7. SAMPLES FROM THE EXCAVATIONS

7.1 Paleobotanical samples from the City Wall — Kathleen F. Galvin

Two samples of plant remains were examined.

7.1.1 Sample One (K1.2)

This sample (from K1, Locus 4, Feature 5) consisted of a clean bagged sample of carbonized grain. 147 grains, mostly complete, were present. All identifications were made under 10x magnification with the aid of published drawings and photographs.

Triticum aestivum L. (Domestic Bread Wheat)

Quantity:	140 grains, mostly complete
Percentage of total:	93%

Ten complete grains were selected for measurement. The results of these measurements were:

Range of Length:	5.0 - 7.7 mm.
Range of Breadth:	2.5 - 3.0 mm.
Range of Thickness:	2.0 - 3.0 mm.
Mean Length:	6.12 mm.
Mean Breadth:	2.70 mm.
Mean Thickness:	2.32 mm.
Thickness:Breadth Index:	85.9 mm.
Breadth:Length Index:	44.1 mm.

Discussion: The ranges fall a bit short compared to fresh samples of *aestivum*, but tend to approximate more closely this species than any other, considering the expected shrinkage upon carbonization.

Similarly, the Breadth:Length index falls a bit short, while the Thickness:Breadth index is exactly what would be expected in trying to distinguish between *Triricum aestivum* and *T. compactum*. Hence, this sample has been classified as *aestivum*.

Triticum boeoticum Boiss. em. Thiem. (Wild Einkorn)

Quantity:	3 grains
Percentage of total:	2%

Only one whole grain was measurable, but all three showed convex curvature on the ventral furrow in section favoring the choice of *boeoticum* over *dicoccoides* in species identification. The one measurable grain yielded the following measurements:

Length:	7.0 mm.
Breadth:	2.0 mm.
Thickness:	2.0 mm.

Hordeum spontaneum Koch. (Wild Barley)

Quantity:	3 - 4 grains
Percentage of total:	3%

The state of the barley recovered made it difficult to be sure there were three or four grains represented. Only one whole grain was measured. The measurements are as follows.

Length:	6.50 mm.
Breadth:	2.20 mm.
Thickness:	1.75 mm.

Discussion: The decision to classify this material as *spontaneum* is based primarily on overall lack of traits characteristic of domestication in the grains represented. The sample is too small to suggest firmly any domestic species or subspecies.

7.1.2 Sample Two (K1.14)

This sample (from K1, Locus 4) consisted of free grains in loose soil, as well as several large clumps of sandy earth which when floated yielded many grains. Total count was 119 grains. The unstabilized mass of the soil samples containing grains had been subjected to percussive forces following recovery and many grains were crushed in the process. This sample contained many fibrous rootlets, which on microscopic examination were clearly attached to the carbonized grains.

Triticum aestivum L. (Domestic Bread Wheat)

Quantity:	111
Percentage of total:	93%

A sample of ten grains was selected for measurement. The results of these measurements were:

Range of Length:	5.2 - 7.3 mm.
Range of Breadth:	2.0 - 3.0 mm.
Range of Thickness:	1.9 - 2.5 mm.
Mean Length:	6.14 mm.
Mean Breadth:	2.60 mm.
Mean Thickness:	2.19 mm.

Discussion: Some variance from the first sample can be expected simply because of the difference in the number of identifiable grains. This sample contained a much higher proportion of broken grains. Nevertheless, the results are virtually identical, hence the identification to species level as *aestivum.*

Triticum boeoticum Boiss. em. Thiem. (Wild Einkorn)

Quantity:	2
Percentage of Total:	1%

As in the first sample, there was a very limited number of *boeoticum* recovered. One grain was measurable at:

Length:	7.0 mm.
Breadth:	1.9 mm.
Thickness:	2.0 mm.

Hordeum spontaneum Koch. (Wild Barley)

Quantity:	2
Percentage of Total:	1%

As in the first sample these grains tend to approximate *spontaneum.* This sample consisted of between 6 and 7 individuals, but all were so fragmentary that consideration as *spontaneum* seemed most reasonable. One measurable grain yielded the following:

Length:	7.0 mm.
Breadth:	2.1 mm.
Thickness:	2.0 mm.

7.1.3 Cultural inferences

Both small samples indicate nothing unusual, but in fact, reflect a much expected dependence on domestic bread wheat by the population. Field weeds, represented by wild forms of wheat and barley, are in low enough frequency as to suggest no problems of soil overexploitation or exhaustion.

7.2 ^{14}C Determinations — Linda Mount-Williams

Several radiocarbon samples were collected during the first two seasons. Three charcoal samples were prepared for radiocarbon counting during the Spring of 1987 at Mt. Soledad Radiocarbon Laboratory in San Diego, under the auspices of Dr. Hans Suess of the Department of Chemistry, University of California, San Diego. Two of these samples, B1.10 and B1.86 contained too few grams for a reliable count (6 grams of cleaned sample being considered the minimum necessary), and therefore were not used. Charcoal sample B1.87 (laboratory number LJ 5761), located on the floor of the stone building in Area B, next to a hearth, contained 6.1 dry grams of carbon material, just enough to use in the small counter.

The preparation of this sample was done in four stages: cleaning, drying, burning, and counting. This sample needed extensive cleaning because of the many root hairs visible in the sample. The largest hairs were removed with sterilized forceps. The remaining recent organic matter was dissoved with hydrochloric acid (HCl), which removes contaminating tissue, but does not attack the charcoal. The sample was then further cleaned with sodium hydroxide (NaOH), then allowed to settle. The remaining charcoal was decanted and rinsed in boiling distilled water several times. After the final decanting, the sample was placed in a covered petrie dish and set in the laboratory's automatic dryer. Two days later, the carbon fragments were placed into the center of a glass tube, and burned into CO_2, then acetylene. This gas was stored for two weeks before being placed into the counter. A specific amount of acetylene is injected into the counter, which measures the amount of radioactive decay, thus determining the ratio of ^{14}C to ^{12}C.

The resulting date obtained from this sample is 5480 +/- 150, or 3370 +/- 150 B.C. Dr. Suess, who has developed the calibration curve now used to correct ^{14}C dates, places the Mozan sample within the 44th to the 42nd centuries B.C. According to the calibration table, however, the sample could be as recent as the 39th century B.C. This is due to the large error factor at this time period.

These dates are much earlier than the general chronological frame provided by the archaeological setting of the sample, i.e. the stone building in Area B, which belongs to the end of the third millennium. Since obviously a ^{14}C determination can only reflect the age of the wood, the time differential of about 2000 years between our sample and its archaeological context may be accounted for either by assuming that the wood recovered from the building was that much older than the building itself, or that some contamination has occurred. As for the latter, the most frequent skewing of sample dates is caused by the inclusion of modern organic debris, such as body hair, grease, cigarette ash, or packaging materials. The analysis of further samples, to be expected from future work at the site, will help provide an answer to these questions.

I wish to thank Dr. Hans Suess, Professor Emeritus at the University of California, San Diego, Department of Chemistry, and Dr. Robert Michels, Scripps Institute of Oceanography, San Diego.

