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# TELL NEBI MEND: TRENCH VIII MA DISSERTATION

# MHAIRI CAMPBELL UNIVERSITY OF DURHAM

This dissertation would not have been possible without the great help of a number of people. First and foremost, my thanks to Peter Parr and my supervisor, Graham Philip, for giving me the opportunity to work on the Tell Nebi Mend Trench VIII material, and for their invaluable help and advice on the project. Particular thanks also to Rachael Sparks at the Institute of London, UCL, for her help accessing material; to Angela Walker at Sheffield University for her hugely helpful work on the botanical material from Trench VIII; and to Jennie Bradbury for long and useful discussions about the Homs region. A general thanks also to all those who have worked on material from Trench VIII since the excavation, whose notes and commentary have helped make this dissertation an enjoyable task.

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#### **CHAPTER 1: INTRODUCTION**

#### 1.1 Regional context

Within the sphere of Near Eastern archaeology, the "Urban Revolution" has become a much discussed, and much cited, phenomenon. Based on an economy built on sophisticated agricultural techniques and long-distance trade in both raw materials and manufactured items, the establishment of centralised political powers, social stratification and the introduction of writing have implications for the development of 'civilisation'. Traditionally, it is generally accepted that this "Urban Revolution" had its roots in Southern Mesopotamia, spreading eastwards into Elam and Iran, and northwards into Syria and up to Anatolia. In the Nile Valley in Egypt, research has pointed to a similar phenomenon occurring at the same time as such developments in Mesopotamia. The degree to which such advances in Egypt were based on stimulus from Mesopotamia is greatly debated. However, what is certain is that both sets of development can be termed "revolutionary" for the effect they had on the societies in which they were based.

Whilst the above has long been discussed and supported with an ever-expanding corpus of evidence, research in the region between Mesopotamia and Egypt, the modern Levant, has been, as yet, less enlightening. Despite the southern region of the Levant, that comprising most of modern-day Israel and Jordan, being one of the best documented regions of the ancient Near East in terms of archaeological excavation, there remain questions as to the nature, extent and process of "urbanisation" in the region. Kenyon's "ethnic movement" model based on three "Proto-Urban" population groups identified by material cultural assemblages now seems too simplistic. Recent research has moved away from the idea of migration into Palestine from the north and puts more weight on trading links with Egypt as the main stimulus for a move towards "urbanism" in the Southern Levant. However, the presence of clearly Mesopotamian links in the material culture of the Southern Levant cannot be ignored. Proto-Urban and Early Bronze Age Palestinian artefacts including droop-spouted jars and cylinder seals point to relations with Mesopotamian communities. Research

even goes so far as to indicate that the Southern Levantine area may well have played a significant role in the movement of Mesopotamian technologies and motifs to communities in the Nile Valley in Egypt.

However, whatever theories are advanced in the explanation of "urbanism" in the Southern Levant, there is one serious impairment to the various hypotheses; the lack of investigation into the archaeology of the Northern Levant. The most extensively excavated sites, until the excavation of Tell Nebi Mend, were the coastal settlements of Ras Shamra and Byblos and the inland site of Hama. The deep stratigraphy at these sites documents the transitional periods of settlements in the Northern Levant from the agriculturally based 4<sup>th</sup> millennium BCE villages to the urban centres of the 3<sup>rd</sup> millennium. However, whilst the *amount* of evidence from the excavations is considerable in quantity, the excavation methods used and the lack of detailed recording of the stratigraphy has resulted in limitations to the interpretation of the archaeological record. Whilst it has been assumed that because the Southern Levant and the Euphrates valley region were urbanised by the early 3<sup>rd</sup> millennium, then the Northern Levant must also have been, this is only an *assumption*, especially given the unreliable evidence from Ras Shamra, Byblos and Hama. The excavations at Tell Nebi Mend were devised with the aim of attempting to fill this important gap in the understanding of the development of urbanism in the ancient Near East.

#### 1.2 The Trench VIII Excavation

Excavations began in Trench VIII in 1978, the third season of the Tell Nebi Mend project. A limited extension (at its maximum extent, 16 by 7 metres) to Trench I, Trench VIII is situated on the north-eastern edge of the tell, just east of, although well below, the foundation stones of the Middle Bronze Age fortification wall (discovered by Pézard and published in his 1931 volume, and re-examined by excavators from the Institute of Archaeology in 1975). The trench was deliberately situated here in order to take advantage of the material moved in the excavation during Pézard's excavations. This gave the best access to the pre-2<sup>nd</sup> millennium levels of Tell Nebi Mend with the minimum effort.

Delays were caused prior to the beginning of work in Trench VIII by the need to remove the substantial amounts of spoil from these previous excavations. However, once modern rubbish and this spoil were removed initial limited exploratory excavations expanded over five seasons to encompass a total of 90 square metres. Continuation of any excavation to the northeast was blocked by a modern track separating the tell from the alluvial farmland surrounding it. Removal of the modern rubbish and Pézard's dumped material revealed around three metres of substantial early 3<sup>rd</sup> and 4<sup>th</sup> millennium BCE occupation overlying over one metre of occupation dated to the ceramic Neolithic period (Parr, forthcoming and *pers. comm.*).

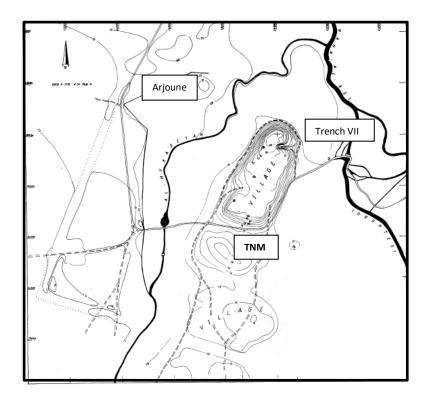


Figure 1: Map of Tell Nebi Mend and immediate surrounding area

Excavating so close to the edge of the tell and outside the town walls of certain occupation periods naturally increased the likelihood of ancient and modern disturbances. Additionally, the redeposition of material eroded from higher up the tell, as well the deposition of spoil from the Pézard excavations, caused ambiguity and disturbed the archaeology. However, given the relatively flat area provided by the earlier excavations and the ease of access on a tell which is still occupied on its

southern side, it was decided that the advantages outweighed the disadvantages of the position of the trench, the latter of which were naturally considered during excavation.

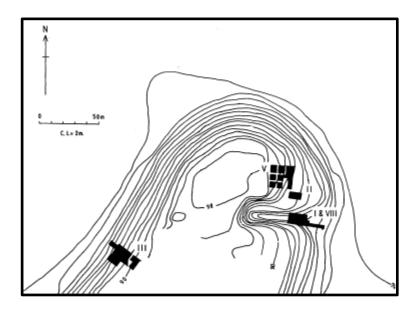


Figure 2: Map of location of trenches at Tell Nebi Mend

As excavation proceeded, the trench was divided into several separate 'areas'. These were normally delimited by a feature such as a wall or baulk, although all were irregular with regards to size and shape. Areas were assigned with numbers for use in recording. The 2m grid used in the plans was added later for ease of reference and was not used during the excavation for recording purposes. The excavation was undertaken in the 'conventional' manner, with each discrete archaeological deposit, as identified by composition, colour and texture, being allocated its own 'layer' number. Thus VIII.644.17 would correspond to Layer 17 in Area 644 of Trench VIII. The term 'layer' was utilised over the more common 'locus' or 'context' due to the various meanings of the latter which can lead to ambiguity.

All artefacts, including the animal bones, with a few exceptions, were kept. The constant strong winds on the tell made dry-sieving of material highly impractical. However, deposits which appeared to contain a significant amount of botanical material were sampled for flotation. A full register of layers by area with their individual attributes is given in Appendix I, but a brief summary of the phases is useful before a full discussion of the stratigraphy of Trench VIII.

Since this researcher was not present for the original excavations, a statement about the digging methodology and retrieval methods is pertinent. Interpreting the results of an excavation conducted thirty years ago obviously presents challenges. Much focus was put on revealing buildings and features, making the stratigraphy challenging to disentangle and interpret. However, detailed and conscientious recording made this task achievable, unlike the poorly excavated stratigraphies at sites like Ras Shamra. Detailed notes about loci and features were provided; although some double-numbering and multiple descriptions were present, these were untangled with reference to the original site notebooks as well as the register of contexts.

In terms of the material sampled, a great number of diagnostic ceramics were brought back to the UK, and detailed notes on those which were not made their study straightforward. Similarly with regards to the botanical remains, whilst some material had not survived the 30 year period in ideal condition, sample sizes were large and plentiful enough to make their study fruitful. A number of the diagnostic ceramics and, in particular, the small finds may have had drawings, but these seem to have been misplaced over the years, meaning that not as many as the researcher would like to illustrate could be. However, what is present gives a good example of the material that was excavated. Thus the excavations at Tell Nebi Mend, whilst conducted many years ago, presenting challenges in understanding and interpreting the material at such a distance, were so well undertaken that the task was not as difficult as it has been for other, less well recorded excavations in Central Syria.

#### 1.3 Research and Interpretation

Initial research and interpretation was carried out by Parr and Mathias, most notably accessible in *Levant* XXI, 'The early phases at Tell Nebi Mend: A preliminary account' (Mathias and Parr 1989). However, as noted, this was a preliminary account and whilst some work continued to be sporadically undertaken on sections of the material, this research was, to a large extent, a re-examination and interpretation of the original material. This included

personal communication with Parr and extensive discussion of the excavation, as well as access to original excavation notes and initial thoughts on stratigraphy by the excavators, as well as such plans of the different phases.

Access to the ceramics and small finds currently located in the archives of the Institute of Archaeology at UCL meant an in-depth study of, and acquaintance with, the original material was possible, in order to gain a better understanding of the finds. Whilst it was not possible to see all the ceramics discussed, since only a selection, albeit a large selection, was brought back to the UK, this research is based on the full ceramic and small find registers made during the original excavations of Tell Nebi Mend.

The discussion of the stratigraphy of the site has been based on a synthesis of the original excavation records and plans, as well as discussions with Parr himself. The interpretation, however, is original. Similarly, with the ceramic assemblage, Mathias' original suggested typology was utilised, since access to all the ceramic material by which to retypologise the catalogue was impossible. This report includes a substantial amount of further description and discussion than the original typology, drawn from first-hand study of a large selection of the material. Research on the charred material and radiocarbons dates was undertaken by Angela Walker at the University of Sheffield, with funding gained by the Homs Region Project based at Durham University. Close personal contact was made and maintained with Walker in order to synthesise her results into the wider discussion of Tell Nebi Mend; again, she worked from original notes and such material as was available in the UK from the excavation. She provided a detailed report designed to aid with this investigation, and to serve as a starting point for future research into the charred remains from Tell Nebi Mend. The material submitted for radiocarbon dating was discussed with Walker and advice on the deposits from her was invaluable, but the final decision on material from which contexts to submit for dating was taken by this researcher.

#### 1.4 Building Phases

There were five distinct "building phases", some within one phase, others encompassing several. The labels were assigned by Parr and Mathias during excavation and post-excavation analysis of Trench VIII.

- Phase 6 "Earliest building phase"
- Phases 7 and 8 "Main building phase"
- Phases 9 to 12 "Intermediate building phase"
- Phase 13 "Yellow Clay building phase"
- Phases 14a to 16 (this could be further sub-divided into 14a/14b/14c, 15 and 16, but generally all one building phase) "Final building phase"

#### Phase 6 - "Earliest EB":

This phase lay directly above the latest Ceramic Neolithic Phase, although with a gap in occupation from the mid-7<sup>th</sup> millennium to the early 4<sup>th</sup> millennium. It comprised a single building or possibly a room within a larger building. This was a mudbrick construction with no footings, foundation trenches or post-holes. Much of the cleared material in the phase was tumble from contemporary and later mudbrick walls. The phase was sealed by the floors of Building II of the next phase.

## Phase 7 - "Main Phase Lower":

Phase 7 comprised two buildings constructed on a noticeable slope and showing indications of rebuilding within the phase. The remains of Building I were particularly ephemeral due to rebuilding in the next phase.

#### Phase 8 – "Main Phase Upper":

This phrase comprised three building structures, which formed the rebuilding and continuation of Buildings I and II from the preceding Phase 7, as well as a third new construction. Two fairly substantial buildings laid out in similar orientation to the preceding phase, with passages in between,

could have been an element in some sort of overall plan in settlement construction, or a layout necessitated by the contour of the slope on which the structures were constructed.

#### Phase 9 – "Intermediate A":

Building I from the preceding period went out of use and was filled with debris, an event which did not necessarily occur in one episode, as suggested by the number of ashy, surface, and broken bricky fill layers. Parr referred to this phase as 'squatter occupation'. The buildings were very fragmentary, although the structures in this phase looked to be more substantial than those of earlier phases, including the first use of stone footings in their construction.

#### Phase 10 – "Intermediate B":

The main building in Phase 10 appeared to follow a similar orientation to that of Phase 9, but with better survival. The walls on the downside slope of the tell were still being reinforced, indicating that the problems of building on a slope were still being tackled in an *ad hoc* manner. Structures in the phase showed evidence of extensive rebuilding, additions and demolitions in a very piecemeal manner as required. Later Early Bronze Age and Middle Bronze Age activity removed and disrupted much of the material from this phase.

#### Phase 11 – "Intermediate C":

Phase 11 was a possible third phase of the buildings in Phases 9 and 10, with additional internal structures and rebuilding and the demolition of several walls.

#### Phase 12 – "Intermediate D":

This was the latest phase of rebuilding within the Intermediate phases, with a floor surface lying 20-30cm higher than that of Phase 11, on top of a bricky fill. Several internal features were excavated, including two hearths, one which reused basalt quern stones in its construction and one which contained many animal bones. A pit cut into a wall and cobbled area contained a baby burial in a

coarse-ware jar. A surface covered with flat-lying sherds marked the clear division of the Intermediate phases from the next 'Yellow Clay' phase.

#### Phase 13 - "Yellow Clay phase":

During this phase, there was a radical change in plan and orientation in Trench VIII, involving the entire area of the trench. The name of the phase referred to an unusually large deposit of light-coloured clay laid across the middle of the trench to a depth of up to 1 metre. Effectively, the deposit levelled up the slope which originally existed as a result of the underlying topography and which had grown steeper with each stratigraphic phase. The orientation of building also changed from northeast-southwest to nearly north-south. The massive deposit was reinforced with two parallel lines of large stones. Phase 13 appeared to be a single period of construction with no occupation structures, rubbish deposition or ashy layers.

#### Phase 14a - "Final, lowest sub-phase (1)":

Occupation in this phase was directly on top of the yellow clay deposit of the preceding phase, with features including various outdoor activity areas, hearths and pits with a variety of fill materials, as well as a small kiln or oven. Post-holes suggested possible temporary structures. All the pits contained wheel-made pottery, a characteristic ceramic form which only appeared from Phase 13 onwards, and which marked a significant transition in ceramic production at Tell Nebi Mend.

#### Phase 14b - "Final, lowest sub-phase (1)":

This phase appeared to be the result of a brief episode involving the burning of material, possibly dung, in a fairly large quantity in a wide, pre-prepared area, potentially a period of industrial process. A wide shallow scoop or depression was filled with a layer of undisturbed, blue-grey coarse ash.

#### Phase 14c – "Final, lowest sub-phase (1)":

Phase 14c comprised accumulations of loose brown earth covering the blue-grey ash of Phase 14b. Various pits, trenches and very rough alignments of stones also featured. A few more substantial walls

were built on foundation stones in deep trenches and were the earliest of the composite building which dominated Phase 15.

#### Phase 15 - "Final, main sub-phase (2)":

Phase 15 comprised a complex building or series of parallel rooms which continued into the main north and south sections. The walls of the structure were constructed in a manner quite different from the earlier Early Bronze Age phases.

#### Phase 16 - "Final, latest sub-phase (3)":

This phase included the continuation of structures from Phase 15, as well as rebuilding and new construction. Rebuilding included the addition of annexes and new hearths and activity areas. What most distinguished this phase was a change in the ceramic repertoire with the coarse-ware present from the earliest phases and the finer wheel-made wares introduced from Phase 13 being replaced with a totally new repertoire of fabrics and vessel shapes.

Phase 16 is the final EBIV phase in Trench VIII; in the next Phase 17, the orientation and building style change along with the ceramics, moving into Early Bronze Age proper material. This phase also marks the extent of excavation in Trench VIII; later Early Bronze Age and Middle Bronze Age material was excavated as part of the Trench I investigation.

#### **CHAPTER 2: STRATIGRAPHY**

#### Note on data

The write up of the stratigraphy of Trench VIII was drawn from Parr and Mathias' initial notes on the stratigraphy as well as the register of contexts which can be found in Appendix I. The original notes were somewhat preliminary, and this report fully synthesises them with additional relevant material to give a more in-depth account of the building phases in Trench VIII. Access to sections and plans assisted the description and interpretation of the stratigraphy as found below. The walls are referred to in the majority by wall numbers, which can be seen on the plans at the end of the chapter. In the Appendix, these walls are described within loci, as they were recorded during excavation.

#### 2.1 Phase 6 – 'Earliest EB' (See Figure 2: Plan of Phase 6)

Phase 6 lay directly above, and in places was terraced into, the last phase of Ceramic Neolithic occupation, Phase 5. Chronologically it is likely that there was a break in occupation from around the middle of the 7<sup>th</sup> millennium BC to the early 4<sup>th</sup> millennium BC cal., with the population at Tell Nebi Mend potentially moving to the nearby site of Arjoune, where the material excavated would neatly fill the gap in occupation at Tell Nebi Mend. Thus the large chronological gap between Phase 6 and the material directly underneath it make logical sense (see Parr, *forthcoming*).

The phase consists of a single building, or room within a large building. Orientated on a northwest-southeast angle, it mirrors walls from the Neolithic occupation levels, most likely explained by the slope of the underlying mound rather than suggesting any continuation of building style. The structure was 5.80m wide and at least 6m long, although there is substantial evidence that the building was in fact longer, and could have consisted of a row of buildings rather than one single structure.

The walls (644 walls 1 and 2) showed construction from mudbrick with no identified stone footings, foundation trenches or post holes. Mudbrick material and bricky fill was cleared from the

area surrounding the structure, and is likely to be tumble from the upper layers. No evidence of roof poles, timbers or brushwood used to support upper walls and the roof was excavated.

The northwest wall (644 wall 1) was terraced into the slope of the underlying Neolithic deposits and, in comparison to the northeast and southwest (644 wall 2) walls in particular, is relatively thin being only one 'brick' wide. The construction material was a very hard, pale yellow clay which had been very carefully laid. The junction between the northwest and southeast walls is missing from photos and plans, but it would appear that the wall projected westwards beyond the excavated end of the northwest terrace wall, suggesting that the building continued and was longer than the excavated 6m. It is also suggested that the northwest terrace wall continued to the northeast, creating a row of rooms.

A clay rimmed, stone lined hearth appeared to lie on the 'floor' of the building (feature 654). It should be noted that there was no actual laid floor, just the ground surface above the Neolithic phase on which the walls of the structure were constructed. It was also notable that not only was there no sign of laid floors, but there was also no material that would constitute accumulated occupation layers. Ash from the hearth spread across this surface (feature 654.6). There was additionally ash from a small pit (feature 654.8) just below the stones of the hearth, and probably associated to an early phase of its use. At c.120cm in diameter, the hearth was large and well-made. If it had been centrally positioned in the structure, the building would have to have been c.5.75m wide and c.9m long. However, it was impossible to tell the actual length of the building due to the inaccessible southeast end and the deep Middle Bronze period pit which cut down to the water table making excavation of it impossible.

Phase 6 was sealed by the floors of Building II of the next phase, Phase 7, which overlaid Phase 6 and also Neolithic deposits lying west of the terrace wall.

#### 2.2 Phase 7 – 'Main Phase Lower (M1)' (See Figure 3: Plan of Phase 7)

Phase 7 comprised two building constructed on a very noticeable slope and showing indications of rebuilding levels within the phase.

#### Building I

The remains of Building I were very ephemeral since the building was all but destroyed by rebuilding in the upper phase of the structure, during Phase 8. However, it was identifiable due to a few offset centimetres at the bottom of a rebuilt wall (605 wall 1), marking a difference between the two phases. This lower phase of Building I was identifiable in the main north section and the adjacent west section (area 705) and south section. In these sections, there are some remains of the lower phase walls and rough surfaces likely to be associated with the structure. In the northeast corner there was a feature thought to indicate an entrance with paving and threshold, marked by a cobbled area (feature 705.54) and a thin mudbrick wall reinforced with stones (705 wall 5). An irregular small pit or hearth which contained some stones was found somewhat off-centre in the structure (feature 608.2). Additionally, the structure also featured a wall-like installation constructed from a very hard orange clay (705 wall 7). Possibly the feature was a flat work area which abutted Building II or could be associated with Building I. It clearly belonged to the lower phase and was later covered over by the accumulation of occupation layers in the alleyway between the two buildings. Later on the awkward slope of the floor was levelled out by infilling the area with distinctly darker material from the Neolithic deposit underlying the occupation.

#### Building II

The lower phase of Building II was better preserved than Building I, probably because it was situated further down the slope on which both were built, meaning the building in the next phase caused less damage. Like the building in Phase 6, the structure was made from mudbrick and clay without stone footings. Additionally, it also cut into the Neolithic deposits underlying the building. A deep Middle Bronze period pit disrupted the line of the wall (705 wall 8), also removing part of a wall of the structure in the northern corner.

The northwest and southwest walls could be seen in the mid-trench north section, situated above the earlier terrace wall. The floor surface, which was dark and possibly ashy, of Building II sealed the material below. The floor of Building II continued to the east, and was also visible in the west and adjacent south sections, in a sequence of buff clay and dark, possibly ashy, surfaces.

Visible in the main south section, walls 3 and 5, the latter of which had been reconstructed with a stone footing by this phase, were preserved to a much greater height without rebuilding. This would imply that they remained in the upper phases of Building II, although may not have been integral to the structure in this later phase, perhaps serving as some sort of annex. Unlike Building I, the floors of Building II were covered with bricky debris, probably associated with rebuilding and tumble, and also with possible indications of interim levelling and surfaces. This was especially visible in the north section.

#### 2.3 Phase 8 – 'Main Phase Upper (M2)' (See Figure 4: Plan of Phase 8)

Phase 8 comprised three building structures, two which formed rebuilding and continuation of Buildings I and II from the preceding Phase 7, and a third, new construction.

#### Building I

Building I consisted of mudbrick walls of which two (605 wall 1 SW side and 605 wall 2 SE side), were laid on an outline row of small to medium stones, with no foundation trench, but headers and stretchers in grey mortar. Both walls were coated on the inside with a thin whitish lime-plaster. The southeast wall (605 wall 2) was truncated by a pit from a later Early Bronze period phase (feature 702.46). The northwest side wall (605.50) interior could be seen in the interim north section and appeared to have been coated with a thicker plaster, possibly of pale clay. The reason the wall did not reach the main north section could have been due to demolition or the presence of a doorway.

The continuation of the southeast wall beyond the pit (feature 702.46) was unclear. It did not show up at all in the main north section (the stones in the section in the lower photo belonged to wall

3 (705 wall 3) of the following Intermediate stage). Erosion of the north section between excavation seasons along with subsequent scraping back showed, however, that wall 6 (705 wall 6) and the nearby cobbled area belong to the preceding Phase 7, whilst wall 5 (705 wall 5), which appeared to be on a lower level, could belong to Phase 8, possibly in the form of a threshold step or supporting ledge associated with Building I.

The northeast wall of the building, which was sectioned very obliquely, was also visible in the section, near to its corner with the southeast wall. On the inner face, plaster was visible, although it was made of yellow clay, rather than lime.

The southwest wall (wall 1) continued to the west beyond the northwest wall. This could indicate that Building I belonged to a row of rooms, although the faces of walls were difficult to find within the adjacent clayey fills. In the adjacent area (613) to the north, a narrow probe along the north section at the very end of excavation in the area, investigated below a later Early Bronze Age building and identified the top of a narrow northeast wall with a return northwest wall with a bluish ash fill. The narrow walls abutted Building I's northwest wall (905 wall 1), and seemed to form an annex, or an internal wall within a northwest extension.

The building appeared to have two or three internal floors. These were laid as thin clay surfaces, with a thickness of c.1cm and alternating buff and black in colour, and significantly they were more horizontal that in the preceding Phase 7. They were best identifiable in the west section and adjacent north section. The floors were laid over an underlying fill level from Phase 7 which consisted mainly of dark brown Neolithic deposits.

The hearth (feature 605.34) associated with Building I was in a roughly central position, just north of the position of the hearth in Phase 7. It was constructed of flat basalt slabs set into a clay rim. Large amounts of ash and charcoal were noted, but no samples were taken.

#### Building II:

Building II underwent a large-scale rebuilding in the upper phase of its occupation. Using the lower-phase wall from Phase 7 as its base, the northwest wall was widened up to one metre across and strengthened by the use of irregular large stones and boulders, in two or more courses. Similarly the northeast wall (705 wall 4) and its corner with the southwest wall (642 wall 3) were also subject to rebuilding following the original course of the lower-phase wall, although on this side of the building, the lower-phase walls of the building survived to a greater height than under the northwest wall. In the south section, the southwest wall (642 wall 3) and the continuation of the northwest wall (642 wall 5) showed no signs of rebuilding. Both the northwest and northeast walls had an extension on the outside constructed from smalls stones laid over and outside large stone footings. Above the stone footings, the wall construction material was alternating red and buff-coloured clay mudbricks.

There was possible evidence of another rebuild of the northwest wall (705 wall 4) in the large stone slab above the mudbrick, with another layer of mudbrick or pisé above it (most noticeable in the section of the Middle Bronze Age pit 730.11). The northeast wall also appeared in the eastern section as a stone footing with a grey surface layer and a further stone and associated layer above it pointing to two or three phases.

The northeast corner was not fully excavated due to difficulties in removing large stones from this depth of excavation. The large stones identified at this level, as well as additionally in later levels, could potentially have been the western corner of a further building adjacent to Building II. Appearing to have left a narrow passage between 60-80cm in width, the passage would have been narrow but usable. In contrast, the width of the "alleyway" running between Buildings I and II was 2.60m wide in the lower Phase 7, and 2.40m in Phase 8; compared to the possible passage, this "alleyway" was more inclining towards being a small street. In the "alleyway" between Buildings I and II, fourteen or more turtle shells were found in a layer associated with the rebuilding of the structures and in a layer of bricky debris. It was not known whether the turtles were from the nearby Orontes, and whether they constituted the remains of a feast, although this seems likely.

Deeper excavation in the area showed large stones lying below the surviving top of the northeastern wall in the eastern section. These appeared to be a later feature, from an Intermediate phase wall or even later. In the eastern half of Trench VIII, the northeastern wall was followed for a short distance but the deposits beyond the excavated length were disturbed by Middle Bronze Age and later activity.

The southeastern wall of Building II was not identified, although possible walls (653 possible wall 7, for example) were noticeable as three courses of stones and some clay which appeared to share a possible surface with the northwestern wall, and also perhaps the lower phase building. However, this feature (feature 653) might alternatively have been part of some internal installation. Interestingly, there was no sign of a hearth in Building II.

#### Building III:

In the southwest corner of the trench, two walls (680 walls H and I) formed the corner of another building, Building III. This construction had, similar to Building I, a white-plaster inner-face to the walls. Building III was lower than Building I due to a dip in the deposits underlying it. It was not possible to tell from the western section whether the structure was contemporary with the lower Phase 7 or the upper Phase 8. Possibly a wall (680 wall Y) abutting the southwards wall of Building I (605 wall 1) may have connected the two buildings, but it was difficult to tell since the connection was destroyed by a later EB deep pit (features 680.7, 680.9 and 680.11).

In short; these were fairly substantial buildings, in particular Building II in the later Phase 8. Both Buildings I and II seem to have had adjoining rooms. Both buildings were also laid out in a similar orientation with "streets" or passages between them. This could have been an element in some sort of overall plan in settlement construction, or a layout necessitated by the contour of the slope on which the structures were constructed.

#### 2.4 Phase 9 – 'Intermediate A' (See Figure 5: Plan of Phases 9-12)

In the northwest, Building I went out of use and the interior of the structure was filled with bricky debris. This did not necessarily occur in one episode, as suggested by the number of ashy horizontal surface and broken-bricky fill layers above. In the western corner of the building, several sloping ashy and bricky layers were laid against the wall stubs. This phase was referred to, by Parr, as "squatter occupation". An irregular pit (feature 607.9) in the area of Building I cuts from Phase 9 through the fill, Building I's floors and right down into the Neolithic levels.

Above Building I and within its western corner were found the large foundation stones of a wall (643 wall 4) which also formed a corner. These walls were truncated to the northeast by a deep Middle Bronze Age pit (feature 730.10) and do not continue to the southeast. Possibly they were robbed out or they were only in place to reinforce the corner of the trench. Either way, as in earlier phases, it is clear that foundation stone footings were used in preference to foundation trenches. Above these foundation stones, some mudbrick remained, and lower down an interior floor surface connected the walls to a wall 3m to the east (possible 653 wall 7). Whilst very fragmentary, these walls represented the most substantial building of the Intermediate phase (comparable in nature to Building II in Phase 8). The only indication of anything more substantial was found in the heavy stones and mudbrick traces to the northeast beyond the aforementioned Middle Bronze Age pit. Whilst it is likely that some of the large stones had fallen, even if none were found *in situ*, they were unlikely to have been moved far and would suggest another substantial structure nearby.

On the south side of 643 wall 4 a small cobbled area was identified which was clearly associated with the wall. It was level with the top of the intervening mudbrick of 642 wall 3 from the preceding Phase 8. This north-south wall was also visible in the main west section between walls 9 and 11 but not, apparently, further south. It appeared to run at a slight angle to the west section, going behind it towards the edge. Since it was within the section, it was only partially planned during excavation and by the time the Trench I south section, which included this section of Trench VIII, was drawn, it appeared to have eroded away.

This north-south wall in the main west section had stone uprights, a probable doorway which ran parallel, although offset, from wall 17 and was apparently a later addition. Its footing of several layers of smaller stones was similar to later walls 9, 10 and 11, although this is not definite. The zigzag layout appeared somewhat odd. The higher levels against the 612/613 wall on its north side included ash layers and a well-laid stone paved area (feature 613). This would make it appear that the area was more like outside deposits than those on the south side (area 610). Possibly it may have been some sort of courtyard area.

The low 604 wall A, situated east of 604 wall 17 and in line with 612/613 wall, had another possible doorway which was marked by two sets of upright stones across its width and paved in between with mudbricks. This led into a narrow room (area 604 north extension) bounded on its east side by wall 10. Wall 10 appeared to be of a much flimsier construction thant 604 wall 17, although it seems likely that it was constructed shortly after since it shared the same occupation deposits. Wall 10, which lay parallel to an unnamed wall to the west, continued straight in a southern direction into the south section. Walls 11 and 9 connected wall 10 with this west wall, which was laid over the Final I A & B deposits with c.20cm of brown and grey material below the stone. The south section was not of much use with the exact sequence of these walls, although the row of rooms bounded by walls 9, 10 and 11 appeared to be annexes added at a slightly later date.

The outer wall 12 could be seen in the south section, apparently as a slightly later construction which ran parallel to the end wall 10 of the row of small rooms. It followed the line of the Yellow Clay Phase 13 bank (cf the Yellow Clay reinforcing wall 13) just inside, and west of its highest part. It was wider than other walls in the same phase, and was footed with larger stones than walls 9, 10 and 11 of the row of rooms. It enclosed a 2m wide "street" or passage (area 603 on the South side, part of 702 to the North). The north end of wall 12 stopped short of the north section, where there may possibly have been some sort of gateway. This was surmised from the presence of two oblong stones laid parallel across the width of the passage-way. Wall 12 passed over a deep pit (feature 702.46) of earlier Final phase (1) although in between there were brown and ash materials. An Middle Bronze

Age pit (feature 702.64) cut wall 12 in the central east-west baulk (so that it was recorded only in the mid-trench North section and was entirely absent from the 702 South section).

The only other wall attributed to the Intermediate A Phase 9 is 705 wall 3. It was built down the middle of the alley between earlier Buildings I and II, on the same orientation of the earlier buildings. The construction was mainly of mudbrick, although the east corner, situated just short of the north section, was reinforced with a few stones. Horizontal bricks on its northwest side were presumably to level up the slope on that side of the wall (705.2). The wall was also discernable in the mid-trench north section, where it was cut by 642 Pit 1 from the later Early Bronze Age. The southwest end of this pit was curiously pointed, possibly because it was overdug as far as the top of the wall. Further south, the wall was not traced, unless it was actually represented in the 680 area A mudbrick (feature 680.43). Alternatively, the southern end of the wall may have been completed razed by subsequent rebuilding. It was noted that the surviving tops of Building I's walls were higher than the base of 705 wall 3.

To the northwest, there was a slight indication in the short north section to the area 605 north extension that, below the 605 wall 15 (which was attributed to the Intermediate B Phase 10), there were scant remains of an earlier wall. It would have rested directly on the débris material which filled Building I. If it had continued further to the southwest parallel to the 705 wall 3, it would explain why the dark ashy layers against the top of the earlier phase walls did extend any further east. This would suggest a building c.6m by 4m, similar to the earlier building plans. Regardless of this, an opposing northwest wall could be expected somewhere in the same general area.

Various other fragmentary remains were excavated along the south of the trench at the stratigraphic level of the Intermediate phase. The uncovered mudbricks and/or stone footings of possible minor walls bore no obvious relation to the walls found further north. They may have belonged to, or have been débris from, separate structures to the south. A 2m-wide probe along the south section was excavated before the grid-plan was established (with theodolite in 1986). The south section was already very deep, therefore making it possible that the alignments of these fragmentary

walls were inaccurate, meaning that they could have been part of the buildings to the north, even if only annexes to these buildings.

#### 2.5 Phase 10 – 'Intermediate B' (See Figure 5: Plan of Phases 9-12)

A better plan could be traced of the similar buildings on the western side of the next Phase 10, Intermediate B. The northwest wall (605 wall 15) was apparently bedded on an Intermediate A phase wall. The parallel southeast wall (702 wall 15) partly incorporated the Intermediate Phase A 705 wall 3, but had to reinforce it on the downside slope. This would suggest that the problem of building houses on a slope was still being tackled in an *ad hoc* manner during this phase of occupation. As in the preceding phases, the main north section cut approximately through the north corner, which was again apparently reinforced or marked by a few stones.

The southwest side of the building was also difficult to trace since the mid-trench north section in this area was largely taken up by the underlying Building I walls to the west and later pits further to the east. In the Intermediate B Phase 10, however, there was a clear plan of a (semi)circular structure which was cut by the main south section (680 walls A and B). These mudbrick walls only remained to a height of 30-40cm, but were proportionately thick and probably the base of a dome or "beehive". The eastern wall B was bonded to 680 wall D, the join being plastered over with a whitish-green lime-plaster. This wall D was either the southwest end of the Intermediate B Phase 10 building described above (which would give it the dimensions of c.4m by 7.50m), with the circular structure being an annex to the main structure, or it incorporated the old southwest wall from the earlier Building I and the circular structure to make a new building to the southwest. Either hypothesis is quite likely since the patchy remains in the narrow probe were difficult to place in successive plans.

