such as hearths, storage capacities and ritual items; and second, a degree of uniformity in building style. The asymmetrical distribution of important features creates the need for reciprocity between households. For example, at Çatalhöyük households were connected by pooling and exchanging ritual items (#86-#88); at Aşıklı Höyük, not every residence had a hearth (#72) or was large enough (#70) to function as a 'complete house' (#69). At Çatalhöyük,

sometimes groups of houses shared hearth or storage (#64, #66, #77).

Uniformity in residential architecture visually expressed, communicated and thereby also reinforced communal identities; either of an entire village, or subcommunities in a village. It also has connotations of the sharing of knowledge and rules or conventions, or even social control. For example, clustering (#47) is an expression of social closeness and creates social control. Similarities in building materials and techniques (#56, #57) attest to a shared set of knowledge and conventions around building. By displaying the same idiosyncrasies (#59), a group of households could express that they formed a subcommunity within the larger village. The house standardisation (#64) at Boncuklu Höyük and Çatalhöyük socialised community members into existing social rules and conventions.

Household autonomy, social competition and **social stratification** have been portrayed in Chapter 3 as different segments of one overall process, and the content analysis has confirmed this notion: the three overlap by sharing some of the same indicators and themes. Chapter 6 has identified differences between an Early Neolithic 'baseline' **household autonomy** and its modification after 6500 BC. During the Early Neolithic, household autonomy was architecturally created through symmetry in the distribution of vital features, and house(hold)-specific idiosyncrasy. Through symmetry, every household owned the features (#1-#6) that enabled them to be socially and economically independent on a short-term, day-to-day basis; for example, being able to store food for a few weeks or months, processing food within the residence, resting and sleeping in it. This might have included the ownership of ritual items and control over burial (#14, #17, #18) at Boncuklu Höyük, although perhaps not at Çatalhöyük (**Theme 3**, Chapter 3.2.2). And within the relatively uniform village landscapes typical of Early Neolithic sites, households might have subtly communicated independence through idiosyncratic building materials and techniques (#10, #12) or idiosyncrasies in ritual expression (#16, #22).

After 6500 BC, Çatalhöyük households may have architecturally liberated themselves from some the tighter communal integration of preceding centuries by

suddenly decreasing investment in two of the most important architectural community-making strategies that were noted for the Early Neolithic in Chapter 3: spatial closeness within the village was drastically reduced (**#32-#34**); investment in ritual ties decreased (**#26-#30**) and it is even possible that some history houses were deliberately burned (**#31**) as a particularly drastic strategy of capping ritual ties. There is only slight evidence that Late Neolithic and Chalcolithic households chose increased house idiosyncrasy as a means of expressing increased autonomy; I tentatively suggested that idiosyncratic house layouts (**#38**) might be more characteristic of post-6500 BC than of pre-6500 BC, and Düring and Marciniak (2005:175, 179, 181) postulated this for idiosyncratic house modifications (**#39**). The indicators coded for post-6500 BC household autonomy also do not clearly show that more symmetry in the distribution of vital features was a strategy to creating more autonomy during the LN/EC; rather, the indicators seem to capture an element of competition as each household attempted to obtain more vital features in comparison to other households: more house space (**#40, #42**), more storage capacities (**#44**), maybe more oven capacity (**#45**) and more outdoor space (yards, **#46**). At post-6500 BC Çatalhöyük, Canhasan and Köşk Höyük, there might be slight asymmetries in the distribution of these and other features between houses that indicate very slight, emerging socio-economic status differences between houses; but overall, there is still symmetry, now created by competition between households not to have less of anything.

Indicators **#40-#46** clearly show that LN/EC autonomy and competition evolved around socioeconomic productivity. Another architectural strategy observed in connection with social competition was a hiding-displaying tactic. Steadman (2000b) drew attention to the fact that inside the larger, more partitioned, more productive houses of the LN and EC households were also able to hide some resources and activities from others (**Theme 17**). This might have been important in a social context where it was not (yet) feasible to display openly differences in socioeconomic productivity, something also observed by Arbuckle (2012a:310) as characteristic of feasting at Early Chalcolithic Köşk Höyük. But aside from 'hiding' wealth and power differences that might have characterised much of daily life,

there are also architectural and other indications that opportunities were created for households to display their productivity during commensal events. The decorated pottery of the Early Chalcolithic (Çatalhöyük, Hodder 2014b:15-16; Köşk Höyük, Arbuckle 2012a:310) was one group of material culture used in the 'display' part of this competition. However, houses at Çatalhöyük might also have changed in order to facilitate competitive hospitality, for example by creating large open rooms for commensal socialising, with a central hearth and strategically located wall paintings (**Theme 18**). At Çatalhöyük specifically, control over ritual and ritual items initially might also have been a status-asserting strategy after 6500 BC (**Theme 19.5**), but ritual status creation might not have been prevalent at other sites.