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FIGURES

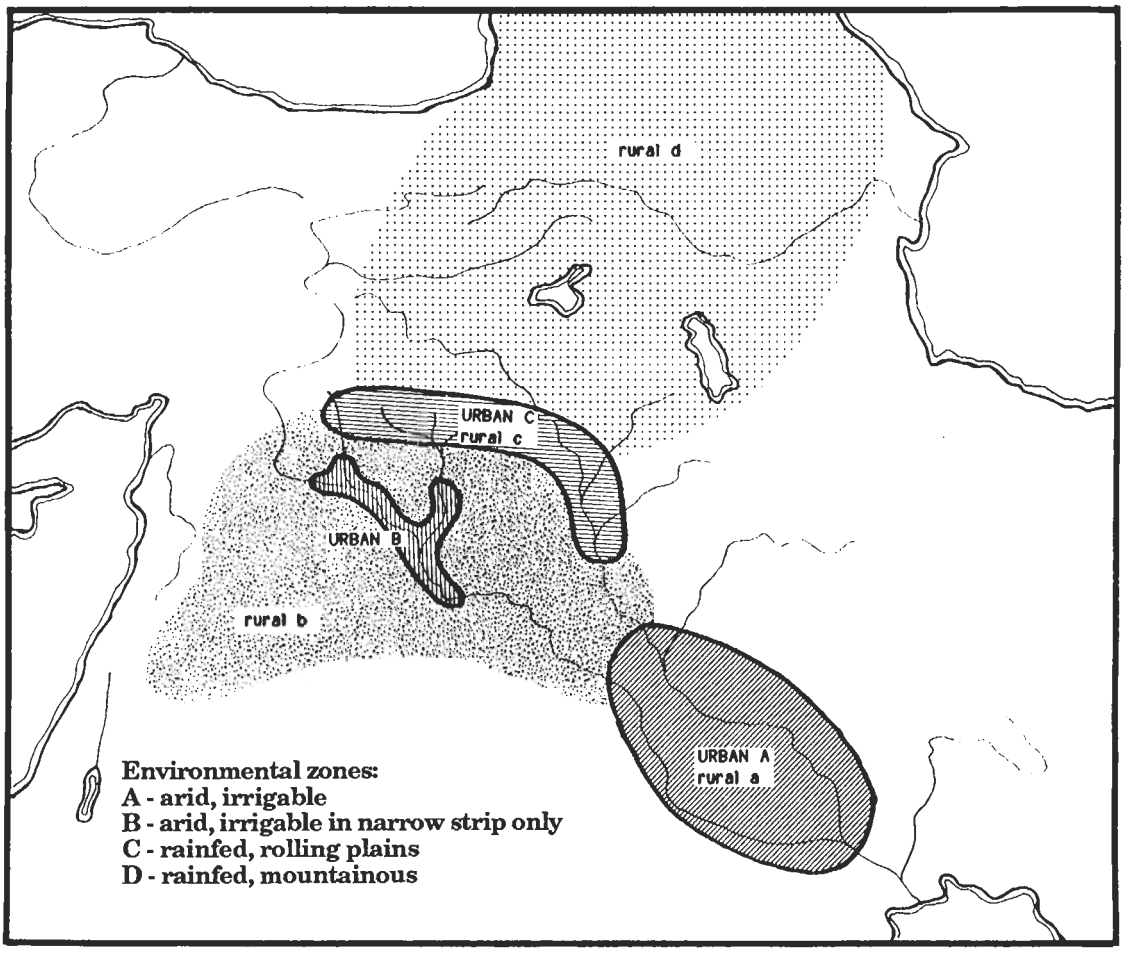


Figure 1. Rural and urban zones in Syro-Mesopotamia during the third millennium

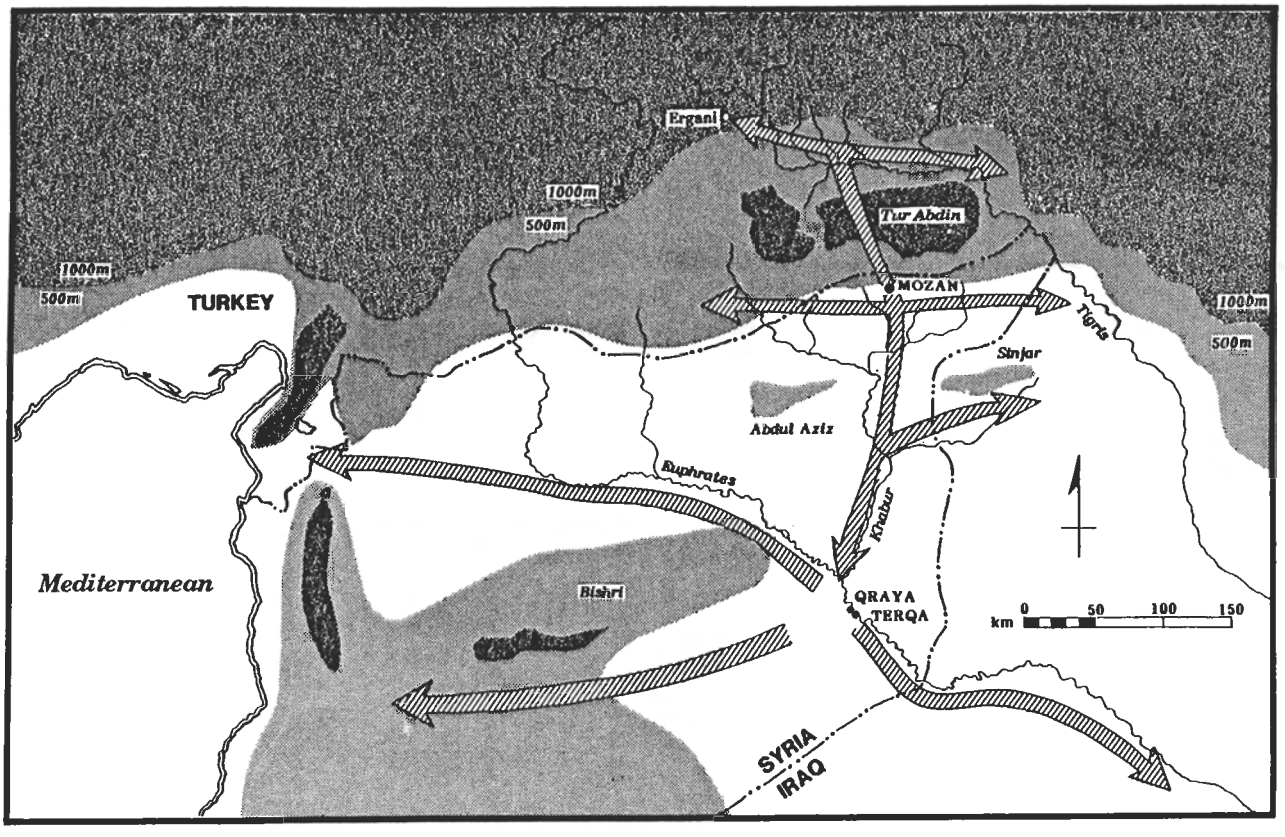


Figure 2. Major trade routes

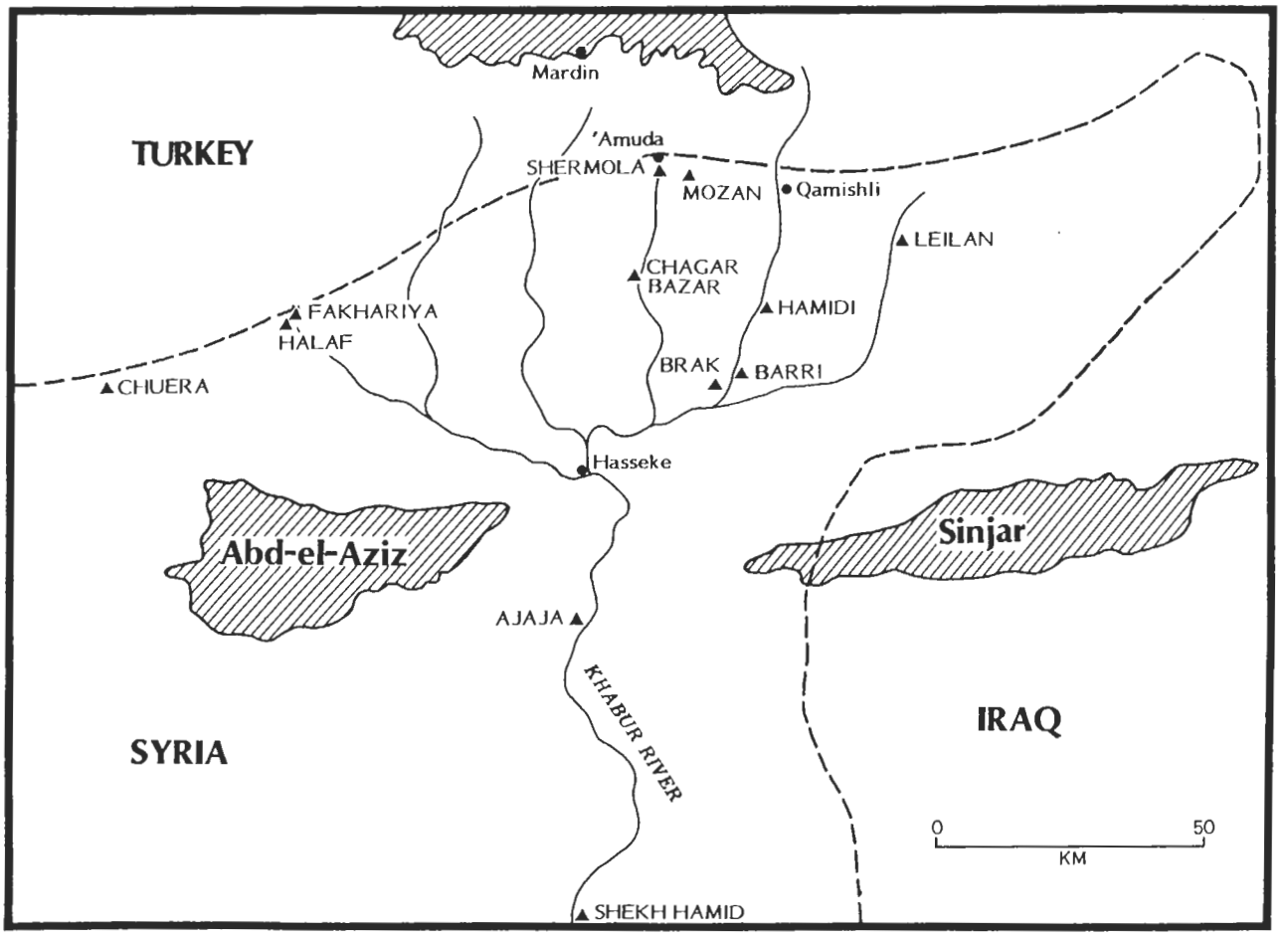
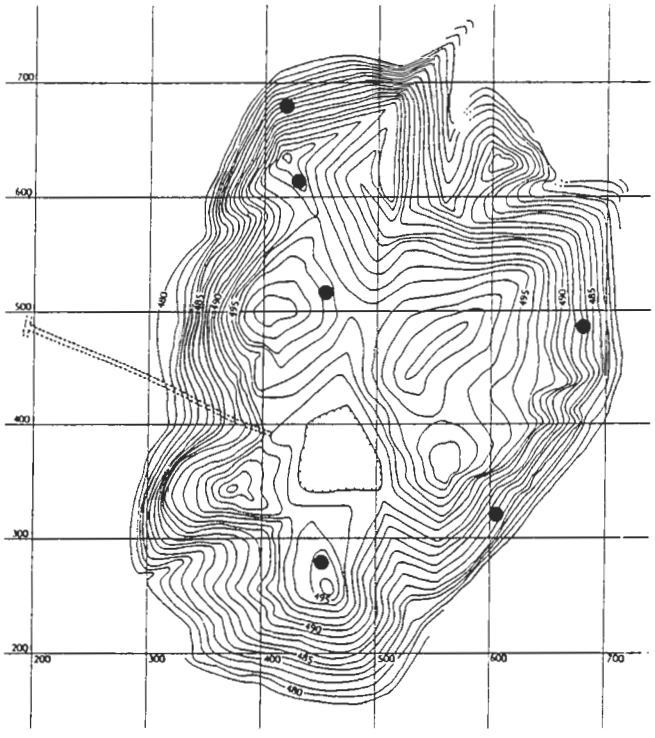
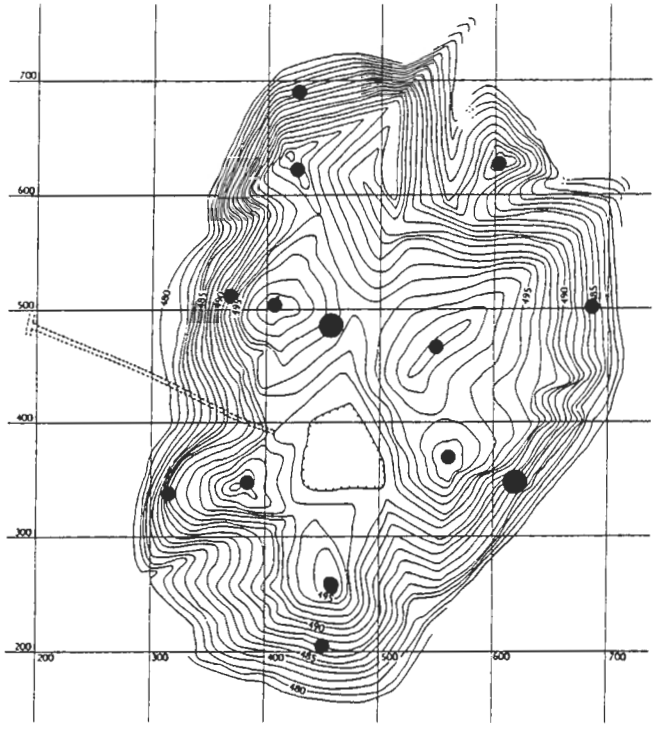


Figure 3. Major sites in the upper Khabur region

EARLY THIRD MILLENNIUM (NINEVITE V)

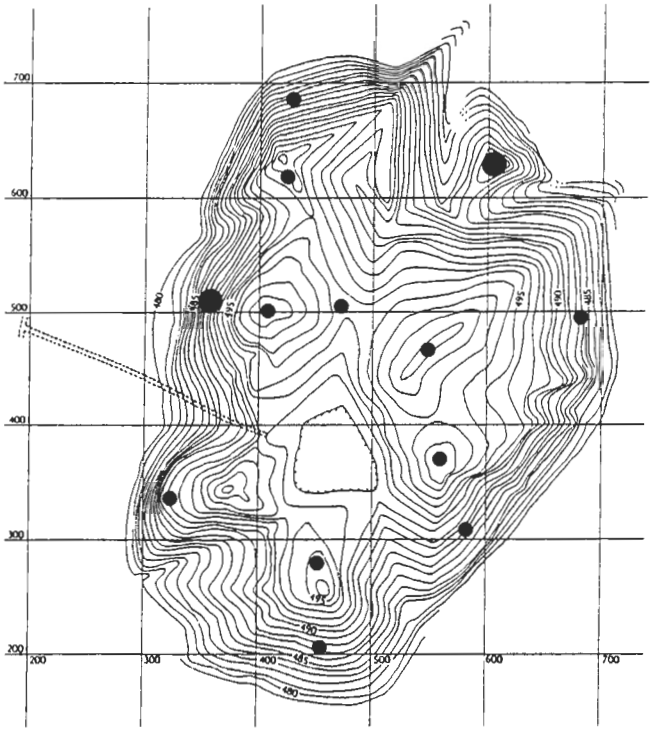
MID THIRD MILLENNIUM





LATE THIRD MILLENNIUM (UR III)

MID EARLY SECOND MILLENNIUM (HABUR)



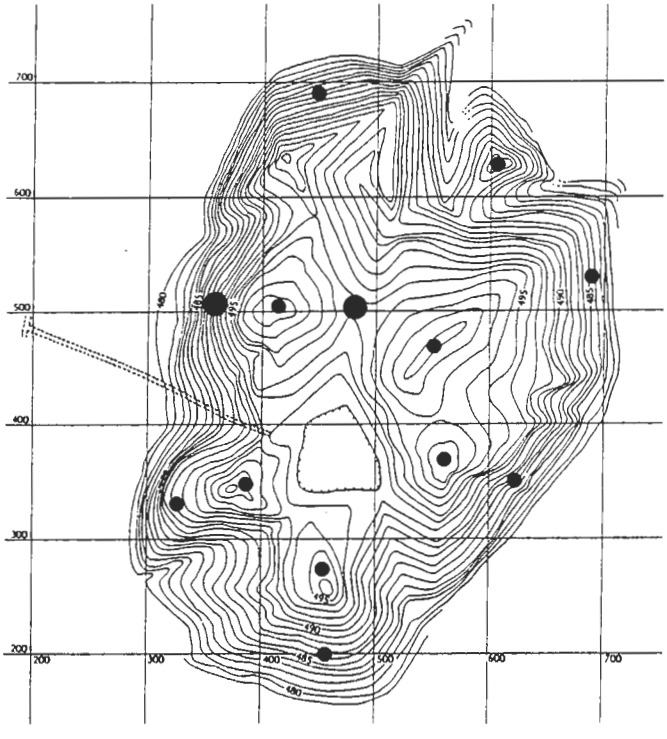


Figure 4. The High Mound: Distribution of ceramic wares by period

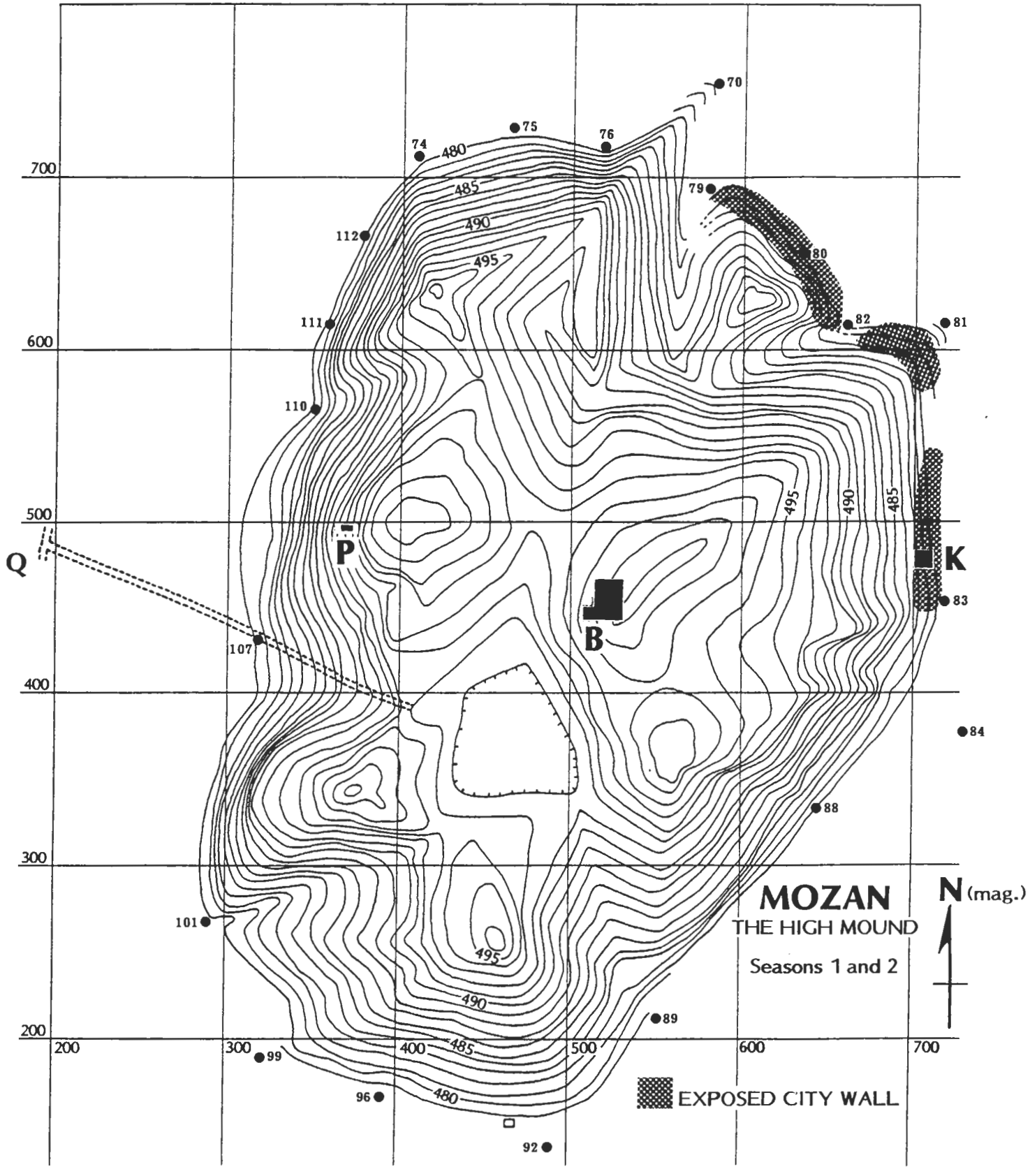


Figure 5. Tell Mozan: Topographic map of the High Mound

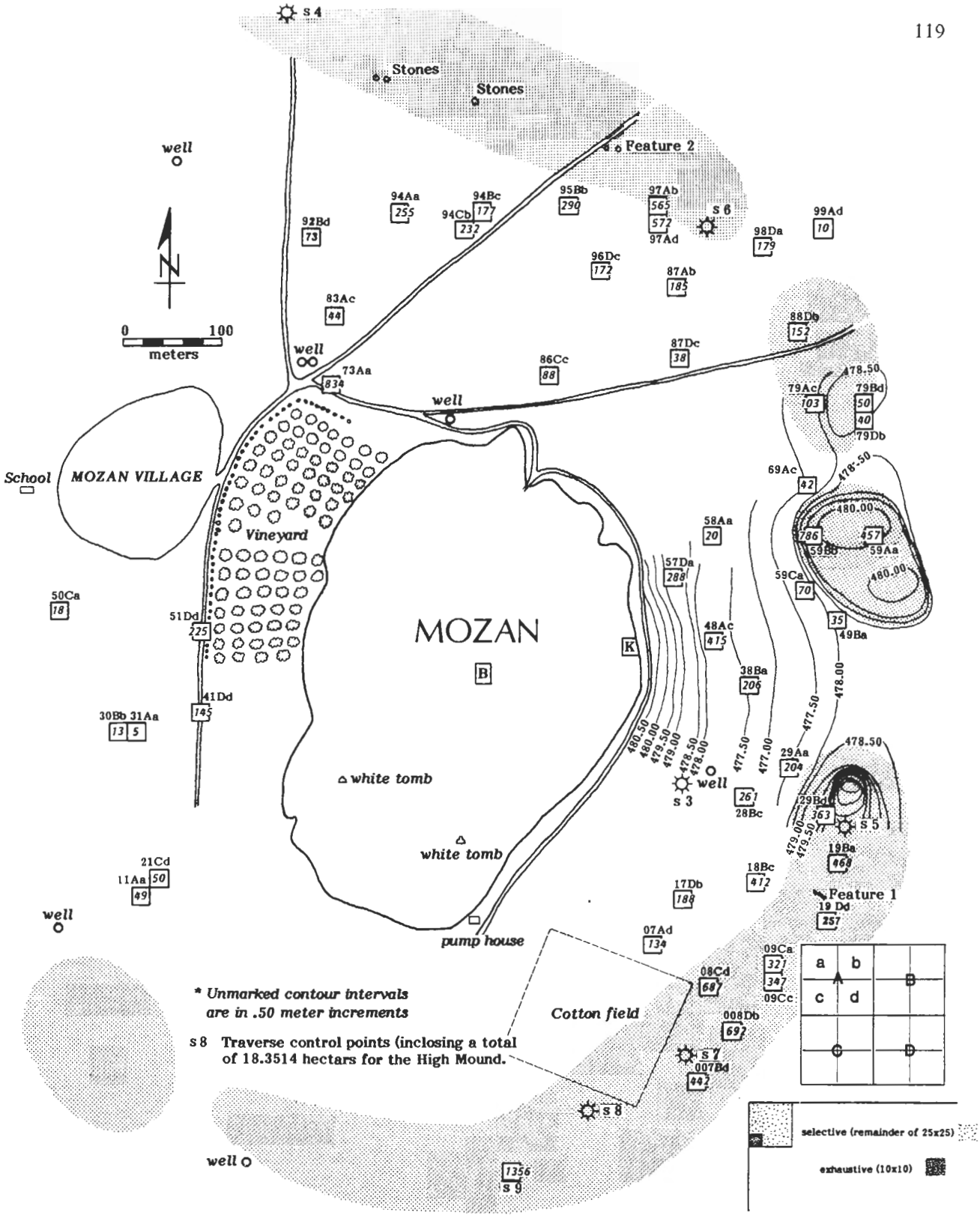


Figure 6. Tell Mozan: Partial topographic map of the Outer City

Note: Small squares represent surface collection areas; the number inside the square corresponds to the total number of items collected; the number outside the square corresponds to the grid designation, as indicated in the inset; the notation of the type s2 corresponds to special areas within the Outer City.