The 680 wall E has surfaces in common with wall B, but appeared to be a slightly later addition lying on the same orientation as the building to the north. It would appear likely that rebuilding, additions and demolition of walls and structures occurred in a piecemeal, *ad hoc* manner as was required.

Further east, the building associated with the substantial 642 wall 4, and the large stones to the northeast of it, likely survived from the Intermediate A Phase 9 in use or as a ruin. The connections were interrupted by later pits in the south section. The north section is equally uninformative. Later Early Bronze Age and Middle Bronze Age activity removed almost all evidence eastwards of this area.

## 2.6 Phase 11 – 'Intermediate C' (See Figure 5: Plan of Phases 9-12)

This possible third sub-phase of the same mudbrick building from Intermediate A Phase 9 and Intermediate B Phase 10, still had the parallel walls 605 wall 15 and 705 wall 15, but with the addition of an internal structure represented by a low wall (705 wall 1). This wall was curved with a sloping face on the inside from the (surviving) top towards on an off-centre low point. It was clearly traced in the middle of the trench and at either end in the section (705 western section and the mid-trench northern section where the sloping inner face could be noted even before the wall itself had been found). This structure abutted 605 wall 15 near its (surviving) top. This could perhaps have been the projecting single mudbrick 605 north extension with an associated thin ashy layer.

It should be noted that on the other, northwestern, side of the 605 wall 15 another projecting mudbrick wall continued as a similar level at the same height with an associated ashy layer and another wall (605.44), forming a rough semi-circle. 605 wall 15 may, therefore, have been low or partly demolished at this stage and could have been used as an internal feature in a larger building. A thick layer of bricky fill below the level of the curved wall was identified in the north section.

In the main south section and area 680, the possible wall E was probably contemporary and could even have been a straighter extension of 705 wall 1. Brick in a temporary north section were in line, as well as in stratigraphic agreement, with 605 wall 15, although the width was much greater and it could have been the west corner of the building. Comparisons could be identified with the preceding sub-phase Intermediate B, although the substantial structure had been built over.

Another unusual feature (feature 705.26/607.4) lay just north of 705 wall 1. The feature was round/oval in plan and almost cylindrical in profile, with a maximum diameter of 60cm and a depth of 15-20cm. Its fill consisted of brown earth and stones (c.5cm large), but no ash. An ashy surface associated with wall 1 lay immediately over the fill and was associated with another minor mudbrick wall or internal feature just north of feature 705.6 (705 west section). These installations, which perhaps were situated in a larger building with internal division, looked like the remains of features associated with specialist activities.

A rough ring of stones (feature 642 pit 2, fill feature 642.3) were possibly also contemporary with this sub-phase. It could be attributed to a slightly later phase, but seems most likely to fall within the Intermediate phase, rather than following Yellow Clay phase.

## 2.7 Phase 12 – 'Intermediate D' (See Figure 5: Plan of Phases 9-12)

By the latest sub-phase, Intermediate D, the northwest and southeast walls of the western building (605 wall 15 and 705 wall 15), if still visible and in use, were related to a still higher floor surface which lay above 20-30cm of bricky fill over the curved wall (705 wall 1) of the preceding Intermediate C Phase 11. Near the northern section, a narrow cross-wall (702 wall 14) was identified in plan and in the section. It looked like an internal partition. Next to its southwest side was a hearth (feature 705.33 Western section) constructed of basalt pieces, one of which was possibly a quern fragment, lying in ash and with two ashy surfaces associated with it. In a small area next to the hearth and the wall 14 (feature 702.20), there were many animal bones, including a complete large skull and several mandibles.

On the northwest side of 605 wall 15 there was a small cobbled area (feature 605.11). This ran over the fill covering the previous Intermediate C Phase 11. Just to the south of the cobbles, a small bell-shaped pit (feature 605.10) was cut into the wall and fill down to a previous surface (feature 605.16). It contained a baby burial in a coarse-ware jar (fabric A, most of the rim missing). The cobbled surface included patches of ash and fragments of basalt grinders similar to those used in the

construction of hearth feature 705.33, described above. The surface continued above the burial pit in the western section.

It was also noted that a definite surface (feature 605.9), lay above the cobble surface and 605 wall 15, and included flat-lying sherds. It could also have overlain both walls and probably all Intermediate phase features. Thus it was the final level preceding the following Yellow Clay phase (605 north section and adjoining western section, and 702 southern section).

To the south, 680 walls J and F probably shared a surface (southern section) and related to this final sub-phase Intermediate D. However, no connections to 605 wall 15 and 705 wall 15 could be traced. 680 wall F (50cm high) was at the same level as 705 wall 15 with a similar orientation.

#### 2.8 Phase 13 – 'Yellow Clay Phase' (See Figure 6: Plan of Phase 13)

During the Yellow Clay Phase 13, there was a radical change in plan and orientation in Trench VIII. The entire area of the trench was involved, except the eastern end (east of grid point 1 - 1986). Here the remains of later Early Bronze Age activity are missing, and accumulations from Middle Bronze Age and later occupations follow straight on from earlier Early Bronze Age deposits.

An unusually large deposit of light-coloured clay (similar to the earlier mudbrick material) was laid across the middle of the trench to a depth of up to 1.4 metres at its deepest in the centre of the trench. The extent to the east was unknown due to disturbances caused by later activity. Possibly it may not have extended any further. To the west, it became shallower, to a depth of around 20 centimetres, against the rising slope of the mound below. Effectively, this deposit levelled up the slope which originally existed as a result of the underlying topography, and which had grown steeper with each stratigraphic phase. The deposited material also changed the orientation of the contours from northeast-southwest to more nearly north-south, probably as a reflection of the changes in the shape of the mound upslope. This orientation is preserved in all succeeding levels up to and after the Middle Bronze Age town wall.

The material making up the deposit was yellowish or buff silt or clay, a new material, different to the broken mudbrick of earlier buildings and containing very little bone or ash flecks and very few sherds. When roughly half of the deepest deposit had been laid, and the level raised to roughly the same as the surface at the western end of the trench, the mass was reinforced by two parallel lines of large stones (642 wall, 1/702 wall 13 west and 642 wall 2 east). The western line was no more than one stone deep and barely touching. The eastern line was built up more firmly, with two courses laid crosswise (730 wall 5). Further north, much of the length was removed by deep MB pits (greenish-white plaster floors immediately above were MB). The two lines were about three metres apart, and the stretch in between them was covered by scattered lumps of hard whitish clay, similar to the material use in the bricks of the early terrace wall. This was probably the best available clay from a local source. These lumps were also found, although to a lesser extent, west of the western wall, and something else similar appears beyond the east wall (730 eastern section). Possibly this material was associated with two very large, relatively flat stones stacked one on top of the other. This could have formed part of a buttress, although another Middle Bronze Age pit in the area again removed any definite connection between them.

The central line over the double wall described above, was later raised during the same phase by a further half-metre of silty clay, making this line somewhat higher than the surface on its western side, forming a low bank or rampart. Its eastern profile, however, did not survive, but was presumably a fairly steep slope.

As the profile of the yellow clay deposit was followed westwards upslope, it rapidly tapered out. On the border with Trench I, in area 613 adjacent to Trench VIII main northern section, the bricky/silty layer under the stone footings of the wall was apparently the equivalent of this whole phase. It should be noted that if this was the case, the underlying 30cm of clay surfaces and ashy layers over the mudbrick wall of the annex to Building I on the north side represented the entire Intermediate phase at this point.

The Yellow Clay Phase 13 appeared to be a single episode of construction. There were no occupation surfaces darkened by use and rubbish deposition, and no ashy layers, even on the level where the stones and pale clay lumps were laid.

#### 2.9 Phase 14a – 'Final, lowest sub-phase (1)' (See Figure 7: Plan of Phases 14a-c)

The top of the Yellow Clay Phase 13 left a flat area bounded by a slight bank to the east, a useful space on which various activities were carried out. On the border with Trench I, a circular pit was dug into the underlying clay and lined with stones and white plaster (feature 610.44). It was then filled with an ashy fill (feature 610.45 – radiocarbon and flotation samples), in at least two stages; firstly a clay layer over ash, followed by a further fill of earth, pebbles, ash and charcoal (feature 610.40 – flotation) and then replastered (feature 610.39). This pit or hearth feature had quite large stones arranged on its southwest side to form a cavity, possibly a flue. However, this cavity was, when excavated, blocked by a stone, potentially making it more likely that the feature functioned as an oven or a small kiln.

Additionally, various small shallow pits (features 602.17, 602.18 and 602.21) were also cut into the top of the yellow clay of the preceding Phase 13 further to the east of the feature described above. Feature 602.18 had large potsherds, suggesting that the pits may have contained a whole pot. Embedded beside them were a quern and other associated fragments. A further, smaller pit (feature 602.22) was only noted in the section. Just north of these pits, a small posthole may have been used as part of a temporary shelter. Two more, rather larger, postholes (features 613.28 and 613.33) were identified near the main northern section and would have lain within the corner of the later building there.

A deep pit in area 680 only intersected with the south section in its wider lower levels, but also originated from the top of the yellow clay, therefore marking the very beginning of the Final phase. The pit cut through all earlier Early Bronze Age deposits and well into the Neolithic and contained significant amounts of wheel-made pottery (features 680.7, 680.9 and 680.11). Other deep pits,

'Carl's pit' 1 (feature 642.4, top disturbed by a later MB pit), pit 3 (feature 642.5, visible in the main south section) and another (feature 642.10, also visible in the main south section, the top disturbed by a later pit 4/feature 643.2) were located further east. They were situated in the area of the Yellow Clay Phase 13 bank or rampart, and were dug either at the beginning of the Final phase, or possibly a little later when activities were going on to the west. All the pits contained some wheel-made pottery. The same was also true of the deep double pit (features 702.46 and 702.72); some of the pottery in these joined sherds in respective fills. Pit feature 702.46 was sealed by Final sub-phase 2 wall 12.

### Phase 14b – 'Final, lowest sub-phase (1)' (See Figure 7: Plan of Phases 14a-c)

Phase 14b appeared to be a brief episode involving the burning of some homogenous material, possibly dung, in a fairly large quantity in a wide, pre-prepared area. It could have suggested some period of industrial process in the area. A wide, shallow scoop or depression stretched from the southern end of a later wall (604 wall 17) eastwards as far as the western edge of area 702, although not as far as into the northern extension of area 604. It extended southwards, probably under a later wall (wall 9), but apparently not over the area 680 deep pit. The whole depressed area was filled with a layer of undisturbed blue-grey coarse ash. This material was very distinctive when first dug (feature 604.23; flotation, feature 702.61; flotation, cf. also feature 604.43, mixed with the brown layer above feature 604.22, below walls 9 and 10).

#### Phase 14c – 'Final, lowest sub-phase (1)' (See Figure 7: Plan of Phases 14a-c)

In the final episode of the sub-phase (1) there were accumulations of loose brown earth (eg. feature 604.22) covering the blue-grey ash of Phase 14b. These extended as far as the south section, where there appeared to have been a shallow pit or trench, 25cm deep and with the same rubbly fill which extended in a layer northwards (area 671.3 east section).

A similar brown layer extended eastwards at least as far as a shallow trench running north-south (area 702, so-called "robber trench") with a softer brown fill (feature 702.55). Within these brown deposits, some very rough alignments of larger stones were noticed (eg. feature 702.51). These could have been the remains of ephemeral walls, for example of animal pens with a surrounding ditch. The brown earth and stones did not extend as far as the north section.

There was a substantial wall to the northwest of these brown deposits (604 wall 17). It may have been built in sub-phase 1A, since it appears to have had a foundation trench, at the very least for the large, upright corner stone which cut into the underlying yellow clay and contained traces of the blue-grey ash of (B??). The adjoining east-west wall in area 612/613 was presumed to be contemporary with wall 17. This collection of walls were the earliest of the composite building which dominated the main Final Phase (2) 15.

#### 2.10 Phase 15 – 'Final, main sub-phase (2)' (See Figure 8: Plan of Phases 15 and 16)

This phase comprised a complex building or series of parallel small rooms which continued into the main north and south sections, and also westwards into Trench I, where there was very little excavation of this phase. To the east, nothing survived eastwards of the line of the Yellow Clay bank, although there were many large pits and deposits, mostly from the Middle Bronze Age period of occupation. Most probably, the east end of Trench VIII was simply not built on during the Final Phase 15.

The Final Phase 15 walls were all built in a similar way, although in a way quite different from the earlier Early Bronze Age phases. Irregular medium-size stone were laid, in places quite carefully arranged in two lines of edging using slightly larger stones. The space in between the two lines was filled with more stones, rubble and earth-packing. These footings could have been two to four rough courses high, and carried an upper layer of crude pisé which was often difficult to distinguish from later fills and layers above. However, it did not appear to be preserved to more than 30-40cm high at any point, and in places, was not visible at all. The technique employed seemed to have been used to

permit quite narrow walls to be constructed, and additionally removed the need for the manufacture of large numbers of mudbricks. It was presumed that the outside wall at least was plastered with clay, but evidence for this was only found in one location (area 612, north side).

As in the Final 1A Phase 14, the two walls which formed a corner in the extreme northwest of Trench VIII (areas 612 and 613) were probably the oldest part of the building. Whilst the area excavated was very restricted, in so far as it could be seen, they were laid on, or in places cut into, the Yellow Clay Phase 13 below. It should be noted, however, that in this area, this was barely 20cm thick at most, very irregular and not very easily identifiable (area 613 Western section). One north-south wall (604 wall 17) was particularly robust, with at least three courses of larger stone forming the southeast corner. The lowest course was set on end in its own foundation trench and was over 50cm high (604 temporary west section).

The adjoining east-west wall (area 612 feature 3, continued into area 613) also contained some substantial stones. Under one, clay surfaces were identified running under the stone, which lay deeper than most of the rest of the wall. Additionally the bricky and silty deposits above the surfaces and either side of the small packing stones showed the Yellow Clay Phase 13 to be shallow to non-existent in this area at the western end. The clay and silty layers with a pinkish plaster surface looked the same on either side, suggesting that it may originally have been an interior wall. However, the overall plan of this building was far from clear.

On the south side of 612 feature 3 and the 613 wall, and just west of the corner, a projecting wall was built out some 80cm to what must have been a doorway, marked by an upright stone slab 90cm high (area 612 feature 1). The adjacent pierced stone, possibly a door-socket (area 612 feature 2), may have been a later addition and at a higher level. The threshold south of the upright stone, represent by two lines of stones (610 walls 3 and 4), led to a wall which continued southwards forming a corner with a slightly later wall (wall 11) which ran east. This north-south wall was also visible along the Trench VIII main west section between walls 9 and 11, but not apparently visible any further south. It appeared that it ran at a slight angle to the western section and went behind it at

this point. Since it was in the section, it was only partially planned, and by the time the Trench I south section, including Trench VIII area 610, was excavated and drawn, it had apparently eroded away. It should be noted though, that the lower layers in this south section which sloped downwards towards the west, i.e. against the slope of the mound, must have done so because they sloped up to this wall, and later layers ran over it. This north-south wall in the main western section, with its stone upright and probably doorway, was parallel to, but offset from, 604 wall 17 and looked like a later addition. Its footings of several layers of smaller stones were also similar to the later walls 9, 10 and 11, although this was not certain. This zigzag orientation is somewhat odd.

The higher levels against the 612/613 wall on its north side included ash layers and even a well-laid paved stone area (feature 613). These layers seem more like outside deposits that those on the south side (area 610), suggesting that by this phase, its function may have been that of a courtyard.

A low wall (604 wall A), situated east of 604 wall 17 and in line with the 612/613 wall, had another possible doorway, marked by two sets of uprights stones across its width and paved in between with mudbricks. It led into a narrow room (area 604 north extension) which was bounded on its east side by wall 10. Wall 10 was a much flimsier construction compared to 604 wall 17, but it must have been constructed soon after and shared the same occupation deposits. Wall 10, parallel to the unnumbered west wall, continued straight on southwards into the south section (marked wall 14 on section). Walls 9 and 11 connected wall 10 with the west wall, which was laid over the Final (1A and 1B) deposits. Around 20cm depth of brown and grey material was found below the stone footings.

The south section was not much help with the exact sequence of these walls, although the row of rooms bounded by walls 9, 10 and 11 do seem to be slightly later annexes. An outer wall (wall 12) could be seen in the south section to be a slightly later construction which ran parallel to the end wall 10 of the small rooms. It followed the line of the Yellow Clay Phase 13 bank (cf the Yellow Clay Phase 15 reinforcing wall 13), just inside and west of its highest section. The wall was wider and had footings of larger stones than walls 9, 10 and 11 or the rooms. It enclosed a 2m-wide street or passage

(area 603 on the south side, part of 702 to the north). The north end of wall 12 stopped short of the north section, where there may have been a gateway. Two oblong stones were laid parallel across the width. An Middle Bronze Age pit (feature 702.64) cut wall 12 in the central east-west baulk, meaning that it was disrupted in the section. Wall 12 passed over the deep pit (feature 702.46) of the earlier Final Phase (1) 14, but in between the two were brown and ash layers with stones (features 702.44, 702.45 and 702.47) which extended west of the wall and may partly have pre-dated the small rooms. Some mudbricks were laid over these grey and brown material accumulations within the street. Over them, a thin 'cobble' or gritty layer was laid, which also contained a lot of potsherds (feature 702.22).

Within the small rectangular rooms of the "Final" building a series of features were investigated. A small area of flat but irregular paving stones (feature 680.5), some arranged in an arc (feature 680.2) abutted wall 14. They were lying on banded grey, silty layers which were either the earliest occupation floors of this room, or early Final 1 deposits below the buildings, the former seeming more probable. Parallels are notable with the well articulated stone paving in area 612/613, between the east-west wall and the north section. Nearby, a hearth (feature 600.33) in the south section, consisted of flat basalt slabs with clay, ash and charcoal (feature 600.27).

A circular hearth of blackened stones was found in area 603, just west, and outside of, wall 10. The hearth was covered with ash and charcoal (feature 603.15) resting on clay (feature 603.16) which seemed to be the top of the Yellow Clay Phase 13, suggesting that this hearth may have belonged to the earlier sub-phase Final 1 (c) Phase 14c.

In the next room to the north (area 601/602A) there was another roughly made stone hearth resting on a clay floor (feature 601.15). This floor was early, but not the original floor of the structure.

# 2.11 Phase 16 – 'Final, latest sub-phase (3) Transitional' (See Figure 8: Plan of Phases 15 and 16)

On the north side, possibly the main part of the building comprising the majority of structural material in this phase, the more substantial 604 wall 17 did not show any rebuilding in the north section. Neither did the east-west wall in area 612/613 which lay at a right-angle to it. The western north-south wall 10 of the small rooms was reinforced on the outside with vertical mudbricks at its northern end at some point, and was probably repaired somewhat from the preceding phase.

The continuation of wall 10 (which was marked as wall 14 on the upper south section) was completely rebuilt as wall 8 (in the south section) with stone footings and mudbrick above. The parallel north-south wall further west in area 610 was less clear in the section.

The connecting east-west walls 9 and 11 were rebuilt, as wall 9 (rebuild) and wall 16 respectively. The reconstruction again featured stone footings over the pisé of the earlier wall, which were then topped by more pisé or mudbrick. Between wall 9 (rebuild) and wall 16 at the western end of the room, there was a curved mudbrick superstructure over the stone footings, perhaps the base of a "beehive" dome. A hearth of stone construction was built into the northwest curve of the structure, against wall 16 and the west wall at the back. The eastern end of this (semi?)-circular structure did not survive. There were at least two clay/silt floors within the structure, with ash and charcoal deposits between them (floor features 601.11 and 601.13).

Another hearth, again constructed from stones (up to 30cm long), was laid in an oval or horseshoe shape 60x75+cm located in the northeast corner of the same room. The level of this hearth was not clear, but it seemed to have been excavated at the same time as the mudbricks of the upper part of wall 9 (rebuild?). It was not necessarily contemporary with the hearth (feature 601.10) in the circular structure, nor even the structure itself, but seemed certainly to be later than the Final subphase 2 Phase 15.

Beyond the outer passage, the outer wall to the west (wall 12) did not seem to have been rebuilt. It was clear that the "Final" building complex was rebuilt or repaired, at least in the rectangular rooms or annexes, following the same plan. It was during this architectural sub-phase 3 that there was a major change in the pottery, both to the finer wheel-made wares, which had come in at the beginning of the "Final" phase, and also to the old coarse wares present from the earliest phase. They were all replaced by a different repertoire of fabrics and shapes (originally called "transitional" to EBIV), earlier than the Syrian Calciform corpus, though probably including some precursors of it.

The next architectural phase, Phase 17, had a different plan, though the walls were on the same orientation of roughly north-south by east-west. It was not clear from the remaining Trench VIII stratigraphy, due to a too small and truncated an area of excavation resulting in only short lengths of walls without a coherent plan, when the Syrian Calciform/EBIV pottery proper came in.

Figure 3: Plan of Phase 6 (1:40)



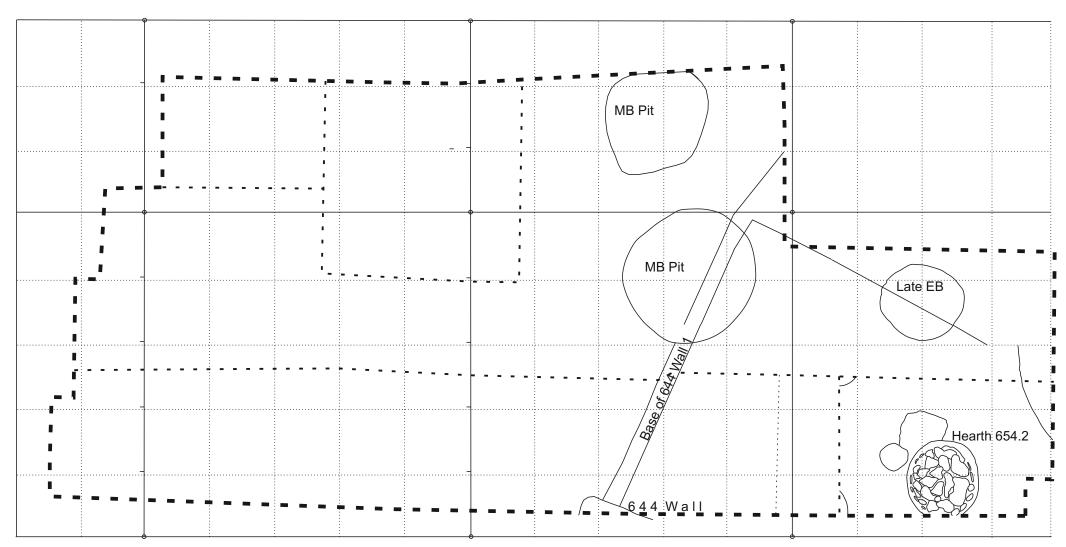


Figure 4: Plan of Phase 7 (1:40)



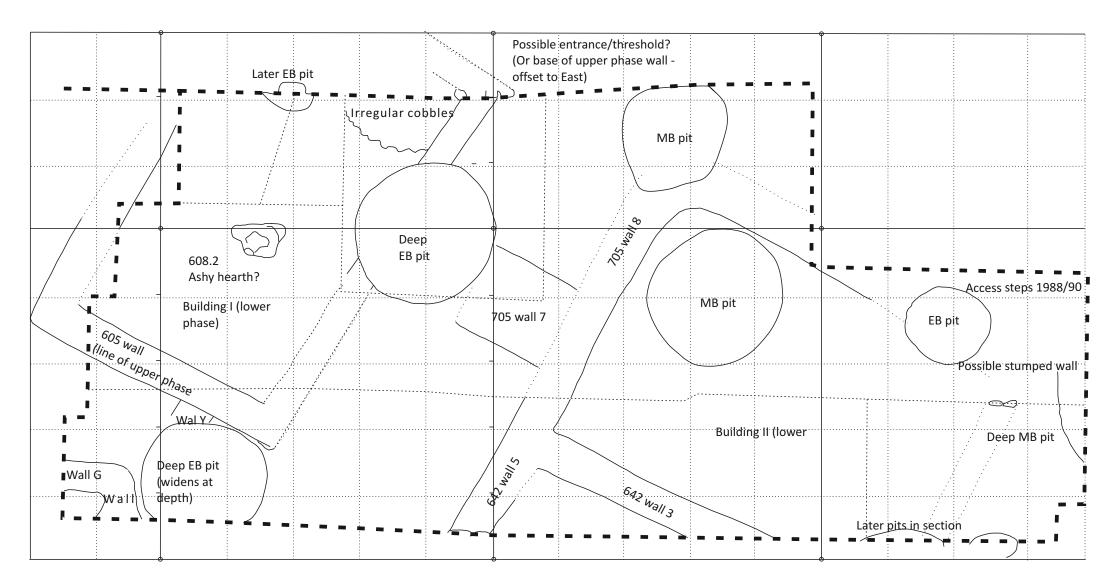
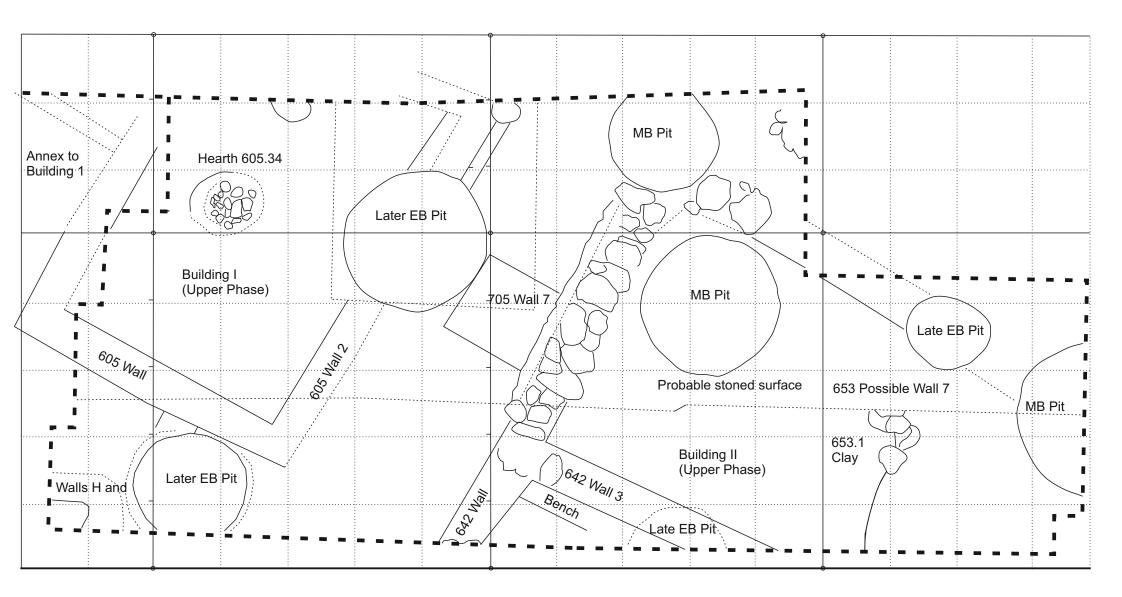


Figure 5: Plan of Phase 8 (1:40)





**Figure 6: Plan of Phases 9-12 (1:40)** 



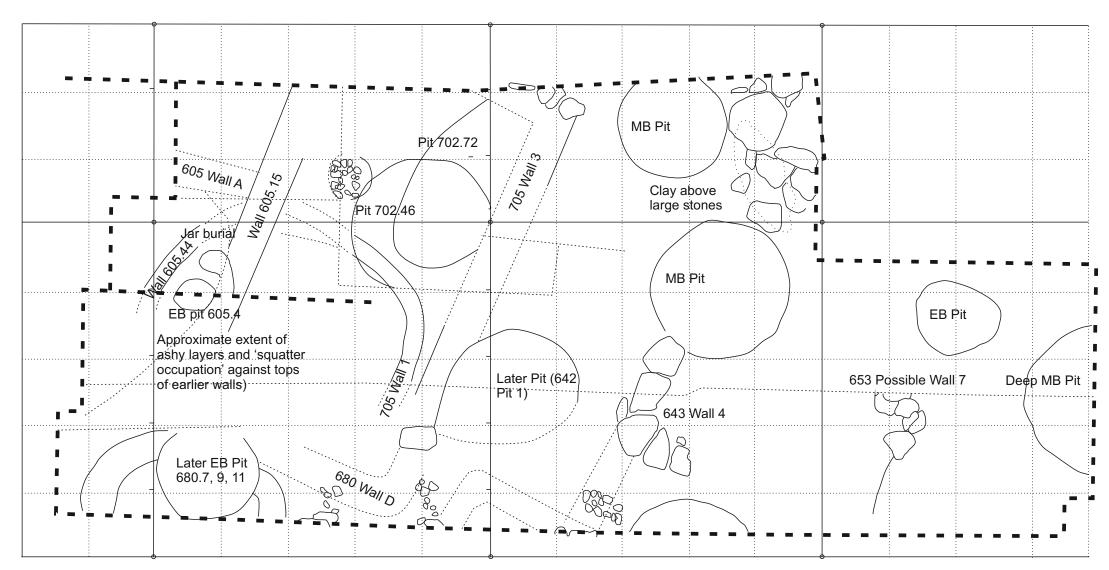


Figure 6: Plan of Phase 13 (1:40)

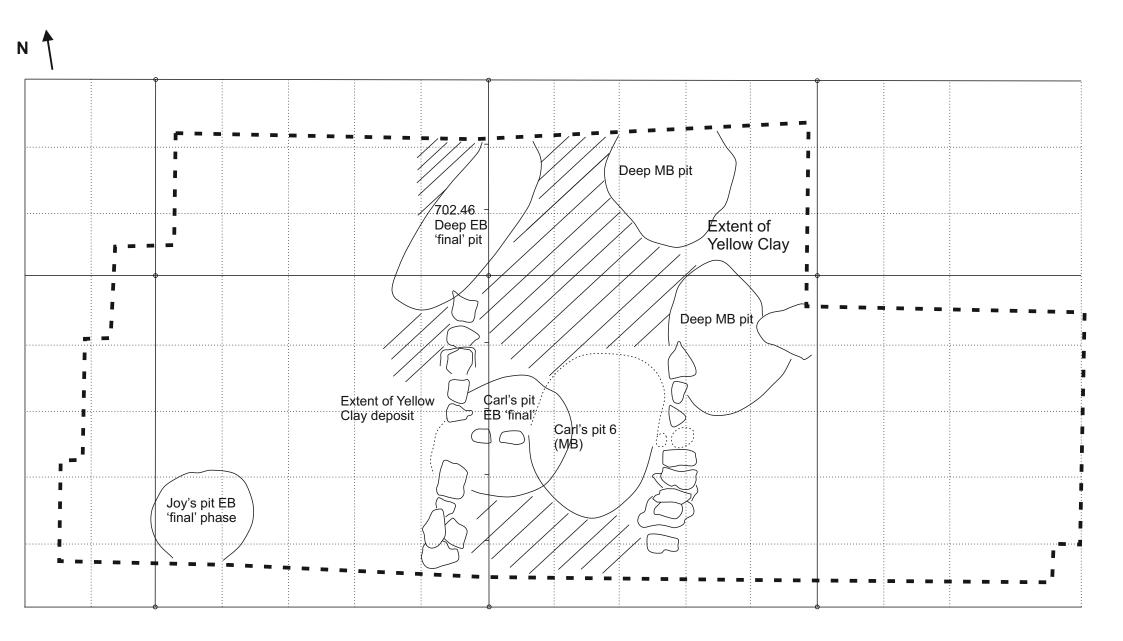


Figure 7: Plan of Phases 14a-14c (1:40)



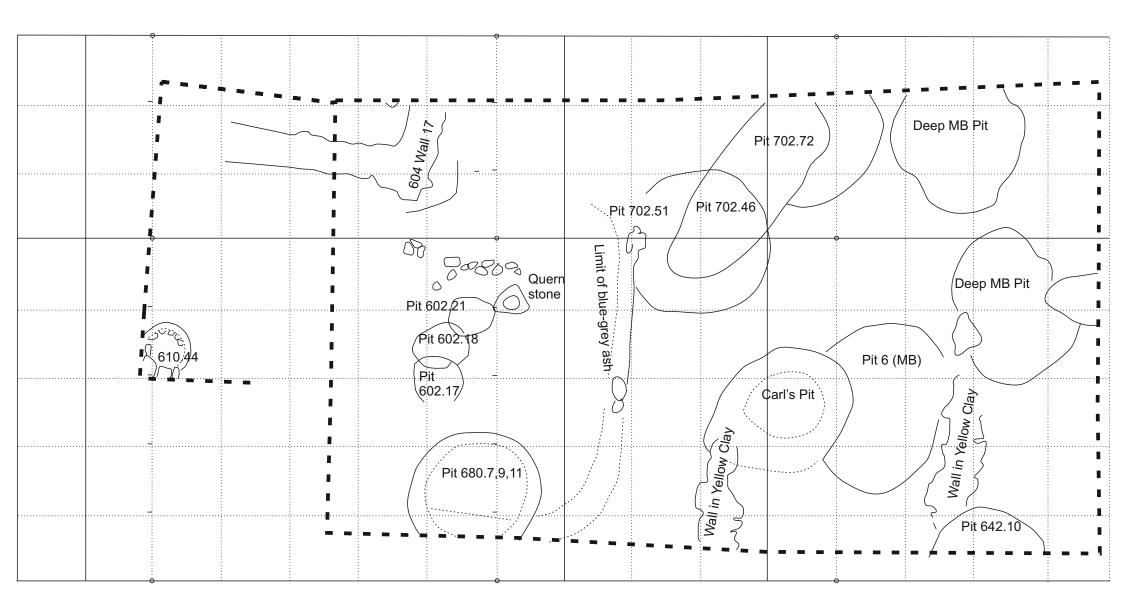
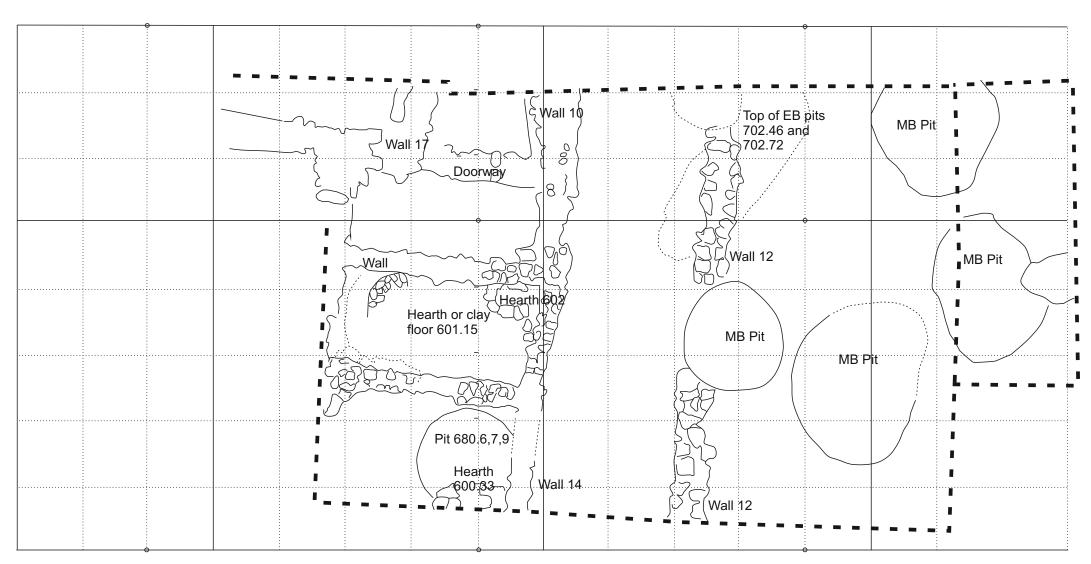


Figure 8: Plan of Phases 15 and 16 (1:40)





#### CHAPTER 3: PLANT REMAINS AND RADIOCARBON DATES

## Note on data

The material discussed is drawn from 15 samples from contexts throughout the stratigraphy of Trench VIII. Samples were chosen for study based on the preservation of the material and on the security and relevance of the contexts; mainly floors and hearths, although two samples were used from pit contexts for their excellent preservation. The size of samples ranges widely, from 2 litres up to 32 litres, depending on what was retrieved during excavation; exact sizes of samples can be found in Appendix II.