Socioeconomic productivity combined with a hiding-displaying strategy that strategically either concealed or displayed the socioeconomic success of early powerful households continued to be important strategies for status assertion in villages with emerging social stratification. For this reason, early elite residences were larger (**#106, #107, #108**) and had more storage (**#112**) and oven capacities (**#113**), as well as courtyard space (**#114**). These features also communicated visually their economic success. Other status-assertion strategies observed in Chapter 7 can also be described as part of a hiding/displaying strategy, although by the Middle and Late Chalcolithic, the balance might have shifted stronger towards display: Elite residences visually dominated over others by being larger (**#106**), higher (**#109**) or located in a higher part within the settlement terrain (**#108, #136**), and possibly by being built from different materials (**#110**). In some MC/LC villages, settlement arrangements put elites on a social stage which placed them near communally used buildings and places, such as Güvercinkayası (**#135-#137, #140**); and maybe at Kuruçay 6, where an elite residence together with a shrine and storage building might have been located in the centre of the village (**#138, #140-#141**; although this reconstruction should be questioned, Düring 2011c:227-228). By the EBA, Bademağacı had a large central building that probably served as an elite residence as well as an administrative and storage centre (**#107, #140**). By placing the elite residence in a central place together with communal space, there was more opportunity for elites to display their status more or less subtly on a daily

basis, for example through the elaborateness of their residence. But 'hiding', i.e. removing some elite activities and resources from communal control, might still have been an elite-making strategy at some early stratified villages such as Güvercinkaya, where elite and non-elite residential areas were clearly separated (#135) by a wall (#137). It is possible to recognise elements of a hiding/displaying strategy also in EBA elite making, for example when Bachhuber (2015:170-177) describes that citadel elites conspicuously consumed wealth both during large public spectacles (feasts, deposition of pottery, sacrifice of meat) and in more exclusive events inside closed quarters (metal deposition).

An interesting possible elite-making strategy that is so far only indistinctly evidenced is the coordination of a large building project by Neolithic/ Chalcolithic elites. The building process itself could have functioned as a conspicuous performance of the influence elites had over human and non-human resources; after completion, the building itself continued to display the memory of the performance (as suggested by Bachhuber 2015:107-111, 128 for EBA fortification structures). At several LN/EC sites, previous researchers have tried to identify such elite control over community-building projects (**Theme 20, #133-#134**, especially Hacilar II-I, Kuruçay 11), but in all cases either the identification of the buildings themselves is insecure, for example, supposed grand fortification structures (#134) at the above named sites probably were less large and massive than suggested by the excavators (Appendix 12); or the reasoning leading from the building to the interpretation of elite influence is weak, for example communally used buildings (#138-#140) might just as well have been built through egalitarian decision-making. Nevertheless, the performance of Neolithic/ Chalcolithic elite influence on communal construction deserves more research in the future.

A noteworthy point developed in Chapter 7 is that, although household autonomy is in some ways the counterpart to community integration, social stratification and community integration are not mutually exclusive. Rather, the emerging LN-EBA elites might have used either actual community integration, or the architectural language of community integration, for their purposes in ways that deserve a more complete investigation in the future. As one example, there have been several

suggestions about chronologically diverse examples ranging from EN Aşıklı Höyük (Düring 2006:288, 309, 2014:133) to the EBA villages of Karataş and Demircihöyük (Bachhuber 2015:53, 81-82) that status differences and elite-making strategies were cloaked in the architectural language of kinship and community using architectural forms that had in earlier millennia or centuries displayed egalitarian community integration, for example the pooling of shared ritual resources into one building (Düring 2014:133-134). This needs to be explored, first as a noteworthy elite-making strategy that should be clustered with the 'hiding' aspect; and second, because it presents an epistemological challenge for architecture research, since it suggests that architecture might not always be the best tool to discern status differences. Also the fact that a lot of the LN/EC social competition described previously evolved around competitive hospitality could be seen as the re-purposing of an existing social format (creating cross-household ties through feasting, important since the Early Neolithic, Chapter 3.2.2) for a new social reality and for the aim of asserting status, as Arbuckle (2012a) has postulated for Köşk Höyük and Güvercinkayaşı.

The indicators and themes that characterise **mobility** and **warfare** discussions (Chapters 8-9) are different; they refer to a less abstract level in the creation of social organisation and are more technical. They identify how the built environment was prepared for the needs of its users: the architecture of campsites such as Pınarbaşı B is characterised by being ephemeral, i.e. not built to be lived in year-round and over decades (#142-#147). A degree of ephemerality might also characterise residences at the base settlements of part-mobile groups, for example at Çatalhöyük the average use life of houses decreases (#153-#154) when pastoral mobility increases in the Late Neolithic; at Çatalhöyük West, the repeated abandonment and reoccupation of some structures (#144) might be associated with mobility. The base settlements of pastoralists might also have changed to accommodate the more animal-focused lifestyle, and it is important that all of the indicators describing this process (#155-#160) have also been connected to household autonomy and social competition; mobility was therefore part of the creation of autonomy and competition.

Warfare is indicated by first, the preparation for warfare, and second, the destruction and abandonment that follows warfare (#178-#182). Villages could have been prepared for warfare by fortifying the settlement perimeter (#163-#170) in ways that would facilitate blocking access to the settlement, which importantly also included the preparation of protected entrances (#171-#174). At Hacilar I and Kuruçay 12-6, in addition to, or instead of, perimeter fortifications individual houses or house clusters were also made less accessible through rooftop entrances and thick and sturdy walls (#175-#177).