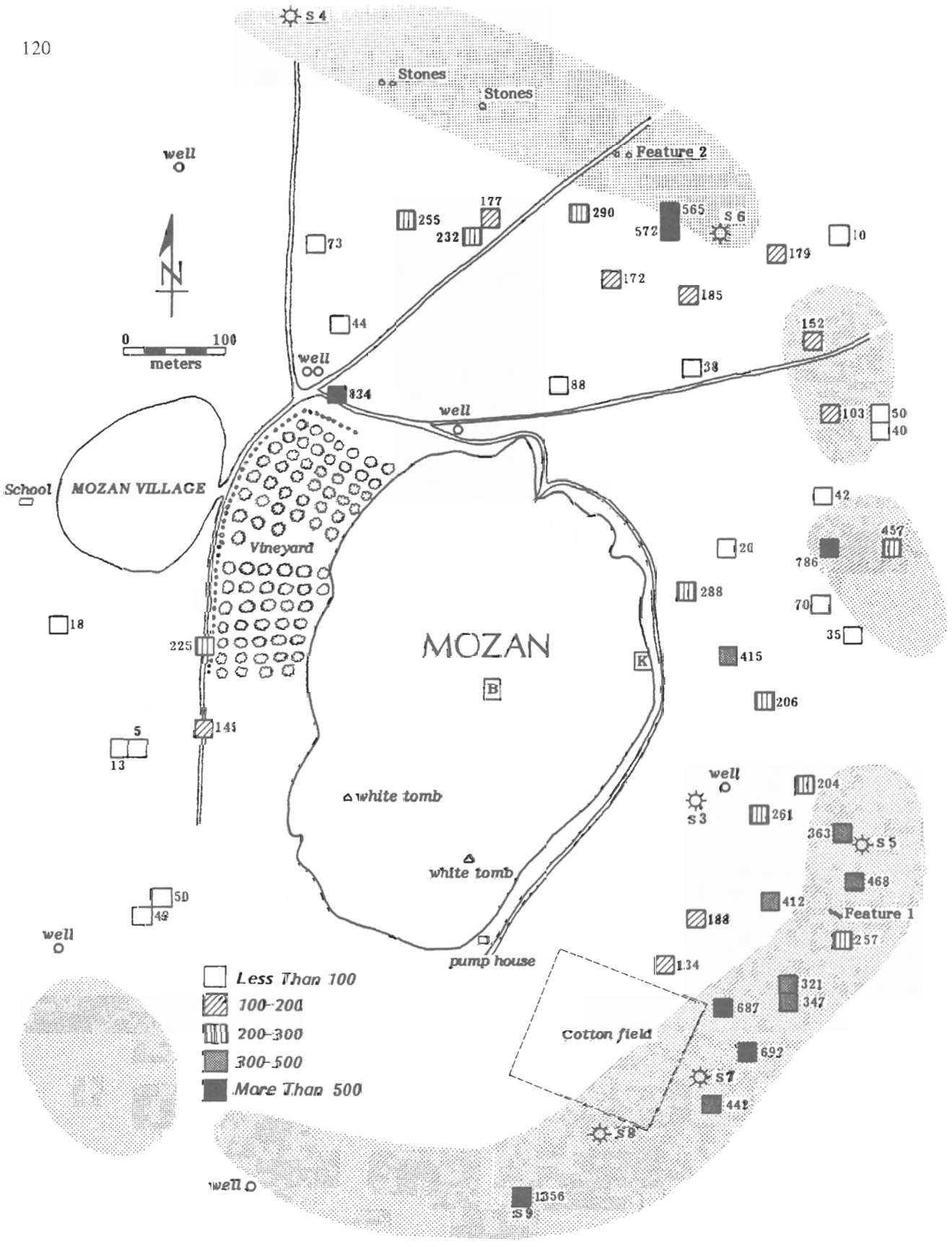


Figure 7. The Outer City: Distribution of ceramic wares by total number

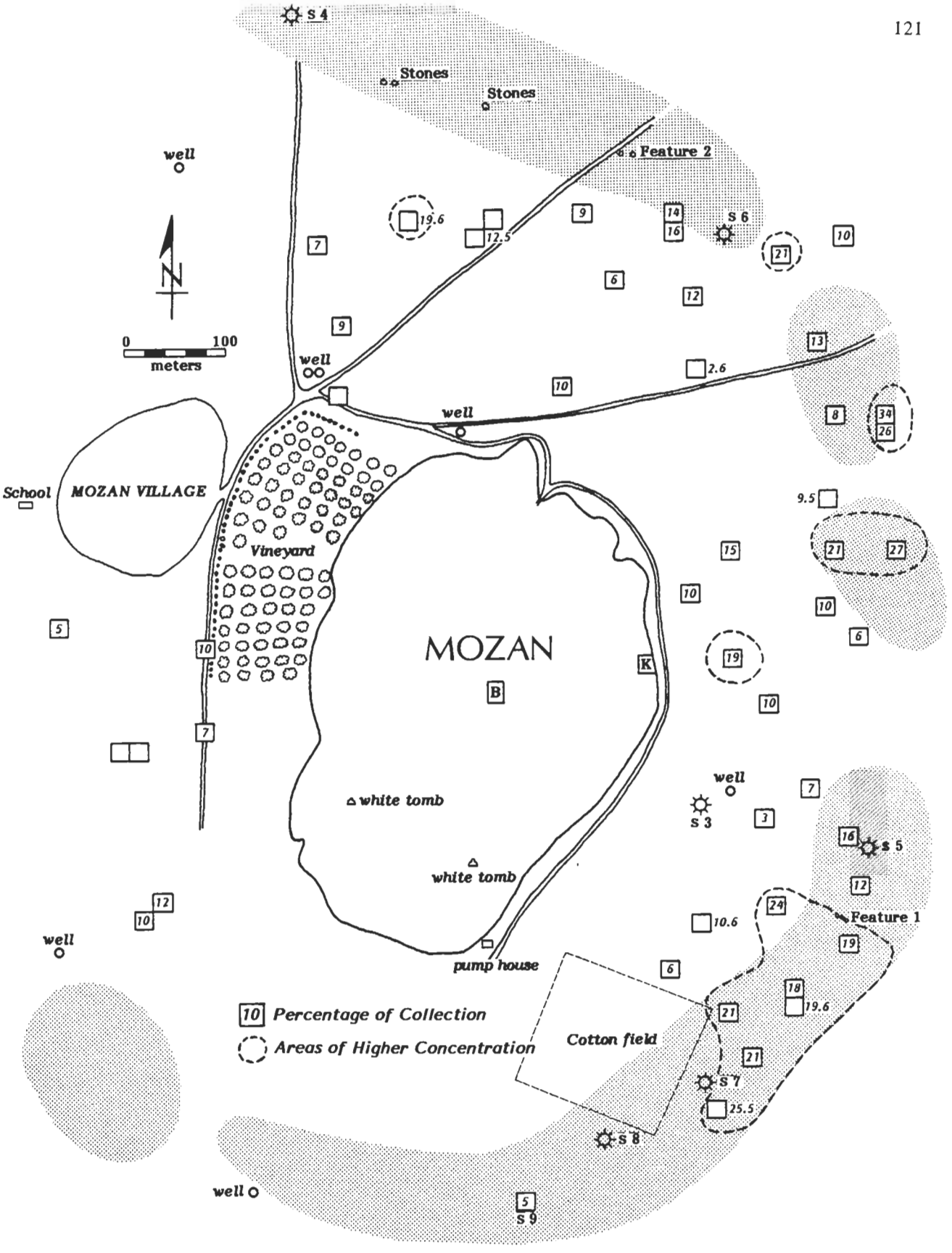


Figure 8. The Outer City: Distribution of Simple ware

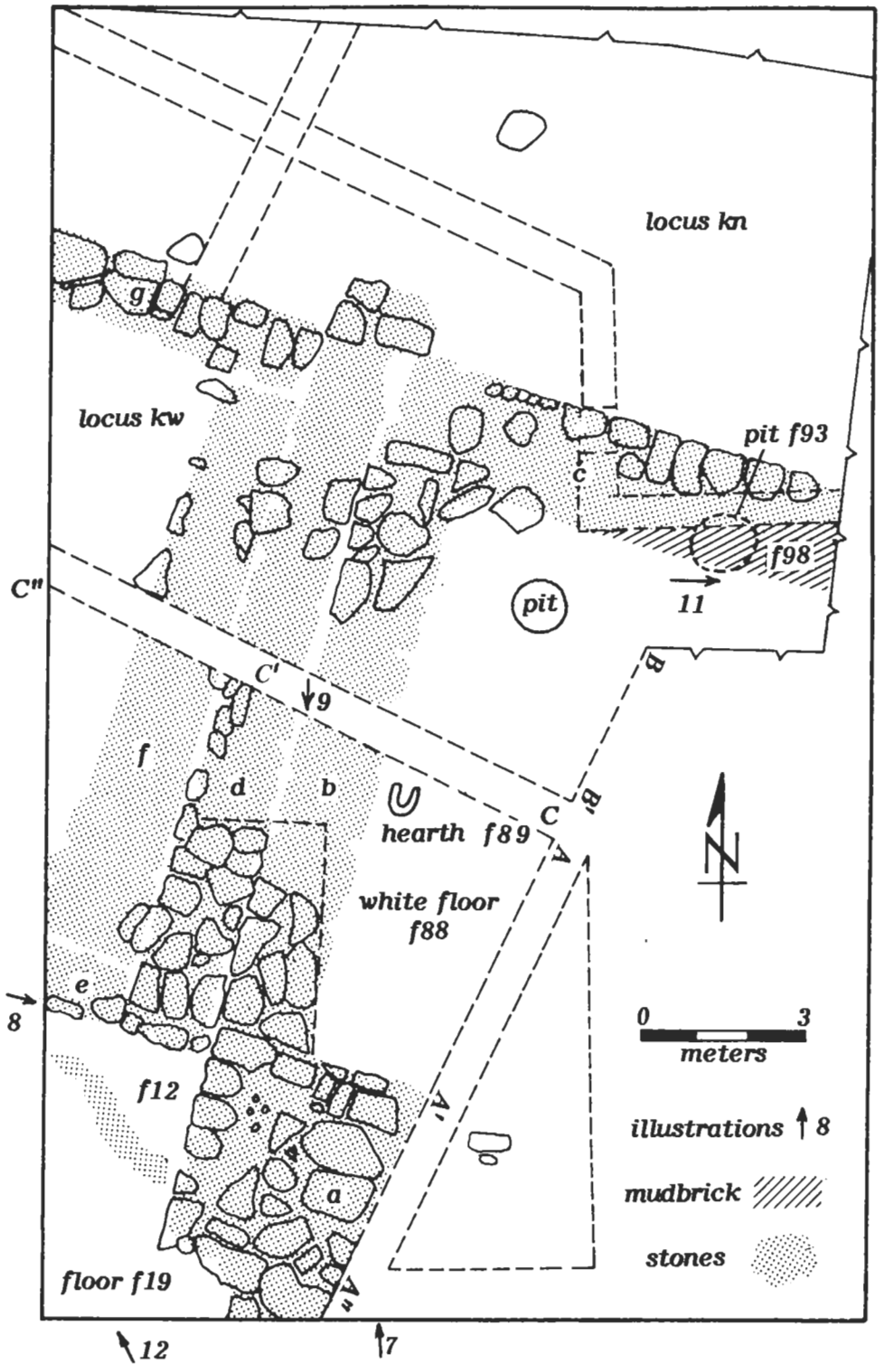


Figure 9. The stone building in Area B: sketch floor plan

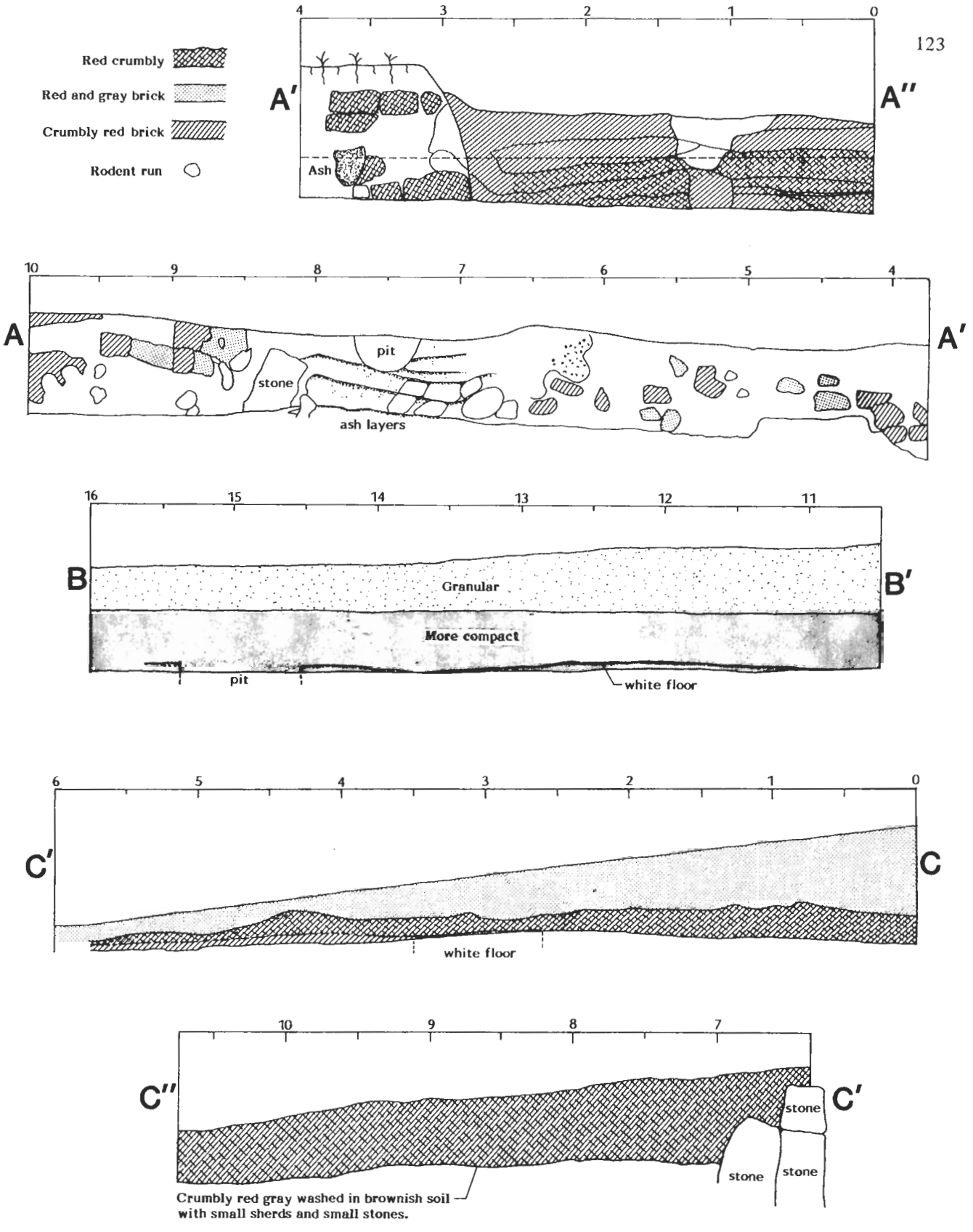


Figure 10. The stone building in Area B: sections