## 3.1 Charred Plant Remains Overview

The sampling of botanical material from Trench VIII was done at the point of excavation; samples were sealed in bags on the site from selected contexts throughout all the phases of occupation, in particular more secure contexts including floors and outdoor activity areas, hearths and sealed pit fills (Stephen Bourke, *pers. comm.*)

Flotation samples varied in volume size (from 2 up to 32 litres), due to material available from contexts in site. Typically the volume was between 20-30 litres but where there was a large amount of identifiable material for sampling or where the context covered only a small area, the volume size varied in order to get as much material as possible or to avoid contamination of the samples respectively. During flotation material was sieved through 1mm and 0.5mm sieves; heavy residue was retained from the 1mm sieve. A few samples went through preliminary sorting, the bulk of the work of sorting and identification has been done more recently by Angela Walker (*pers. comm.*, see Appendix II for detail on methods).

## 3.2 Charred Plant Remains Results and Discussion

## Wild weed species

Seeds from weeds made up the largest proportion in all the samples that were studied. In 11 of these samples, weeds comprised more than 30% of the samples, and over 50% in 5 samples. The most common species which occurred are those classed as field weeds; *Androsace maxima*, *Coronilla scorpioides*, *Trigonella astroites*, *Lolium* sp., *Fumaria* sp., *Adonis* sp., *Malva* sp., *Hippocrepis* sp. and *Galium* sp., these all being commonly found in fields and often used areas with dry to dry/damp conditions. These conditions are similar to the modern conditions around Tell Nebi Mend, and suggest that the area around the site was being extensively used for agricultural purpose.

Ethnobotanical comparison (using the principle that the composition of weed seeds change during the processes of crops, and that the by-products as a result of this are influenced by the characteristics of the seeds – see Appendix II for more detailed analysis) demonstrated that the weed assemblage most closely resembled the by-products of the fine-sieve crop processing stage. However, the high percentages of glume wheat glume bases along with barley grains (see below) complicated the results. Walker's reassessment of the crop and weed ratios resulted in the conclusion that, "the presence of barley grains could be attributed to grain generally lost through the processing stages and the presence of glume bases within the samples were evidence of post-processing mixing or represented post depositional mixing" (Walker 2012 pers. comm.).

## Domesticated species

Several cereal crops were identified in the Trench VIII samples, with various between phases and context locations (Walker 2008). The most common crop in Trench VIII was hulled 2-row barley (Hordeum distichum L.), which was present in 14 out of 15 samples. Glume wheat in grain and glume bases, although the latter less than the former, was also present in 11 out of 15 samples – in one sample it accounted for 70% of the sample - but free-threshing wheat (Triticum aestivum/durum) was only identified in 2 samples in very small amount. In samples in which the presence of glume wheat was particularly high, the levels of barley in these contexts was inversely very low.

Analysis on the signatures produced by the two different methods of crops – uprooting and reaping with a scythe or a sickle – suggested that during the occupation of Trench VIII, reaping was the preferred method of harvesting crops. The basis for this suggestion lies in the fact presence of culm material in the Trench VIII assemblage, although its presence was low in frequency. Furthermore, it is suggested that the low harvesting method was utilised. Analysis of the weeds present in various botanical samples demonstrates that the presence and height of taxa including *Adonis* sp., *Coronilla scorpioides*, *Trigonella astroites*, *Fumaria* sp., *Malva* sp. and *Silene* sp. indicate that crops were harvested low down. If this is the case, then it seems likely that the crops grown at Tell Nebi Mend were being used for straw, for fodder or fuel, as well as the harvesting of the grains for consumption (Walker 2012 *pers. comm.*).

The nature of the samples collected make it difficult to draw any detailed conclusion on the methods of harvesting and crop processing used at Tell Nebi Mend during the occupation of Trench VIII. All the samples analyses, from a variety of locations and chronological contexts, reflect the disposal of the by-products of fine-sieving; i.e. this disposal is not limited to a location or phase. However, it is clear that the types of crops being harvested appear consistent throughout the phases of occupation. Walker's analysis confirms Moffett's original suggestion that the presence of hulled 2-row barley grains and glume wheat glume bases in all 15 samples demonstrated that two different types of crop products were being produced from two different crops (1989).

Lentils (*Lens culinaris*) were identified in 8 out of 15 samples and grass pea (*Lathyrus sativus*) in 7 out of 15 samples. A sample form context 702.72 in Phase 14a had the highest proportion of pulses identified, 22%, a significant percentage of these could not be identified beyond 'large legume indeterminate'. This difficulty in identification was down to a lack of preservation, likely due to the conditions in the pit from which the 702.72 context sample came. Samples also contained examples of flax (*Linum usitatissimum*), pistachio (*Pistacia*), olive (*Olea*), grape (*Vitis vinifera*) and fig (*Ficus*) in relatively small amounts, making it hard to say where these plants had been collected for food or alternative uses. However, the presence of products does indicate the potential plants available for use at Tell Nebi Mend. Mouse dung pellets were also identified in 2 samples (702.46 and 702.72), both deep pit fills from Phase 14a.

Lentils, like the crops mentioned above, appear to have been consumed throughout all the occupation phases in Trench VIII. Grass pea, occurring at a lower frequency, also demonstrated this pattern. From Phase 14a through to Phase 16, these pulses became present in larger proportions of the samples than in the samples from the earlier phases. However, in these phases the preservation of pulses was much poorer, making specific identification of some samples impossible. The poor level of preservation could be due to a new method of the processing of pulses, or could be due to the disturbance of the later contexts by the numerous Middle Bronze Age pits and deposits.

Comparison of the Trench VIII material with other sites across central and western Syria suggested that Tell Nebi Mend fitted into a wider pattern of cereal crop harvesting. The closest parallels are identifiable at Tell Afis and Tell Mishrifeh where 2-row barley is also the dominant crop, along with emmer as the dominant glume wheat (Walker 2012, *pers. comm.*). The frequency and proportions of both 2-row barley and emmer, as well as the less frequently present free-threshing wheats, at these sites are similar to the patterns observed at Tell Nebi Mend. Walker concludes that this suggests Tell Nebi Mend was part of a wider common crop husbandry trench in the Orontes Valley (2012, *pers. comm.*).

Comparison of the Tell Nebi Mend material with Tell Qarqur further north in Syria - that is, outside of the Orontes Valley area – shows more differences. At Tell Qarqur wheat is the dominant crop, with barley species at the sites 6-row barley rather than the 2-row barley found at Tell Nebi Mend, Tell Afis and Tell Mishrifeh (Walker 2012, *pers. comm.*).

Likewise, the presence of pulses and grapes at Tell Nebi Mend puts the site into a common pattern with other sites in the Orontes Valley. The frequency and proportions of lentil in particular at Tell Nebi Mend, is similar to the proportions at Tell Afis and Tell Mishrifeh. However, the proportions of grapes and olive are higher at these two latter sites than at Tell Nebi Mend. Furthermore, pea (*Pisum sativum*), common vetch (*Vicia sativa*) and horse beans (*Vicia faba*) found at these two sites have not yet been found in samples from Tell Nebi Mend Trench VIII, although Moffett did identify one horse bean hilum in sample 643.20 (1989, and Walker 2012, *pers. comm.*)

Thus, the analysis of the botanical material from Trench VIII suggests that Tell Nebi Mend has strong similarities with other sites of a similar size and nature in the Orontes Valley, and shows strong differences in crop husbandry and other crop production to sites further afield. It should be note, however, that this analysis is based on 15 samples from the various occupation phases of Trench VIII, each of which represent slightly different locations and contexts. Analysis of more material from other areas of the site could change the conclusions which these samples suggest, as could more samples from other sites in western and central Syria. What the botanical material from Tell Nebi Mend does suggest, however, is that the types of crops, pulses and other species being harvested at the site do not change much over a long period of occupation, reflecting the pattern also noted in the ceramic and small finds assemblages.

#### 3.3 Radiocarbon Dates

Eleven samples were submitted for C14 dating; since two were unable to be dated due to very low yield, nine C14 dates were returned. Along with three C14 received by Parr in earlier work on the project, the dates provide a wide range chronological information across the occupation Phases 6-16 at the site. Of particular interest was the apparent gap in occupation between Phases 12 and 14a, with the apparently intentional levelling up of the slope of the site during Phase 13.

The samples selected for C14 dating came from a range of different contexts judged to be the most secure – this was particularly important in the later levels where many of the contexts were disturbed by later pit cutting and filling – and useful; these included hearths, floor surfaces, sealed pit fills and building collapse deposits (see Table 1) below.

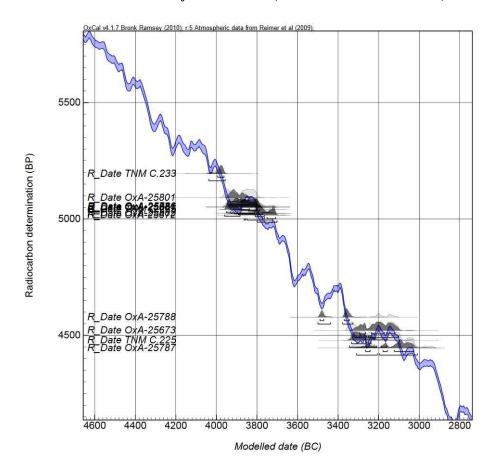
Context	Phase	Context Description	Seeds
605.59	7	Yellow-brown clay hearth and ash of hearthstones	Hordeum sp. (hulled) x2 grains
705.44	8	Thin clayey floors of building I, little pottery, bone, below bricky fill	Hordeum sp. (hulled) x1.5 grains
605.26	9	Burnt, blackish soil, ash, bones, sherds, stones below ash surface.	Hordeum sp. (hulled) x2 grains
605.21	10	Clay surface (of basin?) over silty layer	Hordeum sp. (hulled) x2 grains
705.22	11	Probe in ashy, bricky area west of pit, below ash and walls	Hordeum sp. (hulled) x2 grains
605.19	12	Ash, thicker to East, up to 3 layers on irregular clay surface burnt in situ	Hordeum sp. (hulled) x2 grains
702.46	14a	Deep pit, ashy, bricky fill, much pottery, sealed by wall	Hordeum sp. (hulled) x2 grains
601.12	15	Thick charcoal, between walls 11 and 9, sealed by floor	Hordeum sp. (hulled) x2 grains
702.22	16	Cobble layer, surface between walls 10 and 12	Hordeum sp. (hulled) x2 grains

Table 1: Samples submitted in 2012 with successful C14 dates returned

The results of the C14 dating, along with the dates received by Parr previously, do strongly indicate a gap of at least a couple of centuries between the end of Phase 12 and the reoccupation of the area after the re-levelling of the area during Phase 13.

Phase	Lab Code	Date BP	Standard Deviation
6	NZA 29431 (TNM C.233)	5194	±25
6	NZA 29432 (TNM C.235)	5041	±25
7	OxA-25801	5091	±35
8	OxA-25786	5054	±34
9	OxA-25671	5052	±32
10	OxA-25861	5049	±32
11	OxA-25862	5025	±32
12	OxA-25672	5016	±31
14a	OxA-25788	4578	±33
14	NZA 30348	4479	±25
15	OxA-25673 (TNM C.225)	4521	±30
16	OxA-25787	4445	±34

Table 2: C14 dates from Trench VIII (2012 dates and earlier Parr dates)



The dates provide an invaluable set of data to link the changes in settlement and ceramics (discussed further in the following chapter) to an actual chronology. Occupation at Tell Nebi Mend in the Trench VIII sequence lasted around 600 hundred years, with each identified building phase lasting over several generations. Most importantly, the radiocarbon dates demonstrate that the gap between Phase 12 and the re-levelling of the area during Phase 13 lasted for up to several centuries. At 98% reliability, the gap was 218-449 years; at 68% reliability this is reduced to 220-420 years. In any case, it seems that after Phase 12, the area was left to abandonment. Settlement shifted away from the area, possibly it became too difficult building and re-building on the slope of the tell. Over 200 years later, for unknown reasons, possibly population and settlement growth, the area was levelled out and new buildings were erected. It has been suggested that this resettlement is indicative of increasing urbanism at Tell Nebi Mend; this could plausibly be the case, but is hard to prove definitively.

Besides the gap in occupation and subsequent rebuilding, the long chronology of Trench VIII highlights the strong elements of continuity in subsistence and material culture, the latter of which will be discussed in more detail in the following chapter.

#### **CHAPTER 4: CERAMICS**

#### Note on data

The ceramic material comprised 2538 Early Bronze Age sherds on the ceramic register. Middle Bronze and Roman sherds were disregarded as being irrelevent to the investigation. Quantification was done by calculating the number of sherds of each fabric in each building phase

### 4.1 Ceramics Overview

The ceramics from Trench VIII comprise one of the largest collections of 4<sup>th</sup> and 3<sup>rd</sup> millennium BC pottery currently excavated in Western Syria. The ceramic material from Tell Nebi Mend consists of both fine and coarse pottery. The introduction of the slow-wheel for the use of ceramics manufacture can be attributed to Phase 13 and had a large impact on the nature of ceramic vessels in Trench VIII. The ceramic material was initially typologised by Mathias with contributions to the process by the director of the Tell Nebi Mend excavation, Parr. This typology is well suited to what is a relatively non-complex, easily categorised and relatively site-specific assemblage (Mathias and Parr 1989 and *pers. comm.*). In the course of this dissertation, the typology has been further refined. The typology includes information on both fabrics and ceramic manufacturing techniques within individual categories, rather than requiring two separate typologies for both features. Fabrics are divided into groups A, B, C, D and E; all except Fabric D being relevant here.

Fabrics A and C are attributed to hand-made ceramics present from the early phases of occupation in Trench VIII, which are of a chunky clay material with gritty and organic inclusions. Both fabrics can be linked to the widespread chaff-faced ceramic wares that are found across Mesopotamia and Syria. These are thought to have become so widespread as part of a process of economic development and mass production of ceramics as a result of specialisation and increasingly complex social structures.

Fabrics B and E seem to demonstrate that the settlement of Tell Nebi Mend underwent assumed economic, and probably social, development in the later phases of its occupation. The wheel-

made material, which is associated with a flourishing diversity of vessel shapes as well as apparent architectural settlement change, appears later in the assemblage. Such a development strongly suggests that, by the later occupational levels, pottery production was unlikely to have been predominantly a house-hold activity in which individual families produced the ceramics they needed as and when necessity required. Instead, it is thought that such a method of production was undertaken by specialist, whether full- or part-time, potters who produced all the ceramics needed by a community (Rice 1987).

As an analytical typology, Mathias' system is easy to apply to the assemblage and relatively easy to compare with assemblages from other excavations. On the whole, the typology is solid and very usable, although the sub-types of Fabric E (Fabrics E(a), E(b), E(c) and E(d); all are variants on a generic Fabric E characterised by a lack of mineral inclusion (but with each sub-group exhibiting relatively distinct features) could arguably have deserved their own groups, rather than sub-groups. Additionally the extent to which there is a spectrum of material between Fabrics A and C and, later in the sequence, between Fabrics B and E is hard to assess within the typology, leading to a blurring of identification of sherds in some cases. Accepting Mathias' typology without revision obviously implies that subjective differences in interpretation must be overlooked, but equally, acceptance of it has not just been dictated by the time outlay necessary for the entire revision and new typology of a ceramic assemblage, but more by an appreciation of the fabrics and forms identified by Mathias and their innate usefulness in comparison with other ceramic assemblages from Central Syria.

More complicated, however, is the difficulty of comparing other published assemblages from sites across Central Syria, all of which utilise, to a great extent, their own unique and assemblage-specific typologies. The myriad of different names and descriptions for what are potentially very similar types of fabrics and vessel types is initially quite daunting, although perhaps also rather inevitable in an area where relatively few excavations have been undertaken, in a large part due to the data being sealed under thick later deposits (Gianessi 2002: 83). Excavations which have taken place lack, as yet, research dedicated to comparing them with contemporary settlements in the region. However, on closer inspection of the descriptions from different sites, it becomes apparent that there

are easily identifiable characteristics which are applicable across the whole region, and adequate recording of vessel profiles and standard shapes means that comparison of vessel features is somewhat less difficult than it might initially appear.

## 4.2 Fabrics

## Hand-made Pottery: Fabrics A and C

These categories cover all the hand-made pottery, the production of which continued even after the introduction of the wheel. Both fabrics are variants on the chaff-faced ware with organic inclusions found across a wide expanse of the Near East and associated with an economic development linked to mass production and specialisation of artisans.

**Fabric A** is characterised by a coarse, hard-fired fabric of a dull, dark red colour and, generally, with a grey or black core. The fabric includes up to 50% grit temper. Such mineral inclusions are generally gabbro, quartz, iron ore, chert, marble and iron pellets, the like of which are often found in limestone. Additionally some vessels include an amount of vegetable temper, and sometimes shell. The surface of the fabric is only very lightly smoothed, although often vegetable and shell impressions can be identified. Very occasionally sherds have a light buff wash or slip. Most examples of blackened vessels of this fabric are blackened on the interior rather than the exterior. Vessels made in this fabric are exclusively hand-made flared-rim jars in a variety of sizes.

**Fabric C** is similarly used for hand-made vessels and, whilst also coarse like Fabric A, is differentiated from that fabric by being a finer clay, lower fired and softer. It is made from a carbonate-rich clay, ranging from light buff through orange to light red, usually with a grey core. The few inclusions, varying between 15-20%, are most often quartz and marble, shell and vegetable temper. The surface of the fabric is, on the most part, roughly burnished. Later material shows some traces of red slip and paint on the exterior. Large, shallow bowls and some flared-rim jars, similar to, but smaller than, the Fabric A examples, are most commonly made from this fabric.

## Wheel-made Pottery: Fabrics B and E

Ceramics in these types are all wheel-turned and noticeably finer, both in fabric and manufacture, than the previous two types. In addition to being manufactured from a finer fabric than the earlier Fabrics A and C, vessels made from Fabric B and E have a white, cream or beige slip which varies in intensity and quality of application.

Mathias describes Fabric B as a "medium" fabric which occurs most often in a brick-red colour, although it also appears in a reddish-buff colour. Well-fired and porous, the inclusions in the fabric are very fine vegetable matter, shell and grog, with some quartz and feldspar. The fabric most often occurs with a white-cream chalky slip or wash on the exterior surfaces. Although the attributes of this slip, notably its chalky nature, means it is not well preserved on all sherds identified as Fabric B, where it is present it appears that the application of the slip or wash was relatively thick. The fabric is used for medium-sized jars characterised by a short, outward rolled rim with rilling and striations on the interior, the majority wheel-turned. However, examples of shallow bowls made from this fabric have also been found. A few examples of much larger, thicker vessels still distinctively manufactured from Fabric B also occur. Additionally, there are variants on this fabric which are cream- or greencoloured, distinctly more brittle, grainier and more porous, often with dark mineral inclusions and a pink slip or wash. Despite a majority being wheel-turned, there are some examples of pots made from Fabric B which seem distinctly hand-made, often the grittier, less fine variants noted above. It could be argued that these variants should be considered as a different fabric, although it could also be attributed to the result of over-firing and differing surface treatment on a minority of Fabric B sherds. A different fabric was not created in this report, since the variants did not share enough similar characteristics to constitute a new fabric set among themselves, appearing more like abberations in the general Fabric B corpus.

**Fabric E** is used for fabrics with no obvious organic inclusions, all manufactured on a slow wheel. The general category is split into four sub-categories; Fabric E(a), E(b), E(c) and E(d). Fabric

E(d) occurs alongside Fabric B from Phase 13/14 onwards, whilst the other three Fabric E categories only begin to appear after Phase 16, replacing Fabrics B and E(d) entirely (see more discussion below).

**Fabric E(d)** is the finest fabric identified up to Phase 16. McIntyre has suggested that the similarities that Fabric E(d) shows to Fabric B could be attributed to the fine sieving of the clayof the latter to produce the former (1994). The fabric is generally thin, well-fired and ranges from buff through to light brick-red. Jars exclusively have a cream or pale pink slip on the exterior with barely noticeable vertical burnish strokes, likely to have been utilised to secure the slip on application. Bowls manufactured from this fabric generally have radial burnish on the interior, probably for decoration rather than to serve any practical manufacturing process. The fabric is also used for similar vessels as Fabric B – necked and rolled-rim jars and shallow open bowls – but on a smaller, finer scale. A few bowls made from this fabric have identifiable wick marks, suggesting a potential primary or secondary use as lamps.

Petrological analysis undertaken by McIntyre, whilst on a relatively small-scale – ten sherds from each of the four fabric categories were analysed – confirmed the fabric type divisions (1994). Additionally, the results also strongly emphasised the consistency and absence of development within the Fabric A and C categories through Phases 6-16.

The three later Fabric E sub-categories are all mineral-tempered, thus their inclusion in Fabric E. **Fabric E(c)** is 'clinky' and relatively finely made with a pink or grey colour. The fabric is almost exclusively found in cups, goblets and fine jars in a typical Early Bronze Age calciform type. **Fabric E(b)** is less fine that Fabric E(c) but similarly light coloured and used typically for jars with combedband decoration. The fabric also appears in darker red for jars with a flared rim quite similar to the early Fabric A jars, including a cream slip in some cases. **Fabric E(a)** is used exclusively for large storage jars and is predominantly buff or light red coloured. Vessels in this fabric are not especially common.

## Neolithic Pottery: Fabric D:

Based on fabrics and manufacture techniques, this fabric category was reserved for any ceramics which appear to be Neolithic and which most commonly occur in the assemblage where the excavation reached Neolithic occupation levels, or where Neolithic material had been reused in later building phases. Given the position of Trench VIII on the very edge of the tell, the reuse of Neolithic material to level up later occupational levels is not surprising, and was easily identifiable due to the distinctively dark colour of the Neolithic levels. The Neolithic levels of occupation in Trench VIII are discussed in a separate volume (Parr, forthcoming and *pers. comm.*).

## **4.3 Vessel Shapes (see Plates 1-5)**

The most commonly occurring vessels are Fabric A jars. These are generally medium to large jars with flared rims (See Illustrations 19-22 on Plate 3). Whilst the majority appear to be globular or ovoid in body shape, a few very flat and thick sherds would indicate that there were a limited amount of much larger versions of this vessel shape, also in Fabric A. There is only one example of a flat base, making it almost certain that most had rounded bases. From Phase 6 right through to the material of Phase 16, there is much the same variety of rims in similar proportions (see Illustrations 1-3 on Plate 1 and Illustrations 25-27 on Plate 4). All are flared, but occur in short and long, thick and thin forms. Additionally, there are also examples of variations on the basic flared rim type. Sharply cut rims and longer, thicker rims which do not taper occur in small numbers. These very common and long-lasting jar shapes do not disappear until after Phase 16, when an entire new corpus of material is introduced in Phase 17.

This long-lasting "conservativism" in manufacture and design is also evident in bowls manufactured from Fabric C, vessels which are also common throughout Phases 6 to 16. As with the Fabric A jars discussed above, given that the majority of these bowls have rounded bases, it seems likely that this was the norm (see Illustrations 7-18 on Plates 2 and 3). It should be noted, however, that these proportions may be slightly skewed due to some flat body sherds being almost

indistinguishable from rounded bases. An element of variety is evidenced by one ring or pedestal based from Phase 13 and a few flat bases in Phases 14a through to Phase 16 (See Illustrations 16-18 on Plate 3). This could also be attributed to the introduction of Fabrics B and E(d) and the associated experimentation with new shapes, which may have affected the production of Fabric C vessels to a minor extent.

There are two main vessel shapes associated with Fabric B. Medium-sized jars were manufactured with a variety of neck types; straight, flaring and vestigial, with rolled rims. The vast majority of bases are rounded, with only one identified disc base found in the entire assemblage. The second vessel type manufactured from Fabric B is shallow bowls, one example of which has interior radial burnishing. A few examples of tentatively named flat lids were also identified among the Fabric B sherds, although it is also speculated that these may have been flatter body sherds from unusually large vessels, or rare flat bases.

The use of Fabric E(d) is reserved for small jars, juglets and handle-less bottles, by far the finest vessels in the entire assemblage. These vessels feature straight and flaring necks varying from narrow to quite wide, with rims which are on occasion rolled or slightly thickened (see Illustrations 32-35 on Plates 4 and 5). The majority typically feature spaced vertical burnishing on the light-coloured fabric. It is uncertain whether this was functional or decorative, or whether the fragmentary nature of the burnish is simply due to heavily worn surfaces. The small jars vary from tall and slender to ovoid and round. Bowls in Fabric E(d) are either hemispherical or shallow with a straight rim and round base. The one exception to this is an example of a concave base from Phase 16. Fabric E(d) is particularly interesting because, as the use of the fabric increased, so too did the variety of vessel types manufactured from it. The fabric was used for a wide range of variants on basic standard shapes, more so than any of the other three fabrics, which remained somewhat conservative in their variation on vessel shape.

#### 4.4 Discussion

	Neolithic	Fabric A	Fabric C	Fabric B	Fabric E(d)
Phase 6	33.3% (7)	28.6% (6)	38.1% (7)	0.0% (0)	0.0% (0)
Phases 7&8	17.9% (10)	46.4% (26)	35.7% (20)	0.0%	0.0%
Phases 9-12	9.6% (14)	47.3% (70)	43.2% (64)	0.0%	0.0%
Phase 13	3.7% (3)	44.4% (36)	37.0% (30)	7.4% (6)	7.4% (6)
Phases 14a/b/c	7.4% (85)	37.6% (205)	21.4% (178)	12.2% (145)	21.4% (178)
Phases 15&16	2.8% (15)	33.2% (324)	6.5% (34)	22.1% (186)	35.5% (340)

Table 3: Proportions of ceramic material of the four fabric categories by composite building phases

The distribution of the various fabrics described above throughout the building phases of Trench VIII is distinctive and of much interest, especially when viewed alongside the most obvious changes in architecture and settlement pattern at Tell Nebi Mend. As noted in Chapter 2, the crucial phase for wide-spread and large-impact change in Trench VIII is Phase 13. This change is reflected in a radical change of building plan, architectural style and, arguably, settlement use. Additionally, and of crucial importance when arguing for an entirely new phase of social norms and activities at Tell Nebi Mend from Phase 13 onwards, is the change which occurs at the same point in the ceramic assemblage of Trench VIII. In Phase 13 Fabrics B and E(d), two entirely new and unprecedented fabrics, were introduced. These new fabrics were used to facilitate a vastly expanded collection of new vessel forms. However, these new fabrics did not, it is interesting to note, *replace* Fabrics A and C. These two earlier fabrics, Fabric A in particular, continued to be used in parallel with Fabrics B and E(d) right through to Phase 17 when all four fabrics were entirely replaced by a new corpus of vessel fabrics and shapes.

During Phase 6, the earliest phase of occupation in Trench VIII, Fabrics A and C made up 66.7% of the ceramic assemblage between them (Fabric A; 28.6% and Fabric C; 38.1%). The remaining assemblage was made up of Neolithic ceramics (33.3%). The presence of Neolithic ceramics in demonstrably non-Neolithic occupation levels can be attributed to the occupation of Phase

6 being, as mentioned, directly above the last occupation layer in the Neolithic levels of Trench VIII. Normally it would be expected for Neolithic material to drop entirely out of the assemblages in later phases or, if remaining, to remain negligible volumes. However, the situation in Trench VIII is somewhat more confused due to the location of the trench on the very edge of the tell. In all phases up to the large-scale levelling of the area during Phase 13, material dug from the Neolithic layers was excavated and redeposited in order to re-level areas for building and occupational activities. In phases post-Phase 13, there remains a certain amount of Neolithic material due to extensive excavation of very deep pits. As such, whilst the evidence would suggest the presence of Neolithic material during some phases of a significance which seems unlikely, in reality this can be easily explained by the nature of material use and redeposition throughout the phases of Trench VIII.

As noted above, Fabrics A and C make up the major proportion of material from Phase 6, similarly, the two dominate Phases 7 through 12 as well. As Table 1 above demonstrates, Fabrics A and C occur in relatively similar proportions, although the there is a slightly higher proportion of Fabric A than C, a trend which continues beyond Phase 13, during which the gap becomes even larger. It has been previously noted that both Fabrics A and C continue to be utilised right up until the whole-sale change in ceramics post-Phase 16. The volumes in which they continue to appear is, unlike the previously discussed Neolithic material, too high to merely be residual. What is most interesting, however, is the relative proportions in which they still occur. Fabric A, in fact, drops only very slightly in proportion. Indeed, there is a higher proportion of Fabric A material in Phases 14a through to Phase 16 than in Phase 6 when the fabric was one of only two being used. Thus it is clear that, despite the introduction of wheel-thrown vessels made from two new, finer fabrics, the inhabitants of Tell Nebi Mend still used Fabric A as much as they ever had. This continuity is interesting and will be discussed at more length later, but a plausible explanation might simply be that the inhabitants of Tell Nebi Mend simply had no need to replace a perfectly adequate corpus of cooking wares, but that some social development made the up-take of a new type of ceramic for dining and presentation necessary.

The proportions of Fabric C sherds in levels post-Phase 16 and the introduction of new material, on the other hand, show a different trend. Whilst this fabric was apparently still being utilised right up until Phase 16, the production of vessel from this fabric radically dropped following the introduction of Fabrics B and E(d). From consistently representing over a third of the assemblage up until Phase 13, this presence rapidly declines to less than 10% of the assemblage by Phase 16. In comparison, Fabric A made up a third of the assemblage in this final phase, indicating very different preservations of fabric use after the introduction of Fabrics B and E(d).

A brief investigation of the exterior surface blackening of Fabric A and C sherds can help explain the continuation of both fabrics, the likely change in use of such vessels and the huge drop in presence of Fabric C vessels compared to the consistently high proportions of Fabric A sherds. As described below, Fabric A vessels were, generally speaking, medium to large jars and cooking pots, whereas Fabric C was used more for small jars and bowls. This is also an important distinction to note. In the earlier phase of Trench VIII (that is, Phase 6 through to Phase 13) the volume of sherds with blackened surfaces due to exposure to high temperatures and fire remained relatively low, which would indicate a domestic use such as cooking, rarely exceeding 10% of the total assemblage. However, from Phase 14a onwards, this number triples, indicating that a higher proportion of Fabric A and C vessels were being used for cooking. The majority of these, due to the declining number of Fabric C vessels, were manufactured from Fabric A.

The most likely explanation for this is that during Phases 6 through to 12, Fabric C was the main 'dining', or presentation ware making up the ceramic assemblage, with Fabric A vessels being used for storage and cooking as well as, to some extent, additional dining ware. However, the introduction of Fabrics B and E(d), which were much finer and used to create more intricate and specialised vessels, meant the introduction of a new type of dining ware. Thus the main function of Fabric C vessels were replaced, explaining their dropping out of the assemblage, but, as cooking and storage vessels were still required, Fabric A continued to be utilised for such vessels since no new fabric was introduced to replace it. Presumably, Fabric C's use in producing larger bowls and platters than Fabrics B and E(d) ensured its continuation, albeit in much lower quantities. The shift in use of

Fabric A from general fabric with a relatively wide applicability to variety of uses, to one more focused purely on storage and cooking would explain the increase in the proportions of blackened vessels.

As has been already briefly discussed, Fabrics B and E(d) do not appear in any meaningful quantity prior to Phase 13. Negligible amounts which are identified as having been excavated from Phases 6 through to 12 came exclusively from pits dug during later periods of excavation and merely represent later disturbance of early layers. Aside from the pit-excavation activity which can be expected at any settlement, Trench VIII's situation on the very edge of the tell further increases the likelihood and effect of this type of disturbance. Both fabrics appear in Phase 13, although given the nature of this phase as a single episode of deposition with no occupational activity, and the low volumes in which they occur, it seems likely that the vessels excavated in this phase can actually be more accurately described as belonging to Phase 14a onwards.

Nonetheless, it is certain that the introduction of Fabrics B and E(d), and the wide new range of vessel shapes that their use facilitated, can be associated with the large-scale changes which occurred during Phase 13. Both fabrics increase in proportion of the total assemblage during Phases 14a through 16. Fabric E(d), however, is the more predominant and was used for an increasingly large variety of vessel shapes. Whilst there was a similar increase in the variation of vessels manufactured from Fabric B, this did not match the large range of vessel shapes made from in the finer Fabric E(d).

#### The transition to Phase 17

All four fabrics disappear almost entirely after Phase 16, to be replaced by those described above; E(a), E(b) and E(c). These three fabrics represent the entirely new corpus of material introduced in Phase 17. Where sherds identified as fabrics E(a), E(b) and E(c) occur in phases earlier than Phase 17, these can again be attributed to later pit disturbance since they occur in negligible amounts and in contexts which can demonstrably identified as contaminated by later activity in Trench VIII.