10.2 Household autonomy, social stratification, mobility and warfare 6500–5500 BC

This section summarises the results of the application of the tool kit to architectural data (Appendix 12). A first result is the realisation that the available architectural data often is insufficient to study research questions about social organisation. Although the archaeological map of LN/EC southcentral Anatolia features 13 excavated sites, some with long occupation sequences, and should provide a solid amount of architectural data, the degree and manner in which many sites were excavated did not allow for a comprehensive analysis of their architecture for the purposes of this thesis; either because they are not well preserved (Kuruçay, Gelveri), not or not yet well published (Erbaba, and the recently finished projects at Köşk Höyük, Çatalhöyük West and Bademağacı), or because they were not excavated on a large scale (Höyücek, Çatalhöyük West, Musular, Gelveri). In essence, a study of architecture and social organisation in LN/EC southcentral Anatolia currently is a study of Çatalhöyük East, Canhasan 2b, Hacilar VI, Hacilar II, Hacilar I and Bademağacı ENII3, augmented with some information from other sites. This is especially problematic because it leaves Çatalhöyük and Hacilar as the only sites where developments can be observed over several subsequent occupation levels; and there are many issues with the Hacilar record that were outlined in Appendix 12. These issues are discussed further in the following sections (10.4, 10.5). Here, I provide a summary concerning changes over time (temporal patterns),

and differences between sites and regions (spatial patterns).

Household autonomy and community integration

This analysis has confirmed that household autonomy and community integration always existed in a balance in Neolithic/ Chalcolithic southcentral Anatolia. Contrary to the notion formulated in previous literature (Chapter 3), this analysis did not observe a clear trend of decreasing community integration, and increasing household autonomy during the LN and EC (Figure 50): At Hacılar, there rather seems to be a reverse development: increasing community integration, and decreasing household autonomy. At Kuruçay, Höyücek ShP, Bademağacı and Köşk Höyük there seems to be an equal balance between autonomy and integration, and at Erbaba, community integration slightly outweighs household independence. Only at Çatalhöyük West and Canhasan 2b might it be possible to observe a loosening of communal ties. These results suggest that the post-6500 BC development towards greater household autonomy might have been a Konya plain-specific process; or alternatively that the tool kit devised in this thesis is not suited to detecting autonomy developments at other sites in other regions.

Social competition and social stratification

A similar result arose from the analysis of social competition: At Çatalhöyük West and especially at Canhasan 2b, there are indications that households were in competition, possibly with incipient stratification; and at Köşk Höyük there are clear indications for competition, but this is currently evidenced mostly through non-architectural data, specifically the faunal and burial assemblages. There are no indications of social competition in the Lake District. However, there is evidence for some degree of social stratification at three (Hacılar II, Höyücek ShP, Bademağacı ENII3) of the five occupation levels studied in the Lake District. This pattern might suggest that the succession of household autonomy-social competition was a Konya plain phenomenon, possibly including Cappadocia although based on only one site

(Köşk Höyük). In the Lake District, the emergence of social status differences took a different pathway, not via household autonomy and social competition. Another possibility is that the tool kit needs further refinement in order to effectively research social organisation in the Lake District.

Mobility

Although mobility was portrayed in the literature review (Chapter 3) as an important part of life in Late Neolithic and especially in Chalcolithic southcentral Anatolia, the analysis undertaken in this research has confirmed the existence of only one campsite (Pınarbaşı) on the southern Konya plain. I have suggested that the abandonment-reoccupation pattern observed in some houses at Çatalhöyük West could indicate that elements of its population was part-mobile, and that this was a base settlement. Potentially mobility was a less important aspect of LN/EC life in southcentral Anatolia than I postulated based on the literature review in Chapter 3; or alternatively the selection of sites (a preference for non-campsites) and manner of excavation (for example, a lack of detailed studies of microstratigraphy in houses that could detect abandonment and reoccupation; lack of detailed study of the use of outdoor areas) creates an archaeological research bias against detecting mobility. At many sites, a faunal analysis is missing and this would be crucial to contextualising a discussion of architectural mobility.

Warfare

With the single exception of Canhasan 2b where one researcher (Cutting 2005b:80) has associated the clustered layout with defence, only sites in the Lake District feature evidence for either warfare preparation or results. However, in the Lake District, many of the studied occupation levels have evidence for either preparations or destruction, or both. This might indicate that the Lake District did experience larger-scale violence while central Anatolia was peaceful, or not on the receiving end of attacks (Clare et al. 2008:77-78); or it could attest to a particular

preference for Lake District researchers to detect warfare; or that excavations were more likely to also include the settlement perimeter, where defensive enclosures are most likely located; or a mixture of these factors (see 10.4).

10.3 Evaluating the methodology used in this thesis

A thesis employing archaeological reflexivity would be incomplete without a short evaluation of its own methodology. This section concentrates on, first, a discussion of the use of content analysis for epistemological research, and second, an evaluation of the contextual approach taken in this thesis.

Content analysis

I found content analysis to be a very helpful tool for mapping an archaeological thought landscape. This approach allowed me to create a much more thorough and systematic understanding of the literature than if I had relied on mere reading. Specifically, it documented a much greater variety of indicators than I was originally aware of when reviewing the same literature for Chapter 3; this confirms that content analysis allows for a deeper and more systematic review of an academic discourse. The content analysis also identified a number of isolated research opinions and tentative suggestions made in the literature that otherwise might have remained without comment. In combination it can be used to create deeper insights into archaeological epistemology. At the same time, this thesis is an inherently idiosyncratic—my idiosyncratic—map of the literature landscape, guided by my personal interests, training and research environments.