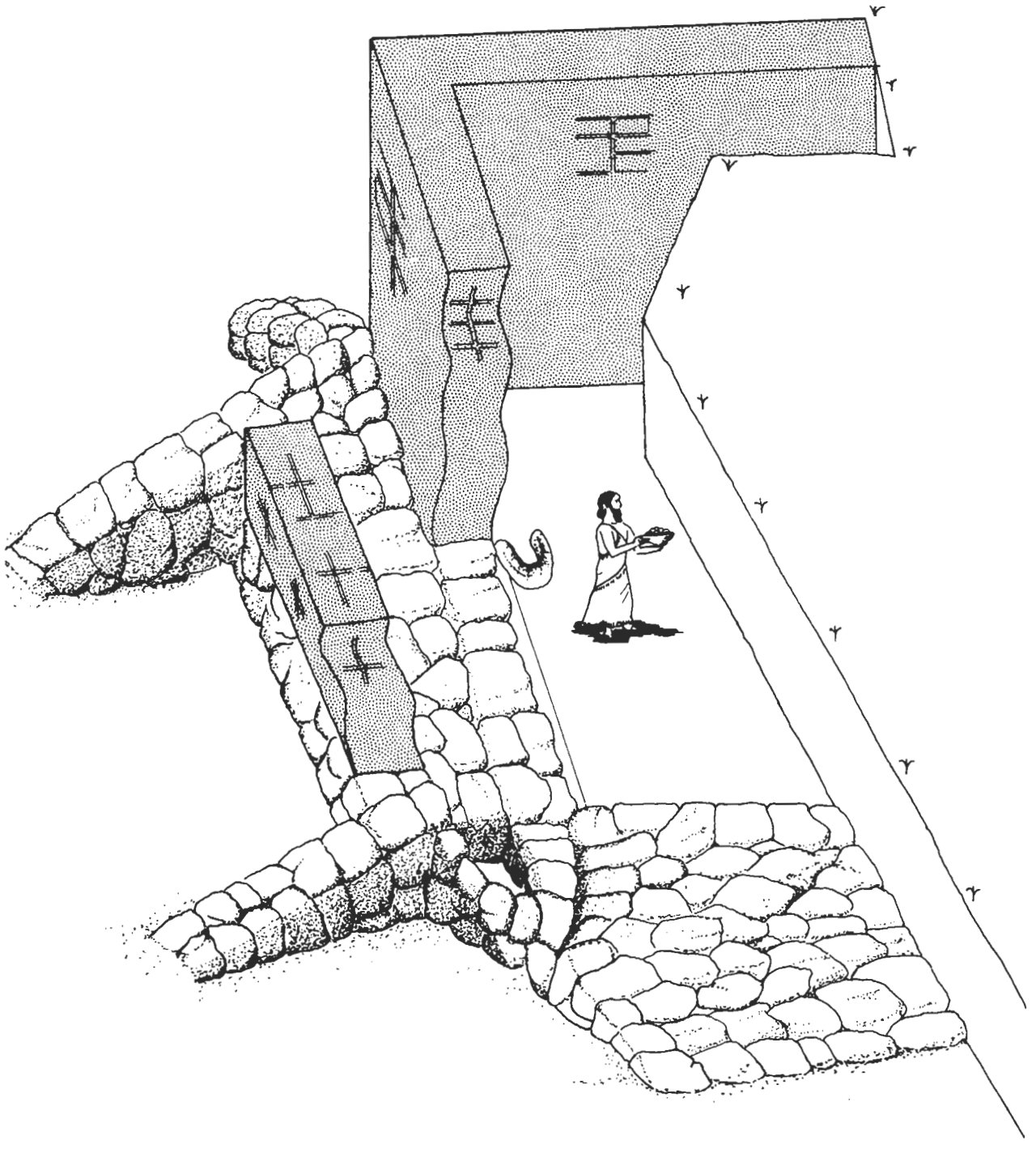


Figure 11. The stone building in Area B: reconstruction

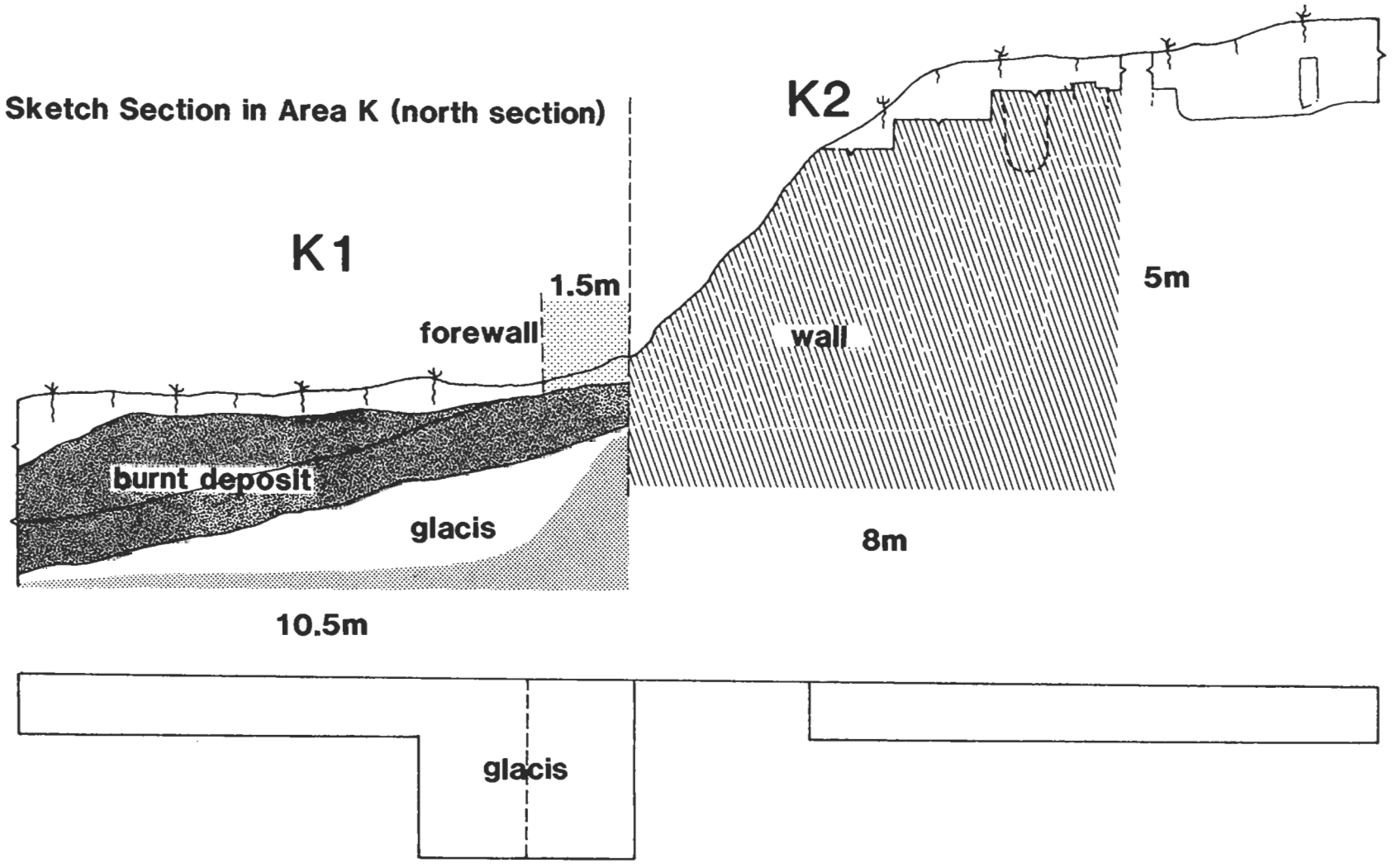


Figure 12. The city wall in Area K: sketch section

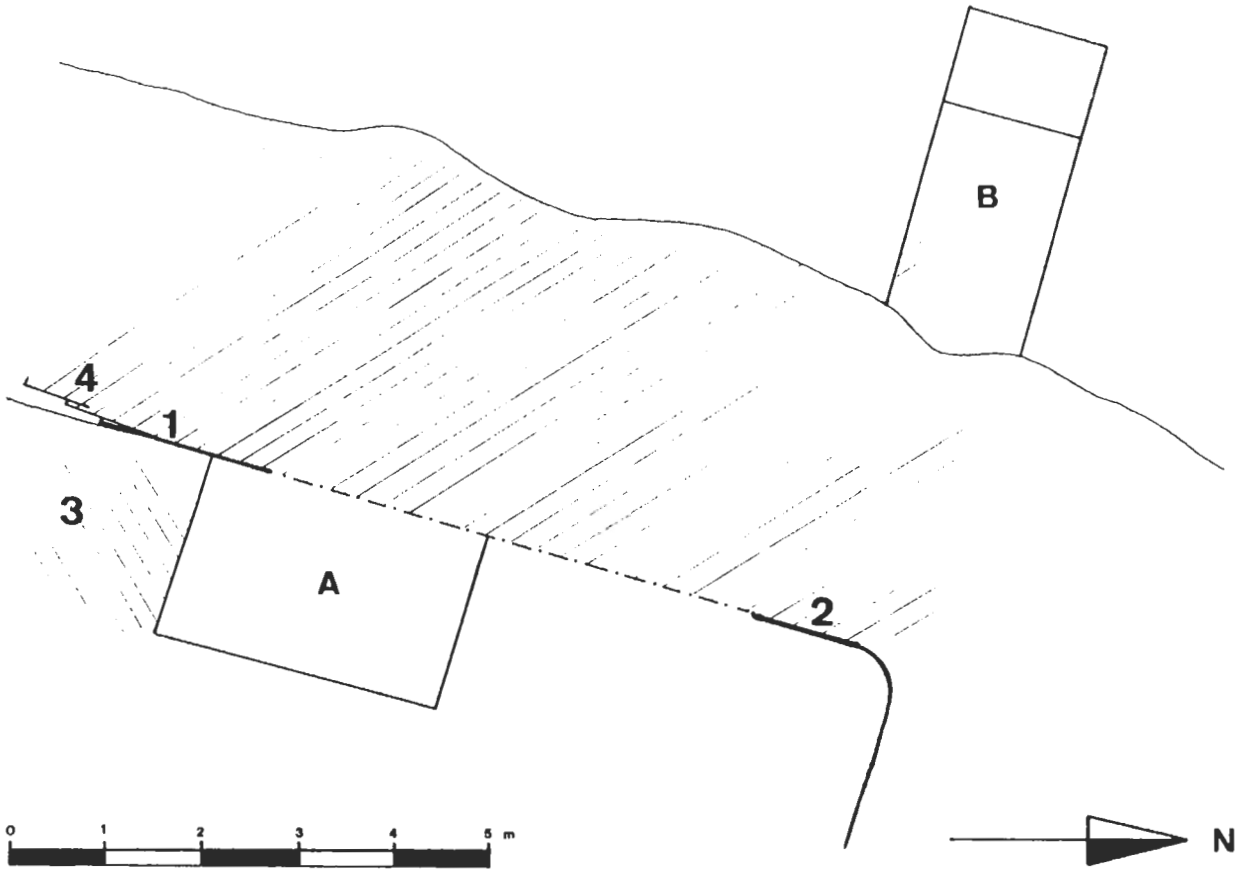


Figure 13. The city wall in Area K: floor plan (1984 season)

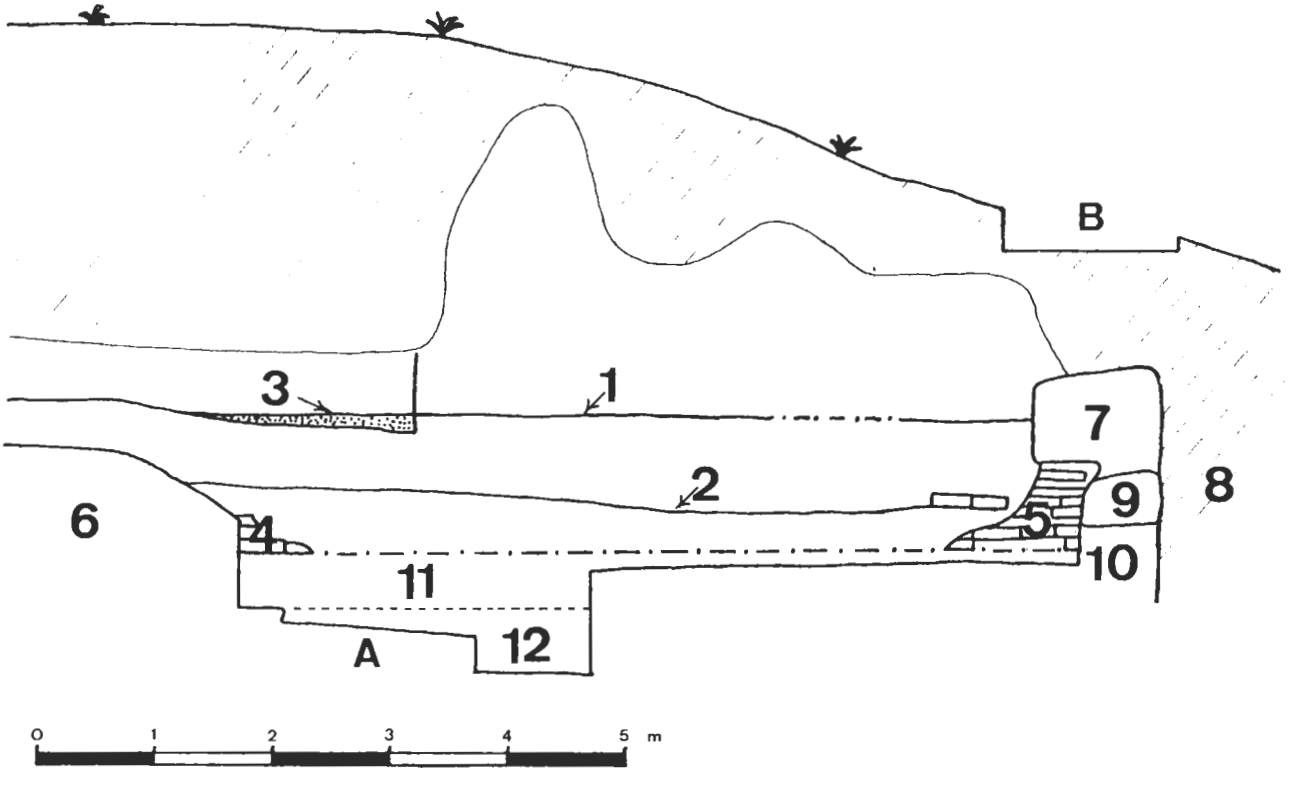


Figure 14. The city wall in Area K: frontal view (1984 season)