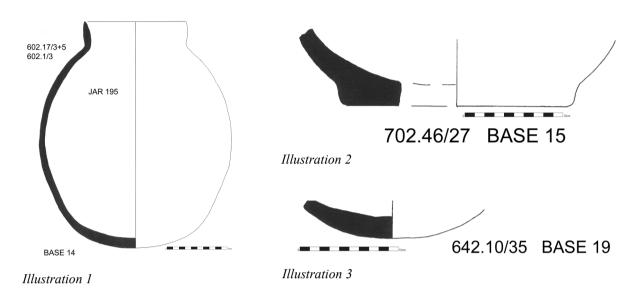
Within the new pottery assemblage characterising Phase 17, new fabrics and vessel shapes appear which are entirely unprecedented in the earlier phases. Such vessel types include jars with flaring necks and drooping necks; jars and deep bowls with rolled rims; narrow-necked, turtle-shaped small jars; large, shallow bowls with inturned, rolled, folded and pinched rims burnished on the interior and exterior; and proper jar handles, even on apparently hand-made vessels, ranging between round, oval and flattened in shape. Flat bases are far more common in this phase.

The ceramics from Phase 17 are, as well as being of a significantly finer quality, more highly decorated. Common surface treatments are burnishing on the interior and exterior of vessels, sometimes with simple patterns in the burnish; and combing, either in a random pattern over the entire exterior and hand-made vessels, or in lightly combed bands, vertical and horizontal, around the neck and shoulders of finer vessels.

Interestingly, what appears to be a possible variant on the Fabric A of Phases 6-16 continues to be used for large jars in a more traditional form with flaring rim. However, in Phase 17 the fabric is significantly better finished and fired, with the upper parts of the vessels being slow-turned and with a variety of new rim shapes being manufactured.

PLATE 1:

Base types which occur throughout all Trench VIII building phases (Phases 6-15): 14, 15 and 19



Base types which occur from Phase 13 onwards (ie. after the Yellow Clay transition): 2, 6, 26 and 29

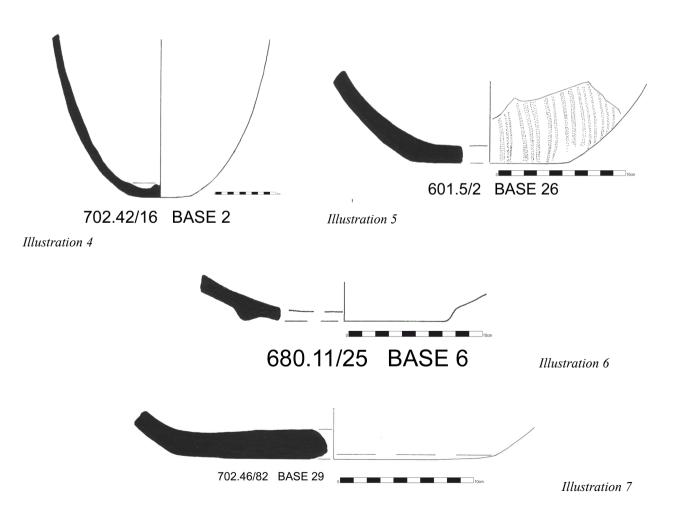
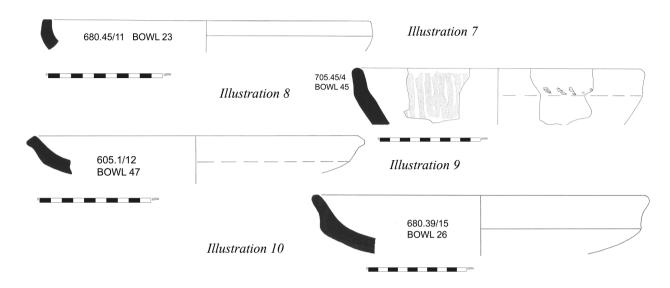
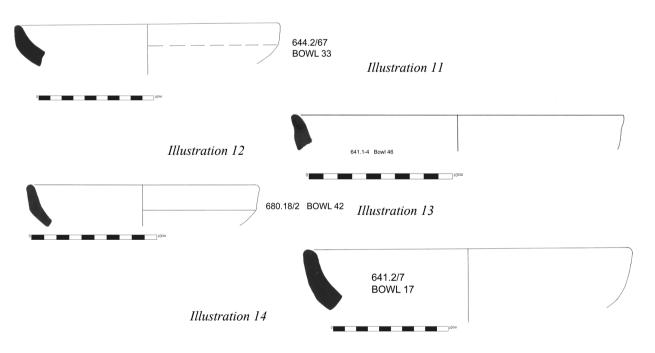


PLATE 2: Bowl types which occur only in pre-Phase 13 phases (Phases 6-12): 23, 26, 45 and 47



Bowl types which occur throughout all Trench VIII building phases (Phases 6-16): 17, 33, 42 and 46



Bowl types which occur from Phase 13 onwards (ie. after the Yellow Clay transition): 10, 13, 16 and 41

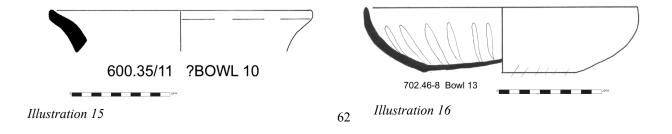
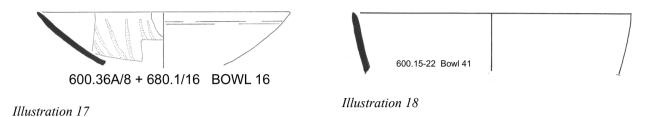
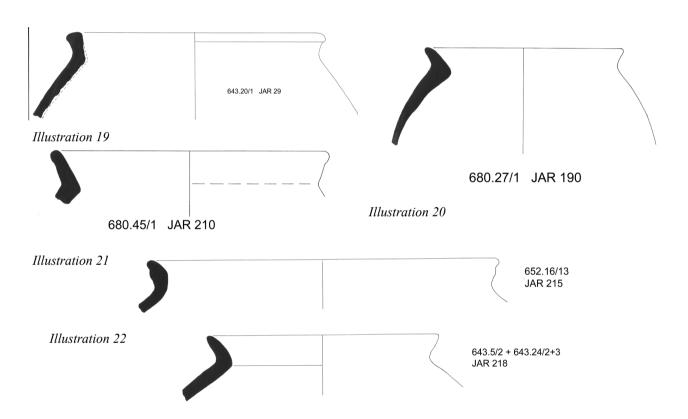


PLATE 3:

Bowl types which occur from Phase 13 onwards (ie. after the Yellow Clay transition): 10, 13, 16 and 41



Jar types which occur only in pre-Phase 13 phases (Phases 6-12): 29, 103, 190, 210, 215 and 218



Jar types which occur throughout all Trench VIII building phases (Phases 6-16): 61, 188, 198 and 208

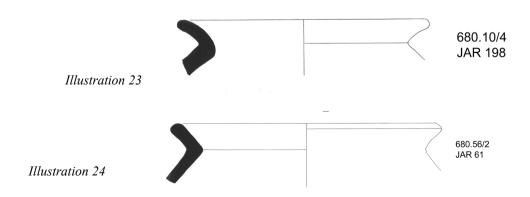
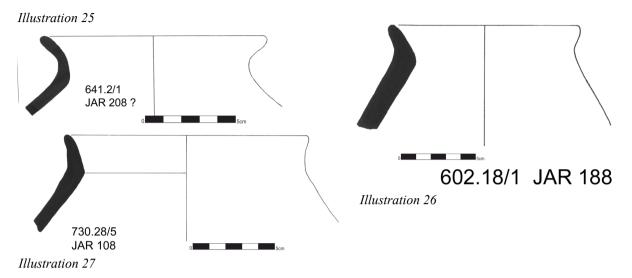
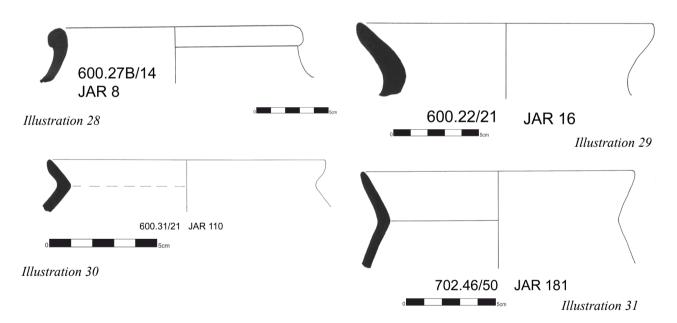


PLATE 4:

Jar types which occur throughout all Trench VIII building phases (Phases 6-16): 61, 188, 198 and 208 (cont.)



Jar types which occur from Phase 13 onwards (ie. after the Yellow Clay transition): 8, 16, 110 and 181



Jar types which occur in Phases 15 and 16 only: 15, 46, 177 and 262

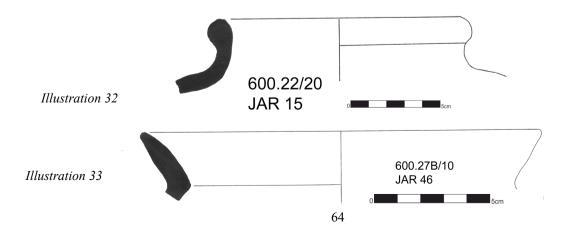
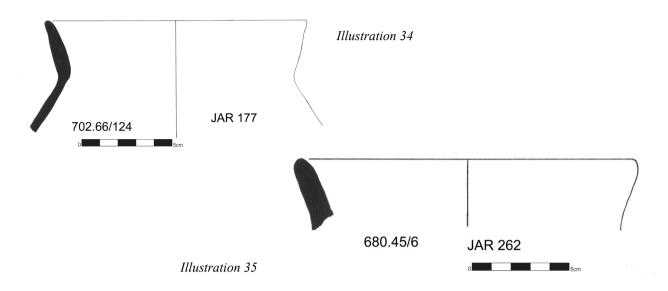


PLATE 5: Jar types which occur in Phases 15 and 16 only: 15, 46, 177 and 262 (cont.)



### **CHAPTER 5: SMALL FINDS**

### 5.1 Phases 6-16 Small Finds

There are a total of 118 registered small finds from the Trench VIII excavations; however, over a third of these came from later pit fills and their contexts have been identified as Middle Bronze or Roman. Thus, 70 of the registered small finds are from Phases 6-16. The number of small finds rises significantly from the post-Phase 13 levels, shadowing the same pattern amongst the volume of ceramics in these levels. This would suggest more intensive occupation of the area, something which the different natures of the building in the area – pre-Phase 13 this is more ephemeral; after Phase 13, the buildings are larger and much better built.

The majority of the artefacts are ground stones although there is a significant number of bone tools, both types of items are used throughout the occupation phases without much stylistic change, although damage to many of these artefacts make this difficult to compare. Small finds were recovered from locations internal to buildings as well as external activity areas. A number of the broken ground stones were excavated as parts of hearths inside buildings or patches of cobbles between buildings. It would seem likely that their size was useful for these purposes.

### Phase 6 (see Plate 6)

Three worked bone artefacts were excavated; two likely bone tools and one pendant. Both tools (#5295 and #5318), as well as a ceramic weight (#5275), were located on the clay floor of the earliest building in Phase 6. It is not clear what the use of #5295 was, although its sloping sides indicate definite intentional smoothing. The use of #5318 is tentatively described as a hook, although the bone does not suggest any intentional modification. The pendant, #5080 (see Illustration 36 on Plate 6), is a pierced astragalus, identified as sheep or goat, largely unmodified and thus retaining its distinctive state, with one side flattened and a small perforation through the top.

A fragmentary worked stone object, #5249, smoothed and drop-shaped was also excavated from a pit fill context in Phase 6 (see Illustration 37 on Plate 6). The smoothing on its surface would suggest use as a type of grinder or polishing stone.

#### Phase 7

A stone bowl fragment, #5325, came from a context which comprised displaced Neolithic fill. A fragment of a bronze metal stip, folded in the centre, #0711, was excavated from the bottom of a mudbrick wall in the early building phases of Phase 7.

### Phase 8 (see Plate 7)

All the small finds excavated from Phase 8 are stone, mainly basalt artefacts, as well as a quartz bead and a chert axe. The bead, #0708, identified as quartz, is circular and pierced through the centre (perforation diameter 0.7cm). Like the majority of the small finds from this phase, its location was inside a building. Two axes, one basalt and one chert, were excavated from within Phase 8 Building II. The basalt axe, #5090, is small with a finely ground edge, polished on all sides (see Illustration 40 on Plate 7). The chert axe, #5116, looks to have been formed from the flaking of an elongated cobble stone (see Illustration 39 on Plate 6). Whilst the artefacts shows use, and it seems as though the chipping along its blunt end was intentional, it could have been accidental. A fragment from the rim of a basalt vessel, #5109, has a finely worked and smooth surface but was not overly polished (see Illustration 38 on Plate 6).

Two ground stones were found within building fills, laying on the floor level. Both are basalt; #5102 is circular with two shallow depressions (see Illustration 41 on Plate 7), #5286 seems to have been used as a rubbing stone, with all surfaces, excepting one, very well smoothed. Two further basalt worked stones, one a stone ring, #5276, and the other a burnishing stone, #5292, were excavated as constituent parts of the stone base to the alley running between Buildings I and II in Phase 8.

### Phase 9 (see Plates 7 and 8)

Whilst all the small finds from Phase 9 can be relatively securely attributed to this phase, the majority of the contexts were building fills and bricky layers outside buildings. Excepting a bone tool and a ceramic vessel, all are worked stone artefact.

The bone spatula, #5077, is flat and leaf shaped with notches along the edges, and definite cutmarks along the widest end (see Illustration 46 on Plate 8). The ceramic vessel, #0739, is a hand-made juglet with an unusual pointed base. Its coarse, gritty temper and lack of surface treatment indicate its fabric as Fabric A. Neither was found in a secure context with any obvious activity use.

Two stone vessel fragments were found within bricky building fills. One, #5089, is a body fragment from a bowl, made from a fine, very hard stone, with the exterior much smoother than the interior (see Illustration 44 on Plate 7). The other, #5144, is a fragment from a bowl rim of a pink-orange vessel, which was identified as chert (see Illustration 45 on Plate 7). Again the exterior surface was very smooth. A possible fragment of a stone figure, #5280, was also excavated but shows no features diagnostic enough for identification. An interestingly incised pierced stone was found as part of a layer of fill between two buildings which contained a significant amount of animal bone. The stone is pierced through the centre and smooth, with two incised lines 4cm apart (no image available). A shaped stone, #5155, possibly chalk has many faces but seems likely to actually be naturally occurring (see Illustration 42 on Plate 7).

Three possible ground stones were found within fill levels in Phase 9. Two, #5153 and #5283, are basalt and very fragmentary with little smoothing on the surface (see #5153 in Illustration 47 on Plate 8). The third, #5143, was tentatively identified as marble and has a square shape which was only worked slightly from its original form (see Illustration 43 on Plate 7).

### Phase 10 (see Plate 8)

A worked stone, #0779, in the shape of an astragalus with some chipping, was excavated from part of an exposed baulk in Phase 10. A tubular bead, #5170, stone unidentified with an off-central perforation (diameter 0.3cm) was found as part of an ashy pit fill (see Illustration 48 on Plate 8). Two smoothed stones were excavated as part of pit fills along with ash, bone, pottery fragments and charcoal. One, #5082, was most likely used as a hammerstone, with one of the used faces polished but with scratches (see Illustration 49 on Plate 8). The other smoother stone, #5104, has one flat side and chips along the wider end. It could possibly have been naturally occurring (see Illustration 50 on Plate 8).

#### Phase 11

The sole small find from Phase 11, #0723, is a worked bone point, possibly a pin with one flat and one concave side.

### Phase 12 (see Plate 8)

Two ceramic artefacts were excavated in Phase 12, both from fill contexts. The first, a bead, #0707, was manufactured from a thin roll of baked clay with a perforation through the centre (diameter 0.2cm). The other, a loomweight, #5189, is fragmentary and manufactured from a compact, buff-orange clay, most similar to Fabric C (see Illustration 51 on Plate 8).

Four worked stones were excavated. One rubbing stone, #5278, was part of a building fill. The other three grinding stones - #5307, #5308 and #5309 – were all fragmentary with one surface of each artificially flattened. All three were excavated as part of a hearth with a substantial ashy fill as part of a building within Phase 12.

#### Phase 13 (see Plate 9)

All the small finds excavated in Phase 13 were from levels directly above Phase 12, thus predating the break in occupation signified by Phase 13 and not connected to the reoccupation which started from Phase 14a onwards.

Two worked bone objects were excavated. The first, #5166, is a long point, or possibly an incomplete needle, with a long polished point but no eye (see Illustration 53 on Plate 9). The other object, #5300, is a broken, later conserved, incised bone cylinder, highly polished on the surface.

Three worked stone objects were found, all basalt. One grinding stone, #5284, is fragmentary with one obviously worked sloping side. The other two worked stone, #5142 and #5208, were also heavily worked (see #5142 in Illustration 52 on Plate 9). Small find #5142 is circular with one face smoother than the other, the smoother side with a convex shape. Small find #5208 is a ring shaped stone pierced through the centre by drilling from both sides (perforation diameter 2.8cm).

#### Phase 14a (see Plates 9 and 10)

All the small finds in Phase 14a were excavated from various pits linked to the reoccupation of the area of the sites during this phase after a substantial period of abandonment. However, all the pit fills were sealed by walls and floors within Phase 14a, making their inclusion in this occupation phase secure.

A possible shell pendant, #5248, was found in a small pit sealed by a later wall. Its oval shape was broken in antiquity at the base, but the perforation and working are still obvious. Four ceramic small finds were also excavated from pit fills. One largely complete ceramic vessel, #0704, is a flat based, small shouldered jar with some breakage above the shoulder obscuring an identification of the rim type. Its fine ware, however, is identifiable as Fabric E(b), the introduction of which ware can be associated with Phase 14a. Also manufactured from clay were a crudely made and poorly fired animal figurine, #5086 (see Illustration 55 on Plate 9). The figurine is identifiable as a quadruped but all four

legs and head are missing, making identification of the animal impossible. A ceramic stamp or stopper, #0682, with a "bell" shape and polished surface, could also have been an applied knob handle on a vessel, although there is no signs of it ever having been applied to a vessel and is polished all over (see Illustration 54 on Plate 9).

A number of worked stone pounders and hammerstones - #5115 (see Illustration 59 on Plate 10), #5146 (see Illustration 61 on Plate 10), #5147 (see Illustration 60 on Plate 10), #5282, #5291, #5294 and #5306 - were found within pit fills, along with substantial amounts of ash, bone and pottery. All were fragmentary and generally unpolished but with flat bases and smoothed sides. All but one were manufactured from basalt, the exception, #0651, being manufactured from limestone (see Illustration 58 on Plate 10).

#### Phase 14b

A single stone bead, #5274, with a bored central perforation, was excavated in Phase 14b, again as part of a pit fill.

### Phase 14c (see Plate 10)

A bone point and a basalt rubbing stone were found in the same stony context at the base of a building wall in Phase 14c. The bone point, #5076, has an oval section and smoothed exterior (see Illustration 62 on Plate 10). The rubbing stone, #5206, is fragmentary and much like those of the preceding levels.

### Phase 15 (see Plate 11)

Two bone points were excavated in what initially seems a secure context in Phase 15 above a cobbled area. However, the excavation of a copper alloy coin, #5209, probably Roman, in the same context suggests that the context was disturbed by later pit activity in the area. One of the bone points, #0623

(see Illustration 65 on Plate 11), is a broken polished point fragment, the other complete, #0716, with a pointed end, grooved side, flat base and rounded along the upper edge. A third bone point fragment from a context nearby, #5075, is highly polished and has a triangular section (see Illustration 64 on Plate 11).

A ceramic bead, #5273, similar to the one found in Phase 12, was excavated in the interior of a building along the bottom of a wall. A ceramic vessel, #5009, was excavated within a hearth fill context (see Illustration 63 on Plate 11). Whilst the fine ware with gritty temper is reminiscent of Fabric B, the bowl rim has interesting surface treatment; a brown slip on the interior and red wash around the exterior band. The vessel does not look to be foreign to the Tell Nebi Mend ceramics; whilst unusual, such surface decoration is noted amongst the later ceramics.

Basalt rubbing stone fragments - #5112, #5113 (see Illustrations 66 and 67 respectively on Plate 11) and #5114 – were all excavated from the same context comprising bricky building debris.

### Phase 16 (see Plate 12)

All the small finds from Phase 16 are manufactured ceramics. A hand-made animal figurine, #0383, was excavated in the Phase 16 fill material, in the upper levels of the phase (see Illustration 68 on Plate 12). The figure is a horned quadruped with a pointed nose, but too damaged for further identification. A ceramic bottle, #0560 (see Illustration 70 on Plate 12), and a pierced disc, #5007, possibly a spindle whorl, were excavated in close proximity in a context covering an activity area level (see Illustration 69 on Plate 12). The globular bottle has a high neck and everted rim, manufactured from a soft ware with some grit temper and a cream slip, identifiable as Fabric E(b) and reflective of the diversity of vessel shapes occurring particularly in Phases 15 and 16. The pierced disc is manufactured from a roughly cut buff ware sherd with an off-centre perforation (diameter 1.3cm)

#### 5.2 Discussion

The worked stone small finds from all phases of occupation in Trench VIII display an element of similarity and continuity throughout. Often naturally fortuitously shaped stones seem to have been slightly modified into tools, and broken and fragmentary worked stone objects were frequently reused in hearth-building and for cobble stones. There is no sign of large quern stones, although this may well be a result of the nature of the contexts excavated.

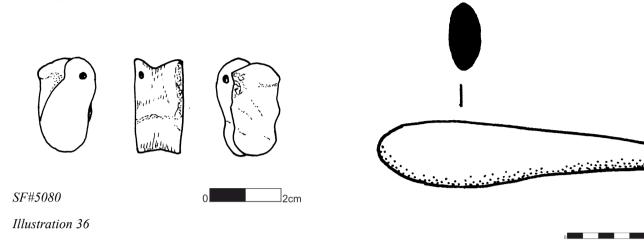
Similarly, the bone tools excavated throughout Phases 6 to 16 do not change in form and use, suggesting continuity through the phases. The two examples of pendants, one bone and one shell, are interesting, but do not occur in nearly enough frequency to allow an in-depth examination of their use as pendant. Given the use of the modified astragulus as a pendant, there could have been others excavated, but easily unnoticed if fragmentary. It seems a mix of bone pendants, stone and ceramic beads were used in jewellery, but do not appear in great numbers. However, it should be noted that sieving was not undertaken during the excavation of Trench VIII due to the windy conditions; possibly this would have yielded more examples of the ceramic and stone beads.

Complete ceramic vessels do not appear to be imported vessels, but fit neatly into the Trench VIII corpus, and the later examples show the diversity of shape and decoration to be expected from the later levels of occupation and the introduction of Fabrics B and E(d).

The two examples of figurines, one stone and the other ceramic, both suggest quadrupeds, but are unfortunately too damaged to allow proper identification or useful comparison with figurines from other settlements. It is interesting that both figurines appear quite similar in form despite the probably gap of several centuries between the two phases.

# PLATE 6: SMALL FINDS

# PHASE 6



SF#5249
Illustration 37

# PHASE 8

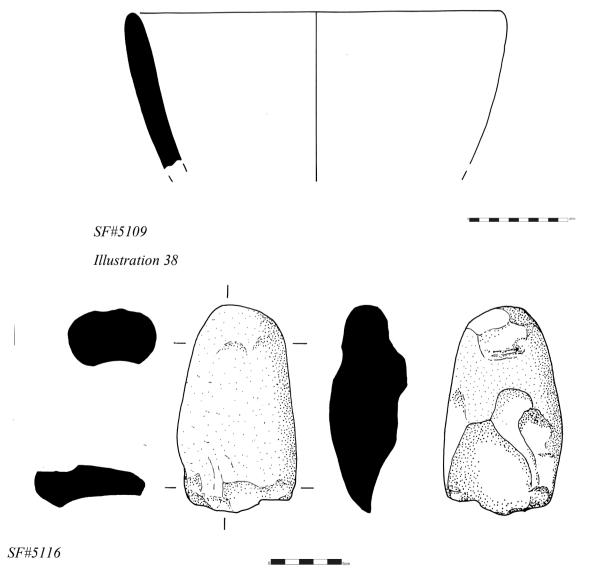
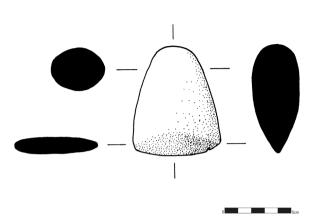


Illustration 39

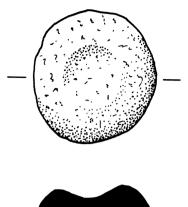
### **PLATE 7: SMALL FINDS**

# PHASE 8



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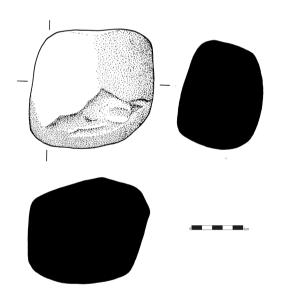
Illustration 40



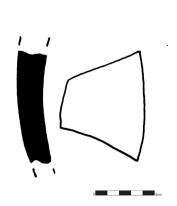


SF#5102 Illustration 41

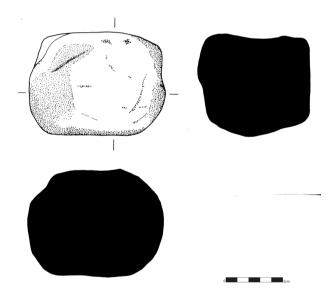
# PHASE 9



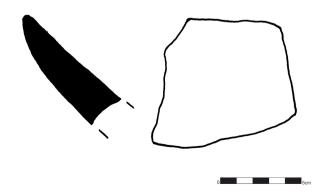
SF#5155 Illustration 42



SF#5089 Illustration 44



SF#5143 Illustration 43



SF#5144 75 Illustration 45

### **PLATE 8: SMALL FINDS**

# PHASE 9

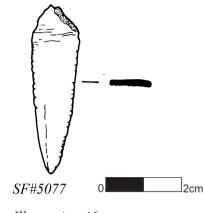


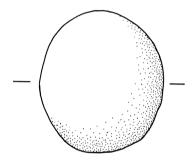
Illustration 46



SF#5153

PHASE 10





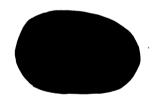


Illustration 49







Illustration 48

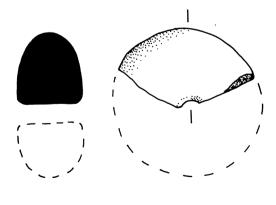


SF#5104

Illustration 50

# PHASE 12

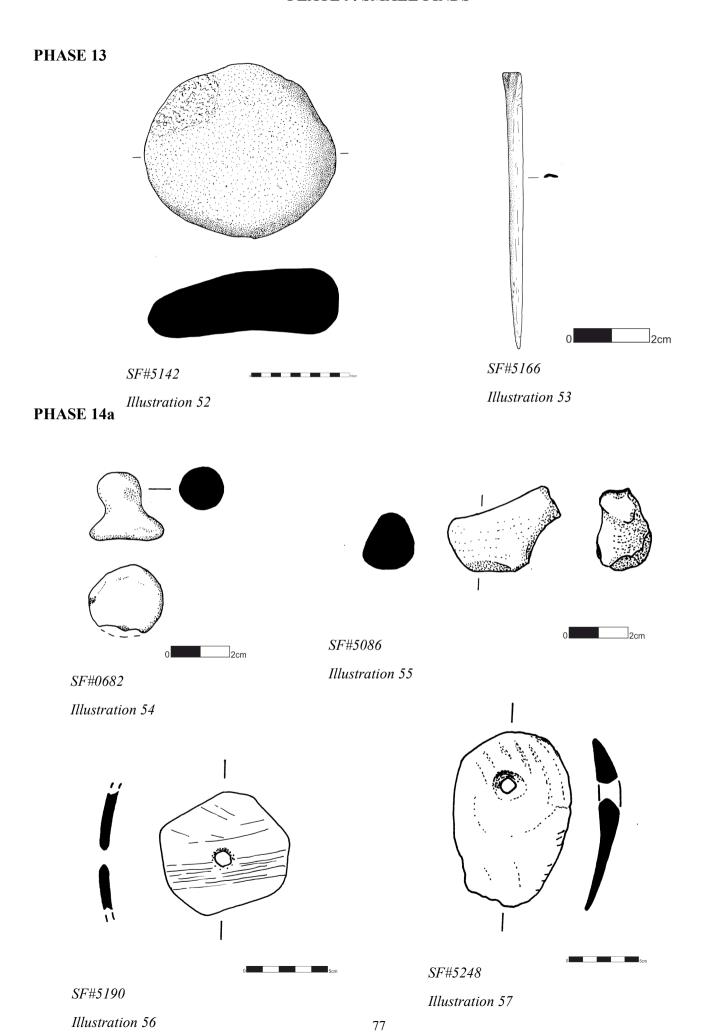
SF#5082



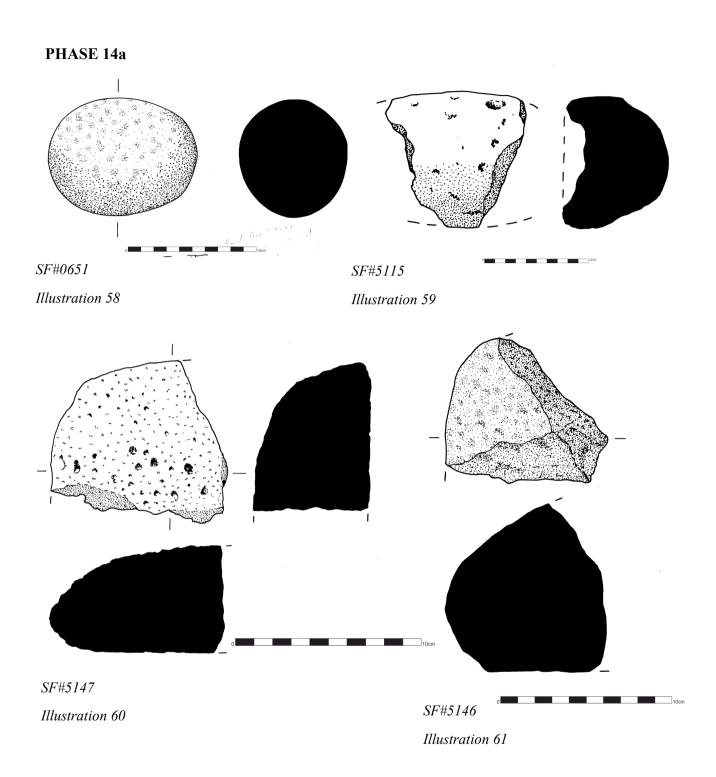
SF#5189

Illustration 51

# **PLATE 9: SMALL FINDS**



# PLATE 10: SMALL FINDS



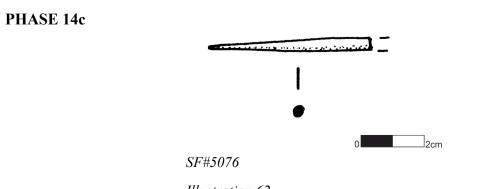
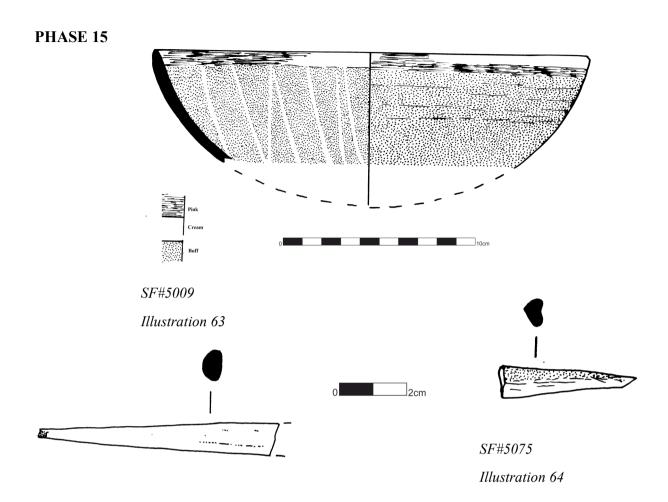
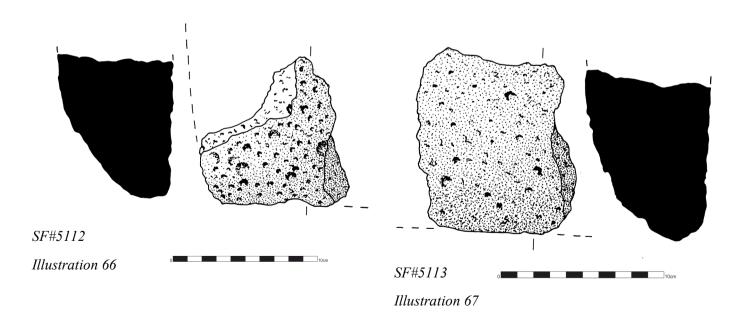


Illustration 62

# PLATE 11: SMALL FINDS

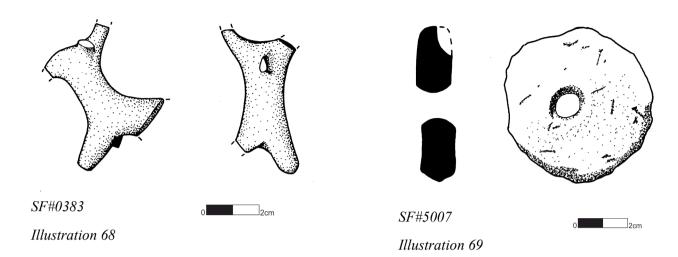


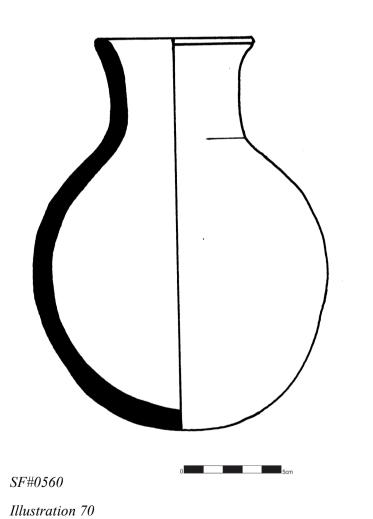
SF#0623
Illustration 65



# PLATE 12: SMALL FINDS

# PHASE 16





#### CHAPTER 6: REGIONAL COMPARISON OF TELL NEBI MEND

### **6.1 Ceramic comparisons**

The most striking feature of the Tell Nebi Mend assemblage, with regards to comparisons with other ceramic assemblages, is the lack of parallels, even with settlements in the near vicinity. Whilst the material from Trench VIII does show that Tell Nebi Mend was part of the wide region utilising chaff-tempered ware, other 'signature' fabrics and vessel shapes do not appear in Tell Nebi Mend's modest range of ceramics. Most conspicuously, given the location of Tell Nebi Mend, there are no holemouth jars in the corpus. There are also only a very few examples of painted sherds from Tell Nebi Mend, and even some of these are suspect and may just be the remains of chipped slip, unlike the often quite sizable volumes of painted pottery found at other settlements in Syria at the time.