The content analysis had two purposes, first to systematically rethink the epistemology by which archaeology makes sense of architecture in the study region and to create indicator packages for further research. Second, to understand how architecture was used in Neolithic/ Chalcolithic southcentral Anatolia by people in the past to create the societies they wanted to build. The latter aim was achieved; the identified themes and indicators have allowed me to explore the formation of these social processes, and the nature of their expression in architecture, in new ways

(Section 10.1). The variety of themes and indicators found in my analysis might also assist others in exploring Neolithic/ Chalcolithic architecture in new ways, and reach conclusions that I did not.

The indicator packages were directly put to a test in this research through an application to the architectural record at 11 sites (Appendix 12, 10.2). During this application I observed a strange discrepancy between the relative certainty with which indicators were accepted in Chapters 6-9, and the many uncertainties that arose when trying to recognise indicators at specific sites. Although the indicator packages were built up from the architectural record itself, when applied to that record a given indicator package often did not actually provide very secure results, because the necessary data were not available, or were unreliable.

How successful is an interpretational framework (here: a tool kit of architectural indicators) if it cannot work with the available data? Clearly, it is limited. However, that limitation is also a strength, as it identifies areas where more data need to be collected. I argue that the discrepancy between indicator packages and data is something that needs to be addressed, but ideally it should be addressed by striving to create better data in the future (10.5). For example, an important issue is temporal resolution. The research questions that were at the centre of this thesis are those of household autonomy, competition and stratification; based on the tool kit devised here, discussing these issues necessitates comparing contemporary houses to each other, and therefore requires a precise-as-possible impression of which houses function together as a village. The available stratigraphic or radiocarbon-dating resolution of sites is, however, rarely up to that challenge. The villages studied here were probably growing organically and changing constantly over years and decades (see evidence Çatalhöyük West, Canhasan, Köşk Höyük, Appendix 12). Until recently, it could have been argued that archaeological dating methods can never be that precise and therefore that different research strategies must be found; but there are examples from the study region of how new methods of radiocarbon dating (Bayliss et al. 2015; Bayliss et al. 2007; Bayliss et al. 2014; Marciniak et al. 2015b) and high-resolution stratigraphy (Stevanović 2012:79) can give archaeology an impression of changes in the architectural fabric over time

spans of a few years or decades. I also argue that it is a significant contribution of this thesis to have pointed out this discrepancy between southcentral Anatolian archaeology's own epistemology of reconstructing social organisation, and the data it typically gathers in the field. Appendix 12 has also demonstrated that some interpretations are far from certain, notable examples being many of the supposedly hostile burnings of Lake District villages, of which at least some might be ritual; and the reconstruction of Hacilar I has being a centrally administered settlement.

The contextual approach

This thesis set out to research southcentral Anatolian Neolithic/ Chalcolithic architecture within an interpretational framework specific to this region and time period. Chapters 6-9 have displayed some of the wealth of available archaeological knowledge that exists about the sites in question, even more than what I was able to include; I therefore conclude that there is enough data available for contextual studies. At the same time, ethnographic analogies and anthropological theory have in the past aided the interpretation of questions relevant to this discussion (for example, history/ lineage houses, #86-#88; or the equation of frequent house modification with household autonomy, #39) and are therefore also part of the genesis of the epistemology recommended by this thesis.

A contextually derived epistemology also inherits existing research biases, which is a disadvantage of this approach. Specifically, I have in Section 10.2 pointed out that the indicator packages might not be suitable for all regions and sites studied (see Appendix 12); large parts of it have a clear Konya plain-focus (read: Çatalhöyük focus), and idiosyncrasies in architecture and social organisation of especially the Lake District, which might culturally always have been somewhat different from the Konya plain and Cappadocia (3.2.1, 3.3.1), might not be adequately acknowledged in this toolkit (also 10.4). Moreover, limiting this analysis to southcentral Anatolia also meant that some periods were underrepresented in the results of the content analysis. Particularly the EBA hardly featured at all in indicator discussions, although

I had set out to research a long-term perspective in both the epistemological evaluation and the understanding of long-term trends in the interaction between prehistoric people and architecture. Two reasons for this shortcoming can be identified.

First, this limitation of the indicator package developed in this thesis mirrors larger issues in prehistoric archaeology in Asia Minor, as outlined in Chapter 1 and especially by Düring (2011c:3, 28-29, 200-202) whereby certain periods in certain regions are under-researched. This hampers the creation of larger storylines that require long-term perspectives. With few EBA sites excavated in southcentral Anatolia compared to western and north-central Anatolia which have a very well researched EBA landscape, prominent discussions of the EBA such as Bachhuber (2015) are bound to focus their attention elsewhere (see also Section 7.5). In future work, this problem could be alleviated by widening the borders of the study region to include, for example, Karataş, a well-researched EBA site just south of the Lake District, or to widen the radius even more and research southcentral Anatolia as part of EBA western Turkey. A study such as that conducted here, desirous to draw a region-specific long-term perspective from the EN to EBA, however, currently has to accept that the latter end of that timeline (LC and EBA) is missing.