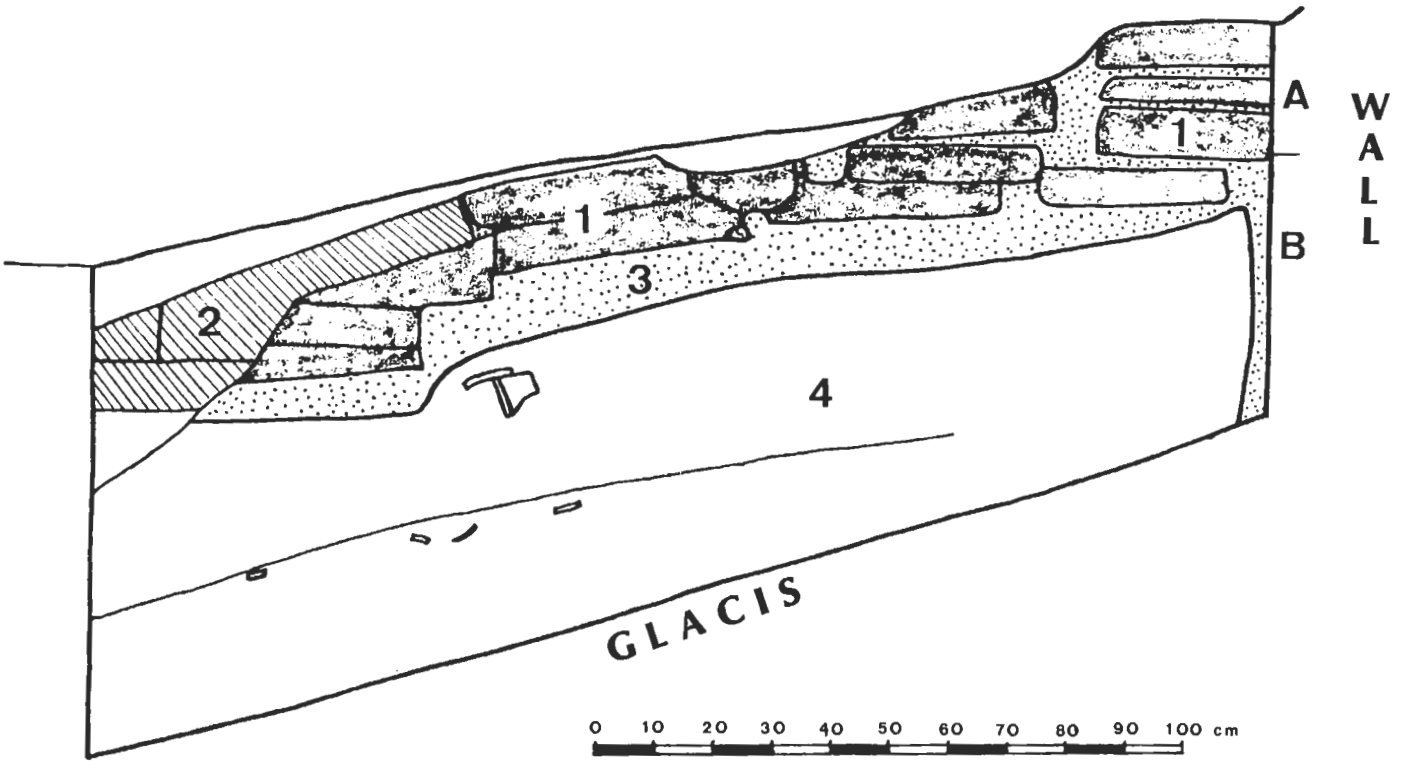


Figure 15. The city wall in Area K: North section of Locus A

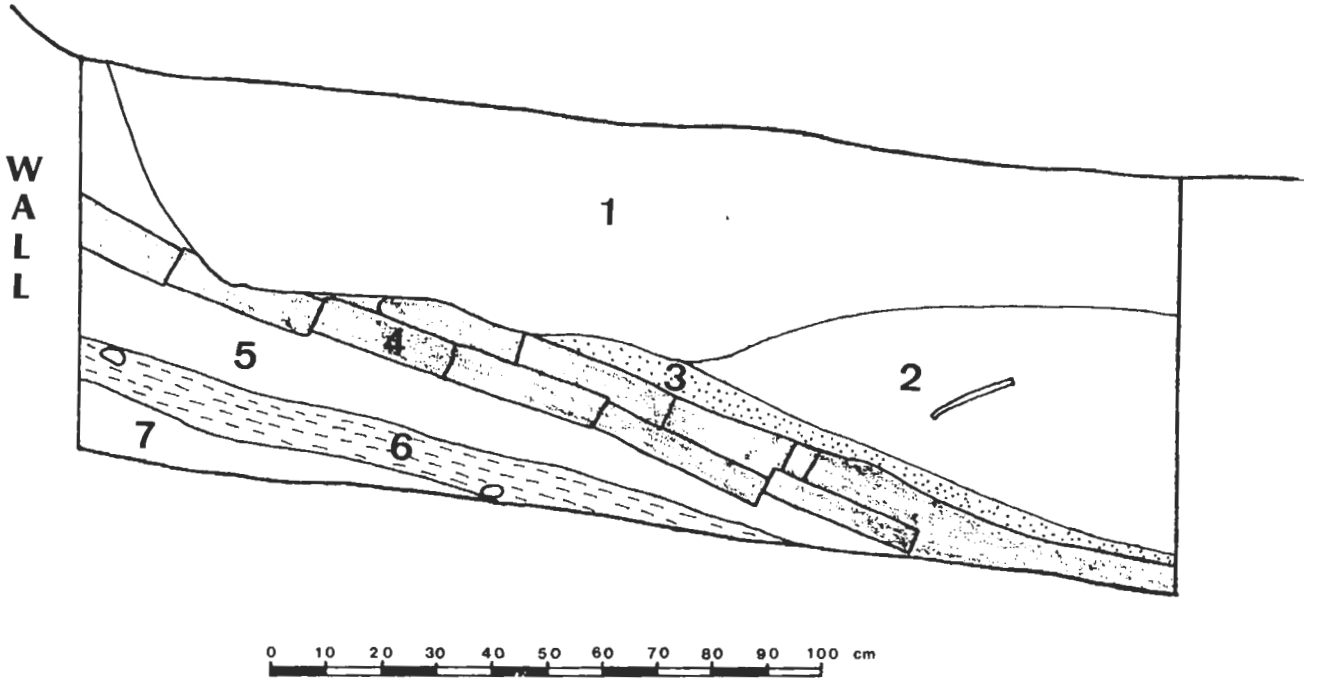


Figure 16. The city wall in Area K: South section of Locus A

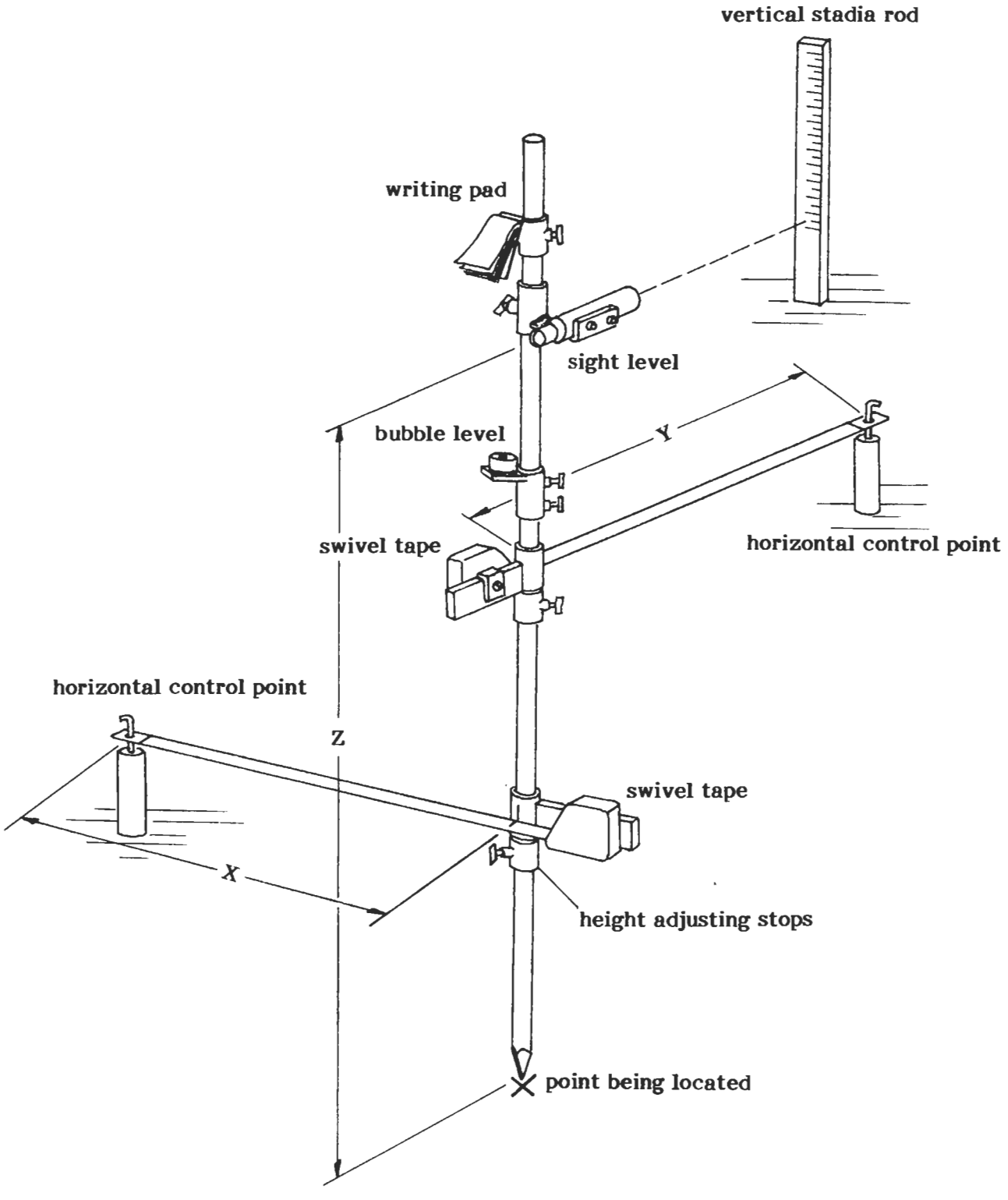
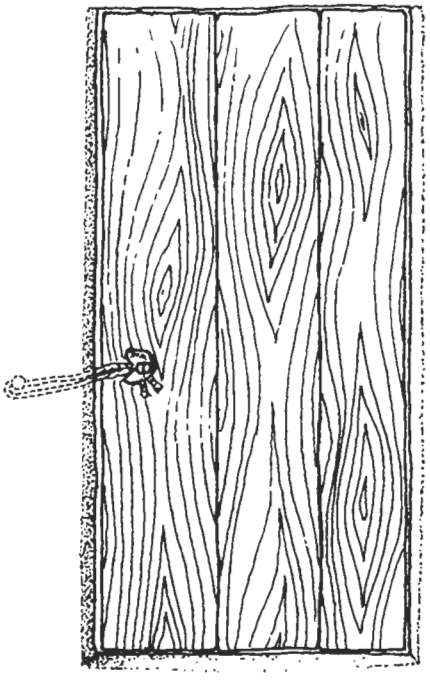