Whilst there are always some parallels in vessel shapes, especially in rim shapes, with other settlements, these seem likely to be coincidental given the lack of parallels in fabric and the differing proportions in which these shapes are found at other sites.

### Fabric A

The coarse, gritty Fabric A is not found in any great amount at any other settlement in central and western Syria, however, a few sherds in a similar fabric were identified at Hama. Interestingly, infant burials from Level K at Hama were buried in jars made from a fabric which is unlike almost anything else in the material from Hama. Whilst problems with the excavations and security of contexts at Hama do arise, these jar burials are very similar to that found at Tell Nebi Mend, and the fabric of the jars is almost identical to Tell Nebi Mend's Fabric A (Thuesen, *pers. comm.* and personal study at the Nationalmuseet, Copenhagen).

### Fabric C

Fabric C is the fabric with the closest parallels to the Late Chalcolithic widespread use of chaff-faced wares. The long continuation of the ware seen at Tell Nebi Mend is also the case at other sites in central and western Syria such as Ras Shamra, Hama and Tell Afis; these sites also reflect the minor chronological changes and localised variations in the ware demonstrated at Tell Nebi Mend (Mazzoni 1991, de Contenson 1992, Theusen 1988). At Tell Afis, in particular, however, the Simple Ware which is most similar to Fabric C is used on a far wider range of vessel types and shapes. The everted rim goblets, small, fine jars and flat bases found at Tell Afis are not found at Tell Nebi Mend, and there are only a couple of examples of painted ware at Tell Nebi Mend, although it occurs in some quantity at Tell Afis (Mazzoni1991, Mazzoni and Gianessi 1998)

#### Fabric B

Fabric B is not paralleled at any of the obvious comparable settlements, such as Hama or Tell Afis. This could suggest it was a fabric very specific to Tell Nebi Mend. However, there are sherds of a very similar fabric found in small numbers at Jawa, south of Tell Nebi Mend, across the Damascus Basin (Betts 1991: 68, 80). Not enough material from sites in the Damascus Basin is available to demonstrate a definite link between the two settlements, but the curious appearance of Fabric B in the Jawa assemblage does raise interesting questions for future research about the links between Tell Nebi Mend and sites to the south.

#### Fabric E(d)

By the end of Phase 16, at which point a wider range of vessel shapes came into use, Tell Nebi Mend began to show some more parallels with vessel shapes at Tell Afis, such as tooled rims and shallow bowls and plates (Mazzoni1991, Mazzoni and Gianessi 1998). However, whilst most other settlements of a comparable age have a relatively sophisticated range of painted and finely slipped

fine wares like Fabric E(d), the Tell Nebi Mend assemblage shows little of the fine decorative features of these other sites.

### **6.2** Relationships with the Orontes Valley settlements

Of the recent projects being undertaken in the landscape immediately surrounding Tell Nebi Mend, and thus of pertinence to the attempt to explore the relationship between Tell Nebi Mend and other settlements, is the joint project between the University of Durham and the Syrian Directorate General of Antiquity and Museums; Settlement and Landscape Development in the Homs Region, Syria (SHR). This multi-disciplinary and multi-period survey project was established to understand the development of settlement organization in Western Syria over a long period of time (Philip *et al.* 2005, Philip 2007).

The location of the Homs region between two "broad and enduring 'cultural zones", namely the Southern Levant and 'inland' Syria, means study in the region is important, both in general, and with regards to the study of Tell Nebi Mend for this investigation in particular (Philip 2002: 2). Both developments in settlement change and the nature of material culture need to be better understood in the Homs region. With such research in this region, it will be possible to fill the gaps in understanding currently existing in the study of the Homs region with regards to other, more widely understood landscapes of the Near East (Philip and Bradbury 2010: 136, Banning 1996, Wilkinson *et al.* 2004: 202-4). For example, having a more accurate grasp on the relationship between the Orontes Valley and the wider Near East during the Early Bronze Age will further the understanding of trade routes and settlement systems in an, as yet, largely unilluminated area of central Syria. Beyond this, establishing Central Syria's relationship to the rest of the Near East during the Early Bronze Age will readdress some of the traditional assumptions and answer questions about economic and social development in the wider region.

In terms of the relevance of Tell Nebi Mend, which is included in the area covered by the survey, the SHR project is invaluable. The examination of "the articulation of different, but

contemporary communities and lifestyles" is necessary to understand how Tell Nebi Mend interacted with its immediate surroundings, and how this region in turn maintained relations with areas further afield (Philip 2002: 2). Also with regards to the understanding of Tell Nebi Mend, the SHR survey calls for a consideration of the nature of settlements potentially comparable to Tell Nebi Mend. Whilst there are a number of sizable tell sites in the surrounding region, such as Tell es-Sefinet Nebi Noah, the survey has demonstrated that "many of the sites in the survey area do not take the form of tells, but survive as 'flat' artefact scatters" (Philip 2002: 3). This changes quite dramatically how we regard Tell Nebi Mend and the settlement system within which is was acting.

The SHR survey has, among many branches of research, attempted to identify the smaller, more widely dispersed settlements generally missed by traditional survey methods focusing on the more obvious tell sites of the Late Chalcolithic and Early Bronze Age periods. The result of this work has identified a scarcity of pre-Classical settlements in the northern survey area. This has parallels with survey work in both the Amanus Mountains and the Jebel el-Aqra regions, respectively west and south of the Amuq plain to the north of the Orontes valley (Casana 2004: 110, 2007: 199, 204). However, recent work into the Late Chalcolithic and Early Bronze Ages of the Southern Levant, in particular the basaltic Jaulan and the arid Negev region, has demonstrated that much of the occupation during these periods did not take the form of traditionally identified tell sites (Avner and Carmin 2001, Epstein 1985, 1998, Mizrachi *et al.* 1996, Rosen 2008).

Research conducted in the northern survey area has suggested that the region was comprised of 'sub-optimal zones'; areas which were not prime agricultural lands, but which cannot be designated entirely as marginal zones. In other words, these areas held the potential for exploitation, but also had drawbacks which made such exploitation problematic (Philip and Bradbury 2010). Such areas, in the Houleh Basic and the Orontes Valley in particular, have, in more recent times, existed as foci for occupation. However, the archaeological evidence for Late Chalcolithic and Early Bronze Age activity in the area has suggested an alternative distribution of population, based on a variety of focal settlements (Philip and Bradbury 2010: 140). Presumably the exploitation of such marginal zones occurred out of some economic necessity, the intensity of which may have fluctuated between periods of occupation, resulting in the absence of activity during some periods.

Late Chalcolithic and Early Bronze Age activity has been identified at several sites in the northern survey area. In particular, sites SHR860 and 888 have a high proportion of Early Bronze Age material. It should be noted, however, that these sites, due to their location in the basaltic landscape, are quite different in formation to tell sites based on mud-brick occupation (Philip and Bradbury 2010). The clearest evidence of activity dating to the late 4<sup>th</sup> and early 3<sup>rd</sup> millennium BC is at SHR49, a occupation site incorporating massive, probably defensive, fortifications, although it is yet to be absolutely securely dated (Philip and Bradbury 2010: 143). It is suggested that it is probable that most of the identified sites in the northern survey area were occupied during the Late Chalcolithic and Early Bronze Age periods, but that the evidence of this occupation has been obscured by material from later occupation periods (Philip and Bradbury 2010: 143). Aside from the material from these sites, the survey ceramics from the basaltic region cairn enclosures studied by Bradbury show a high proportion of identifiably Late Chalcolithic and Early Bronze Age types (Philip and Bradbury 2010: 145, Bradbury forthcoming and *pers. comm.*)

A discussion of the survey ceramics from the northern survey area is important with regards to assessing Tell Nebi Mend's relationship to the settlements in the basaltic area. Two main categories of ceramics comprise the survey material collected during recent fieldwork in the area; basalt-tempered and chaff-tempered (Philip and Bradbury 2010, Bradbury forthcoming and *pers. comm.*)

The basalt-tempered ceramics which make up the bulk of the survey assemblage are suggested to be a local product, although with strong associations to the holemouth vessels characteristics of the Southern Levant. Variants also occur in the form of everted rim vessels, although the majority of the basalt-tempered ceramics are holemouth vessels. With only one flat base collected, it is assumed that the majority were round-based. The range of vessels was limited, with no fine-ware variants occurring (Philip and Bradbury 2010: 153).

The closest parallels to the basaltic fabric have been suggested to occur in the Tell Nebi Mend Trench VIII assemblage, although the similar Fabric A from Trench VIII does not include basaltic tempering and does not occur in the holemouth form. The vessel forms of round-based jars with a simple everted rim are paralleled at Tell Nebi Mend. However, given the significant differences in fabric to the Trench VIII material, is could be suggested that the parallels noted in everted rim vessels,

of which the everted rim is the *only* parallel, are accidental and bear no resemblance to the Tell Nebi Mend material. This would raise the interesting potential for a significantly different ceramic tradition in the basalt region of the Orontes Valley. Additionally there is a lack of holemouth form vessels from the surface collection in the corresponding SHR survey in the marl region south of the basaltic region, in which Tell Nebi Mend is located (Philip and Bradbury 2010, also *pers. comm.*). Other parallels are found with the 'cooking pot wares' of the Amuq F sequence, in the Period K material at Hama and the Late Chalcolithic level at Tell Afis (Braidwood and Braidwood 1960: 241-2, fig. 175.2-4, fig. 182.2-9; Thuesen 1988: 117-8, fig.59; Mazzoni and Gianessi 1998: 17, figs 4-5).

The chaff-tempered Fabric 5 ceramics from the northern survey area of the SHR project are "best understood as a local manifestation of the chaff-tempered tradition characteristic of Amuq F, and which is documented in the northern Levant" (Philip and Bradbury 2010: 155, also Schwartz 2001: 237-41, 245). The fabric very closely resembles Fabric C at Tell Nebi Mend; the parallels between the SHR Fabric 5 and Fabric C vessels at Tell Nebi Mend are more convincing than that basalt-tempered ceramics. Given that, due to the nature of the raw materials needed for the manufacture of the chaff-tempered ceramics, it is unlikely that Fabric 5 vessels were locally produced on sites in the basaltic region. It could be suggested that the similarity between Fabric 5 and Tell Nebi Mend's Fabric C demonstrates a relationship of some nature between settlements in the basalt region and Tell Nebi Mend and its surrounding marl area. In fact, it would seem implausible that there would have been no relationship between Tell Nebi Mend and the basalt region given their close proximity, but it is interesting that the differences in settlement types and apparent economic activity is also paralleled in the ceramic assemblages.

The most obvious point of difference between the ceramic assemblages of the basalt area and Tell Nebi Mend is the presence of holemouth vessels at the former and their conspicuous absence at the latter. In the Amuq sequence, such vessels are noted as being present, but infrequent; similarly, holemouth vessels have been identified in Period K material from Hama, but again the form is notable for being "uncharacteristic" (Braidwood and Braidwood 1960: 235-6, figs 176.1-41; Thuesen 1988: 118, fig. 59). The presence of holemouth vessels in the basalt region points to relations with the Southern Levant where the vessels are among the most distinctive feature of late Chalcolithic and

Early Bronze Age assemblages, being utilised for cooking and storage (Lovell 2002a: 112, 115, 132-37, figs 4.4-5, 4.14-16; Fishcher 2008: 281-84; Harrison 2000: 35, fig. 19.6; Greenberg *et al.* 2006; Braemar and Échallier *et al.* 2004: 289, fig. 546-59; Marfoe 1995: fig. 45, 46.4,6.). Given the similarities between the northern survey region and Tell Nebi Mend with regards to the above mentioned round-based, everted rim jars and the very close parallels found in the chaff-tempered ceramics, it is notable that Tell Nebi Mend is so conspicuously absent of parallels, and presumably relationships, with the Southern Levant which other settlements close by are engaging in. However, if, as looks likely, the chaff-tempered material is a localised variant on a wider tradition, it is not necessarily surprising that this was one of the shared features of Tell Nebi Mend and settlements in the basalt region, even while both areas had links with other regions in the Near East.

#### 6.3 Discussion

### Traditional interpretation: 'urbanisation' and the case of the Orontes Valley

Traditionally, the terminology used in describing the process of urbanisation in the Near East has placed a strong emphasis on regional unity rather than localised specifics (Dessel and Joffe 2000). The process has been applied to a very wide region, with little attention given to the various different forms in which it appears, in reality, to take (Esse 1989, Dever 1987, Richard 1987). Previous interpretation based on the excavation of large cities has established the existence of an 'urban revolution' for Mesopotamia; a process which was paralleled further West with the rise of the Egyptian state (Kemp 1983: 71-116, Ben-Tor 1991, Kantor 1992: 17-21, Stager 1992: 40-41). The functions thought to be characteristic of a town – typically fortifications, permanent residences, a variety of economic specialisations, institutionalised religious buildings and systems, and complex funerary activity – have been used in the past to differentiate between 'urban' and 'non-urban' settlements.

However, this view has, more recently, been challenged as being too simplistic and for leading to inaccurate observations in regions peripheral to the central Mesopotamian region. For

example, it had been asserted that the Southern Levant during the Early Bronze Age had undergone a period of prosperity, its own 'urban revolution' (Broshi and Gophna 1984). However, further work has established that along the coastal plain of the region during this period, settlements actually went into decline, with sites featuring few of the urban characteristics which were used to track the presupposed spread of urbanisation (Faust and Ashkenazy 2009).

Typically, the post-processual school of theory found much to criticise in the very processual application of systems theory, cultural ecology and cultural evolution in the attempt to understand regions beyond Mesopotamia. Whilst theoretical explanation had moved beyond Kenyon's diffusion of cultural groups, traditional interpretations were labelled as "historical, unilineal, functionalist, and environmentally deterministic constructs" (Stein 1998: 4, also Hodder 1986, Preucel 1991, Shanks and Tilley 1987, Trigger 1991). Whilst bearing these criticisms in mind, it should also be noted that traditional study has resulted in some useful paradigms, the application of which should still be considered when interpreting the complex archaeological record of Western Syria. As Stein also notes, we should consider "long distance exchange and other forms of interregional interaction between polities in differing levels of complexity as important transformative factors in the development of secondary states in many parts of the Old World" (1998: 5, also Champion 1989, Chase-Dunn and Hall 1991, Hall and Chase-Dunn 1993, Schortman and Urban 1992).

### Peripheries not analogues of Mesopotamia

"...the spectacular growth of metropolitan Uruk in the fourth and third millennia BC may provide the classic textbook example of urban nucleation, but it does not necessarily prefigure all courses of urbanization in Mesopotamia, let alone other regions of the Near East." (Falconer and Savage 1995: 38).

One of the main reasons that there is so much ambiguity over the understanding of settlement and social structures in the Levant can be argued to be due to the application of the wrong paradigms to the material evidence. Dessel and Joffe have argued for the consideration of a measure of "urban

relativism" (Dessel and Joffe 2000: 48, also Joffe 1993). They further identify the situation in the Levant to have been a case of "small-scale urbanism", thus making comparisons with the large urban centres of Mesopotamia misleading and un-helpful (2000: 48). The Levant should be considered not as an analogue of Mesopotamia, but as a separate system with its own distinctive and fundamentally different characteristics (Dessel and Joffe 2000). Tell Nebi Mend seems to exemplify this exactly; a somewhat provincial settlement which its own material culture quite distinctive from greater Mesopotamia. Whilst it is obvious there was interaction between Mesopotamia and the Levant, particularly in the South, recent study has moved away from direct comparisons with Mesopotamia, noting the problems with utilising the core-periphery model which has traditionally been used to explain the process of 'urbanisation' and 'civilisation' (Oates et al. 2007). This has even extended so far as to question the merit of actually considering settlements in the Southern Levant as 'urban' (Philip 2001, 2003, Chesson and Philip 2003, Faust and Golani 2008). The botanical material Tell Nebi Mend suggests that the settlement was self sufficient and farming a variety of crops, whilst also having the time and increasing expertise to create pottery and ornamental objects. Whilst perhaps not 'urban' in the strictest traditional definition, Tell Nebi Mend certainly seemed to be a sizeable settlement which underwent dramatic redesigning during Phases 14 onwards, which could be suggestive of a transition towards urbanisation.

### Outdated definitions of 'village', 'town' and 'city'

The case of the Southern Levant is pertinent to the study of Western Syria during the Late Chalcolithic and Early Bronze Age. Whilst the two regions are distinctly different, the movement to a new way of interpretation on the vastly more studied Southern Levant should inform the expanding interest and research in Western Syria. One of the most relevant points which should be considered is how we view urban centres, in terms of concept, function and terminology. The traditional interpretations of 'villages', 'cities' and 'states' used in Mesopotamia, it could be argued, should be dropped when investigating the Orontes Valley, given how the definitions applied in the former

fundamentally differ in the latter. Horden and Purcell argue convincingly that the study of proto-urban and urban settlements should focus on the relationship of settlements with the wider landscape, and be understood in terms of ecology, politics, social and economic contexts (Horden and Purcell 2000). In the case of Tell Nebi Mend, the dropping of the attempt to apply Mesopotamian-centric definitions and the interpretation of the settlement in the terms laid out by Horden and Purcell is eminently more useful that traditional attempts.

Physically, economically and socially, Tell Nebi Mend appears to be on a much larger scale than the surrounding settlements dated to the Late Chalcolithic and Early Bronze Age in the Orontes Valley, compared with the much smaller, possibly seasonal sites identified in the Homs Region Survey. However, it certainly does not demonstrate the innate sophistication and social complexity of the cities and 'urbanism' of Mesopotamia. Trying the make the definitions and expectations of the latter fit the model of the former, as has been attempted previously, would simply lead to a misinterpretation of Tell Nebi Mend.

### Mis-use of ceramics as evidence

The study and interpretations of the material culture of the types of settlements discussed above — in particular the ceramic assemblages — has suffered from the same lack of accurate definition, misapplication of terminology and general confusion resulting from ambiguity and misunderstanding. As Philip and Baird note, there is a problem with the discrepancy between the value of ceramics to add to understanding, and the limitations of this understanding due to the lack of accurate terminology available to describe these assemblages and ways to compare them on an intersite level across regions (2000). The liberal traditional application of easily identifiable, wide ceramic categories used to mark key chronological changes has led to a lack of thorough analysis into key ceramic assemblages (Dessel and Joffe 2000). This in turn limits "opportunities for systematic interassemblage comparative studies" meaning that there is little "recognition of diversity at an inter- or

intra-site scale, be it related to function, modes of interaction, or organizationally divergent communities" (Philip and Baird 2000: 1).

Tell Nebi Mend's corpus of ceramic material seems quite distinctively specific to the site. Whilst it has some similarities to sites in Central Syria and around the Damascus Basin, it does not seem to up-take new trends and utilises the same forms of pottery for long periods of time. With a focus on the case of western Syria, the value of the utilisation of typologies deriving from Palestinian ceramic assemblages, as has been attempted in the past, has been questioned (Philip and Baird 2000). Certainly, in the case of Tell Nebi Mend alone, the paucity of similarities with the ceramics of Palestine would make this endeavour futile. Arguably, it could be better to study an assemblage in depth before looking for parallels elsewhere, although this can lead to problems with site-specific typologies, the definitions of which can be difficult to match with other assemblages (Dessel and Joffe 2000). It is safe to say, however, that the material culture of any given site in western Syria will be the resultant product of a wide range of influences and production methods, thus making it problematic and futile to apply very general, region-wide ceramic trends to new assemblages (Philip and Baird 2000). Indeed, the scale of variety and differentiation between sites that has been established recently would suggest that "normative, bounded and homogenous ceramic regions, if these can be demonstrated to exist, will be exceptional and will require specific explanation" (Philip and Baird 2000: 22). It seems likely that diversity between settlements was the norm in Western Syria, and the investigation of ceramic assemblages should not assume that the organization of ceramic design and manufacture from one site should transfer entirely to contemporary settlements.

### Alternative ways to urbanisation: heartlands and hinterlands – how appropriate a model?

The Mesopotamian-centric idea of 'heartlands' and 'hinterlands', based on the core-periphery model, may have some use in the understanding of urban centres outside the Mesopotamian region. Wilkinson identifies the existence of large, urban sites "up to the limit of rainfed agriculture" when arguing for the economic basis behind urban centres (2000: 3). However, there remains the question

as to why large sites with typically urban characteristics occur outside of this ecological zone. Falconer and Savage hint at the presence of the heartland-hinterland model with reference to sites in the Diyala survey in Iraq, based on the evidence of development in the 'hinterland' manifested through modest but distinctly developed town-life (1995: 55). They also suggest urbanism in the Levant as a coastal phenomenon which was forced on rural settlements further inland, who then pursued their own, ecology-specific variations on the urban model (1995). It is true that, from the 4<sup>th</sup> millennium BC onwards, the Eastern Mediterranean coast was the focus of intensive trade (Stieglitz 1984, Marcus 1998, 2002). However, the evidence is ambiguous as Faust and Ashkenazy have more recently argued that the 'urban revolution' actually by-passed much of the coast of Israel due to environmental fluctuations during the Early Bronze period which made the model redundant (2009). Much of the evidence for such limited core-periphery influenced models is based on similarities in the material culture from a range of sites; however, "overall typological homogeneity should not be confused with identity of purpose" (Castel and Peltenburg 2007: 612).

### Cities not the only manifestation of 'urbanisation'

Whilst the consideration of the Mesopotamian core-periphery may have some merit and limited applicability to the case of urbanisation in the Levant, it is more pertinent to note that "cities do not, in any uniform sense, epitomize all 'urbanized' societies" (Falconer and Savage 1995: 55). Whilst a general trend towards urbanism can be noted across the Levant as in Mesopotamia during the early 3<sup>rd</sup> millennium BC, when the archaeological data is fully analysed, there is revealed "distinct, sometimes divergent settlement trajectories" (Falconer and Savage 1995: 55). Maisels describes the process to urbanisation thus:

"...a population sufficiently numerous and nucleated that the social relations of production mutate to express the principle of synoecism itself (which is interdependence arising from a dense proximity), the emergent expression of which is the crystallisation of government. In turn, government manifests itself as the state through administration

based on writing, plus monumental building representing the professionalization of ideological, economic and armed force." (Maisels: 155).

A perfectly valid argument for the necessity of the process of urbanisation in socially complex settlements, Maisels does not presuppose that *all* manifestations of this urban complexity must be identical. The expression of urbanism occurs differently across the Old World, even if it was caused by the same pressures and increasingly complex social relations. Change notes in China, for example, that the invention and proliferation of writing was more associated with potters rather than intellectuals because there was a greater focus on social identification than economic transaction in early Chinese urban centres (1980: 247). Whilst the Chinese model is far removed from the Levant, the differences in the manifestation of urbanism suggest that the differences in urban settlements in the Levantine region from Mesopotamia should not be considered surprising, but merely as a different expression of the urban process, informed by different economic, social and political relations specific to the settlements in question.

Further to this concept, it should be noted that, whilst the well-studied model of Mesopotamian hierarchy characterizes the centre of power in that region, there are a variety of other models which may well be more reflective of 'urban' settlements in the Levant. As Crumley notes, "forms of order exist that are not exclusively hierarchical and that interactive elements in complex systems need not be permanently ranked relative to one another" (1995: 3). Stein also identifies the necessity of other models being developed which reflect "internally generated social evolutionary change", rather than assuming the influence of external factors as the sole reason behind urban development in areas outside Mesopotamia (1998: 7).

Away from the Levant specifically, but in a similar case of supposed regional independence from Mesopotamia, evidence from settlements north of the Uruk heartland suggests social developments which were not directly tied to, or were not the direct result of contact with the Uruk South (Frangipane 2001, Stein 2002). Evidence from Tell Brak, Hamoukar, Tepe Gawra, Qalinj Agha and Aslantepe all suggest an independent developmental evolution towards social complexity, with

settlements exhibiting 'urban' characteristics, but with no evidence that this was directly the result of the spread of Mesopotamia 'urbanism' to the wider Near East (Gibson *et al.* 2002, Rothman 2002, Hijara 1973, Fragipane 2001). If this is the case for the North, it should be considered likely that, given the evidence, other regions peripheral to Uruk Mesopotamia, such as the Levant, underwent a similarly independent process of urbanisation.

### How should we interpret settlements?

The Uruk manifestation of urbanism "occurred in the absence of a strong centralizing state, and was able to thrive for at least a brief moment under the control of decentralized local groups" during the 4<sup>th</sup> millennium BC (Wright 2002: 7). In contrast, recent work in the Levant has revealed a region that was neither a heartland nor a hinterland in line with the Mesopotamian concept; rather "a patchwork of urban and rural systems [which] followed variable trajectories at different times and in different subregions" (Falconer and Savage 1995: 38). However, it is unclear as yet, how and why urbanism occurred and manifested itself in such a way. Harrison suggests the active role of small communities, as opposed to their traditional interpretation as tributary centres (2000). Peregrin notes that the control of prestige goods could result in political control, even on a small-scale (1991), whilst Earle and Gilman note the importance of landownership and pastoral capital in such a rural region (1991c, 1991). Other alternatives which could be applicable include the concept of chiefdoms as a variant on the states of Mesopotamia, or the potential for settlements with sedentary existence resulting in an apparently less developed urban centre as at Al Rawda further north (Kristiansen 1991: 17, Castel and Peltenburg 2007). As Joffe notes, in the identification of developmental predecessors of state societies, a multilinear perspective focusing on power relations to define social structures is necessary (1993).

It should be accepted that the 'urbanisation' of the Levant and its surrounding regions was not a simple of case of the adoption of the Mesopotamian model by inferior regions. However, in order to establish the process by which the Levant in particular, with regards to Tell Nebi Mend, became

'urbanised' to the extent expressed through the archaeological record, the settlement systems of the region, and potentially its sub-regions, must be established. Joffe identifies the notion of "rising and collapsing complexity" as an attempt to explain social complexity in the Levant (Dessel and Joffe 2000: 49, Joffe 1993: 23). Castel and Peltenburg also cite the archaeologically and historically documented 'pulses' of a "much wider trend of settlement growth and extension, the result of relatively stable political circumstances, favourable economic conditions and population expansion" (2007: 611, also Geyer and Rousset 2001: 114).

Castel and Peltenburg refer to Al Rawda as part of a wider system of settlements, all exhibiting the same urban structures (2007: 610, also Geyer and Calvert 2001:60-61). This phenomenon is paralleled by the recent evidence for the expansion of settlement in the steppe regions to the north and east of Salamiyah (Geyer and Calvert 2001: 61). Whilst the settlement of Al Rawda is too far outside of the Orontes Valley to be directly comparable to Tell Nebi Mend, there are clear parallels in the ceramic assemblage from the site with the Orontes Valley, Qatna and Ebla, suggesting that the interpretation of one could be pertinent to the understanding of the other (Castel *et al.* 2005: 87-92, also Boudier).

Indeed, a similar expansion in settlement in western Syria can be identified during the Late Chalcolithic-Early Bronze Age period. The first widespread evidence of settlement in the Southern Survey Area of the SHR project, i.e. that area including Tell Nebi Mend, relates to the EBIV period (Philip *et al.* 2005). The Early Bronze Age settlement is restricted to large tells close to the banks of the Orontes River and along relict wadi systems, but demonstrates a significant expansion compared to previous periods (Philip *et al.* 2005). Morandi-Bonacossi's survey in the immediate area around Tell Mishrife/Qatna also indicates a sudden intensification of settlement in the 3<sup>rd</sup> millennium BC. Additionally, the expansion of settlement is also paralleled in the Beq'a Valley and the Amuq during the late 4<sup>th</sup> and early 3<sup>rd</sup> millennia BC (Marfoe 1995: 119-124, Casana 2007: 119).

The nature of sites within such settlements systems should also be considered. It has been noted that excavation in the Near East has, until recently, focused primarily on the large tell sites,

giving the attempt a 'tell-minded' bias (Ahlstrom 1985: 25, also London 1989). More recently, it has been pointed out that the Levant comprised discrete, and fundamentally different, units which do not necessarily share the same settlement processes as reflected in the archaeological record (Faust and Ashkenazy 2009: 35). In the immediate area around Tell Nebi Mend, for example, survey has indicated that flats sites represent a larger proportion of settlement in the Early Bronze Age period than tell sites; in addition, there may well be more concentrations of early occupation which now lie under the level of the modern-day Lake Qatina (Philip *et al.* 2005).

Another identified characteristic of a settlement with urban features is the presence of specialisation, a phenomenon reflected in the material culture. This material culture forms the very spatial characteristics of settlements (Falconer and Savage 1995, Savage 1997). Additionally, the use of "ceramics to paint a dynamic rather than cyclical canvas" reveals key information about the development of ceramic production and the relationships this utilised and necessitated with other settlements and region-wide trends (Dessel and Joffe 2000: 49, also Going 1992, Tylecote 1993). For example, the introduction of the wheel to ceramic production in Phase 13 of Tell Nebi Mend's occupation could well be indicative of a shift to multiple production sequences in the manufacture of pottery, as also noted by Harrison on the Madaba Plain (2000). Whilst the rate of ceramic change during the Early Bronze Age period is notably slow compared to other periods (Kamlah 2000), that the mechanisms for the transmission of manufacturing techniques and vessel styles rely on the communication between, and movement of, specialised potters demonstrates that there must have been a level of interaction between sites. The level of individuality at sites in the Levant, as at Tell Nebi Mend, has been noted, but, as Philip and Baird note, "within a context of the highly selective and quite variable adoption of traits through complex networks, it is unlikely that community identity was expressed through a particular unified ceramic assemablge", making this individuality unsurprising (2000: 24).

### **CHAPTER 7: CONCLUSIONS**

#### 7.1 Tell Nebi Mend Trench VIII

The excavations of Trench VIII at Tell Nebi Mend reveal a settlement relatively removed and isolated from the wider area around it along the Orontes Valley. Whilst it appear that Tell Nebi Mend was located in something of a backwater compared to the more complex and sophisticated burgeoning urban centres to both the north and south, this does not seem to have been due to a lack of potential contacts. Rather, it could be suggested that the inhabitants at Tell Nebi Mend made a conscious decision to continue using the same locally sourced pottery fabrics and crop harvesting techniques over a long period of time.

The two distinct periods of occupation in Trench VIII were separated by at least two centuries of abandonment. It seems likely that settlement on the site shifted away from the original buildings of Phases 6 to 12. For some reason, perhaps population growth or settlement rebuilding, the decision was taken to re-settle the area and, in order to avoid the problems of building structures on a slope, a large amount of material was deposited to level the area. The new buildings in Trench VIII at this time were much more sophisticated and well-built than the earlier buildings. The re-levelling and re-settlement of the area also coincided with the introduction of finer, wheel-made ceramics and increasingly varied vessel shapes and decoration. However, aside from the sudden introduction of the wheel into pottery manufacture, there is a strong element of continuity in the ceramics used at the site. Cooking ware and large storage vessels were made from the same fabric, with virtually no change over several centuries, right up to the end of Phase 16.

### 7.2 Importance of 'placing' sites like TNM

The better understanding of Tell Nebi Mend as a settlement during the Early Bronze Age is of great interest. However, an understanding of how Tell Nebi Mend fits into a wider settlement pattern and sphere of interaction also has much more importance and a wider reaching significance than just for the site itself. Traditional research has attempted to compare the better understood Mesopotamian cities and regional hinterlands with the northern Levant, an endeavour which has been less that fruitful given the scarcity of data for the latter region (Philip *et al* 2002). This is an issue which does not just affect Late Chalcolithic and Early Bronze Age settlements; Alcock has noted a similar problem in the Hellenistic period of the Homs region (Alcock 1994: 181). Gianessi notes the same problem in dealing with the material from Tell Afis, pointing out that early urbanization must have had a great impact in the central Syrian region, but that the development of this is still little understood since so much early material remains sealed under later archaeological deposits (2002: 83). Clearly, only more research will be able to redress this imbalance, but the situation makes the importance of Tell Nebi Mend that much greater as one of the few sources of reliably stratified Late Chalcolithic and Early Bronze Age data in the region.

More recent research has begun to cast a sceptical eye on the usefulness of comparisons with large Mesopotamian cities to explain urbanism in the Levant and central Syria, noting that urbanism in the latter areas is on a demonstrably smaller scale (Dessel and Joffee 2000, Joffee 1993). This "urban relativism" (Dessel and Joffee 2000: 48) is a observation which begins to pose difficult questions to the traditional application of core-periphery models and asymmetric interactions to explain urbanisation (Oates, McMahon, Karsgaard, Ur 2007). Whilst not identical to the Mesopotamian centres of urban life, settlements outside the Uruk sphere do exhibit features identified as 'urban' such as town planning, social stratification and the sophisticated exploitation of the surrounding land to feed a growing population. If, as it begins to become apparent, there is some demonstrable level of urbanisation in the supposed 'periphery' areas as early, if not arguably earlier, than in Mesopotamia, then the assumption of the transition of urban features from the core to the periphery is questionable. Further north than Tell Nebi Mend, evidence at Tell Brak, Hamoukar, Tepe

Gawra, Qalinj Agha and Arslantepe, all settlements considered to be situated outside of the Mesopotamian 'core', challenges the core-periphery model with the sophistication and advanced development of these settlements (Oates, McMahon, Karsgaard, Ur 2007, Gibson *et al* 2002, Rothman 2002, Hijara 1973, Frangipane 2001). Indeed, there is further evidence for developments in social complexity in these northern regions which show no direct connection at all to the Mesopotamian South, possibly even pre-dating urbanism in the latter (Frangipane 2001, Stein 2002).

If this is, as is beginning to look more likely, the case in the development of urbanism in the Late Chalcolithic and Early Bronze Age in the north, it is not inconceivable that there is a similar process in another 'periphery' area of the Orontes Valley. Increasing the understanding of another region on the border of the dominating Mesopotamian urban centres will help to clarify the interactions betweenthe various regions of the Near East during this dynamic period of development and the processes by which urbanism spread and adapted itself to different regions.

The Homs region, in the Orontes Valley, is of particular significance, further increasing the importance of the 'placing' of Tell Nebi Mend within this regional and extra-regional framework. The Homs region during the Early Bronze Age was situated between two "broad and enduring 'cultural zones'", namely the Southern Levant and culturally Mesopotamian inland Syria (Philip 2002: 2). Geographically, the situation of Tell Nebi Mend is notable at the junction between the access to the Mediterranean afforded by the Homs-Tripoli gap and the distinctly divergent agricultural and pastoral zones which are the focus of the Southern Homs Region survey (discussed in more detail below). Given the apparent absence of any Mesopotamian influence on Tell Nebi Mend, the examination of the relationship of the settlement with the "different, but contemporary communities and lifestyles" in the Homs region will shed much needed light on the development of urbanism in central Syria in the late 4<sup>th</sup> and early 3<sup>rd</sup> millennia BCE (Philip 2002: 2). Beyond the process of urbanism, given the likelihood of the various regions making up the Near East during the period being more divergent and individual than previously assumed, the study of settlements like Tell Nebi Mend is important for the investigation of various, as yet, poorly understood themes of economic relations, subsistence lifestyles and settlement patterns.