Second, this limitation is a result of my choice of coding literature (Appendix 2.1), paired with an intellectual fault line separating archaeological research of the EBA from that of earlier prehistory (3.6.1). Focusing on the Late Neolithic and Early Chalcolithic, I included only one explicitly EBA-focused publication in my coding list (Bachhuber 2015). A few of the sources on the coding list include a long-term perspective from the EN to the EBA (to name only the most recent monographs: Düring 2011c; Duru 2008; Sagona and Zimansky 2009; Yakar 2011b), but a great majority of the sources deal with a timeline that stays within the borders of the Neolithic and Early Chalcolithic. Düring (2011b:797) observed that the EC is often researched as an extension of the Neolithic, and this is confirmed when looking at publications such as Düring's (2006) and Cutting's (2005b) theses on architecture, both of which choose a sample from the EN to the EC (Cutting 2005b:114 included also MC Güvercinkaya, which she however dates EC/MC). Many sites in the study

region span the Neolithic and Early Chalcolithic but do not have MC-EBA occupation, therefore publications about them by default deal with a Neolithic/Early Chalcolithic research framework. By contrast, research of the EBA—and LC, often researched as a prelude to the EBA Düring (2011b:797)—is separated from that of earlier period by an intellectual rift (Düring 2011c:257). Few publications on the Neolithic and EC make specific reference to the LC or EBA; as a result, most of the discussions, indicators and evidence captured in Chapters 6-9 stay within the borders of the EN to EC, only occasionally venturing into the MC. For this reason, this epistemological discussion includes more of the Early Neolithic than originally planned, and less of the Early Bronze Age.

10.4 Reflections: the epistemology of architecture and social organisation

In many ways, this thesis has possibly best documented the gaps in our knowledge base and the many challenges to answering research questions about social organisation from architecture in the study region. Specifically, it has pointed out insecurities in the dating of sites and levels (Chapter 2/Appendix 1); uncertainties about important details of architectural reconstructions at several sites, such as where and how large storage spaces were, or whether houses had second stories (Appendix 12), as well as insecurities about how specific pieces of evidence are to be interpreted (Chapters 6-9). While most of these issues were probably no secret, this thesis has documented in greater detail and more comprehensively research challenges specific to the Late Neolithic and Early Chalcolithic. These often consist in the nature of the archaeological record, and the formation processes that have destroyed important evidence; or are the result of limited resources (time, funds) that did not allow excavators to explore sites in greater detail. But sometimes, archaeology impedes itself by creating research biases. Although frustrating, it is an important contribution of this thesis to have reviewed systematically and in detail existing interpretational biases. Here I would summarise this aspect of the thesis by pointing out three issues in particular.

Epistemological superficiality

First, there is a worrying degree of unquestioned assumption in many archaeological interpretations of the social meaning of architecture. Throughout Chapters 6-9 I have repeatedly remarked that particular architectural indicators are insufficiently explored, i.e. the connection between architectural form and social interpretation has not sufficiently been demonstrated in previous research. Even 'classics' of southcentral Anatolian Neolithic/ Chalcolithic architecture, such as clustering or non-clustering (#13, #32, #33, #47, #97, #130, #131, #157, #165), seem incompletely explored compared to the iconic status they have achieved in understanding and classifying communities. Moreover, the existing pieces of research that directly address the intricate details of mechanisms linking architecture and social organisation by exploring the social use of architecture also originate from only a small circle of people, notably Bleda Düring and members of the Çatalhöyük team, including Ian Hodder. For some of the issues researched here Sharon Steadman and James Mellaart are also relevant, although many ideas from the latter should be regarded as outdated. Future research in the regions needs more and more rigorous research towards a deeper understanding of the social use of architecture during the Neolithic/ Chalcolithic, which can then be used to create archaeological interpretational frameworks using a variety of methods. It seems desirable that more people participate in these debates, offering a greater variety of viewpoints, using various methods, and thereby moving archaeological knowledge forward and in different directions.

Excavation is interpretation

Second, there might not be enough awareness of, and open discussion of, the fact that social reconstructions generated through excavation are so inherently shaped by the research strategy chosen by the excavators, and especially by senior team members, that re-interpretations of the data become complicated to impossible. In effect, many interpretations are established at the time of excavation. Given the range of research aims in different projects, this suggests that perceived differences

between sites and regions might be a product of archaeological research rather than past lifeways. The content analysis has clearly demonstrated that different researchers participate to different degrees in the discussion of different social factors or processes. For example, Mellaart, Steadman, Eslick and Duru are more prominent in the discussions of social stratification and warfare than they are in those of household autonomy and community integration; by contrast, Ian Hodder is less prominent in the warfare debate than in the other chapters. As pointed out in Chapter 7, personal preferences seem to guide the interpretation of some pieces of evidence—here communally used buildings (#138-#140)—with some researchers more likely to interpret them as signs of community integration in an egalitarian framework, and others as signs for social stratification.

Chapter 4 has demonstrated that the influence of each researcher's personal experience and research motivation on the research product is unavoidable; and that these influences therefore should be integrated into archaeological research processes rather than treated with discomfort. In particular, there needs to be an awareness that the research preferences of site directors and site supervisors influence how entire sites are excavated, documented and reported; in other words: how the knowledge basis that all following architectural (and other) research builds on is created and shaped. Excavation directors have a major influence on the interpretation of a site from the trowel upwards: they choose where to excavate, and how thoroughly to research certain parts of the site. Moreover, they are also often the ones to decide what knowledge to disseminate within the research landscape: in many of the sites researched here, the excavation director is the only person to have published accounts of the architecture and stratigraphy. Possibly an interesting relationship of mutual influence exists between the nature of the site and the research position of its excavator: perhaps excavation directors are more likely to favour certain research topics because their sites demand it; so, for example it could be argued that Ian Hodder at Early Neolithic Çatalhöyük was bound to write about egalitarianism (Hodder 2014b) and an absence of warfare (Hodder 1996a:46, 2006:206), and Refik Duru at LC Kuruçay and EBA Bademağacı was bound to write about warfare and social stratification (Duru

2008). However, pre-existing perceptions about what issues are most important to research in Neolithic/ Chalcolithic southcentral Anatolia also influenced entire research strategies from choosing a site to choosing how to excavate it.