Figure 17. Sketch of triangulation rod



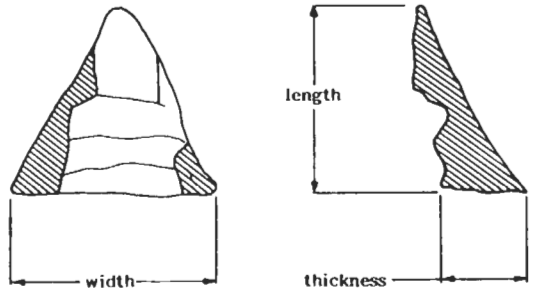


Figure 19. Parameters for measurements of door sealings

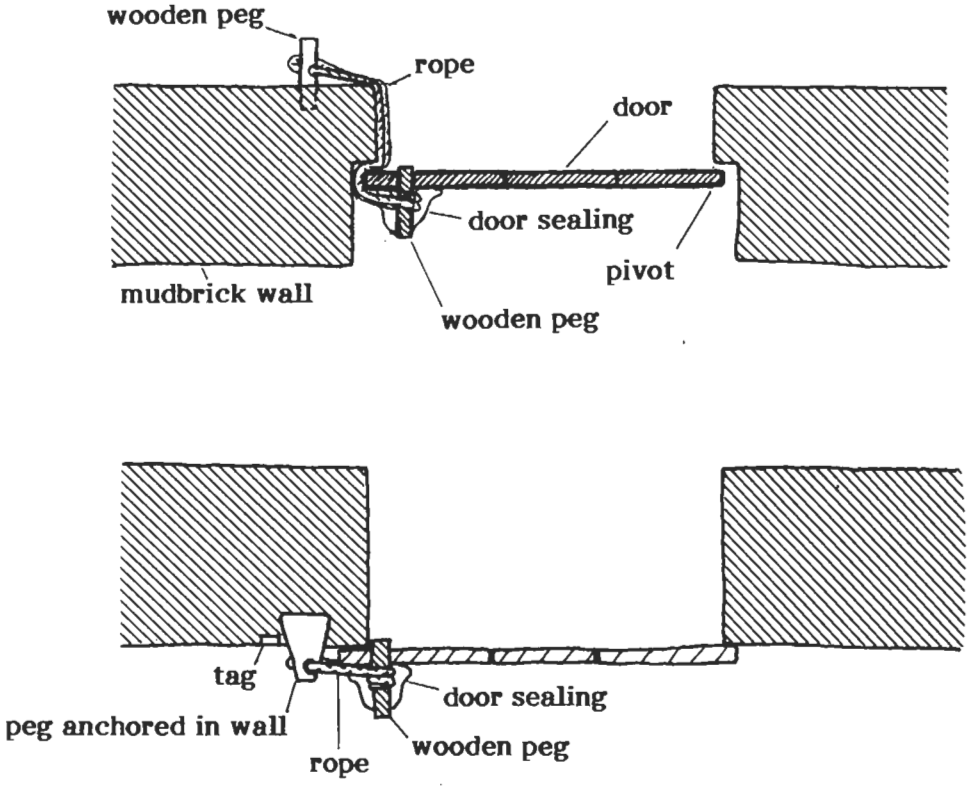


Figure 18. Suggested reconstructions of the use of door sealings

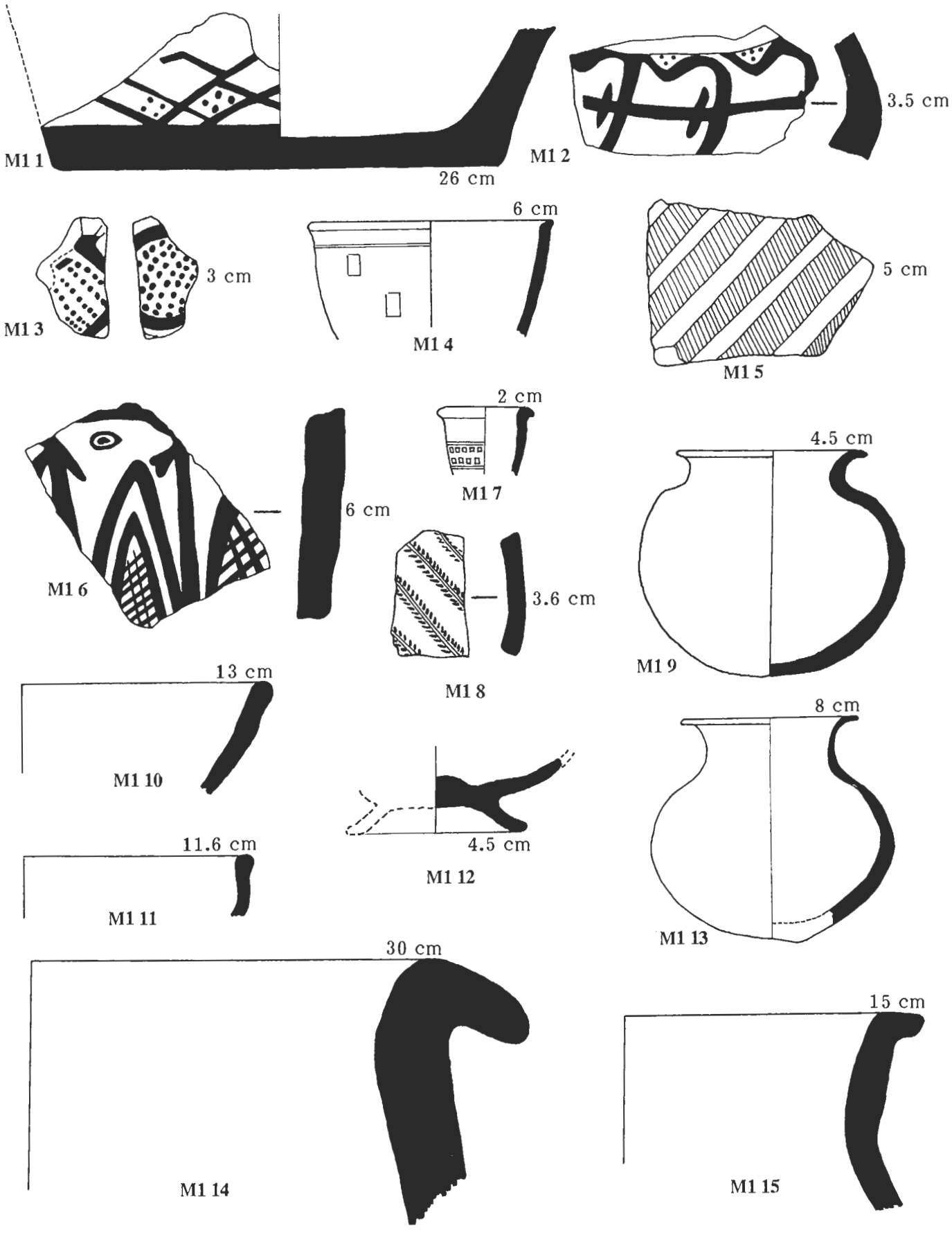


Figure 20. Ceramic types from the surface of the High Mound
Halaf (M1 1-3), Incised Ninevite V (M1 4-5, 7-8), Painted Ninevite V (M1 6), Metallic ware (M1 9-15)

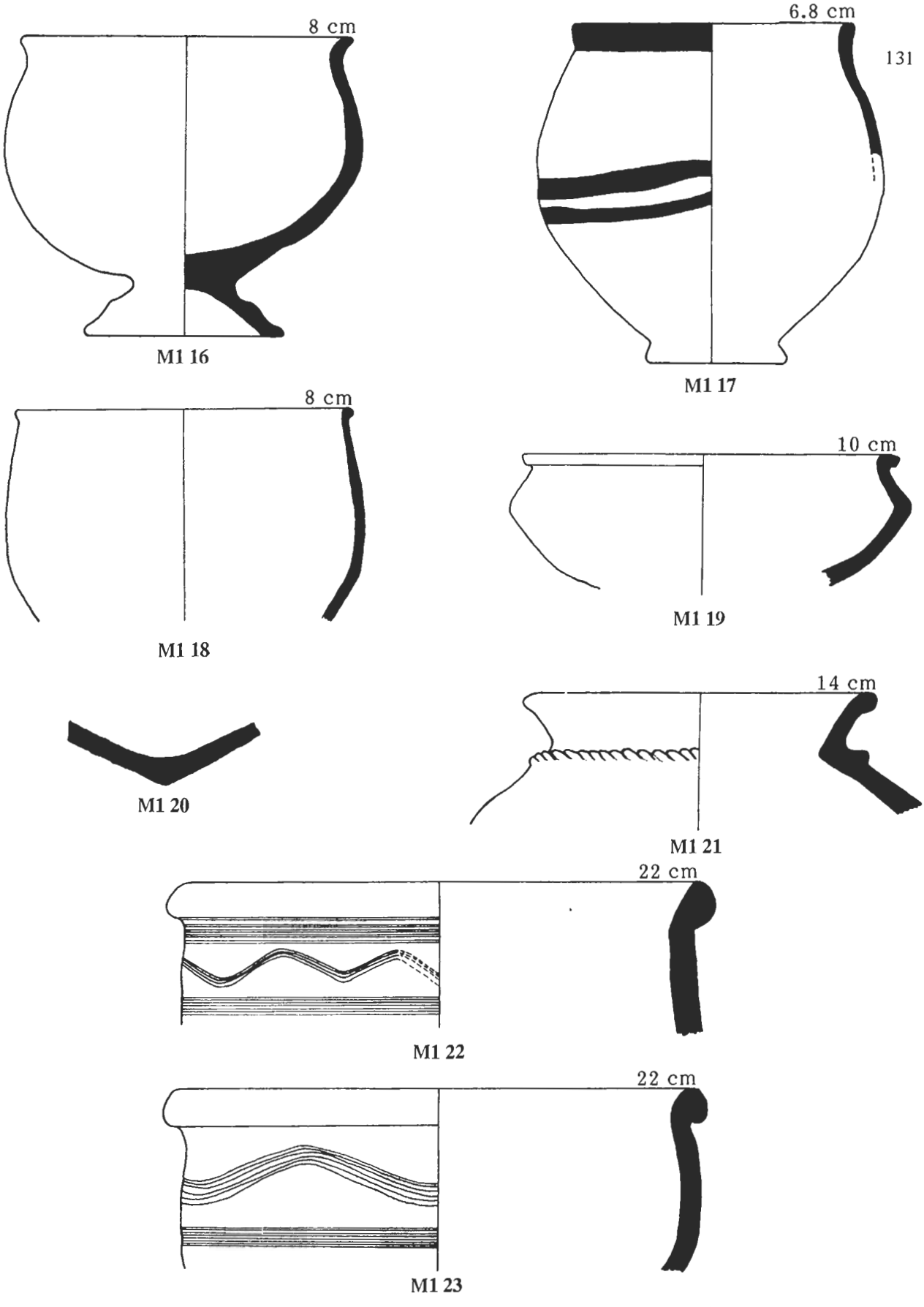


Figure 21. Ceramic types from the surface of the High Mound
Simple ware (M1 16, 18-19), Painted Simple ware (M1 17), late third mill. or "Ur III" (M1 21-23)

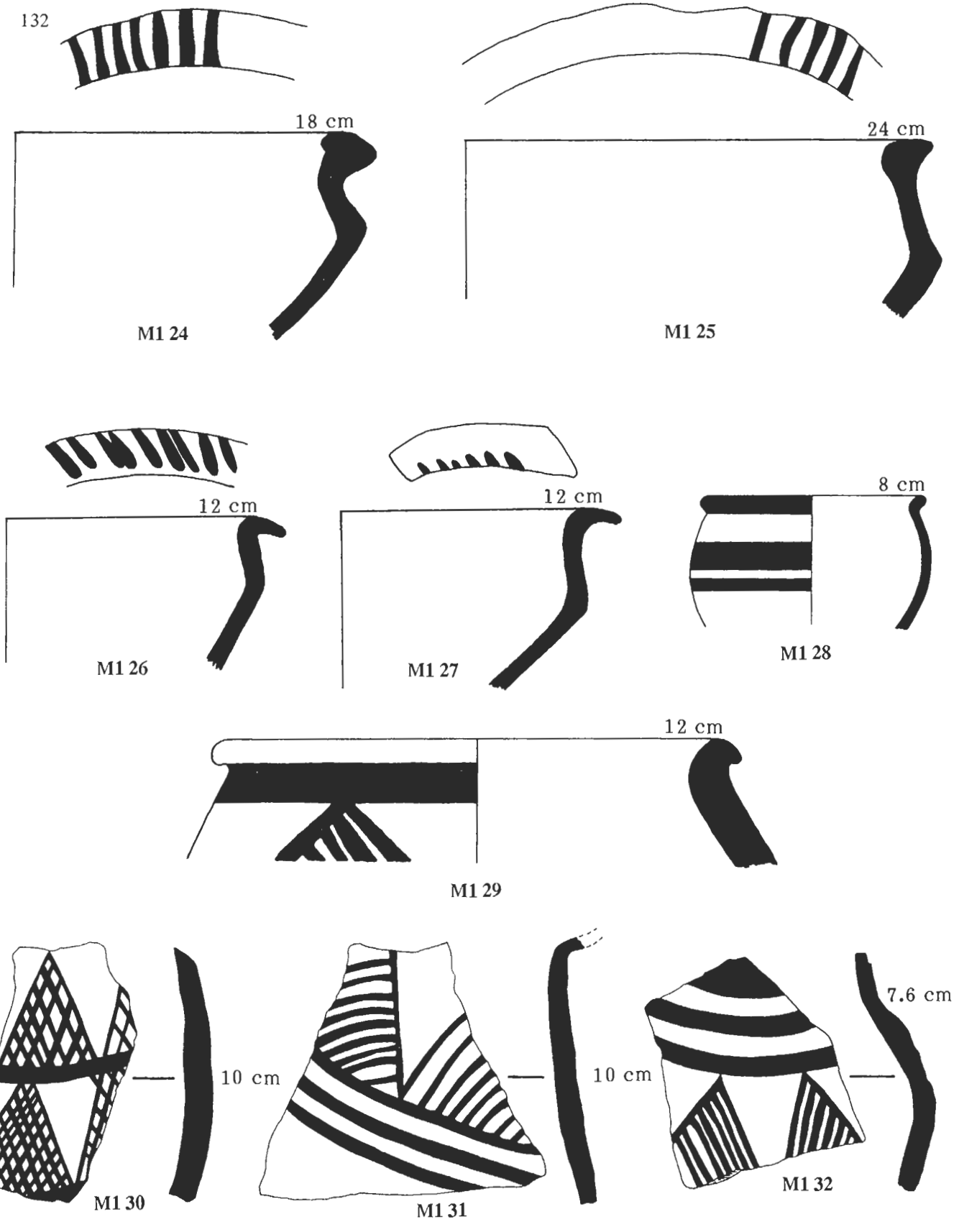


Figure 22. Ceramic types from the surface of the High Mound: Khabur ware

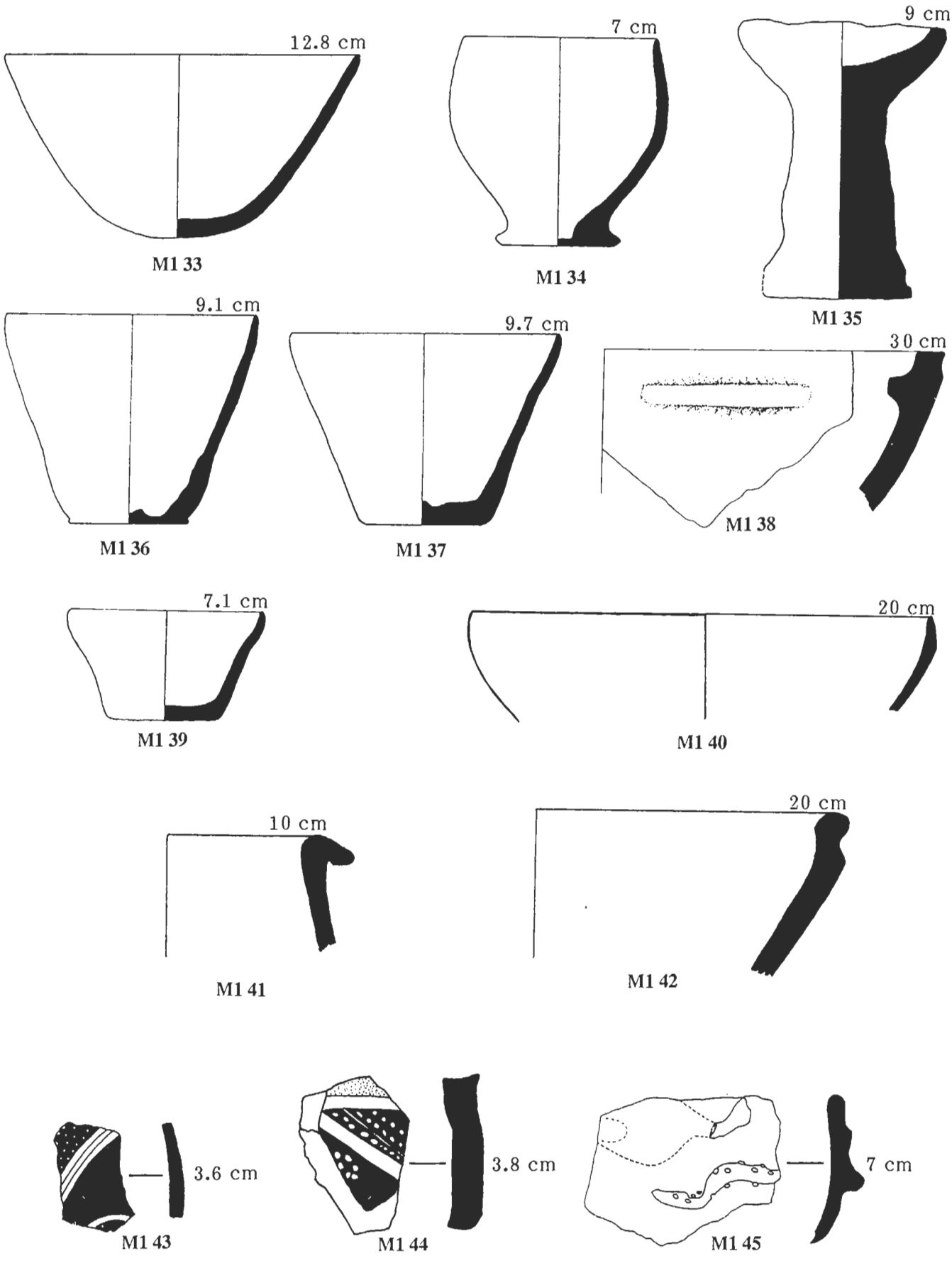


Figure 23. Ceramic types from the soundings and surface of the High Mound
Miscellaneous types (M1 33-39 are from the soundings, M1 40-45 from the surface)