### 7.3 Future research questions

The analysis of Trench VIII at Tell Nebi Mend does highlight a number of research questions for the future. Whilst it is clear that Tell Nebi Mend had a strong, continuous tradition of lifestyle, despite changes in settlement pattern, the nature of the links between Tell Nebi Mend and other sites in central Syria and further afield remains somewhat obscure. It is not clear whether Tell Nebi Mend was an organisational centre for a wider area populated by small groups of pastoralists. Perhaps the site had seasonal links to the small settlements found in the basalt landscapes of the Homs regions, acting as a gateway settlement for the exploitation of the natural resources of the area.

The location of Tell Nebi Mend would seem to be well situated to engage in trade routes across Mesopotamia to the Mediterranean. The lack of foreign material, however, would suggest that Tell Nebi Mend either did not engage in this way, or that its trade was based on some perishable material of which there is no trace in the excavated material. Perhaps the strength of identity of the community at Tell Nebi Mend was great enough to make a conscious decision to retain individuality in it material culture, or there are shared traits with settlements across the Damascus Basin, where more research needs to be undertaken.

Tell Nebi Mend will prove useful for future work in central Syria, on a variety of settlement types and locations. As a typesite, particularly with its invaluable radiocarbon sequence closely linked to a chronological sequence typified by subtle, but noticeable, changes in material culture, the settlement should help future research look differently at the Orontes Valley region. Rather than assuming it to be an analogue of the Uruk cultural tradition, the region should be treated as a group of individual settlements in their own right; apparently with localised traditions and regional variations which raise important questions about the nature of urbanism and the variable ways in which the process can manifest itself.

# APPENDIX I: STRATIGRAPHIC PHASES (TABLE 4)

Context	Phase	Description and associations	Year	Flotation?
644.013	6	Foundation trench fill west of 644 Wall 1; below 644.1 & 644.12	1988	
644.017	6	Clay floor, light brown. Earliest phases building, east of 644 Wall 1; below 644.2 & 3	1988	
644.037	6	Clay floor, light brown. Earliest phases building, east of 644 Wall 1 (=644.17, further north); below 644.3	1988	
644 Wall 1	6	Hard pale yellow, 1 brick wide, dug into/revets Neol. deposits, NNE-SSW	1988	
644 Walls 2/3	6	Cross-walls of Wall 1, WSW-ENE	1988	
646.008	6	Earliest building, terrace wall 644 Wall 1	1990	
646.016	6	Foundation trench of early EB terrace wall	1990	
650.012	6	Black ashy; below 650.10	1982	
650.013	6	Mixed yellow & red clay layer – early floor? above 650.14; below 650.10 & 12	1982	
654.002	6	Hearth of fitted basalt stones, ash & burnt clay on top; below 654.1	1984	Flot. Sample
654.003	6	Raised clay rim of hearth 654.2; below 654.1	1984	
654.004	6	Soft brown, ash, red-yellow bricky, associated with hearth 654.2 (some under 654.3); below 654.1	1984	
654.005	6	Soft compacted ash (clay to S) on possible surface, W of hearth 654.2, 3; below 654.1 & 653.8	1984	Flot. Sample
654.006	6	Red burnt clay & ash in depression cut into 654.7 Neolithic; below 654.2 hearth stones	1984	Flot. Sample
654.008	6	Pit, soft grey & dense black ash from hearth 654.2, 3/layer 5; cuts 655.6, dug into 654.7; below 654.1	1984	Flot. Sample
654.011	6	Small pit? Ash lens over soft grey stony ashy (from 654.5?) SW corner 655; below 654.1		
605.054	7	Ash layer; below 605.53 and runs under NW wall 605.50	1992	
605.064	7	Mixed grey- and reddish-brown, some stone rubble; below 605.63	1992	
606.059	7	Grey-brown soil; probe below 750.1 (=605 wall 1, W end) re-numbered from 605.59	1992	
606.06	7	Grey-brown soil; probe below 606.59 & wall 750.1, re-numbered from 605.60	1992	
608.001	7	Succession of clay floors, pockets in dark gritty layer beneath; below floors (605.33 etc) of Building I	1995	
608.002	7	Small ashy scoop/hearth (close SE of hearth 605.34 – central position?); below 605.33	1995	
608.003	7	Dark gritty, base of floors in 608.1? Loose bricky to W, down to lowest floor; below 608.1	1995	
608.004	7	Irregular bricky layer, lowest surface of lower EB building; below 608.3	1995	
643.020	7	Black surface (floor of Building II, over earliest building Phase 6); below 642.9, 26, 643.24, 653.4	1986	
644.001	7	Clay surfaces/floors, dark clay (=643.20?); below Walls 5 & 3	1988	
644.006	7	Clay surfaces & fill above 644.2, probably = 644.1	1988	
644.008	7	Metal strip, lying on floor or in mudbrick of lower wall	1988	
644.009	7	Floors associated with (lower?) Wall 3, along facing of soft yellow mud-plaster; below 643.23?	1988	
644.010	7	Pinkish stone base of floor 644.9, and stump of Wall 3	1988	

644.011	7	Probe along S section behind Wall 3, 10cm clayey above Neolithic; below 642.27 (1986 p.24)	1988	
644.028	7	Clay floor, light brown (= 644.1 or 644.12 extended to north, west of 644. Wall 1)	1988	
644.031	7	Mudbricks, 1 sherd (EB) from underlying clay "plug"; below Wall 3	1988	
644.033	7	Floor associated with Wall 3, west of pit 644.19	1988	
646.009	7	Grey-brown gritty thin layer over area, not over 644 Wall 1; lowest floor of Building II/Walls 3 & 5?	1990	
653.005	7	Dark-brown clay, patchy ash/burning, above 653.6; below 653.4	1984	Flot. Sample
653.006	7	Hard brown bricky, a few stones, above 653.7; below 653.5	1984	
653.007	7	Light-grey lumps with black ash over thin soft orange layer, above 653.8 (S end only); sealed by 653.6	1984	
705.046	7	Dark brown gritty/Neolithic fill over bricky layers/floor of earlier Building I; below 705.44	1988	
705.050	7	Probe SE of/over 705 wall 5 (Building I), yellow bricky; below 705.41? 39?	1988	
705.051	7	Clay over cobbles 705.54, earlier Building I (NW); below floors 705.44/fill 46?	1988	
705.054	7	Cobbles NW of 705/wall 6; below 705.51 & floors 44	1988	
705.056	7	Soft yellow bricky, over Neolithic (base of 1st phases of Building I); below 705.54 cobbles	1988	
705.061	7	Brown gritty (displaced Neolithic fill) over lower EB level (705.56); below 705.54 cobbles	1988	
705.081	7	Brown gritty (Neolithic fill) over EB bricky surface; below 705.54 cobbles	1990	
707.007	7	Lower levels/surfaces in alley between buildings I & II (605 wall 2 & 705 walls 7, 8); below 707.5	1992	
707.009	7	Mudbricks/clay of 705 wall 8; below 705 wall 4	1992	
707.010	7	Lowest level between 705 walls 7, 8 & 605 wall 2 (over dark brown Neolithic); below 707.5	1992	
707.011	7	Mudbrick/clay of 705 wall 7, hard orange, abuts wall 8, and wall 4 above (705 & 706 S sectns)	1992	
707.012	7	Grey clay layer 2-5cm thick; below 705 wall 7 (probably 8); & 707.10?	1992	
710.001	7	Alleyway between earlier phases of Buildings I & II, surface below fill containing Neolithic deposits	1995	
735.010	7	Part of 705 wall 8 (Building II, earliest phase), mudbrick; below 705 wall 4 (=rebuild, Building II 2nd phases)	1990	
605.007	8	Bricky (= bottom of 605.6) resting on clay floor of 605 walls 1& 2	1988	
605.033	8	Thin ash layer, beneath clay floor (no finds on floor); below 605.32 fill	1990	
605.034	8	Hearth (basalt stones/clay rim) on clay floor 605.33, ash, charcoal on/around	1990	
605.05	8	Wall B, NW wall of Building I	1992	
605.051	8	Floors of building I (= 605.33, 705.44), alternate thin ash and clay layers; below 605.49	1990	
605.055	8	Clay surround of hearth 605.34; below 605.49	1992	
605.057	8	Ash/charcoal of hearth 605.34	1992	
605.059*	8	Yellow-brown clay over hearth 34(=605.5 etc) & ash of hearthstones	1992	Flot. Sample
605.060	8	Yellow/brown clay over hearth 605.34 (same as 605.59 etc, both in 605 N extension)	1992	
605.061	8	Grey-brown soil overlying hearth 605.34 & a thin plaster floor (= 605.33,51 etc); below 605.60 (p.148)	1992	Charcoal Sample
605.062	8	Gritty grey-brown floor? over floor 605.63 (= 60)5.33,51 etc), over 61?; below 605.60 (p.151)	1992	•

605.063	8	Floor, mud plaster; below 605.61, 62	1992	
605 walls 1/2	8	Building I, west end of Trench VIII; see also 905	1986-92	
613 Wall 3	8	Abutting Building I, NW side; yellow clay, c.25cm wide; corner of 2 walls in N Sect?	1995	
642.022	8	Grey-brown, running up to bench along S side of 642 wall 3; below 642.21	1986	
642.023	8	Mudbrick bench along S side of 642 wall 3; below 642.22	1986	
642.027	8	Grey brown, bands of ash/clay beneath bench along S side 642 wall 3; below 642.22	1986	
642 Wall 3	8	Building II, wall on S side; mudbrick, large stones at corner with 642 wall 5 (2nd phase foundations)	1986	
644.005	8	Clay floor of Wall 5	1988	
653.004	8	Hard greyish brown, patchy orange; below 650.3?	1984	
680.032	8	Wall G, hard brown mudbrick, white plaster face with wall I, abuts H; below 680.27	1984	
680.033	8	Wall H, mixed mudbrick, rubbly(débris ?) abuts walls G, I; below 680.23	1984	
680.036	8	Wall I, hard brown clay, abuts walls G & H?; below 680.27, cut by pit 7	1984	
705.038	8	Brown & grey surfaces running up to 705 wall 4 NW face; below 705.34, 36	1988	
705.043	8	Yellow-brown layers NW side of 705/wall 4 rebuild, over 705.57, 58; below 705.38	1988	
705.044	8	Thin clayey floors (=605.7) of Building I, a little pottery, bone; below fill 705.39	1988	Flot. Sample
705.045	8	Ashy layers in alleyway; below 705 wall 3, 705.9(36), & 34	1988	
705.052	8	Grey ashy, pit? in alley betwn Buildings I & II; below 705.40, 41, 45?	1988	
705.053	8	Grey-bricky, whitish surfaces in alleyway; below 705.52 & wall 5	1988	
705.057	8	Greyish in alley, against kerb of 705/wall 4; below 705.43	1988	
705.058	8	Greyish, whitish surfaces, in alley against 705/wall 4; below 705.43, 47	1988	
705.059	8	Brownish grey, gritty/stony base, in alley against 705/wall 4; below 705.58	1988	
707.003	8	Probe S of/over wall 7, bricky & ashy layers/faint surfaces, alley against 705 wall 4 (Building.II); below 707.2,4	1992	
707.005	8	Levels ag.(NW) 705 wall 4 brickwork/kerb; below 707.3	1992	
707.006	8	705 wall 4, red/yellow bricks/large stone foundations, cobble kerb(NW); below 707.5	1992	
707.008	8	Levels against 605 wall 2 & top of 705 wall 7 (707.5); below 707.3	1992	
905 Wall 1	8	SW wall of Building I (= 605 wall 1), continues NW beyond corner with 905 wall 2	1995	
905 Wall 2	8	NW wall of Building I, crossing 605 NW corner	1995	
605.001	9	Soft silty grey, over 605.5/top of 605 wall 2 (= 26, etc); below 602.38, wall 15	1988	
605.002	9	Grey and bricky tumble (mixture of 605.1 and top of 2)	1988	
605.003	9	Yellow bricky tumble, resting on ashy surface (= 605.27, 31, top of 49; below 605.1	1988	
605.006	9	Stiff brown bricky; below black ashy surface under 605.3	1988	
605.024	9	Ashy surface, top of thick burnt layer 26 (605.1?); below bench 605.23, wall 15, clay depression 21	1988	Flot. Sample
605.026	9	Burnt blackish soil/ash/bones/sherds/stone (=605.1,30,48)over 605.27; below ash surface 605.24, wall 15	1988	Flot. Sample

605.027	9	Pink-orange bricky débris (= 605.3, 31, upper 49); below 605.26	1988	
605.03	9	Soft silty grey over brick débris (= 605.1, 26, 48); below stub of wall 605.15	1990	
605.031	9	Broken brick and ash, down to thin ash surface (= 3, 27, upper 49); below 605.30	1990	
605.048	9	Alternating dark ashy and clayey levels c.30cm deep, 1 intact pot (= 605.1, 26, 30); below 605.47	1990	
607.007	9	grey ash layer, possible pit (no finds) cuts 607.6? 8; below 607.5	1995	
607.009	9	Pit/ash fill (=605.52) cuts 607.8 Building I floors; below 607.7	1995	Flot. Sample
613.025	9	Ash layer over top of Building I wall (NW); below 613.22	1995	·
613.029	9	Fallen mudbrick against inner face of Building I NW wall; below 613.25?	1995	
613.036	9	Blue-grey ashy, some clay lumps, beside/over annex wall III; below 613.35	1995	
642.008	9	Black surface = 643.5 (floor of 642 Wall 4)	1984	
642 Wall 4	9	Corner of later building inside Building II; foundation large stones	1986	
643.005	9	Red/grey clay/brick down to building floor	1984	
653.002	9	Grey clay, thin layer above 653.3 W of stones	1984	
680.023	9	Clayey ash layer; below layers 680.15, 22 & wall A	1984	
680.027	9	Brown mixed silty over 680.35 fill; below 680.23	1984	
705.019	9	Probe/ashy layers in alleyway between 705/walls 4 & 3 (& Buildings I & II?); below pit 705.10?	1988	Flot. Sample
705.027	9	Bricky/ashy débris agst/W of 705 wall 3 (down to grey 705.9 below wall 3); below 705.17	1988	
705.028	9	Bricky débris against/E of 642 wall 4, above/same as 705.30; below 705.25	1988	
705.030	9	Bricky débris against/SE of 642 wall 4, down to floor 31; base of/below 705.25	1988	
705.031	9	Clay/ash surfaces (=642.8/643.5) much pottery, associated with 642 wall 4 SE side; below 705.30	1988	
705.032	9	Bricky layer W of 705 wall 4, associated with wall 3?; below 705.18	1988	
705.034	9	Top surface of alley, against 705 wall 4; much pott/bone/large shells; below 705.32/wall 3	1988	
705.037	9	Dark ashy in NW of 705; below 705.35	1988	
705.040	9	Probe, bricky orange in NW of 705; below 705.37 (no pottery)	1988	
705 Wall 3	9	Mudbrick, cornerstones at NE	1988	
905.009	9	Hard bricky; below 905.2?	1995	
602. 012	10	Mudbrick wall (fallen? débris?), plaster faced, layer of dark ash; below 602.10	1986	
605.015	10	Wall (bricky, low bench both sides); below floor 16, top below 605.9	1988	
	10	Silty surface running up to wall 605.15, over bench 605.25 (= 605.47); below 605.10 (burial)	1988	
605.021	10	Clay surface (of basin?) over 605.22, sloping down E to 24; below 605.20	1988	
605.022	10	Yellowish silty layer with charcoal flecks, runs over bench 605.23 up to wall 15; below 605.21	1988	
605.023	10	Low bench E side of wall 15, over ash 605.24 and 605.1; below 605.22	1988	
605.025	10	Low bench W side of wall 15 over 605.1; below floor 16, which extends beyond it to S	1988	
605.047	10	Soft grey ashy, mudbrick débris, bone/sherds/flint/shell/quern?; below 605.46	1990	
605.058	10	Bricky/clayey fill of pit (= 605.052)	1992	
607.005	10	Clayey brown and ash layer beneath; below 607.3	1995	

607.006	10	Clayey brown and ash layer beneath; below 607.5	1995	
680.015	10	Banded yellow/brown/whitish clay/silt, W of pit 680.7, abuts wall A; below 680.6	1984	
680.016	10	Wall A, reddish-brown mudbrick, whitish plaster on N face, W of pit 680.7; below 680.15, 10, 21	1984	
680.017	10	Wall C, yellow-orange mudbricks 8cm thick (visible mortar lines)W of pit 680.7; below 14, 18	1984	
680.019	10	Wall B, red-brown mudbrick (some burnt?), outer face white-plastered; below 680.14, E of/cut by pit 7	1984	
680.020	10	Thin ash/clay surfaces, abut Wall B inner face; below 680.15? E of/cut by pit 680.7	1984	
680.021	10	Ashy, abuts Wall A on W side; below 680.10	1984	Flot. Sample
680.022	10	Grey clayey surface (flat-lying sherds/bones), abuts Wall A on W side; below 680.21	1984	
680.024	10	Brown/black silty, abuts wall B/E side; below 680.18, wall E	1984	
680.037	10	Clay surface against wall B (white-plastered E face) over 680.38; below 680.24 & wall E	1984	
680 038	10	Thin ashy/silty surface against wall B (white-plastered E face) over 680.38; below 680.24 & wall E	1984	
680 Wall AB	10	(680.16 & 19) south ends of semicircular wall; cut by pit 680.7	1984	
680 Wall C	10	Earlier than walls A, B, D?	1984	
680 Wall D	10	Mudbrick débris only?	1984, '86	
680.062	10	Number given to 1984 wall D/mudbrick fill	1986	
705.014	10	Grey/yellow thin sloping surfaces, much pottery/bone; below 705.13	1988	
705.018	10	Grey & light bricky layers running up to 705 wall 4/NW face; below 705.16	1988	
705.021	10	Probe into fill over/SW side of 705/wall 3; below 705.17?	1988	
705.024	10	Bricky débris ('mudbrick of wall') over clay surface 705.25, SE of 705/wall 4; below 20	1988	
705.029	10	Grey surface associated with 705 wall 3, above 705.27?; below 705.22	1988	
705.035	10	Ashy/bricky in NW of 705, over ashy 705.37; below 705.22(& 29?)	1988	
602.010	11	Surfaces (top surface abuts wall Y; near top of wall Z); below 602.9(pit)? 602.1?	1986	
605.010	11	Jar burial, infant; below 605.9? cut through 605.11? resting on floor 605.16?	1988	
605.013	11	Ashy surface; below 605.12	1988	
605.014	11	Yellow-orange soft layer W of wall 15, over floor 16; below 605.13	1988	
605.020	11	Hard bricky/silty, burnt lumps towards bottom, over 605.21 and 24; below 605.19	1988	
605.028	11	Line of cobble, foundation(?) of upper bricky bench W of wall 15, associated with surface 13	1988	
605.029	11	Upper bricky bench E of wall 15 (or rebuild?), associated with surface 605.19	1988	
605.030	11	Mudbrick wall? Associated with ashy surface 605.13, over 14? Top of wall below 605.9	1988	
605.044	11	Mudbrick wall A; below cobbles 605.11, 42-3	1990	
605.045	11	Dark soft ashy, 2 thin layers with hard brown surface between (=605.13); below 605.43	1990	
605.046	11	Soft yellow bricky (= 605.14); below (identical to) wall 605.44, floors 45	1990	
607.003	11	Grey ashy layers; below 607.2	1995	
607.004	11	Stone feature in E side of 607 baulk; below 607.2	1995	
680.010	11	Yellow/mixed clay débris, ash lenses, over 680.21, abuts/over wall A; below 680.6	1984	

680.018	11	Dark grey-brown greasy fill over 680.24, abuts walls B, C & E, east of pit 680.7; below 680.14	1984	
680 Wall E	11	Later than walls B, C, D?	1984	
705.006	11	Yellow, ash flecks, over top of wall 15; below 705.3 & wall 1 floor	1988	
705.022	11	Probe in ashy/bricky W of pit 702.46; below 705.7 ash, walls 1, 15	1988	Flot. Sample
705.026	11	Posthole? Earth/stones; below walls 1 & 15	1988, '95	
705.048	11	Dark ashy surface under 705 wall 1; below 705.7 & wall 1	1988	
705 Wall 1	11	Clay, low curved, associated 705 wall 15? over wall 3; below 705.7	1988	
600.040	12	Ashy grey with burnt fallen mudbricks (small sounding)	1981	
602.004	12	Fine grey ash, E end of extended area; below 602.1	1986	
605.004	12	Pit, packed brick, ash, broken stone above; below surface 605.9	1988	
605.009	12	Clay surface with with flat-lying sherds, over pit 605.4; below 605.8	1988	
605.011	12	Cobble floor W of wall 15, over 605.12; below 605.9, cut by pit 605.4?	1988	
605.019	12	Ash, thicker to E, up to 3 layerson irregular clay surface, burnt in situ; below 605.18	1988	Flot. Sample
605.042	12	Cobble layer (= 605.11) with gaps, in light ashy silt; below 605.41	1990	
605.043	12	Light ashy silt, thin layer among/under cobbles, over surfaces 605.45; below 604.42	1990	
607.002	12	Mudbrick, ashy patches (= 605 wall 15, probably some adjacent/overlying fills); below 607.1	1995	
670.002	12	Mixed grey/broken mudbrick/ash/small firepit/stones; 670.1	1982	
670.003	12	Grey, patches of mudbrick, down to greenish surface; below 670.2	1982	
680.012	12	Yellow clay layer, over 680.13 ash; below 641.1 & ash at its base	1984	
680.013	12	Ashy surface, abuts upper parts of walls C & F, east of pit 680.7; below 680.12	1984	
680.014	12	Mixed brown bricky, E of pit 680.7 over walls B, C, E, fills 18, 25, abuts wall F; below 680.13	1984	
680.026	12	Black ashy, abuts wall E on east side; below 680.25	1984	
680.028	12	Black ash, abuts wall F on east side; below 641.1	1984	
680.029	12	Mixed yellow/grey clayey, abuts wall F on east side; below 680.28	1984	
680.030	12	Thin black ashy layer, abuts wall F on east side; below 680.29	1984	
680.031	12	Wall F, yellow mudbrick, over 680.26; top below 641.1	1984	
680 Wall F	12	Later than walls E, B, C, D?	1984	
680 Wall J	12	Later than wall A	1984	
702.070	12	Yellow-brown bricky (fill assoc.iated with 702 wall 14, lot of bone); below 702.65	1986	
702.073	12	Grey ashy layer, W of wall 13; below 702.70	1986	
705.003	12	Bricky/ash flecks, fill E of wall 1 along S section over wall 15; below 702.52/59	1988	
705.004	12	Yellow clay, ash flecks, broken brick; below 705.2? & wall 14	1988	
705.007	12	Probe in bricky débris over 705 wall 1 along W section; below 705.4	1988	
705.015	12	Greyish fill against W side of 705 wall 1; below 705.7	1988	
705.023	12	Light-greyish/bricky fill inside/W of curved wall 1; below/same as 705.15	1988	
705.033	12	Worked basalt from ashy/bricky/hearth by wall 14, associated with floor; below 705.2?	1988	

705 Wall 2	12	Not a wall – broken mudbrick in 705.7	1988	
705 Wall 14	12	Clay/brick NW-SE, 30cm wide; below 705.1&2, cut by pit 702.46	1986	
730.028	12	Grey layer/floor in S balk; below 730.27	1986	
600.039	13	Yellow clay (small sounding)	1981	
602.001	13	Clay/brick, down to hard brick surface; below 604.43 (& wall 9 etc)	1986	
605.008	13	Bricky on ashy surface; below brown gritty (=14c) under wall 9?	1988	
605.018	13	Hard yellow bricky on ashy surface 605.19; below 605.17 and thin ash/surface	1988	
610.047	13	Yellow sandy layer, very clean; below 610.43	1992	
613.020	13	Whitish layer, E of 613.19; below wall 17?	1995	
641.001	13	Hard yellow clay (NB some wheelmade pottery)	1984	
642 Wall 2	13	Medium stone foundations, over 642.7; below 643.3, cut by pit 642.6	1984	
660.002	13	Yellow compact silty; below 660.1	1982	
670.001	13	Yellow compact, 30cm deep (= 660.2); below hearth 600.33	1982	
671.004	13	Yellow compact (=660.2, 670.1); below 671.3	1982	
702.052	13	Yellow clay/very few incluiosns, SE of area over wall 13; below 702.41 (3 wheelmade sherds)	1986	
702.058	13	Yellow clay, down to levels assoc. with wall 13 on W side; below 702.52	1986	
702.059	13	Yellow clay, down to levels assoc. with wall 13 on E side; below 702.52	1986	
702.065	13	Yellow clay from edge of pit 702.46 to N & W faces (= 702.52); below 702.47?	1986	
702 Wall 13	13	N-S row of large stones, below upper yellow clay, reinforcement?	1986	
730.027	13	Yellow clay (SW) W of pit 730.11 below 730.1? disturbed surface?	1986	
730.030	13	W balk (S) 'white' clay; below disturbed surface	1986	
730.033	13	W baulk, down to grey layer 730.28; below disturbed surface	1986	
602.017	14a	Small pit dug into yellow clay 602.22, cutting pit 602.18; below 604.43 in 602 N extension	1986	
602. 018	14a	Small pit dug into yellow clay 602.22, cut by pits 602.17, 21; below 604.43 in 602 N extension	1986	
602.021	14a	Small pit dug into yellow clay 602.22, cutting pit 602.18; below 604.43 in 602 N extension	1986	
610.038	14a	Yellow/orange surface; below 610.37?	1992	
610.039	14a	Pit? White-plaster lined	1992	
610.040	14a	Fill of pit 610.39, earthy/pebbly, patchy ash & charcoal, ash deposit at bottom, 15cm deep	1992	
610.044	14a	Ring of stones, plaster-lined 22cm deep; below 610.39,40	1992	
610.045	14a	Fill of 610.44, ashy/charcoal	1992	Flot. Sample
610.048	14a	Post hole 17x18cm, light sandy clay; below 610.43	1992	Î
680.007	14a	Deep pit from top of 680.6, fill grey/brown clayey, yellow lumps; below 680.1, walls	1984	Flot. Sample
680.008	14a	Fill in pit 680.7, hard yellow bricky, some grey, charcoal fragments; below 680.7 fill	1984	1
680.009	14a	Fill in pit 680.7, SW corner, later cut? hard brown clayey; below 680.7?	1984	Flot. Sample
680.011	14a	Fill in pit 680.7, bricky/ash/pottery/stones, lower bell-shape, banded ash/silt; below 680.7-9	1984	
			4	

702.046	14a	Deep pit(ashy/bricky fill, much pottery); sealed by wall 12, 702.44, 45 C14	1986-90	Flot. Sample
702.050	14a	Hard yellow-brown stony, top fill in pit 702.46	1986	
702.071	14a	Shaft' of pit 702.72; loose brown fill/large stones; below topsoil?	1986	
702.072	14a	Pit in NE; ash/brown/stones/cow bones	1986	Flot. Sample
604.023	14b	Dense coarse blue-grey ash; below 604.22 and walls 10, 11	1984	Flot. Sample
604.045	14b	Blue-grey ash underneath walls 11 & 10; below 604.22	1986	
702.061	14b	Bluish-grey ash, bricky frags, shallow scoop; below 702.60	1986	Flot. Sample
600.035	14c	Dark grey, lot of stones	1981	
600.036	14c	Brownish, lot of stones	1981	
600.036A	14c	Shallow pit; fill greyish, lot of stones	1981	
601.018	14c	Brown, full of stones, level with foundation of wall 11(?), below wall 9; below 017?	1981	
602.002	14c	Brown bricky pit fill, very shallow	1986	
604.022	14c	Stony surface? irregular, close-packed large stones/gaps/small pebbles on thick brown layer	1984	
604.046	14c	Brown earth and stones over yellow clay (beyond limit of blue ash); below wall 10	1986	
610.054	14c	Brown-grey layer with charcoal and stones; below 610.42	1992	
671.003	14c	Brown rubbly; below 671.2	1982	
680.001	14c	Banded grey silt, W of wall 14, over all of 680; below 680.2, 5	1984	
702.051	14c	Brown with stones; below 702.31, 47?	1986	
702.055	14c	Brown stony in N/banded yellowish S, border with 604; base of/below 702.47, wall 10(604)	1986	
702.060	14c	Brown/bricky débris, stones aligned E-W, E of wall 12/SW corner; below 702.47?	1986	
600.025	15	Orange floor	1979, '81	
600.027	15	Grey ashy layer over hearth 600.33, associated with wall 9	1981	
600.027A	15	Upper charcoal layer over hearth 600.33	1981	
600.027B	15	Lower charcoal layer immediately over hearthstones 600.33 & north as far as wall 9	1981	
600.027C	15	Grey and reddish bricky layer between 27A and B	1981	
600.028	15	Yellowish bricky with lot of pebbles & fine pottery; below hearthstones 600.33	1981	
600.028A	15	Stone pavement, apparently later than adjacent stone wall of 603 (outer wall 12); below 600.28	1981	
600.029	15	Soft grey, lime specks; below 600.28/28A	1981	
600.030	15	Silty brownish-yellow; below 600.29	1981	
600.031	15	Soft grey with lime specks	1981	
600.032	15	Silty brownish	1981	
600.033	15	Stone hearth	1981	Flot. Sample
600.034	15	Posthole	1981	
601.012	15	Thick charcoal, between walls 11 and 9; below/sealed by floor 601.011	1981	Flot. Sample
601.013	15	Thick yellow layer between walls 11 and 9; below 601.012	1981	
601.013A	15	Thin orange original floor of circular structure, between walls 11 and 9; below 601.013	1981	

601.014	15	Charcoal grey, several floor levels, lot of black stones, between walls 11, 9; below 601.013A	1981	
601.015	15	Black stones/hearth on yellow clay floor between walls 11, 9; below 601.014	1981	
601.016	15	Thick charcoal grey, black stones on floor 16A, between walls 11 and 9; sealed by 601.015	1981	Flot. Sample
601.016A	15	Thin orange clay, original floor of circular structure between walls 9 and 11; below 601.016	1981	
601.017	15	Yellowish pebbly, against wall 11, below wall 9; base of 601.016A?	1981	
603.008	15	Hard brownish clay with pebbles; above 603.009	1981	
603.009	15	Very hard dark yellow clay, lot of pebbles; above 603.010	1981	
603.010	15	Orange surface to pisé wall 14, below wall 8; above603.011	1981	
603.011	15	Blackish with charcoal streaks; above 603.012	1981	
603.012	15	Brownish with lot of stones; above 603.013	1981	
603.013	15	Blackish grey with charcoal; above 603.014	1981	
603.014	15	Orange yellow clay, floor?	1981	Flot. Sample
603.015	15	Thick dark grey ash on circular stone hearth, NW corner of 603; above 603.016	1981	
603.016	15	Orange yellow clay, similar to 603.014, same as 603.14 in NW, below 603.15? or lower floor	1981	
604.016	15	Brownish, white inclusions, most of area; below 604.15	1984	
604.017	15	Grey-brown (some yellow clayey N side low down, large white inclusions), most of area; below 604.16	1984	
604.018	15	Yellowish gritty, E end of area over/corresponding to 604.17; below 604.14	1984	
604.020	15	Grey greasy; below 604.18	1984	
604.021	15	Banded silty layers (patchy red surfaces) over gritty surface, original floors of walls 11 etc? below 604.17	1984	
604.024	15	Grey and brown alternate layers, between wall 604A and N section; below 604.11	1984	
604.026	15	Gritty grey over stones of wall 10 in NE corner, pisé? below 604.10?	1984	
604.027	15	Foundation trench for wall 604A? fill yellow/grit/blue ash; cuts 604.22, 23	1984	
604.028	15	Greyish/yellowish brown, broken mudbrick, between wall 604A and N section; below 604.10, 11	1984	
604.039	15	Grey ashy and lumps of yellow mudbrick, fills above yellow clay base of building; below 604.37, 38	1986	
604.044	15	Grey pisé or mudbrick over foundation stones of wall 10 at N end; below 604.4, 9, 10, etc.	1986	
610.032	15	Finds associated with 610 Wall 1 (= west end of wall 11)	1992	
610.055	15	Ashy, possibly very decayed plaster floor; under large stones in 610.43	1992	
610.Wall 1	15	Western end of wall 11 (areas 602A, 604 etc)	1992	
610.Wall 3	15	Short length (threshold?) from corner of walls 1 & 2 to 612 feature 1 & W-E wall	1992	
612.008	15	Yellow-brown silty, sloping down to W and N; below flat-stone paving in 612.7, N of wall F3(613 wall I)	1992	
612.013	15	Yellow-brown, S side of plaster & clay, over stone wall footings (=pisé of F3/613 wall I); below 612.9	1992	
613.009	15	613 Wall I (W-E), yellowish pisé on stone footings (2 shaped?); below 613.6	1995	
613.017	15	Foundation trench/packing Wall I, loose clay, cuts, floor 613.10 to S; below 613.8	1995	

613.018	15	Dark grey ashy layer, N of 613 Wall I; below paving 613.16	1995	
613.026	15	Layers N of Wall I down to yellow clay; below 613.23	1995	
613.033	15	Post hole diameter 15cm, filled with brown earth; dug from 613.26	1995	
671.001	15	Greyish compact; below hearth 600.33	1982	
671.002	15	Gritty pinkish brown; below 671.1	1982	
680.002	15	Flat stones (c.20cm) in arc; below pisé of wall 14 (associated with stone base? or earlier?)	1984	
680.003	15	Pinkish-orange rubbly ('mortar') abutting walls 9 & 10; over 680.1	1984	
680.005	15	Flat-lying stones (alignment?) against S end of wall 9, related to 680.2? over 680.1; below 680.3, 4	1984	
702.029	15	Dark grey, N & W of wall 12; below 702.22	1984	
702.030	15	Dark grey-brown, pebble lines, a few stones; below 702.29	1984	
702.031	15	Banded dark-grey ashy & yellow bricky/lump; below 702.22, 21?	1984	
702.041	15	Clay & stones layer E of wall 12 (pit dug from below wall?); below 702.14, 15?	1986	
702.043	15	Packing of wall 12	1986	
702.044	15	Fine brown earth; below wall 12	1986	
702.045	15	Mixed grey ash/yellow bricky débris, mostly W of wall 12; below 702.44 & wall 12	1986	Flot. Sample
702.048	15	Shallow pit (?) in N balk, cut into yellow clay (no pottery)	1986	
702.049	15	Compacted ashy/bricky, some stones, small area remaining in NE, mixed levels	1986	
702.054	15	Soft greyish brown, small stones, on borderline with 604; below 702.31?	1986	
702 Wall 10	15	E end-wall of row of small houses/rooms at W end of Trench VIII	1986	
702 Wall 12	15	E boundary wall of row of small houses/rooms, W end of Trench VIII, E of wall 10 & narrow	1986	
		passage		
600.018	16	Brown clay with yellow patches/compact/lots of pottery within it; below 600.17	1979	
600.019	16	Brownish soil with fairly large gravel/area behind Wall 8; below 600.18	1979	
600.020	16	Grey ashy, contemporary with Wall 8 (rebuild of wall 14,10); below 600.19	1979	
600.021	16	Brownish yellow/brown grey with large stony grits and charcoal specks; below 600.20	1979	
600.021A	16	Orange floor, probably of wall 8 (or below it)	1979	
601.006	16	Dark grey ashy, curving up east to pisé of wall 10; below 601.005	1981	Flot. Sample
601.007	16	Yellowish muddy clay, curving up east to pisé of wall 10; below 601.006	1981	
601.008	16	Streaky charcoal, cream line, ashy material, curving up east to wall (10); below 601.007	1981	
601.009	16	Greasy brownish (finds: small handle-less juglet, complete, and pierced pottery disc); below 601.008	1981	
601.010	16	Stone hearth in NW corner of circular structure, 2 layers, on floor 601.011	1981	
601.011	16	Yellow clay/beaten earth floor between walls 11 and 9; below 601.009, 601.010	1981	
603.003	16	Blue-grey with pebble; above 603.004	1981	
603.004	16	Hard, brownish earth with patches of clay and lot of pebbles; above 603.005	1981	
603.005	16	Blue-grey ashy, contemporary with wall 8; above 603.006	1981	
603.006	16	Compact brownish yellow layer with pebbles (original floor of wall 8?); above 603.007	1981	