Given how fundamentally these research choices influence the data that come out of an excavation (Chapter 4) it can be very difficult in retrospect and as an outsider to critique the excavation data. For example, the Çatalhöyük that the Hodder team excavated was very different from the place that Mellaart excavated; Mellaart's Çatalhöyük was socially stratified (Mellaart 1967:82, 207) and at least potentially under threat from hostile attack (Mellaart 1967:68-69). If Mellaart's version of Çatalhöyük had never been challenged by a different research project excavating the same site with different aims and methodology, would it have been possible to re-interpret the site as peaceful and egalitarian based only on Mellaart's data? And how different might Hacilar look if it were excavated again by a different person? (see Duru 1989c for a glimpse of what only a few test trenches could do). This applies to any site and director, Mellaart was chosen here as an example because he is the only one whose sites were later re-excavated. My own re-analysis of Hacilar was eventually only able to confirm much of the same picture that Mellaart (1970c) drew of social organisation at the site—Hacilar II might have been a socially stratified community, Hacilar I features strong community integration, there might have been warfare—although I have (Appendix 12) indicated many points on which I fundamentally disagree with Mellaart's reconstruction of the site.

For the same reason—excavation data being inherently shaped by the methods of excavating, recording and publication—it is difficult in retrospect to interpret sites whose excavators were hesitant to offer social interpretations, such as Erbaba and Canhasan. At Erbaba, researching social organisation was not an explicit focus of the research project, and the excavation strategy chosen at the site was not conducive to uncovering social organisation; as a result, the data from the site can contribute little to research projects such as mine, despite sizeable exposure (Düring 2006:248). At Canhasan, it was French's personal decision not to offer more detailed reconstructions of social life at the site: "I have deliberately chosen a minimalistic prose partly in order to keep close to the idiosyncrasies of the first

accounts [the annual reports 1962-1968] but principally to focus on the record more than the interpretation" (French 1998:v; also Düring 2006:260; Steadman 2000a). Unfortunately, as a result the site has featured much less prominently in some discourses of prehistoric Anatolia. For instance, Redman (1978:182-188), although outspokenly not a fan of Mellaart's excavation and research style (Redman 1972), bases his discussion of Neolithic Turkey mainly on Hacilar and Çatalhöyük, mentioning Canhasan only in one sentence. For re-interpretations of Canhasan social organisation, such as by Düring (2006) or in this thesis (Appendix 12), it is possible to suggest a number of new thoughts about Canhasan 2b. For example, in this thesis the existence of house-related ritual and social competition is tentatively credited to the relatively systematic publication achieved by French (1998, 2005, 2010), although the data, for example for ritual elaboration (artefact assemblages by house, Table 53), are buried fairly deeply in the publications, French instead focusing on a discussion of building techniques and stratigraphy.

The issue is amplified by the circumstance, as pointed out in Chapter 1, that the three regions researched here have been associated with different sets of excavators. As a result, it becomes difficult to decide whether seeming differences between regions concerning social organisation were a prehistoric reality or the result of archaeological research bias. For example, in Section 10.2 I have pointed out that the social trajectory of the Lake District after 6500 BC appears different to that of central Anatolia in most aspects. This is entirely possible because of the different genesis of its Neolithic (Chapter 3.3.1), but also might be an impression created by the fact that a different set of researchers was dominant there as compared to Cappadocia or the Konya plain. As another example, emerging social competition might have been expressed differently in Cappadocia/Köşk Höyük, where it does not seem apparent in residential architecture but in the faunal and burial assemblage, as compared to the Konya plain. At Çatalhöyük East, West and Canhasan the architecture seems to have been an important item of material culture used in competition between households, but this, too, might be a false impression created by the current lack of detailed publication of the Köşk Höyük architecture.

In this thesis I suggest that precisely because of the unavoidable influence of the site director and other senior research personnel within the excavation team on both the final perception of the site and the very data that is collected and published (Chapter 4), there must be more debate about field work techniques and more sharing of primary excavation data. This could begin with excavators including more descriptions and discussions of excavation and recording methodology into their publications, something that has systematically only been done by French (French 1998:8-18, 2005:1-10), and the Çatalhöyük Research Project (Farid 2000; Farid and Hodder 2014). Even a regular open access publication of excavation data seems desirable. The Turkish system of publishing yearly season reports is already an invaluable source of information (Matthews 2011:38); but the sheer amount of data produced by modern excavations can probably best be published on the internet either after the end of an excavation project or as part of the ongoing project. Visual material (photos, drawings, sketches) and excavation notebooks that document the knowledge-making process during excavation (Mickel 2015) are especially valuable, as they present the raw data that informs interpretations. The archives of the 1950s-1970s excavations should be made available by the institutions that hold them, some of which are already in the process of doing so (Chapter 5.2).