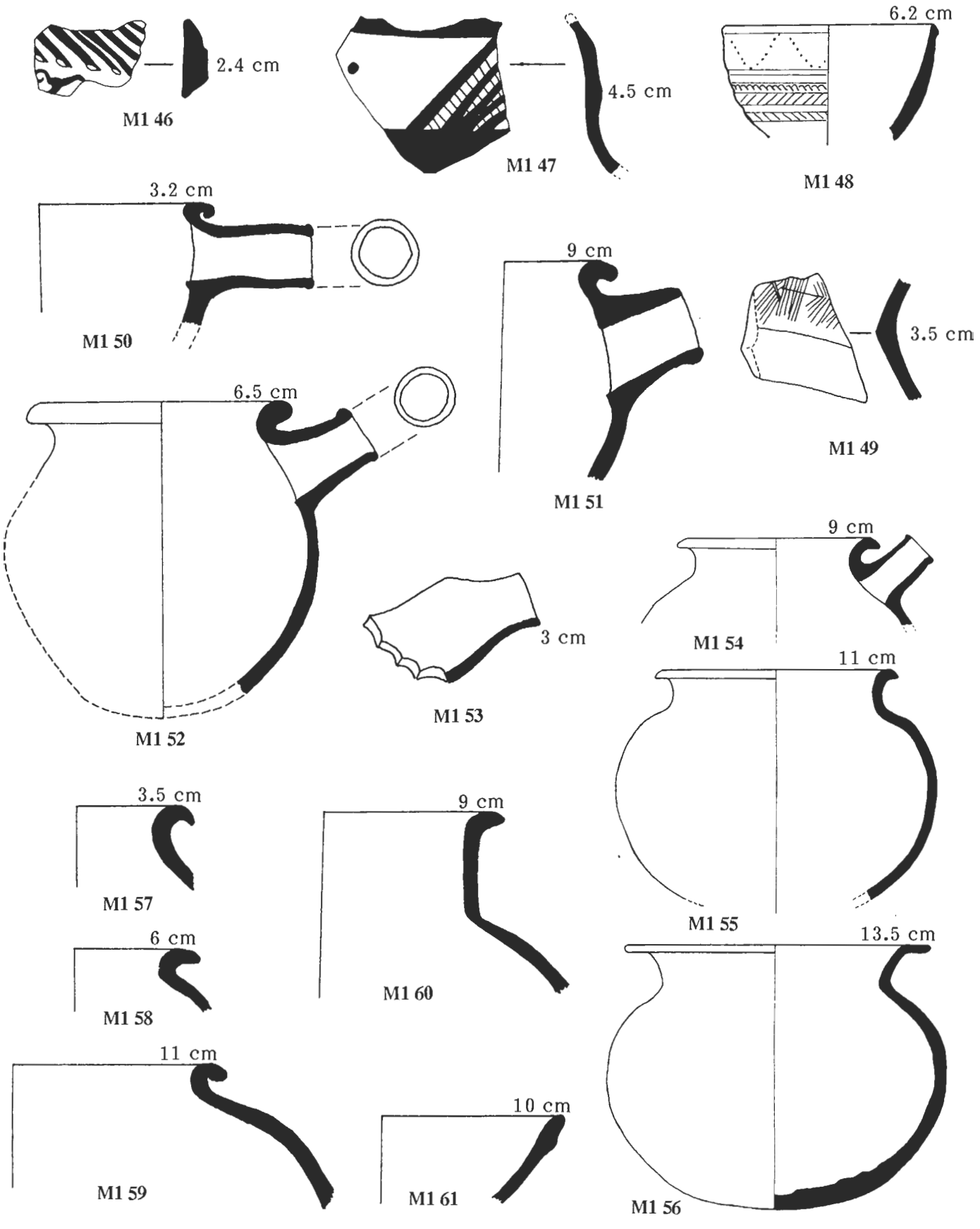


Figure 24. Ceramic types from the soundings

Halaf (M1 46-47), Incised Ninevite V (M1 48-49), Simple ware (M1 50-59), Metallic ware (M1 60-61)

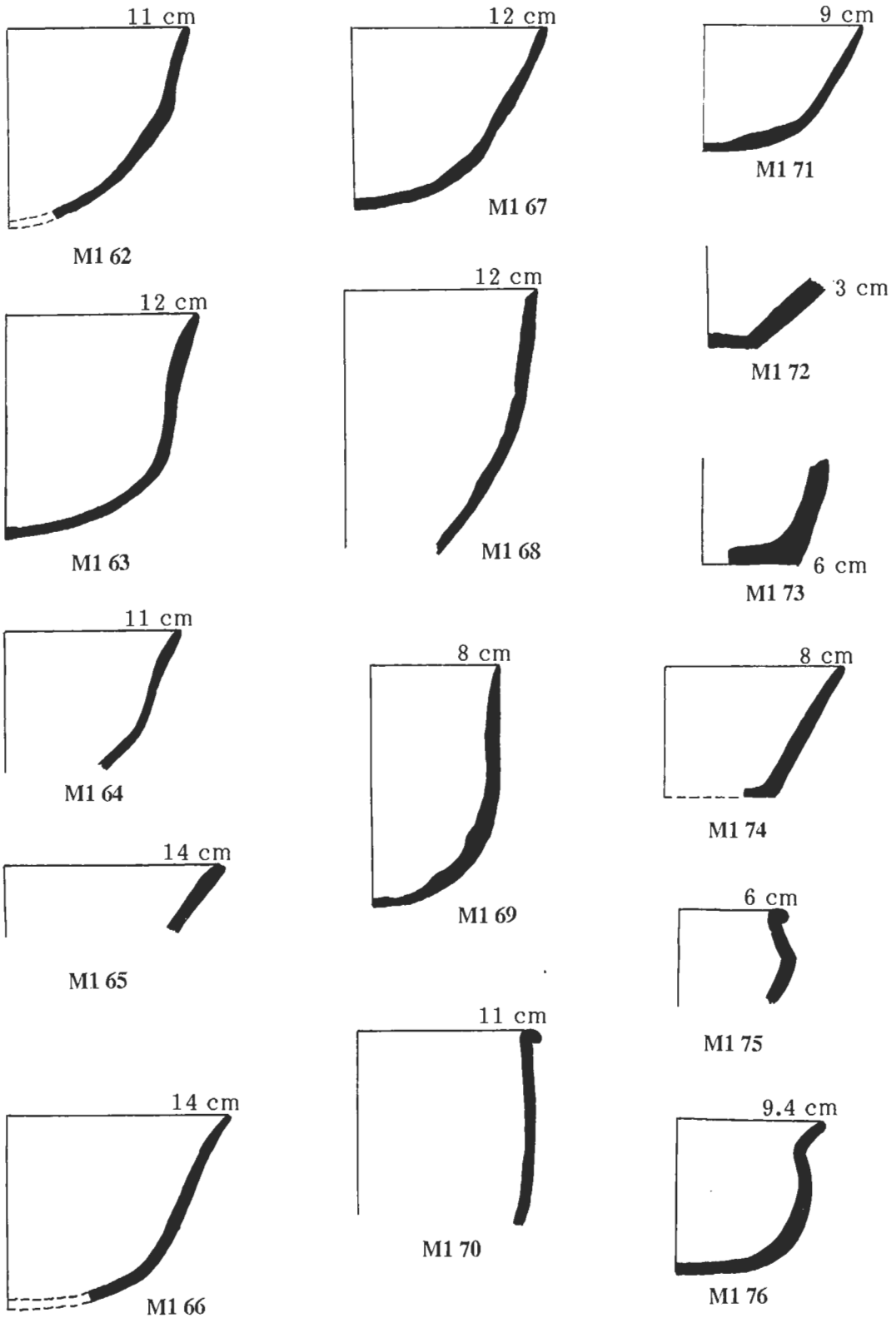


Figure 25. Ceramic types from the soundings
Simple ware (M1 65, 72-73, 75-76 are from Area B1, the rest from area K1)

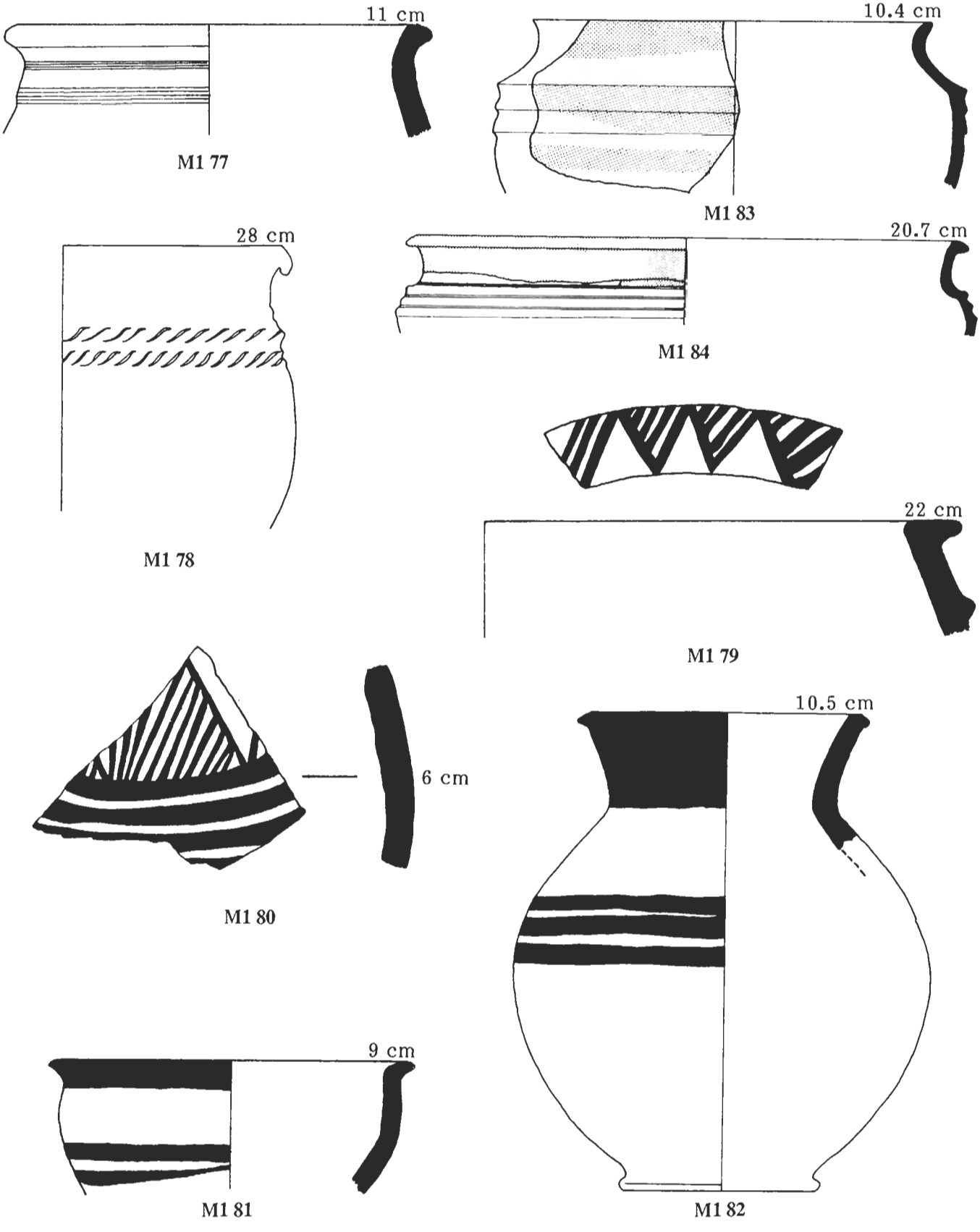


Figure 26. Ceramic types from the soundings
Late third mill. or "Ur III" (M1 77-78), Transitional (M1 83-84), Khabur ware (M1 79-82)