604.006	16	Cobbles (large, uneven) area c.1.20x0.70m; below 604.2, 4?	1984	Flot. Sample
604.007	16	Small patch of grey; below and south of cobbles 604.6	1984	
604.013	16	Grey-brown, some ash, E end between walls 11 and 604A; over 604.014	1984	
604.014	16	Gritty layer below/bottom of 604.7; below 604.13	1984	
604.041	16	Mixed grey/light bricky over 702.22 & vertical mudbricks (wall 10); below 604.34	1986	
610.026	16	Dark brown silty, charcoal flecks, small stones; below 610.33 (clay surface)	1992	
610.027	16	Very stony earth (st. 1-2cm, some 10-15cm), quern 610.30 on this (patchy) surface; below 610.26, 29	1992	
610.029	16	Small area of compacted pebbles 6-1cm thick over 610.27 (same/relaid surface? p.3); below 610.26	1992	
610.030	16	Large stone quern lying vertically on 610.27	1992	
610.033	16	Clay surface (associated with wall 4?) above 26; below 610.24	1992	
612.005	16	Probe, ashy grey level, sloping downwds to N & W; area between wall F3 and N section only; below 612.4?	1992	
612.007	16	Probe, grey-brn/ash/burnt clay, flat stones	1992	
612.01	16	Yellow-brown, compact; stone rubble, soil from wall F3/613 Wall I removed next to upright stone feature 1	1992	
612.012	16	Probe in SE corner of 612, east of large standing stone Feature 1	1992	
613.010	16	White plaster/gritty layer over grey pebbles on hard brown clay, S of Wall I; below 613.8	1995	
613.012	16	Soft grey ash, N of 613 Wall I; below 613.11	1995	
613.014	16	Clay floor, reddish over cream, N of 613 Wall I; below 613.12	1995	
613.015	16	Soft dark ash, N of 613 Wall I; below 613.14	1995	
613.016	16	Paved floor, N of 613 W.I (large, flat, irregular stones); below 613.15	1995	
613.023	16	Dark ashy & burnt earth, N of Wall I foundationn trench (=613.18?); below paving 613.16?	1995	
702.022	16	Cobble layer over 702.23; surface between walls 10 & 12	1984, '86	Flot. Sample
702.023	16	Thin ash level'; below 702.22 (no pottery)	1984	
702.056	16	Mudbricks facing E of wall 10; below 702.22?	1986	
702.057	16	Base of small stones, & layer of brownish stony; below 702.56 mudbricks	1986	

## APPENDIX II: BOTANICAL SAMPLES (TABLE 5)

Table 5: From Walker, A. 2012 (pers. comm.) – "Contextual, chronological and botanical data for the 15 Tell Nebi Mend Trench VIII samples. Wild Taxa are ordered by family following the Flora of Iraq (Townsend and Guest 1974, 1980; Townsend, Guest and al-Rawi 1968)"

Sample Number	654.2	605.59	643.2	705.44	605.26	705.1	605.21	680.39	705.22	605.1	702.4	702.72	604.23	601.12	702.22
Context description	hearth	hearth	floor of	floor of	burnt	ash	clay	pit/alley?	ash/	ash	Deep	pit	ash	thick	cobble
Trench Number	VIII	VIII	VIII	VIII	VIII	VIII	VIII	VIII	VIII	VIII	VIII	VIII	VIII	VIII	VIII
Phase	Phase 6	Phase 7	Phase 7	Phase 8	Phase 9	Phase	Phase	Phase 10	Phase	Phase	Phase	Phase	Phase	Phase 15	Phase
Volume of soil	2	?	32	12	12	12	?	28	?	?	9	?	27	?	?
Cereal grain															
Triticum monococcum		1					1								
Triticum dicoccum		12	5		22	1	1	5	2		17	2	3		
Triticum monococcum/			1		2			1							
Glume wheat indet.	2	6			12			4	4			2	2		
Triticum indet.								1			10	1	1		
Hulled Hordeum								5							1
Hulled Hordeum	13	6	46	1	37	3	2	34	2	2	13	21	2	2	6
Hordeum indet.	22	5	24		30	6	2	51	23	1	24	66		4	6
Hordeum/Triticum												1			
Cereal indet.	3	4	50		37	4	2	93	14	2	47	30	10	2	6
Avena sp.	3	1	1		1	4		6			3	4			
Cereal chaff															
Glume bases															
Glume wheat indet.	76	89	94		152	9	8	27	70	81	244	208	362	21	171
Rachis internodes															
Free-threshing wheat														1	1

Barley rachis															
Hordeum sativum var.	2	3					1	3		3	4	30	6	10	7
Sample Number	654.2	605.59	643.2	705.44	605.26	705.1	605.21	680.39	705.22	605.1	702.4	702.72	604.23	601.12	702.22
Context description	hearth	hearth	floor of	floor of	burnt	ash	clay	pit/alley?	ash/	ash	Deep	pit	ash	thick	cobble
Trench Number	VIII	VIII	VIII	VIII	VIII	VIII	VIII	VIII	VIII	VIII	VIII	VIII	VIII	VIII	VIII
Phase	Phase 6	Phase 7	Phase 7	Phase 8	Phase 9	Phase	Phase	Phase 10	Phase	Phase	Phase	Phase	Phase	Phase 15	Phase
Culm material															
Culm nodes	1	1	2		4			6	1		13	7	1		7
Pulses															
Lens culinaris		35	14			3			5		37	52	14		16
Lathyrus sativus		2							2		13			1	3
Lathyrus sativus/Vicia									1		2	100	4	1	1
Large legume indet.		5							1		2	179	2	2	3
Other potential															
Ficus												4			
Linum usitatissimum	3	2			6						1				2
cf. Linum usitatissimum									1						
Olea sp.								3							
Pistacia								1						13	
Vitis vinifera, seeds											16				6
Vitis vinifera, vine											4				2
Wild Taxa															
Astragalus / Trigonella	22	3	3		2	1		18	1		5	50	184	33	2
Coronilla scorpioides	1		3		4			2				9	9	5	
Hippocrepis type		2	2		4						4	6	2		7
Medicago sp.											1		4	2	
Melilotus/Trifolium	5	1				1		2				15	4		1

Scorpiurus muricatus						11		60			1		3	5	1
Sample Number	654.2	605.59	643.2	705.44	605.26	705.1	605.21	680.39	705.22	605.1	702.4	702.72	604.23	601.12	702.22
Context description	hearth	hearth	floor of	floor of	burnt	ash	clay	pit/alley?	ash/	ash	Deep	pit	ash	thick	cobble
Trench Number	VIII	VIII	VIII	VIII	VIII	VIII	VIII	VIII	VIII	VIII	VIII	VIII	VIII	VIII	VIII
Phase	Phase 6	Phase 7	Phase 7	Phase 8	Phase 9	Phase	Phase	Phase 10	Phase	Phase	Phase	Phase	Phase	Phase 15	Phase
Wild Taxa															
Trigonella astroites		1											4	1	
Small seeded legume	4	21			4	1	18	7			6	81	106	28	21
Malva sp.		2			1	-	10	,				1	100	3	1
Galium type A		_			1			4	1		7	4	4	2	4
Galium type B								1				-	-	_	
Galium type C					1								1		
Galium type D											1	1			
Galium type E								1	1				3		
Galium indeterminate													3		
Verbena officinalis L.													2		1
Adonis sp.			1	1		1		1		2	15	9		1	2
Fumaria sp.												1			
Silene sp. Conica type	1	3			2					1	2	5		1	
cf. Silene - internal										1					
Vaccaria pyramidata		5													
POLYGONACEAE		5	2		1							7	2	1	2
Salsola type			1												
Androsace maxima												5			
Plantago sp.		2					1							1	1
Veronica sp.					1							1	1	1	
Ammi majus		1										2			
Valerianella sp.		1						1							
Centaurea sp.								1							
COMPOSITAE -		2								1		5			

Sample Number	654.2	605.59	643.2	705.44	605.26	705.1	605.21	680.39	705.22	605.1	702.4	702.72	604.23	601.12	702.22
Context description	hearth	hearth	floor of	floor of	burnt	ash	clay	pit/alley?	ash/	ash	Deep	pit	ash	thick	cobble
Trench Number	VIII	VIII	VIII	VIII	VIII	VIII	VIII	VIII	VIII	VIII	VIII	VIII	VIII	VIII	VIII
Phase	Phase 6	Phase 7	Phase 7	Phase 8	Phase 9	Phase	Phase	Phase 10	Phase	Phase	Phase	Phase	Phase	Phase 15	Phase
Wild Taxa															
Lithospermum sp.	57	3	1		70	4	4	74	3		17	32			35
LABIATAE - unident.													1		
Sparganium sp.								3							
Scirpus sp.								1			1		1	1	
Aegilops sp. glume					1										
Bromus type											7	4			
Echinaria sp.		7										3			1
GRAMINEAE (large)			9								6	18	3		
GRAMINEAE	40	11	30		12	2		3	4	8	6	102	28	9	4
GRAMINEAE (small)	1	8						5				37	19	26	6
Hordeum spontaneum		1			1										
Lolium type		52	16	3	82	13		31	16	5	28	21	23		25
Phalaris sp.	42	27	2		1		6	7	1	4	7	8	16	3	4
Unidentified	4	3			3	2	4	6	2		4	10	6	8	12
Other															
Unidentified – Fruit														1	
Unidentified - Fruit														X	
Unidentified - nut fragme	ents /							8						5	
Mouse dung								-			1	2			

## APPENDIX III: SMALL FINDS (TABLE 6)

Register Number	Context Number	Phase	Туре	Material	Description	Complete	Colour	Length (cm)	Width (cm)	Thickness (cm)	Height (cm)	Diameter (cm)
5080	730.2	6	Astragalus Pendant	Bone	Pierced, worn. Sheep/goat bone. One side cut flat and pierced.	Y		3	1.7	0	1.65	0
5295	644.17	6	Worked Bone Object	Bone	Sides sloping.	N	Brown			0		
5318	644.17	6	Hook?	Bone	Probably unworked.							
5249	653.8	6	Worked Stone Object	Stone	Fragment. Drop shaped stone, smooth.	N		2.5	0.7	0.3	0	0
5275	644.17	6	Weight	Ceramic		?	?	0	0	0	0	5.2
5325	705.61	7	Bowl (fragment)	Stone								
0711	644.8	7	Bronze Fragment	Bronze?	Metal stip, folded in middle.	N		5.2	0	0.4	0	0
0708	705.43	8	Bead	Stone (Quartz?)	Circular. Centrally pierced; perforation diameter = 0.7cm.	Y		1.4	0	0	0	0
5090	642.22	8	Axe	Stone (Basalt?)	Small, edge finely ground, pecked, polished all sides.	Y	Grey	4.2	3.3	1.7	0	0
5102	642.22	8	Worked Stone	Stone (Basalt)	Circular, 2 depressions, "waisted" stone.	Y	Grey	0	0	0	3.5	4.6
5109	642.26	8	Stone Vessel	Stone (Basalt)	Bowl rim fragment. Finely worked surface, smoothed, shaped, not polished.	N		0	5.5	0.9	9.4	0
5116	642.26	8	Axe	Stone (Chert?)	Flaked elongated cobble, chipping blunt end accidental?	?		8.9	5.1	3.2	0	0
5276	705.59	8	Basalt Ring	Stone (Basalt)		Y	Black	0	3.9	0	0	0
5286	605.7	8	Rubbing Stone	Stone (Basalt)	Edged, rounded surfaces, smooth apart from one.	N	Black				3	
5292	705.59	8	Burnishing Stone	Stone	Rounded.	?	?					
5077	730.10	9	Spatula	Bone	Edges notched, leaf shaped. Flat, cutmarked at wide end.	N		5.8	1.7	0.25	0	0
5089	680.58	9	Stone Vessel	Stone	Bowl body fragment. Fine, hard stone, exterior smoother than interior.	N	Buff	2.2	3	0.7	0	0
5143	680.59	9	Shaped Stone	Stone (Marble?)	Square? Only slightly worked.	Y		9.4	7.5	7.1	0	0
5144	680.48	9	Stone Vessel	Stone (Chert?)	Bowl rim fragment. Very smooth surface, compact pink-orange stone.	N	Orange	3.3	4.4	1.1	0	0

5153	680.59	9	Rubbing Stone	Stone (Basalt)	Fragment. No rubbing surface on fragment.	N		6.4	4.5	4.6	0	0
5155	680.51	9	Shaped Stone	Stone (Chalk?)	Many-faced stone. Possibly natural?	?		8.3	7.5	6.8	0	0
5277	705.36	9	Pierced Stone	Stone	Interior smooth with 2 incised lines 4cm apart.	?	?	6.5	7	2.5	5	0
5280	605.26	9	Stone Figure	Stone	Fragment.	N	Grey	0	0	0	0	0
5283	705.40	9	Grinding Stone	Stone (Basalt	Fragment. Very porous.	N	Black				3	
0739	605.48	9	Ceramic Vessel	Ceramic	Juglet, pointed base, no surface treatment, coarse ware, grit temper, handmade, direct rim	Y	Brown	0	0	0	9.5	6
0779	707	10	Astragalus	Stone	Some chipping.		Whitish/grey- brown sections	3.6	2.0	1.2		
5082	680.39	10	Rubbing Stone	Stone	Hammerstone? Round, smooth; one used face polished with scratches	Y		8.7	6.7	4.5	0	0
5104	680.39	10	Smoothed Stone	Stone	One flat side, chips on wide end, natural?	Y	Brown?	8	4.2	2.1	0	0
5170	602.11	10	Bead	Stone	Tubular with off-centre hole; perforation diameter = 0.3cm.	N	White	1.6	0	0	0	0.6
0723	605.46	11	Worked Bone Object	Bone	Pointed object. Possible pin. One side flat, one concave.	N		7.3	0	0	0	0
5278	670.50	12	Rubbing Stone	Stone		?	?	8	7	7.8	0	0
5307	705.33	12	Grinding Stone	Stone	Fragment. Edges possibly rounded, one surface artificially flattened.	N				7		0
5308	705.33	12	Grinding Stone	Stone	Fragment. One surface artificially flattened.	N						
5309	705.33	12	Grinding Stone	Stone	Fragment. One surface artificially flattened.	N						
0707	705.15	12	Bead	Ceramic	Pierced; perforation diameter = 0.2cm. Small thin roll of clay	Y	Grey	0.3	0	0	0	0
5189	702.70	12	Loomweight	Ceramic	Fragment, compact, buff-orange clay, unbaked, only 1/3 remaining	N	Orange/buff	0	0	2.8	0	6.3
5166	643.23	13	Long Needle/Point	Bone	Polished. Lond bone point, no eye.	Y		22.3	1.1	0	0	0
5300	641.1	13	Worked Bone Object	Bone	Incised cylinder. Polished. Broken (conserved). Incised lines on one edge.	N	Brown					
5142	643.23	13	Worked Stone	Stone (Basalt)	Circular, opposite face not as smooth.	Y		0	0	4.9	0	14.2
5208	730.38	13	Ring Shaped Stone	Stone (Basalt)	Pierced, drilled from both sides; perforation diameter = 2.8cm.	Y		0	0	0	6.3	12.3

	1			G.			1	ı				1
5284	705.2	13	Grinding Stone	Stone (Basalt)	Fragment. One sloping side.	N	Black				6.5	
5248	680.11	14a	Pendant	Shell	Oval, pierced. Broken at base.	N		2.6	1.6	0.4	0	0
0651	642.10	14a	Pounder	Stone (Limestone)	-	?	White	0	0	0	0	0
5115	680.40	14a	Worked Stone	Stone (Basalt)	Fragment.	N		6.7	6.5	0	5	0
5146	702.46	14a	Rubbing Stone	Stone (Basalt)	Fragment. No surface worn to a polish.	N		8.8	7.8	0	9.1	0
5147	702.46	14a	Rubbing Stone	Stone (Basalt)	Fragment. Base flat but not polished.	N		10.2	10.4	0	7	0
5282	680.7	14a	Grinding Stone	Stone (Basalt)	Fragment. Very porous, one surface artificially flattened.	N	Black					
5291	702.46	14a	Rubbing Stone	Stone	Surface smooth.	?	Red		10	3		
5294	702.46	14a	Hammer Stone	Stone	Context uncertain, possibly from 705.39 bricky fill inside building?	Y	?					
5306	705.10	14a	Grinding Stone	Stone	Fragment. Very porous. One surface artificially flattened.	N						
0682	702.46	14a	Stamp or Stopper	Ceramic	Knob handle; diameter = 1.9cm. "Bell" shaped, polished.	Y	Brown	0	0	0	2.9	3.1
0704	702.46	14a	Ceramic Vessel	Ceramic	Shouldered jar; flat based small jar, broken above shoulder. Fine ware	N	Grey	0	0	0	3.1	2.6
5086	702.46	14a	Figurine	Ceramic	Animal, crudely made, poorly fired, baked, soft ware, quadruped, legs missing	N	Grey	3.5	0	0	2.7	1.7
5190	702.72	14a	Pierced Disc	Ceramic	Sherd, perforation diameter = 0.45cm, fine ware, drilled from both sides	Y	Pink	0	0	0.2	0	3.8
5274	604	14b	Bead	Stone?	Bored.	Y	Red	0.4	0.4	0	0	0
5076	702.55	14c	Bone Point	Bone	Point reserved. Oval section.	N		3	0	0	0	0.25
5106	702.55	14c	Rubbing Stone	Stone (Basalt)	Fragment.	N		5.7	6.3	0	8	0
5209	702.22	15	Coin	Copper alloy	Difficult to see anything.	Y		0	0	0.3	0	0.9
0623	702.22	15	Bone Point	Bone	Broken, polished bone point fragment.	N		3.6	0.5	0.3	0	0
0716	702.22	15	Bone Tool	Bone	Pointed end, grooved side. Flat base, rounded upper edge.	N	Brown	3.7	0.7	0	0	0
5075	702.45	15	Bone Point	Bone	Possible point fragment? Polished. Triangular section.	N		3.4	0.35	0	0	0
0566	602a.12	15	Rubber	Stone (Basalt)	Stored in Syria, object marked as VIII 602.12.	Y		26.2	13.9	0	5.5	0

5112	702.45	15	Rubbing Stone	Stone (Basalt)	Fragment, same artefact as 5113? End fragment.	N		8.2	8.5	0	6.5	0
5113	702.45	15	Rubbing Stone	Stone (Basalt)	Fragment, same artefact as 5112? End fragment.	N		8.7	9.7	0	6.7	0
5114	702.45	15	Rubbing Stone	Stone (Basalt)	End fragment, polish on base.	N		10.2	11	0	4.8	0
5009	600.29	15	Ceramic Vessel	Ceramic	Bowl rim sherd, brown slip on interior, fine ware, grit temper, red wash band around rim	N	Red/buff	0	0	0	0	17.2
5273	702.29	15	Bead	Ceramic	Bored, conserved	Y	Grey?	2.3	0.8	0	0	0
0383	600.15	16	Figurine	Ceramic	Handmade. Animal; no incisions, horned, quadruped, pointed nose.	N	Grey/black	4.92	0	0	5.55	0
0560	601.9	16	Ceramic Vessel	Ceramic	Bottle; high neck, everted rim, globular. Soft ware with grit temper and cream slip. Scratches at base.	Y	Cream/pink	0	7.3	0	10.2	3.1
5007	601.9	16	Pierced Disc	Ceramic	Spindle whorl?, perforation diameter = 1.3cm, buff ware, roughly cut, perforation off centre	Y	Buff/grey	0	0	1.25	0	5.45

## **BIBLIOGRAPHY**

- Adams, R.M. 1992. 'Anthropological perspectives on ancient trade'. In *Current Anthropology* 33: 141-160.
- Adams, R.M. 2001. 'Complexity in archaic states'. In *Journal of Anthropological Archaeology* 20: 345-360.
- Ahlstrom, G.W. 1982. Royal Administration and National Religion in Ancient Palestine. Brill, Leiden.
- Akkermans, P.M.M.G. and Schwartz, G.M. 2003. *The Archaeology of Syria. From Complext Hunter-Gatherers to Early Urban Societies (ca. 16,000-300BC)*. Cambridge University Press, Cambridge.
- Alden, J.R. 1982a. 'Marketplace exchange as indirect distribution: an Iranian example'. In J.E. Ericson and T.K. Earle (eds) *Contexts for Prehistoric Exchange*. Academic Press, New York: 83-102.
- Algaze, G. 1989. 'The Uruk expansion, cross-cultural exchange as a factor in early Mesopotamian civilization'. In *Current Anthropology* 30: 571-608.
- Algaze, G. 2008. Ancient Mesopotamia at the Dawn of Civilization: The Evolution of an Urban Landscape. University of Chicago Press, Chicago.
- Amin, S. 1991. 'The ancient world system versus the modern capitalist world system'. In *Review* 14: 349-385.
- Amiran, R. 1969. Ancient Pottery of the Holy Land. Masada Press, Jerusalem.
- Avner, U. And Carmi, I. 2001. 'Settlement patterns in the Southern Levant deserts during the 6<sup>th</sup>-3<sup>rd</sup> millennia BC: a revision based on C14 dating'. In *Radiocarbon* 43: 1203-16.
- Bairoch, P. 1988. Cities and Economic Development: From the Dawn of History to the Present. University of Chicago Press, Chicago.
- Banning, E.B. 1996. 'Highlands and lowlands: problems and survey frameworks for rural archaeology in the Near East'. In *Bulletin of the American Schools of Oriental Research* 301: 25-46.
- Bar-Yosef, O. and Belfer-Cohen, A. 1989. 'The PPNB interaction sphere'. In I. Hershkovitz (ed.) *People and Cultures in Change*, BAR International Series 508. Archaeopress, Oxford: 59-72.
- Basalla, G. 1988. The Evolution of Technology. Cambridge University Press, Cambridge.
- Beijerinck, W. 1947. Zadenatlas der Nederlandsche Flora. H. Veenman and Zonen Wageningen.
- Ben-Tor, A. 1991. 'New light on the relations between Egypt and Southern Palestine during the Early Bronze Age'. In *Bulletin of the American Schools of Oriental Research* 281: 3-10.
- Ben Tor, A. 1992. 'The Early Bronze Age'. In A. Ben Tor (ed.) *The Archaeology of Ancient Israel*, 81-125. Yale University Press, New Haven.

- Betts, A.V.G. 1991. *Excavations at Jawa 1972-1986. Stratigraphy, Pottery and Other Finds*. Excavations and Exploration in the Hashemite Kingdom of Jordan. Edinburgh University Press, Edinburgh.
- Bintliff, J.L., Howard, P. and Snodgrass, A.M. 1999. 'The hidden landscapes of prehistoric Greece'. In *JMA* 12: 139-168.
- Boehmer, R. 1991. 'Uruk 1980-1990: A progress report'. In Antiquity 65: 465-478.
- Burney, C.A. 1989. 'The Khirbet Kerak Question and the Early Transcaucasian Background'. In P. de Miroschedji (ed.) *L'urbanisation de la Palestine à L'age du Bronz Ancien*, 331-39. British Archaeological Reports, International Series No. 527. British Archaeological Reports, Oxford.
- Boileau, M.-C. 2005. *Production et distribution des céramiques au IIIème millénaire en Syrie du Nord-Est.* Éditions de la MSH/Éditions Epistèmes, Paris.
- Boudier, T. (forthcoming??). 'La poterie d'Al Rawda (Syrie intérieure) dans son context regional à la fin du Bronze ancien'. In M. al-Maqdissi, V. Matoïan and C. Nicolle (eds) *Céramique de l'Age du Bronze en Syrie. II.* (*Bibliothèque Archéologique et Historique*). Institut Français du Proche-Orient, Beirut.
- Bourke, S. 2000. 'Pella in the Early Bronze Age'. In G. Philip and D. Baird (eds) *Breaking with the Past: Ceramics and Change in the Early Bronze Age of the Southern Levant*. Sheffield University Press, Sheffield: 233-255.
- Braemar, F. and Échallier, J.-C. 2000. 'A summary statement on the EBA ceramics from southern Syria, and the relationship of this material with that of neighbouring regions'. In G. Philip and D. Baird (eds) *Breaking with the Past: Ceramics and Change in the Early Bronze Age of the Southern Levant*. Sheffield University Press, Sheffield: 403-411.
- Braemar, F., Échallier, J.-C. *et al.* 2004. *Khirbet Al Umbashi*. Bibliotheque Archeologique et Historique. Institut Français du Proche-Orient, Beirut.
- Braidwood, R.J.B. and Braidwood, L.S. 1960. *Excavations in the Plain of Antioch I. The Earlier Assemblges, Phases A-J.* Chicago University Press, Chicago.
- Braun, E. 2000. 'Area G at Afridar, Palmahim Quarry 3 and the earliest pottery of Early Bronze Age I: part of the missing link'. In G. Philip and D. Baird (eds) *Breaking with the Past: Ceramics and Change in the Early Bronze Age of the Southern Levant*. Sheffield University Press, Sheffield: 113-129.
- Breniquet, C. 2008. Essai sur le tissage en Mésopotamie: Des premières communautés sèdentaires au milieu du IIIe millénaire avant J.C. De Boccard, Paris.
- Broshi, M. and Gophna, R. 1984. 'The settlement and population of Palestine during the Early Bronze Age II-III'. In *BASOR* 253: 41-52.
- Burney, C.A. 1989. 'The Khirbet Kerak question and the Early Transcaucasian background'. In P. de Miroschedji (ed.) *L'Urbanisation de la Palestine à l'Age du Bronz Ancien*. British Archaeological Reports, International Series No. 527. British Archaeological Reports, Oxford: 331-339.

- Casana, J. 2004. 'The archaeological landscape of Late Roman Antioch'. In J.A.R. Huskinson and B. Sandwell (eds) *Culture and Society in Later Roman Antioch*. Oxbow, Oxford: 102-25.
- Casana, J. 2007. 'Structural transformations in settlement systems of the Northern Levant'. In *American Journal of Archaeology* 111(2): 195-222.
- Castel, C., Archambault, D., Barge, O., Boudier, T., Courbon, P., Cuny, A., Gonder, S., Herveux, L., Isnard, F., Martin, L., Monchambert, J.-Y., Malin, B. and Sanz, S. 2005. 'Rapport préliminaire sur les activities de la mission archéologique Franco-Syrienne dans la micro-region d'Al-Rawda (Shamiyeh); deuxième et troisième campagnes (2003 et 2004)'. In *Akkadia* 126: 51-96.
- Castel, C. and Peltenburg, E. 2007. 'Urbanism on the margins; third millennium BC Al-Rawda in the arid zone of Syria'. In *Antiquity* 81(313): 601-616.
- Champion, T. (ed.) 1989. Centre and Periphery: Comparative Studies in Archaeology. Unwin Hyman, London.
- Charlton, T.H., Nichols, D.L. and Chalton, C.O. 1991. 'Aztec craft production and specialization: archaeological evidence from the city-state of Otumba, Mexico'. In *World Archaeology* 23: 98-114.
- Chase-Dunn, C. and Hall, T.D. (eds) 1991. *Core/Periphery Relations in Precapitalist Worlds*. Westview, Boulder.
- Chesson, M.S. 2000. 'Ceramics and daily life in the EBA household: form, function and action in residential compounds at Tell el-Haridaquq South, Jordan'. In G. Philip and D. Baird (eds) *Breaking with the Past: Ceramics and Change in the Early Bronze Age of the Southern Levant*. Sheffield University Press, Sheffield: 365-378.
- Chesson, M.S. and Philip, G. 2003. 'Tales of the city? 'Urbanism' in the Early Bronze Age Levant from Mediterranean and Levantine perspectives'. In *Journal of Mediterranean Archaeology* 16(1): 3-16.
- Childe, V.G. 1928. The Most Ancient Near East: The Oriental Prelude to European Prehistory. Kegan Paul, London.
- Chisholm, M. 1962. Rural Settlement and Land Use: An Essay in Location. Hutchinson, London.
- Contenson, H. de., 1992. *Préhistoire de Ras Shamra: les Sondages Stratigraphique de 1955 à 1976*. Éditions Recherche des les Civilisations, Paris.
- Costin, C.L. 2001. 'Craft production systems'. In G.M. Feinman and T.D. Price (eds) *Archaeology At the Millennium : A Sourcebook*. Plenum Press, New York : 273-327.
- Crumley, C. 1995. 'Heterarchy and the analysis of complex societies'. In R. Ehrenreich, C. Crumley and J. Levy (eds). *Heterarchy and the Analysis of Complex Societies*. Archaeological Papers of the American Anthropological Association No. 6, Washington DC, pp.1-5.
- Dessel, J.P. and Joffee, A.H. 2000. 'Alternative approaches to Early Bronze Age pottery'. In G. Philip and D. Baird (eds) *Ceramics and Change in the Early Bronze Age of the Southern Levant*, 31-59. Sheffield Academic Press, Sheffield.

- Dever, W.G. 1987. 'Palestine in the Middle Bronze Age: the zenith of the urban Canaanite era'. In *Biblical Archaeologist* 50(3): 149-177.
- Dobnes, M.A. and Hoffman, C.R. 1994. 'Social agency and the dynamics of prehistoric technology'. In *Journal of Archaeological Method and Theory* 1: 211-58.
- Douglas, K. And Kafifi, Z. 2000. 'The main aspects of the Early Bronze I pottery from Jebel Abu Thawwab, North Jordan'. In G. Philip and D. Baird (eds) *Breaking with the Past: Ceramics and Change in the Early Bronze Age of the Southern Levant*. Sheffield University Press, Sheffield: 101-113.
- Dunand, M. 1937. *Fouilles de Byblos t.1, 1926-1932*. Bibliothèque archéologique et historique (Haut Commissariat de la République Française en Syrie, et au Liban, Service de antiquités): t.24 Études et documents d'archéologie (République libanaise, Direction de l'instruction publique et des beaux-arts), t.1 1926-1932. Geuthner, Paris.
- Dunand, M. 1950. *Fouilles de Byblos t.2, 1933-1938*. Études et documents d'archéologie (République libanaise, Direction de l'instruction publique et des beaux-arts), t.3 1933-1938. Maisonneux, Paris.
- Dunnell, R.C. 1992. 'Archaeology and evolutionary science'. In L. Wandsnider (ed.) *Quandaries and Quests: Visions of Archaeology's Future*, Occasional Paper No. 20, Center for Archaeological Investigations, Southern Illinois University Press, Carbondale: 209-221.
- Earle, T. (ed.) 1991c. *Chiefdoms: Power, Economy, and Ideology*. Cambridge University Press, Cambridge.
- Eerkins, J.W. and Lipo, C.P. 2007. 'Cultural transmission theory and the archaeological record: providing context to understanding variation and temporal changes in material culture'. In *Journal of Archaeological Research* 15: 139-274.
- Ehrenreich, R., Crumley, C. and Levy, J. (eds). 1995. *Heterarchy and the Analysis of Complex Societies*. Archaeological Papers of the American Anthropological Association, No. 6, Washington DC.
- Elkholm, G.F. and Willey, G.R. (eds). 1996. *Archaeological Frontiers and External Connections*. University of Texas Press, Austin.
- Emberling, G. 1997. "Ethnicity in Complex Societies: Archaeological Perspectives", in *Journal of Archaeological Research* 5: 295-344.
- Epstein, C. and Gutmann, S. 1972. 'The Golan'. In M. Kochavi (ed.) *Judea, Samaria and the Golan, Archaeological Survey 1967-1968*. The Archaeological Survey of Israel, Jerusalem: 244-298.
- Epstein, C. 1985. 'Dolmens excavated in the Golan'. In Atigot 17: 20-58.
- Epstein, C. 1998. The Chalcolithic Culture of the Golan. Israel Antiquities Authority, Jerusalem.
- Esse, D.L. 1991. Subsistence, Trade and Social Change in Early Bronze Age Palestine. Studies in Ancient Oriental Civilisation 50. University of Chicago Press, Chicago.