The Çatalhöyük dilemma

The site of Çatalhöyük presents a dilemma for southcentral Anatolian prehistoric research. The content analysis in this thesis has clearly demonstrated the overpowering interpretative dominance of this site for research into social organisation and probably for Neolithic research in southcentral Anatolia more generally. Of the 182 indicators researched here, a disturbing 74 indicators (40%) were only observed at Çatalhöyük. For many other indicators, this site provided most of the evidence for the indicator evaluations presented in Chapters 6-9 because it provided newer, deeper or more rigorously researched insights into architecture and its social meaning and a greater variety of evidence derived also

from small-scale techniques such as geoarchaeology, micromorphology or the systematic light and heavy residue analysis of soil samples. Prominent examples, the understanding of which has been significantly enhanced by such methods, include the identification of food storage spaces and capacities (#5, #6, #44, #73-#77, #81, #91, #110, #137), research into the social meaning of variation or uniformity in building materials and techniques (#10, #11, #56, #57), and the use of outdoor spaces through a detailed analysis of deposits (#80, #46). All of these are aspects of architecture that could have been studied at most, if not all, other sites researched in this thesis, but they were the target of in-depth study only at Çatalhöyük (East) although they, and especially storage as demonstrated by the many indicators dealing with this issue, are of central importance for reconstructing social organisation from architecture. The depth and detail of research is one reason; the exceptional preservation of the site and the size of the exposure are other reasons making Çatalhöyük the nodal point in the architectural epistemology researched here.

The dilemma is that Çatalhöyük East presents at the same time a blessing for southcentral Anatolian prehistoric archaeology and a methodological problem for comparative studies. It offers otherwise elusive insights into details of prehistoric Anatolian lives, specifically into details of the relationship between people and their built environment, but to what degree these insights can be used to also understand other sites remains unclear. As long as there is no comparable data from other sites it is impossible to decide, for example, whether the social use of mudbrick building observed at Çatalhöyük (Love 2013a, 2013c; Tung 2013) or that of unroofed areas (Martin and Russell 2000; Shillito and Matthews 2013; Shillito et al. 2011; Shillito and Ryan 2013) was similar at other sites where less data is available.

The Çatalhöyük dilemma is not improved by the fact that there were regional differences in social organisation and architectural expression, but these remain incompletely understood (Chapters 2-3), so that often it is unclear which sites can be used to make inferences about which other sites. This is aggravated by the above discussed region- and site-specific research bubbles which might distort actual

differences in the social use of architecture. Cultural differences between the Çatalhöyük/the Konya plain and other regions in southcentral Anatolia might be overrated, while at the same time similarities within the Konya plain are also overrated; for example, the interpretations of (pre-Çatalhöyük) Pınarbaşı A and Boncuklu Höyük are explicitly made in reference to Çatalhöyük (Baird 2012b; Baird et al. 2013; Baird et al. 2011; Baird et al. 2012; Fairbairn et al. 2014) but might be exaggerated both because of a pre-perception of the Konya plain as a unified cultural zone, and also because Douglas Baird and Andrew Fairbairn both previously were members of the Çatalhöyük Research Team.

10.5 Recommendations for future research

This thesis has pointed out many shortcomings in the archaeological knowledge-making strategies employed in the study region. In addition, it has identified tangible ways for future research to accomplish more detailed and comparable studies of Neolithic and Chalcolithic social organisation. To achieve a deeper understanding of social organisation in Late Neolithic and Chalcolithic southcentral Anatolia, archaeology first needs to strive to produce more reliable, detailed and comparable data during excavation, but foremost it needs to work efficiently with the excavation data that already exists.

Excavating new architectural data

Based on observed discrepancies between the data archaeologists know they need (Chapters 6-9) and those that are typically excavated (Appendix 1, 12), I would like to recommend five fieldwork strategies that should be employed more intensively in the future.

First, field work needs to try harder to detect food storage. The content analysis undertaken in this thesis has identified 14 indicators in Chapters 6-8 that deal with food storage capacities; clearly, an accurate reconstruction of food storage

capacities is important for the understanding of all social processes researched here, with the exception of warfare. Compared to the significance of storage, not enough effort is made to identify food storage. It must be acknowledged that many details of food storage might not leave direct traces in the archaeological record, because food was typically consumed or removed before houses were abandoned. But systematic sieving and floatation of sediment samples, especially from possible storage containers, can detect more obscure traces of food storage (Bogaard et al. 2009, 2013, Demirergi et al. 2014).

Second, more effort needs to be expended on studying unroofed areas. Especially in settlements where there was a lot of unroofed space between houses, such as Hacilar, Bademağacı ENII or Kuruçay, there is a discrepancy between the significance attributed to the mere existence of such unroofed space (Duru 2012:27; Schoop 2005b:48) and the degree to which this space is actually studied. The formation processes of deposits in unroofed areas can be studied through the details of their stratigraphy, by recording the exact location of artefacts, by wet and dry sieving of sediments, systematic sampling, e.g. for phytoliths or phosphate, and through thin sectioning (Shillito 2011; Shillito and Matthews 2013; Shillito et al. 2011).

Third, more attention needs to be paid to the deposits filling the houses. At many sites this fill is only reported if it is considered part of the original inventory or collapse of the roof or an upper storey. Other formation processes are not acknowledged, but could be indicative of factors discussed in this thesis, such as: intentional infilling as part of abandonment rituals and building continuity (Çatalhöyük East, Russell et al. 2014); middening and use for storage, production and burial activity (Çatalhöyük West, Rogasch et al. in press); repeated re-use and abandonment indicative of mobility (also Çatalhöyük West, Appendix 12). I have throughout Appendix 12 suggested that roomfill might have been too often interpreted as collapse or original house inventory when in fact it was not. For example, the inventory of B.3+4 at Höyücek ShP could represent ritual deposition during abandonment, and the collapsed upper stories at Canhasan 2b and Hacilar VI, II and I could instead represent erosion and middening. It also seems curious

that at all the other sites where such roof/upper storey collapse deposits were not found, questions were never raised as to what happened to the upper part of the house and why its collapse was not found. A better understanding of roomfill formation processes is therefore crucial to establishing whether a house had two storeys, and whether artefacts found in the building interior can be researched as part of that building. In short, a significance of the study of house fill really should not be underestimated. Potential construction collapse needs to be much more thoroughly researched using experimental or ethnoarchaeological studies of collapsing (mudbrick) houses as a reference (Friesem 2016; Friesem et al. 2011; Friesem et al. 2014a, 2014b).

Fourth, building materials should be studied more systematically and in greater detail. The fact that most buildings in the study area are built at least partially from mudbrick creates great research potential, since mudbrick can display human agency clearly (Love 2012, 2013c), and possibly more than stone. Appendix 12 demonstrates that building materials can be researched at every site, even if buildings are very badly preserved. For instance, if their interior furnishing is lost, some traces of walls and floors will remain that can be studied. Even systematically conducted and published visual descriptions of the colour, inclusions and shapes of mudbricks, mortar, daub and stone would be useful (see Love 2013a:83; Tung 2013:70 for the use of visual assessment as a first step in composition analysis) and these are neither costly nor time consuming. Ideally, the composition of earth building materials would also routinely and systematically be studied by geoarchaeological means which provide a higher resolution than visual studies (see Love 2012:146, 2013a:90, 92; Tung 2013:71 for limitations of visual mudbrick assessment). I acknowledge that these recommendations are shaped by my experience of excavating at Çatalhöyük West, which has also influenced the way in which I have approached a reinterpretation of other sites in Appendix 12, for example readily recognising middening into abandoned houses and organic village growth. The use of new insights from fieldwork to assess previous fieldwork is, however, in principle valuable.

Finally, I would like to point out that many of the indicators collected especially for

the identification of household autonomy, community integration and social stratification (Chapters 6-7) rely on both a high quantity and a high resolution of architectural data. This means sites excavated on a large scale both horizontally (exposing a significant amount of roughly contemporary buildings) and vertically (researching social changes at the site); combined with knowledge of architectural details such as the composition of building materials and the microstratigraphy of plaster layers or of roomfill. However, most excavations seem to offer either only high resolution at the expense of quantity (Çatalhöyük West), or large extent at the expense of high resolution (Hacılar), but not both. If they have neither (Erbaba, Gelveri, Musular) they cannot offer much to a study of social organisation. The new Çatalhöyük East project comes closest to the 'ideal' excavation, although it must be noted that for some research questions that require a larger amount of data it is useful that Mellaart already excavated numerous buildings in the 1960s (Düring 2006:135). The Çatalhöyük East project also gives an example of the amount of funding and time that needs to be invested by a large group of researchers to achieve such an outcome. It might well be that that is not a realistic scenario for all future excavations, but it serves as a benchmark. Moreover, it is valuable for excavators to be aware of the amount of resources needed to contribute towards a study of social organisation.

Dealing with legacy data

Chapter 4.4 has outlined strategies for a study of architectural legacy data. In Appendix 12 I have used some of these to create new stories from old buildings. Here I note that, first, published site reports can be critically dissected to find information that was not explicitly reported. For example, I have tried for several sites to reconstruct knowledge about roomfills and artefact inventories from information scattered throughout the sources. Based on this, I was able to offer some new perspectives on these buildings, examples being possible ritual depositions at Canhasan 2b, Höyücek and Bademağacı. In this way, it is possible to scrutinise some of the original interpretations and reconstructions, although the

information thus detected through a data hunt in the publications will always be incomplete—for example, it will never be possible to reconstruct an ‘objective’ view of house inventories if the sources only record a preselection of artefacts that the excavators deemed important enough to mention with their finds location.

Second, future archaeological research on architecture should use the excavation archives that will be available soon from Erbaba, Hacilar and Canhasan (Chapter 5.2). The original documentation from the field—notebooks, sketches, and photos—could record information that did not make it into the final publications of the site (see 4.5.2 on site reports). Unpublished photos could offer new views on a site; from Canhasan and Hacilar, most published photographs show buildings after they have been completely excavated, but perhaps material in the archives has recorded some of the process of excavation and details of the infill. A total of only four photos were published from the Erbaba excavation (Bordaz 1969a).

Stratigraphy and building materials are other features of architecture that might be recorded in greater detail in notebooks. It is likely that untangling the complex stratigraphy of built features that are characteristic to southcentral Anatolian *höyük* sites was one of the main tasks occupying the minds of excavators, so it could be expected that they recorded the process of their knowledge-making in notes and sketches; importantly, the notebooks then could also contain interpretations alternative to the stratigraphy that was eventually published.

Epilogue

This thesis has provided the analysis of an academic discourse, and a re-interpretation of some architectural data from the Late Neolithic and Early Chalcolithic of southcentral Anatolia. It has documented gaps in the archaeological knowledge base, and inconsistencies in archaeology’s knowledge-making strategies. It has offered recommendations for overcoming these in future research. The sites researched for this thesis are archives of a fascinating episode in human history; it is a privilege to study them and I hope this research has contributed towards their deeper understanding.

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