- Falconer, S.E. and Savage, S.H. 1995. 'Heartlands and hinterlands: alternative trajectories of early urbanization in Mesopotamia and the southern Levant'. In *American Antiquity* 60: 37-58.
- Falkenstein, A. 1974 (1954). The Sumerian Temple City. Undena, Malibu.
- Faust, A. and Golani, A. 2008. 'A community in transition: the Early Bronze Age site at Qiryat Ata as a test case'. In *Tel Aviv* 35: 215-243.
- Faust, A. and Ashkenazy, Y. 2009. 'Settlement fluctuations and environmental changes in Israel's coastal plain during the Early Bronze Age'. In *Levant* 41(1): 19.
- Feinman, G.M. and Nicholas, L.M. 2004. 'Unraveling the pre-Hispanic highland Mesoamerican economy'. In G.M. Feinman and L.M. Nicholas (eds) *Archaeological Perspectives on Ancient Political Economies*. University of Utah Pres, Salt Lake City: 167-221.
- Fischer, P.M. 2000. 'The Early Bronze Age at Tell Abu al-Kharaz, Jordan Valley: a study of pottery typology and provenance, radiocarbon dates and the synchronization of Palestine and Egypt during Dynasty 0-2'. In G. Philip and D. Baird (eds) *Ceramics and Change in the Early Bronze Age of the Southern Levant*, 201-233. Sheffield Academic Press, Sheffield.
- Fischer, P.M. 2008. *Tell Abu Al-Kharaz in the Jordan Valley. Volume I. The Early Bronze Age.* Verlag der Österreichischen Akademie der Wissenschaften.
- Fisher, J.F. 1986. *Trans-Himalayan Traders, Economy, Society, and Culture in Northwest Nepal.* University of California Press, Berkeley.
- Frangipane, M. 2001. 'Centralization processes in Greater Mesopotamia: Uruk expansion as the climax of systematic interactions among areas of the greater Mesopotamian region'. In Rothman, S. (ed.) *Uruk Mesopotamia and its Neighbors: Cross Cultural Interaction in the Era of State Formation*. School of American Research Press, Santa Fe.
- Frank, A.G. 1993. 'The Bronze Age world system and its cycles'. In *Current Anthropology* 34: 383-413.
- Frankel, R., Getzov, N., Aviam, M. and Degani, A. 2001. Settlement Dynamics and Regional Diversity in Ancient Upper Galilee, Archaeological Survey of Upper Galilee. IAA Reports No. 14. Israel Antiquity Authority, Jerusalem.
- Frankenstein, S. and Rowlands, M. 1978. 'The internal structure and regional context of the Early Iron Age society in southwestern Germany'. In *London University of Archaeology Bulletin* 15: 73-112.
- Genz, H. 2004. 'Early Bronze Age potmarks from Khirbat az Zayraqun: some aspects concerning their meaning'. In A. Hadidi (ed.) *Studies in the History and Archaeology of Jordan. VII.* Department of Antiquities, Hashemite Kingdom of Jordan, Amman.
- Geyer, B. and Calvert, Y. 2001. 'Les Steppes arides de la Syrie du Nord au Bronze ancient ou "la première conquête de l'est". In B. Geyer (ed.) Conquête de la Steppe et Appropriation des Terres sur les Marges Arides du Croissant Fertile. (Travaux de la Maison de l'Orient Méditerranean 36). Maison de l'Orient, Lyon: 55-67.

- Geyer, B. and Rousset, M.-O. 2001. 'Les steppes arides de la Syrie du Nord à l'époque byzantine ou la ruée ves l'Est'. In B. Geyer (ed.) Conquête de la Steppe et Appropriation des Terres sur les Marges Arides du Croissant Fertile (Travaux de la Maison du l'Orient Méditerranean 36). Maison de l'Orient, Lyon; 111-21.
- Gianessi, D. 2002. 'Tell Afis; the Late Chalcolithic Painted Ware'. In Levant 34: 83-97.
- Gibson, M., Al-Azm, A., Reichel, C., Al-Quntar, S., Franke, J., Khalidi, L., Hritz, C., Altaweel, M., Coyle, C., Colantoni, C., Tenney, J., Aziz, G. and Hartnell, T. 2002. 'Hamoukar: a summary of three season of excavation'. In *Akkadica* 123: 11-34.
- Gilman, A. 1991. 'Trajectories towards social complexity in the later prehistory of the Mediterranean'. In T. Earle (ed.) *Chiefdoms: Power, Economy, and Ideology*. Cambridge University Press, Cambridge: 146-168.
- Gilman, A. 1991. 'Trajectories towards social complexity in the later prehistory of the Mediterranean'. In T. Earle (ed.) *Chiefdoms: Power, Economy, and Ideology*. Cambridge University Press, Cambridge, pp. 146-168.
- Gledhill, J., Bender, B. and Larsen, M.T. 1989. *State and Society: The Emergence and Development of Social Hierarchy and Political Centralization*. Unwin Hyman, London.
- Going, C.J. 1992. 'Economic 'Long Waves' in the Roman period: a reconnaissance of the Romano-British ceramic evidence'. In *Oxford Journal of Archaeology* 11: 93-117.
- Golani, A. 1999. 'New perspectives on domestic architecture and the initial stages of urbanization in Canaan'. In *Levant* 31: 123-33.
- Greenberg, R. 1996. 'Early Bronze levels'. In A. Burian, D. Ilan and R. Greenberg (eds) *Dan I, A Chronicle of the Excavations, the Pottery Neolithic, the Early Bronze and the Middle Bronze Age Tomb*. Hebrew Union College, Jerusalem: 86-160.
- Greenberg, R. 2000. 'Changes in ceramic production between Early Bronze Age II and III in Northern Israel, based on the pottery of Tell Hazor and Tel Dan'. In G. Philip and D. Baird (eds) *Breaking with the Past: Ceramics and Change in the Early Bronze Age of the Southern Levant.* Sheffield University Press, Sheffield: 183-201.
- Greenberg, R. 2006. 'What's cooking in EBII?'. In A. Maeir and P. de Miroschedji (eds) "I Will Speak the Riddles of Ancient Times": Archaeological and Historical Studies in Honor of Amihai Mazar on the Occasion of his Sixtieth Birthday. Eisenbrauns, Winona Lake: 39-47.
- Greenberg, R., Eisenberg, E. et al. 2006. Bet Yerah, The Early Bronze Age Mound. Volume I. Excavation Reports 1933-1986. Israel Antiquities Authority, Jerusalem.
- Grigson, C. 1995. 'Plough and pasture in the early economy of the Southern Levant'. In T.E. Levy (ed.) *The Archaeology of Society in the Holy Land*. Leicester University Press, Leicester: 245-268.
- Grigson, C. 2006. 'Farming? Feasting? Herding? Large mammals from the Chalcolithic of Gilat'. In T.E. Levy (ed.) *Archaeology, Anthropology and Cult: The Sanctuary at Gilat, Israel.* Equinox, London.

- Haldane, C. 1993. 'Direct evidence for organic cargoes in the Late Bronze Age'. In *World Archaeology* 24: 348-360.
- Hall, T.D. and Chase-Dunn, C. 1993. 'The world-systems perspective and archaeology: Forward into the past'. In *Journal of Archaeological Research* 1: 121-143.
- Hallpike, C.R. 1986. The Principles of Social Evolution. Oxford University Press, Oxford.
- Harrison, T.P. 2000. 'The Early Bronze III ceramic horizon for Highland Central Jordan'. In G. Philip and D. Baird (eds) *Ceramics and Change in the Early Bronze Age of the Southern Levant*, 347-365. Sheffield Academic Press, Sheffield.
- Hegemony, M. 1998. 'Technology, style and social practices: archaeological approaches'. In M.T. Stark (ed.) *The Archaeology of Social Boundaries*. Smithsonian Institute Press, Washington: 262-79.
- Hennessey, J.B. 1967. *The Foreign Relations of Palestine During the Early Bronze Age*. Colt Archaeological Institute Publications. Colt Archaeological Institute, London.
- Henrickson, E. and Thuesen, I. (eds) 1989. *Upon This Foundation The Ubaid Reconsidered*. Carsten Niebuhr Institute Publication No. 10, Copenhagen.
- Hijara, I. 1973. 'Excavations at Tell Qalinj Agha (Erbil)'. In Sumer 29: 13-34 (Arabic section).
- Hillman, G.C. 1973. 'Crop husbandry and food production: modern basis for the interpretation of plant remains'. In *An St* 23: 241-244
- Hillman, G. 1981. 'Reconstructing crop husbandry practices from charred remains of crops'. In Mercer, R. *Farming Practice in British Prehistory*. Edinburgh University Press, Edinburgh.
- Hodder, I. 1980. 'Trade and exchange: definitions, identification, and function'. In R.E. Fry (ed.) *Models and Methods in Regional Exchange*. Papers No. 1, Society for American Archaeology, Washington DC: 151-156.
- Hodder, I. 1986. Reading the Past. Cambridge University Press, Cambridge.
- Holmes, W.H. 1886. Ancient Pottery of the Mississippi Valley, Fourth Annual Report of the Bureau of Ethnology, 1882-83. Smithsonian Institution, Washington DC: 361-436.
- Horden, P. and Purcell, N. 2000. *The Corrupting Sea: A Study of Mediterranean History*. Blackwell, Oxford.
- Hutterer, K.L. 1977b. 'Preface'. In K.L. Hutterer (ed.) *Economic Exchange and Social Interaction in Southeast Asia: Perspectives from Prehistory, History and Ethnography*. Center for South and Southeast Asian Studies, University of Michigan, Ann Arbour: xiii-ix.
- Joffe, A.H. Settlement and Society in the Early Bronze I and II of the Southern Levant: Complementarity and Contradiction in a Small-Scale Complex Society. Sheffield Academic Press, Sheffield.
- Jones, G. 1984. 'Interpretation of archaeological plant remains: ethnographic models from Greece'. In W. van Zeist and W. Casparie (eds.) *Plants and Ancient Man*. Rotterdam: A. A. Balkema. pp. 43 61.

- Jones, G. 1987. 'A statistical approach to the archaeological identification of crop processing'. In *Journal of Archaeological Science* 14: 311-23.
- Jones, G 1990. 'The application of present-day cereal processing studies to charred archaeobotanical remains'. In *Circaea* 6: 91 96.
- Jones, G. 1991. 'Numerical analysis in Archaeobotany'. In van Zeist, W, Wasylikowa, K. and Behre, K.E. (eds.) *Progress in Old World Palaeoethnobotany* pp. 63-80. Balkema, Rotterdam.
- Jones, G.E.M. 1992. 'Weed phytosociology and crop husbandry: identifying a contrast between ancient and modern practice'. In *Review of Palaeobotany and Palynology* 73:133-143.
- Junker, L.L. 1993. 'Crafts goods specialization and prestige goods exchange in Philippine chiefdoms of the fifteenth and sixteenth centuries'. In *Asian Perspectives* 32: 1-35.
- Kamlah, J. 2000. 'Early Bronze Age Grain Wash decoration from Northern Jordan: the evidence of the Zeraqon survey'. In G. Philip and D. Baird (eds) *Ceramics and Change in the Early Bronze Age of the Southern Levant*, 287-295. Sheffield Academic Press, Sheffield.
- Kamp, K. and Yoffee, N. 1981. "Ethnicity in Ancient Western Asia during the Early Second Millennium BC: Archaeological Assessments and Ethnoarchaeological Perspectives", in *Bulletin of the American Schools of Oriental Reasearch* 237: 85-104.
- Kantor, H.J. 1992. 'The relative chronology of Egypt and its foreign correlations before the First Intermediate Period'. In R.W. Ehrich (ed.) *Chronologies in Old World Archaeology*. University of Chicago Press, Chicago: 3-21.
- Kemp, B.J. 1983. 'Old Kingdom, Middle Kingdom and Second Intermediate Period c.2686-1552'. In B.G. Trigger, B.J. Kemp, D. O'Conner and A.B. Lloyd (eds) *Ancient Egypt: A Social History*. Cambridge University Press, Cambridge: 71-182.
- Knapp, A.B. and Cherry, J.F. 1994. *Provenience Studies and Bronze Age Cyprus*. Prehistory Press, Madison WI.
- Kenyon, K.M. 1960. Excavations at Jericho I. British School of Archaeology in Jerusalem, London.
- Knorzer. 1970. Novaesium IV. Bmevzatliche Pflanzenfunde aus Neus 5. Limesforschungen 10 Berlin.
- Kochavi, M. 1993. 'Leviah Enclosure'. In E. Stern *et al.* (eds) *New Encyclopedia of Archaeological Excavations in the Holy Land* Volume III. Israel Exploration Society, Jerusalem: 915-916.
- Kramer, C. 1997. "Pots and Peoples", in T.C. Young and L.D. Levine, eds., *Mountains and Lowlands*. Undena, Malibu, pp.91-112.
- Kristiansen, K. 1991. 'Chiefdoms, states and systems of social evolution'. In T. Earle (ed.) *Chiefdoms: Power, Economy and Ideology*. Cambridge University Press, Cambridge, pp. 16-43.
- Kroeber, A.L. 1916. Zuni Potsherds, Anthropological Paper No. 18, Part 1. American Museum of Natural History, New York.
- Levy, T. (ed.) 1995. The Archaeology of Society in the Holy Land. Facts on File, New York.

- London, G. 1989. 'A comparison of two life styles of the late second millennium BC'. In *BASOR* 273: 37-55.
- Lovell, J. 2002a. The Late Neolithic and Chalcolithic Periods in the Southern Levant: New Data from the Site of Teleilat Ghassul, Jordan. Oxford University Press, Oxford.
- Lyman, R.L., O'Brien, M.J. and Dunnell, R.C. 1997. *The Rise and Fall of Cultural History*. Plenum Press, New York.
- Lyman, R.L. 2000. 'Culture historical and biological approaches to identifying homologous traits'. In T.D. Hurt and G.F.M. Rakita (eds) *Style and Function. Conceptual Issues in Evolutionary Archaeology*. Bergin and Garvey, Westport CT: 69-89.
- Lyman, R.L. and O'Brien, M. 2000. 'Measuring and explaining change in artefact variation with clade-diversity diagrams'. In *Journal of Anthropological Archaeology* 19: 39-74.
- Mabogunje, A.L. 1962. Yoruba Towns. Ibadan University Press, Ibadan.
- Malville, N.J. 2001. 'Long-distance transport of bulk goods in the pre-Hispanic American Southwest'. In *Journal of Anthropological Archaeology* 20: 230-243.
- Marcus, E. 1998. 'Maritime trade in the Southern Levant from earliest times through the Middle Bronze IIa Period'. DPhil thesis, Oxford University, Oxford.
- Marcus, E. 2002. 'Early seafaring and maritime activity in the southern Levant from prehistory through the third millennium BCE'. In van den Brink and Levy (eds) *Egypt and the Levant: interrelations from the 4th through the early 3rd millennium BC*. Leicester University Press, London: 213-22
- Marfoe, L., *et al*, "Arjoune, 1978: Preliminary Investigation of a Prehistoric Site in the Homs Basin, Syria", *Levant* XIII (1981), 1-27.
- Marfoe, L. 1995. *Kamid el-Loz 13. The Prehistoric and Early Historic Context of the Site*. Saarbrücker Bieträger zur Altertumskunde Bd.41. Rudolf Habelt, Bonn.
- Mathias, V.T. and Parr, P.J., 1989. 'The early phases at Tell Nebi Mend: A preliminary account', in *Levant* XXI (1989), 13-33.
- Mathias, V.T. 2000. 'The Early Bronze Age Pottery of Tell Nebi Mend in its Regional Setting'. In G. Philip and D. Baird (eds) *Ceramics and Change in the Early Bronze Age of the Southern Levant*, 411-427. Sheffield Academic Press, Sheffield.
- Mazar, A. 1990. Archaeology of the Land of the Bible. Doubleday, New York.
- Mazar, A. and Rotem, Y. 2009. 'Tel Beth Shean during the EB IB period: evidence for social complexity in the late 4th millennium BC'. In *Levant* 41(2): 131-153.
- Mazzoni, S. 1991. "Ebla e la formazione della cultura urbana in Siria", in *La Parola del Passato* 46: 163-194.
- Mazzoni, S. And Gianessi, D. 1998. 'Area EI Late Chalcolithic, Early, Middle and Late Bronze I Ages'. In S.M. Checchini and S. Mazzoni (eds) *Tell Afis (Siria) Scavi sull'acropoli 1988-1992. The 1988-92 Excavations on the Acropolis.* Edizioni ETS, Pisa: 9-121.

- McCorriston, J. 1997. 'The fiber revolution: textile extensification, alienation, and social stratification in Ancient Mesopotamia'. In *Current Anthropology* 38(4): 517-549.
- McIntyre, S. 1994. MA Dissertation. University of Durham, Durham.
- Meggers, B., Evans, C., and Estrada, B. 1965. *Early Formative Period of Coastal Ecuador: The Valdiva and Machalilla Phases*. Smithsonian Contributions to Anthropology I, Smithsonian Institution, Washington DC.
- Miroschedji, P. de. 1971. *L'epoque Préurbaine et Palestine*. Cahiers de la Revue Biblique 13. Garbalda, Paris.
- Miroschedji, P. de. 1986. "Céramiques et Mouvements de Population: le cas de la Palestine au IIIe. Millénaire", in *A Propos de Interprétations Archéologiques de la Poterie* (ed. *Recherche sur les Civilisations*), Paris.
- Miroschedji, P. de. 2000. 'An Early Bronze Age III pottery sequence for Southern Israel'. In G. Philip and D. Baird (eds) *Breaking with the Past: Ceramics and Change in the Early Bronze Age of the Southern Levant*. Sheffield University Press, Sheffield: 315-347.
- Mithen, S.J. 1997. 'Cognitive archaeology, evolutionary psychology, and cultural transmission with particular reference to religious ideas'. In C.M. Barton and G.A. Clark (eds) *Rediscovering Darwin: Evolutionary Theory in Archaeological Explanation*. Archaeological Paper No. 7, American Anthropological Association, Washington DC: 67-74.
- Mizrachi, Y., Zohar, M., Kochavi, M., Murphy, V. and Lev-Yadun, S. 1996. 'The 1988-1991 excavations at Rogem Hiri, Golan Heights'. In *Israel Exploration Journal* 46: 167-207.
- Moffett, L. 1989. 'Appendix. Early Bronze Age plant remains from Tell Nebi Mend. A preliminary report'. In *Levant* 21: 29-32.
- Morandi-Bonacossi, D. (?). 'Tell Mishrifeh and its region during the EBAVI and the EBA-MBA transition. A first assessment'. In P. Parr (ed.) *The Levant in Transition ; the Intermediate Early Bronze Age (Annual of the Palestine Exploration Fund)*. Maney, Leeds.
- Oates, J., McMahon, A., Karsgaard, P., Al Quntar, S. and Ur, J. 2007. 'Early Mesopotamian urbanism: a new view from the north'. In *Levant* 81(313): 585-600.
- O'Brien, M.J. and Lyman, R.L. 1999. Seriation, Stratigraphy, and Index Fossils: The Backbone of Archaeological Dating. Kluwer Academic/Plenum Press, New York.
- O'Brien, M.J. and Lyman, R.L. 2002. 'The epistemological nature of archaeological units'. In *Anthropological Theory* 2: 37-56.
- O'Brien, M.J. and Lyman, R.L. 2003. 'Style, function, transmission: An introduction'. In M.J. O'Brien and R.L. Lyman (eds) *Style, Function, Transmission: Evolutionary Archaeological Perspectives*. University of Utah Press, Salt Lake City: 1-32.
- Oka, R. and Kusimba, C.M. 2008. 'The archaeology of trading systems, Part 1: Towards a new trade synthesis'. In *Journal of Archaeological Research* 16: 339-395.

- Oldenburg, E. 1991. *Sukas IX. The Chalcolithic and Early Bronze Age Periods*. The Royal Danish Academy of Sciences and Letters, Copenhagen.
- Ollsson, G. 1965. *Distance and Human Interaction: A Review and Bibliography*. Regional Science Research Institute, Philadelphia PA.
- Padgett, J.F. 2001. 'Organizational genesis, identity and control: the transformation of banking in Renaissance Florence'. In J.E. Rauch and A. Casella (eds) *Networks and Markets*. Russell Sage, New York: 211-257.
- Parr, P.J. 1983. 'The Tell Nebi Mend Project'. In AAAS XXXIII(2): 99-117.
- Paynter, R. 1989. 'Archaeology of equality and inequality'. In *Annual Review of Anthropology* 18: 369-399.
- Paz, Y. 2003. 'The Golan 'enclosures' and the urbanization process in the central and Southern Golan during the Early Bronze Age'. PhD dissertation. The University of Tel Aviv, Tel Aviv. (Hebrew with English abstract).
- Paz, Y. and Iserlis, M. 2009. 'Golanite production and distribution center of cooking pots during the Early Bronze Age II'. In S. Rosen and V. Roux (eds) *Anthropological Perspectives on Technology in the Archaeology of the Proto-Historic and Early Historic Periods in the Southern Levant*. De Boccard, Paris: 99-110.
- Peña-Chocarro, L. and Rottoli, M. 2007. 'Crop Husbandry Practices during the Bronze and Iron Ages in Tell Mishrifeh (Central-Western Syria)'. In Morandi Bonacossi, D. (ed.) *Urban and Natural Landscapes of an Ancient Syrian Capital: Settlement and Environment at Tell Mishrifeh/Qatna and in Central-Western Syria*. Forum: University of Udine. Pp. 123-143.
- Peregrine, P.N. 1991a. 'Prehistoric chiefdoms on the American mid-continent: a world system based on prestige goods'. In C. Chase-Dunn and T.D. Hall (eds) *Core/Periphery Relations in Pre-Capitalist Worlds*. Westview Press, Boulder CO: 193-211.
- Peregrine, P.N. 1991b. 'Some political aspects of craft specialization'. In *World Archaeology* 23: 1-11.
- Peregrine, P.N. 1996a. 'Hyperopia or hyperbole? The Mississippian world system'. In P.N. Peregrine and G.M. Feinman (eds) *Pre-Colombian World Systems*. Prehistory Press, Madision WI: 39-50.
- Petrie, W.M.F. 1899. 'Sequences in prehistoric remains'. In *Journal of the Royal Anthropological Institute of Great Britain and Ireland* 29: 295-301.
- Philip, G. 2001. 'The Early Bronze I-III Ages'. In B. MacDonald, R. Adams and P. Bienkowski (eds) *The Archaeology of Jordan (Levantine Archaeology I)*. Sheffield Academic Press, Sheffield: 162-232.
- Philip, G. 2002. 'Contacts between the 'Uruk' world and the Levant during the fourth millennium BC: evidence and interpretation'. In J.N. Postgate (ed.) *Artefacts of Complexity. Tracking the Uruk in the Near East.* Aris and Philips, Warminster: 207-35.

- Philip, G., Jarbour, F., Beck, A., Bshesh, M., Grove, J., Kirk, A. and Millard, A. 2002. 'Settlement and landscape development in the Homs region, Syria: research questions, preliminary results 1999-2000 and future potential'. In *Levant* 34: 1-23.
- Philip, G. 2003. 'The Early Bronze Age of the southern Levant: a landscape approach'. In *Journal of Mediterranean Archaeology* 16: 103-32.
- Philip, G., Abdulkarim, M., Newson, P., Beck, A., Bridgland, D., Bshesh, M., Shaw, A., Westaway, R., Wilkinson, K. 2005. 'Settlement and landscape development in the Homs region, Syria. Report on work undertaken during 2001-2003'. In *Levant* 37: 21-42.
- Philip, G. 2007. 'Natural and cultural aspects of the development of the marl landscape east of Lake Qatina during the Bronze and Iron Ages'. In D. Morandi Bonacossi (ed.) *Urban and Natural Landscapes of an Ancient Syrian Capital. Settlement and Environment at Tell Mishrifeh/Qatna and in Central-Western Syria. Proceedings of the International Conference held in Udine*, 9-11 *December* 2004. Forum Editrice, Udine: 218-26.
- Philip, G. and Bradbury, J. 2010. 'Pre-Classical activity in the basalt landscape of the Homs region, Syria: implications for the development of 'sub-optimal' zones in the Levant during the Chalcolithic-Early Bronze Age'. In *Levant* 42(2): 136-169.
- Polanyi, K., Arensberg, C.M. and Pearson, H.W. 1957. *Trade and Market in the Early Empires*. Free Press, Glencoe IL.
- Pollock, S. And Coursey, C. 1995. 'Ceramics from Hacinebi Tepe: chronology and connections'. In *Anatolia* 21: 101-141.
- Preucel, R. (ed.) 1991. *Processual and Postprocessual Archaeologies*. Centre of Archaeological Investigations, Occasional Paper No. 10, Southern Illinois University, Carbondale.
- Rast, W.E. and Schaub, R.T. 2003. *Bâb edh-Dhra': Excavations at the Town Site (1975-1981)*. 2 vols. Report of the Expedition to the Dead Sea Plains 2. Eisenbrauns, Winona Lake, Indiana.
- Redding, R. 1993. 'Subsistence security as a selective pressure favouring increased cultural complexity'. In *Bulletin on Sumerian Agriculture* 7(1): 77-98.
- Rice, P. 1987. Pottery Analysis: A Sourcebook. University of Chicago Press, Chicago.
- Richard, S. 1987. 'The Early Bronze Age: the rise and collapse of urbanism'. In *Biblical Archaeologist* 50: 22-43.
- Rosen, A. 2008. 'Desert pastoral nomadism in the Longue Durée'. In H. Barnard and W. Wendrich (eds) *The Archaeology of Mobility: Old World and New World Nomadism*. Cotsen Archaeological Institute, Los Angeles: 115-40.
- Rosen, S. and Roux, V. 2009. Anthropological Perspectives on Technology in the Archaeology of the Proto-Historic and Early Historic Periods in the Southern Levant. De Boccard, Paris.
- Rothman, M. 2002. *Tepe Gawra: The Evolution of a Small Prehistoric Center in Northern Iraq.* University Museum Monographs 112, Philadelphia.

- Roux, V. and Corbetta, D. 1989. *The Potter's Wheel. Craft Specialization and Technical Competence*. Oxford and IBH Publishing, Oxford.
- Roux, V. and Courty, M.-A. 1997. 'Les bois élaborés au tour d'Abu Hamid: rupture technique au 4<sup>th</sup> millénaire avant J.-C. dans le Sud Levant.' In *Paléorient* 23: 25-43.
- Roux, V. 2003. 'A dynamic systems framework for studying technological change: application to the emergence of the potter's wheel in the Southern Levant'. In *Journal of Archaeological Method and Theory* 10: 1-30.
- Roux, V. and Miroschedji, P. de. 2009. 'Revisiting the history of the potter's wheel in the Southern Levant'. In *Levant* 41(2): 155-173.
- Saghieh, M. 1983. *Byblos in the third millennium BC: a reconstruction of the stratigraphy and a study of the cultural connections.* Aris and Phillips, Warminster.
- Sahlins, M.D. 1976. Culture and Practical Reason. University of Chicago Press, Chicago.
- Savage, S.H. 'Assessing departures from log-normality in the rank-size rule'. In *Journal of Archaeological Science* 24: 233-244.
- Schaub, R.T. 1982. 'The Origins of the Early Bronze Age Walled Town Culture of Jordan'. In A. Hadidi (ed.) *Studies in the History and Archaeology of Jordan* 2. 67-75. Department of Antiquities in Jordan, Amman.
- Schortman, E. and Urban, P. (eds). 1992b. *Resources, Power and Interregional Interaction*. Plenum, New York.
- Schortman, E.M. and Urban, P. (eds). 1992b. *Resources, Power and Interregional Interaction*. Plenum, New York.
- Schortman, E.M. and Urban, P.A. 2004. 'Modeling the roles of craft production in ancient political economies'. In *Journal of Archaeological Research* 12: 185-226.
- Schneider, J. 1991. 'Was there a pre-capitalist world system?' In C. Chase-Dunn and T.D. Hall (eds) *Core/Periphery Relations in Pre-Capitalist Worlds*. Westview Press, Boulder CO: 45-66.
- Schwartz, G. and Falconer, S. (eds) 1994. *Archaeological Views from the Countryside*. Smithsonian Institution Press, Washington DC.
- Shanks, M. and Tilley, C. 1987. *Social Theory and Archaeology*. Cambridge University Press, Cambridge.
- Silver, M. 1986. Economic Structures of the Ancient Near East. Barnes and Noble, Totowa, NJ.
- Sinopoli, C. 1994a. 'The archaeology of empires'. In Annual Review of Anthropology 23: 159-180.
- Sinopoli, C.M. 2003. *The Political Economy of Craft Production: Crafting Empire in South India, c.1350-1650*. Cambridge University Press, Cambridge.
- Smith, A. 2005. Climate, Culture and Agriculture: Examining Change in the Near East during the Bronze and Iron Ages. Unpublished PhD thesis Boston University Graduate School of Arts and Sciences.

- Stager, L.E. 1992. 'The Periodization of Palestine from Neolithic through Early Bronze Times'. In R.W. Elrich (ed.) *Chronologies of Old World Archaeology*, 22-41. University of Chicago Press, Chicago.
- Stieglitz, R.R. 1984. 'Long distance seafaring in the ancient Near East'. In BA 47: 134-42.
- Stein, G. and Rothman, M.S. (eds). 1994. *Chiefdoms and Early States in the Near East: The Organizational Dynamics of Complexity*. Prehistory Press, Madison, WI.
- Stein, G.J. 1999. Rethinking World-Systems: Diasporas, Colonies, and Interaction in Uruk Mesopotamia. University of Arizona Press, Tucson.
- Stein, G.J. 2002. 'From passive periphery to active agents: emerging perspectives in the archaeology of interregional interaction'. In *American Anthropology* 104: 903-916.
- Steward, J.H. 1949. 'Cultural Causality ands Law: A Trial Formulation of the Development of Early Civilisations'. In *American Anthropologist* 51: 1-27.
- Stone, E.C. 1997. 'City-states and Their Centres: The Mesopotamian Example'. In D.L. Nichols and T.H. Charlton (eds) *The Archaeology of City-States: Cross-Cultural Approaches*, pp. 15-26. Smithsonian Institution Press, Washington DC.
- Theusen, I. 1988. *Hama: Fouilles et Recherches 1931-1938. I., The Pre- and Protohistoric Periods.* Nationalmuseet, Copenhagen.
- Trigger, B. 1972. 'Determinants of Urban Growth in Pre-Industrial Societies'. In. P.J. Ucko, R. Tringham and G.W. Dimbleby (eds) *Man, Settlement, and Urbanism*. Duckworth, London, pp.575-99
- Trigger, B. 1991. 'Distinguised lecture in archaeology: Constraint and freedom a new synthesis for archaeological explanation'. In *American Anthropology* 93: 551-569.
- Trigger, B. 2003. Understanding Early Civilizations. Cambridge University Press, Cambridge.
- Townsend, C.C., Guest, E. and al-Rawi (eds.) 1968. Flora of Iraq Volume 9 Gramineae, Ministry of Agriculture and Agrarian Reform, Baghdad.
- Townsend, C.C. and Guest, E. (eds.) 1974. Flora of Iraq Volume 3 Leguminales, Ministry of Agriculture and Agrarian Reform, Baghdad.
- Townsend, C.C. and Guest, E. (eds.) 1980. Flora of Iraq Volume 4 Part 1 Cornaceae to Rubiaceae (Hutchinson, 1959), Ministry of Agriculture and Agrarian Reform, Baghdad.
- Townsend, C.C. and Guest, E. (eds.) 1980. Flora of Iraq Volume 4 Part 2 Bignoniaceae to Resedaceae (Hutchinson, 1959), Ministry of Agriculture and Agrarian Reform, Baghdad.
- Tylecote, A. 1993. The Long Wave in the World Economy: The Present Crisis in Historical Perspective. Routledge, London.
- Underhill, A.P. 2002. *Craft Production and Social Change in Northern China*. Kluwer Academic, New York.

- Ur, J.A. 2010. 'Cycles of civilisation in Northern Mesopotamia, 4400-2000BC'. In *Journal of Archaeological Research* 18: 387-431.
- van der Veen, M. 1992. *Crop husbandry regimes. An archaeobotanical study of farming in northern England.* Sheffield Archaeological Monographs 3, Sheffield University Press, Sheffield.
- van Zeist, W. and Bakker-Heeres, J.A.H. 1985. Archaeobotanical studies in the Levant 1. Neolithic sites in the Damascus Basin: Aswad, Ghoraifé, Ramad. In *Palaeohistoria* 24: 165-256.
- van Zeist, W. and Buithenhuis, H. 1983. 'A palaeobotanical study of Neolithic Erbaba, Turkey,' In *Anatolica* 10: 47-89.
- Vila, E. 1998. L'exploitation des Animaux en Mésopotamie aux IVe et IIIe millénaires avant J.-C. CNRS, Paris.
- Wachter-Sarkady, C. 1998. 'Archaeobotanical investigations'. In Cecchini, S.M. and Mazzoni, S. (eds.), *Tell Afis (Siria). Scavi sull'acropoli* 1988-1992, Pisa, Edizioni ETS, 451-480.
- Wallerstein, I. 1974. The Modern World System, Capitalist Agriculture and the Origins of the European World Economy in the Sixteenth Century. Academic Press, New York.
- Walker, A. 2008. Bronze Age and Iron Age charred plant remains from Tell Nebi Mend, Syria. Unpublished MSc Thesis, University of Sheffield.
- Weiss, H. 1985. "Protohistoric Syria and the Origins of Cities and Civilization", in *Ebla to Damascus*. *Art and Archaeology in Ancient Syria* (Smithsonian Institution Travelling Exhibition Service, Washington D.C., 1985), 77-89.
- Whincop, M.R. 2007. 'The Iron Age II at Tell Nebi Mend: towards an explanation of ceramic regions'. In *Levant* 39: 185-212.
- Willey, G.R. 1953. 'A pattern of diffusion-acculturation'. In *Southwestern Journal of Archaeology* 9: 369-384.
- Wilkinson, T.J. 1990. Town and Country in Southeastern Anatolia, I. Settlement and Land Use at Kurban Höyük and Other Sites in the Lower Karababa Basin. Oriental Institute, Chicago.
- Wilkinson, T.J. 2000. 'Settlement and land use in the zone of uncertainty in Upper Mesopotamia'. In R.M. Jas (ed.) *Rainfall and Agriculture in Northern Mesopotamia*. Nederlands Historisch-Archaeologisch Institut te Istanbul, Leiden: 3-35.
- Wilkinson, T.J., Ur, J. And Casana, J. 2004. 'From nucleation to dispersal: trends in settlement pattern in the northern fertile crescent'. In S.E. Alcock and J.F. Cherry (eds) *Side-by-Side Survey: Comparative Regional Studies in the Mediterranean World.* Oxbow, Oxford: 189-205.
- Wittfogel, K.A. 1938. 'Die Theorie de orientalischen Gesellschaft'. In Zeitschrift für Sozialforschung 7: 90-122.
- Wood, B.G. 1990. The Sociology of Pottery of Ancient Palestine. JSOT Press, Sheffield.
- Wood, B.G. 1992. 'Potter's Wheel'. In D.N. Freedman *et al.* (eds) *The Anchor Bible Dictionary* 5. Doubleday, New York: 427-8.

- Wright, R. 2002. 'The origin of cities'. In M. Ember and C. Ember (eds) *Encyclopedia of Urban Cultures, Cities and Cultures Around the World I.* Grolier, Danbury (C.T.): 2-11.
- Yoffee, N. and Clark, J. (eds) 1993. *Early Stages in the Evolution of Mesopotamian Civilization*. University of Arizona Press, Tucson.
- Yoffee, N. 1993. 'Too many chiefs? (or, safe texts for the 90s)'. In N. Yoffee and A. Sherratt (eds). *Archaeological Theory: Who Sets the Agenda?* Cambridge University Press, Cambridge, pp. 60-78.
- Yoffee, N. 1995. 'Political economy in early Mesopotamia'. In *Annual Review of Anthropology* 24: 281-311.
- Yekeutieli, Y. 2000. 'Early Bronze Age I pottery in Southwestern Canaan'. In G. Philip and D. Baird (eds) *Breaking with the Past: Ceramics and Change in the Early Bronze Age of the Southern Levant*. Sheffield University Press, Sheffield: 129-153.
- Zohary D. and M. Hopf. 2000. *Domestication of Plants in the Old World* Oxford: Oxford University Press.