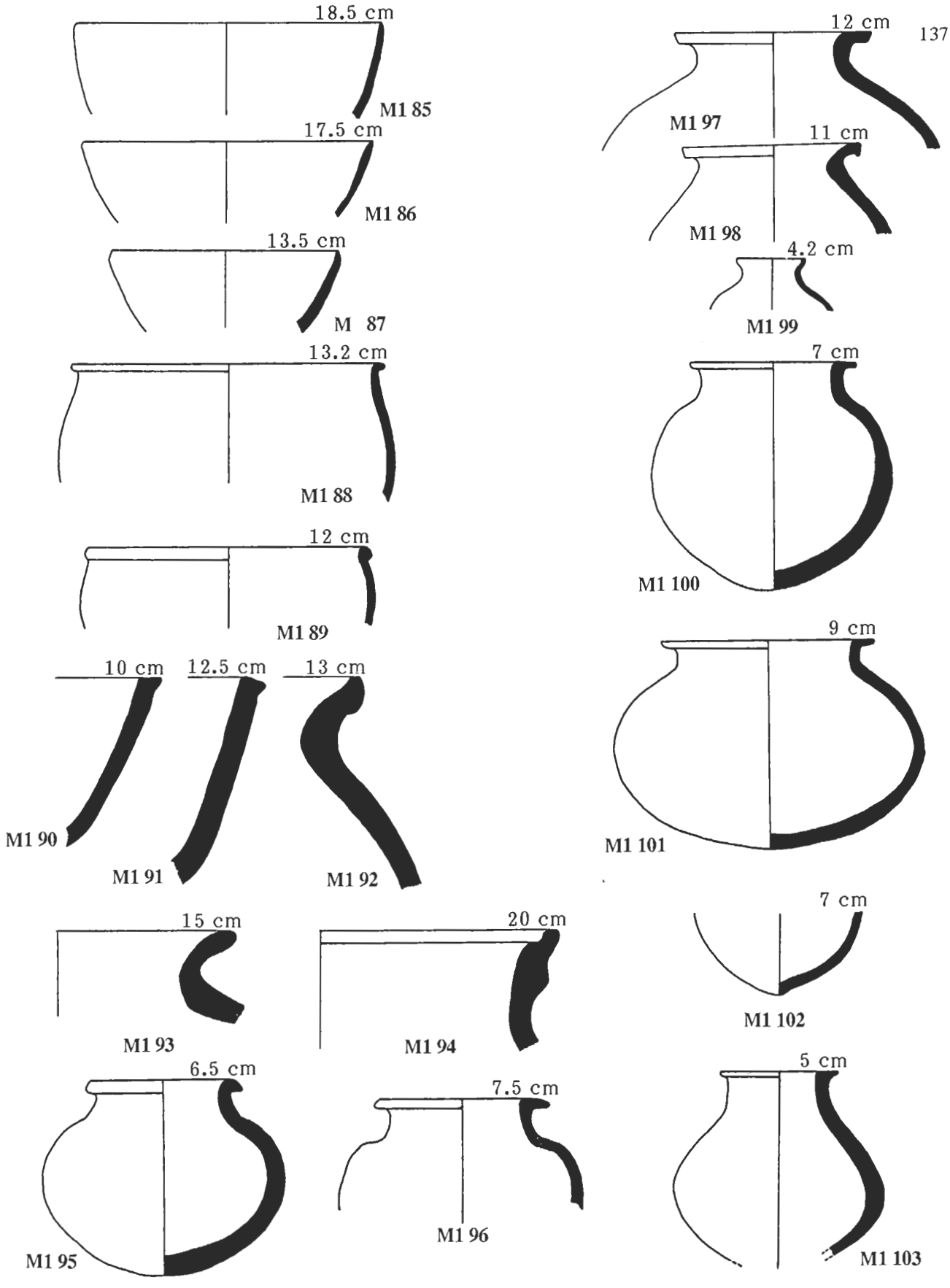


Figure 27. Ceramic types from the surface of the Outer City: Location Os4

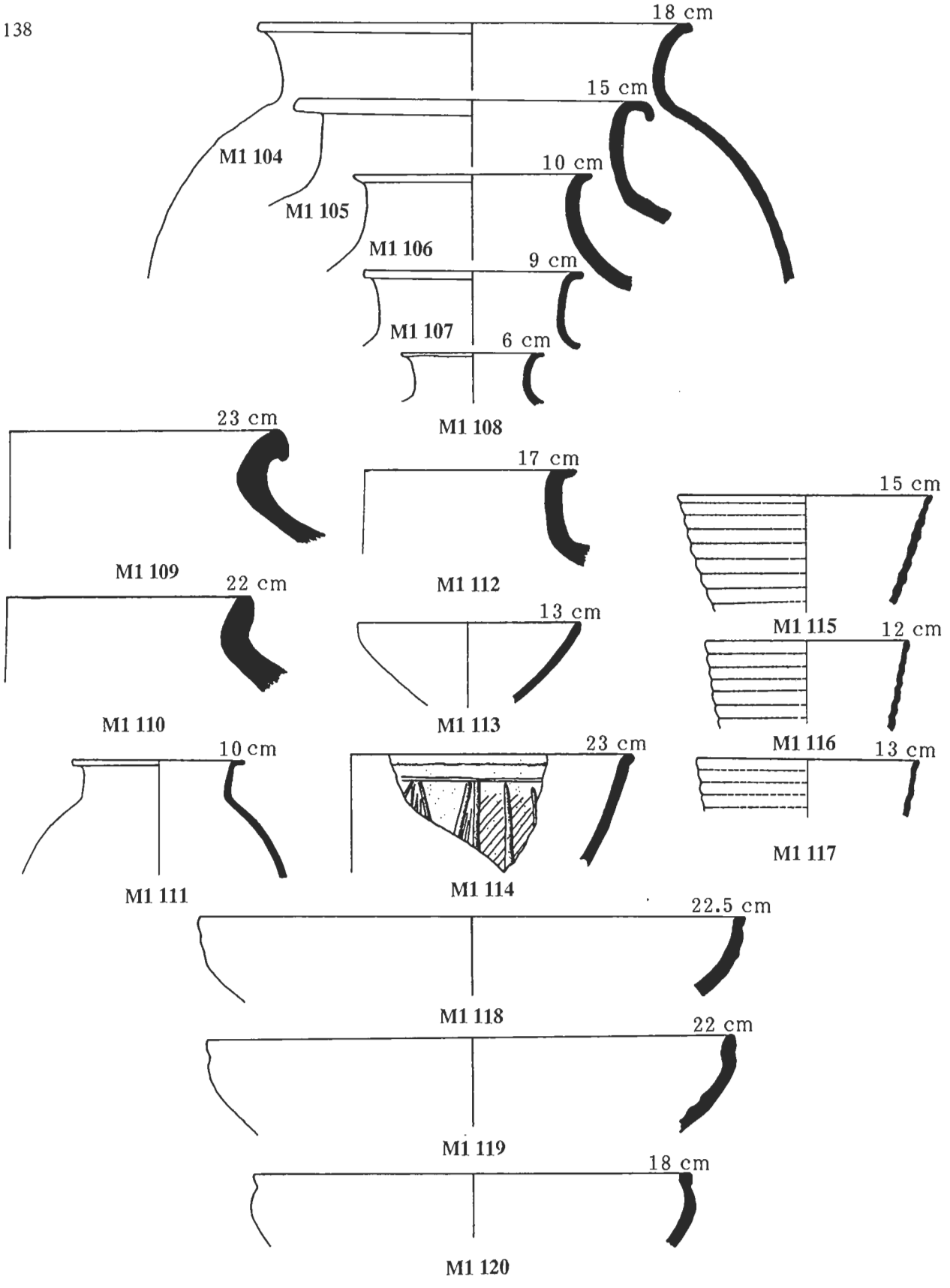


Figure 28. Ceramic types from the surface of the Outer City: Location Os6

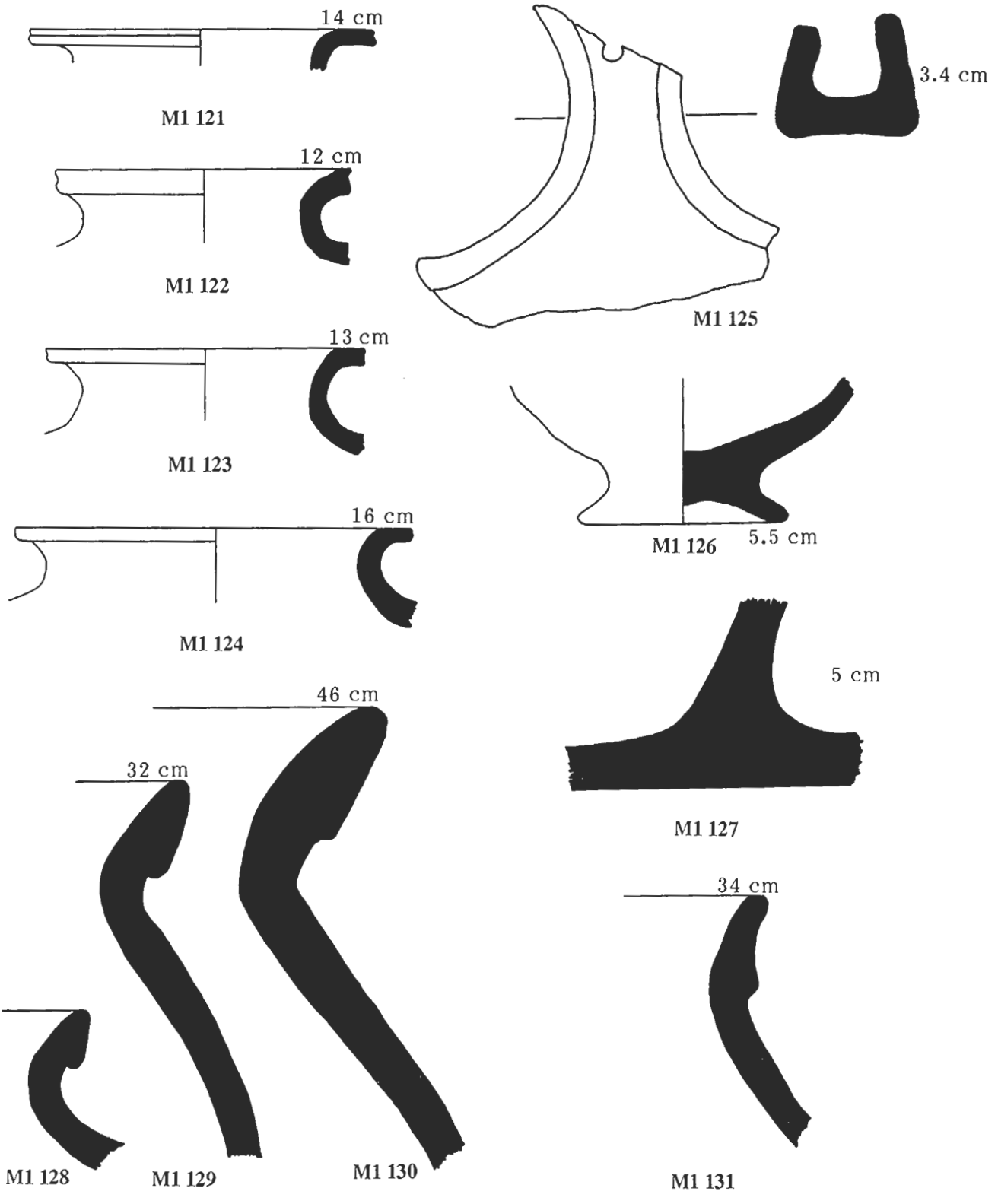


Figure 29. Ceramic types from the surface of the Outer City: Locations Os7 and Os9

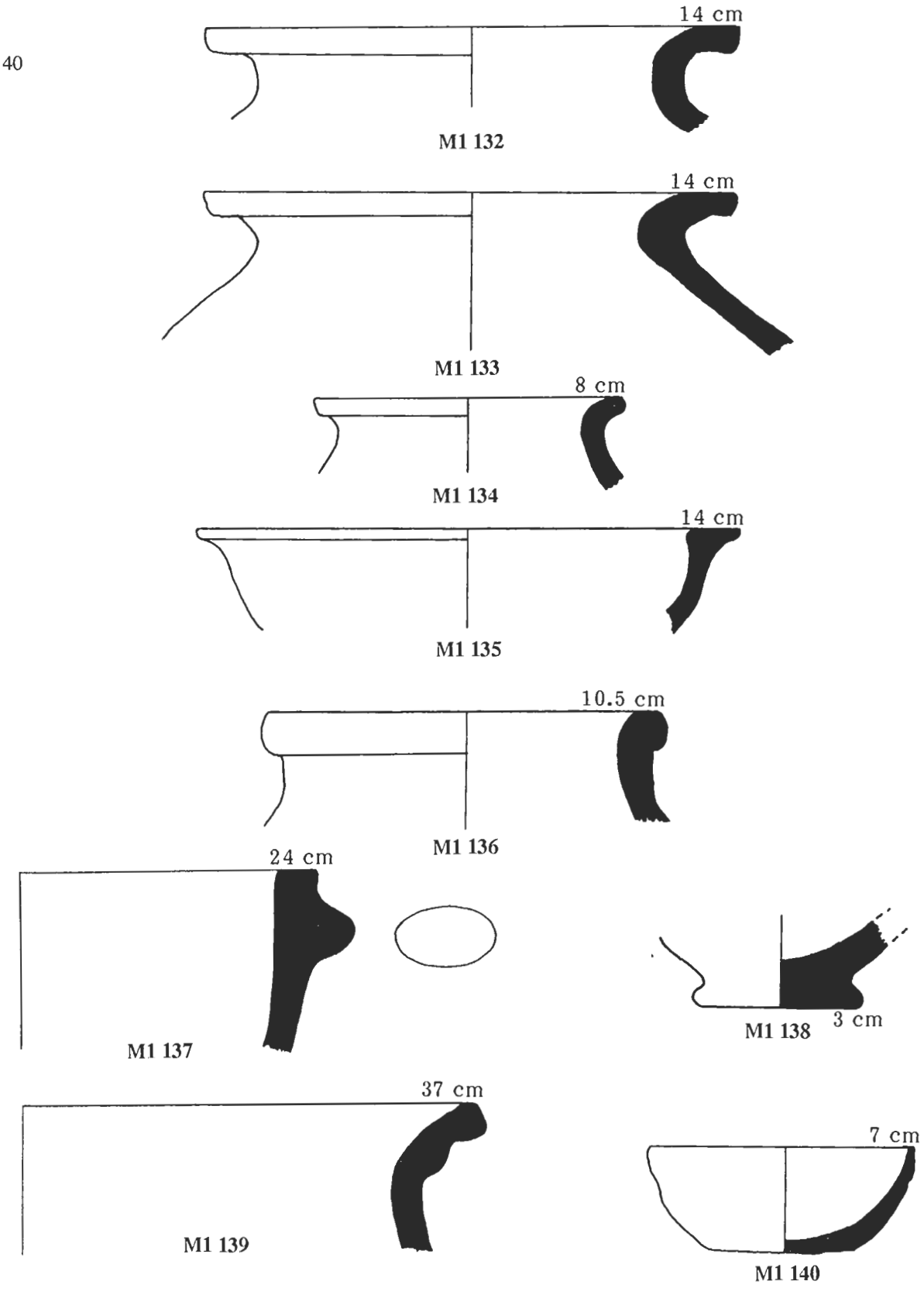


Figure 30. Ceramic types from the surface of the Outer City: Metallic and Simple ware types from various locations

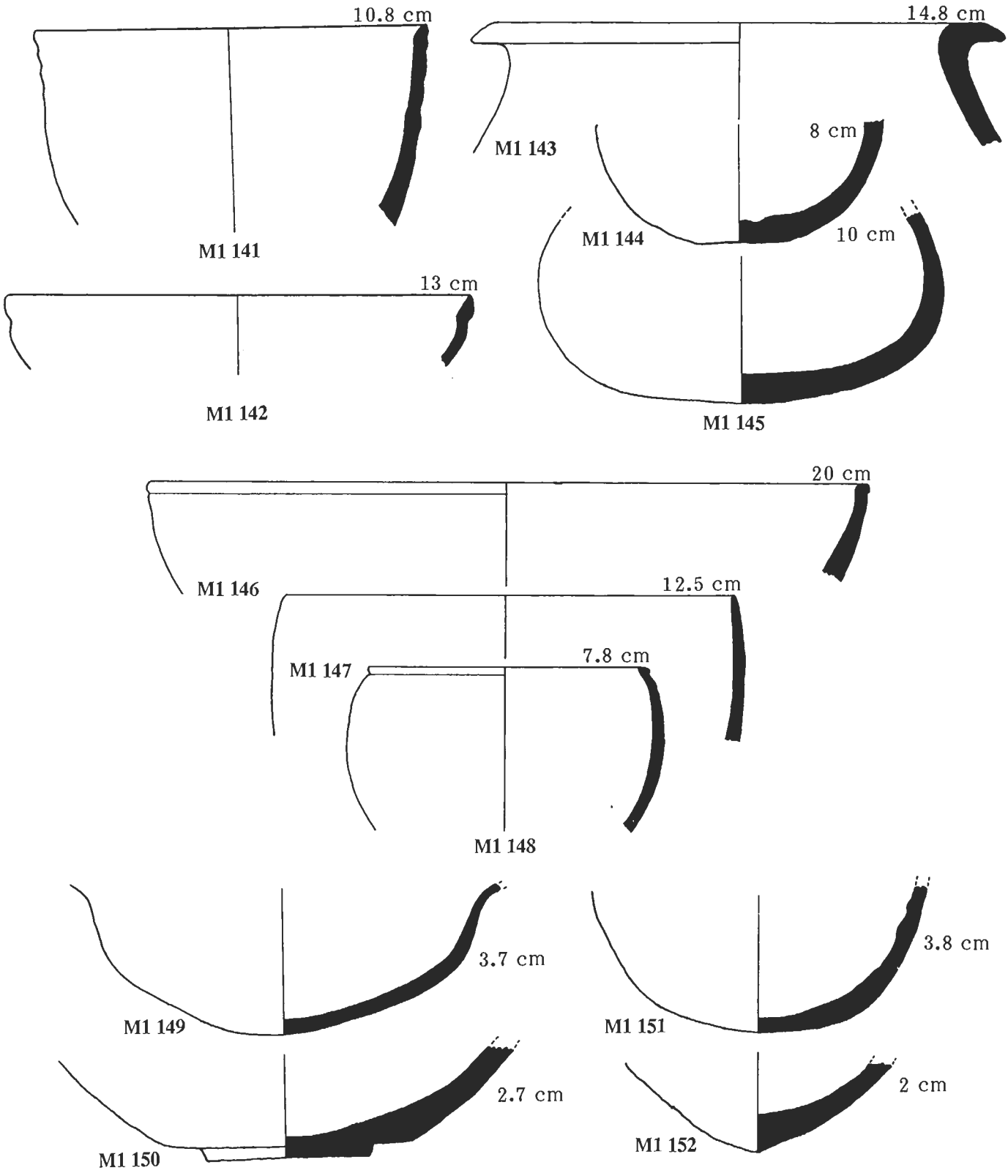


Figure 31. Ceramic types from the surface of the Outer City: Miscellaneous types

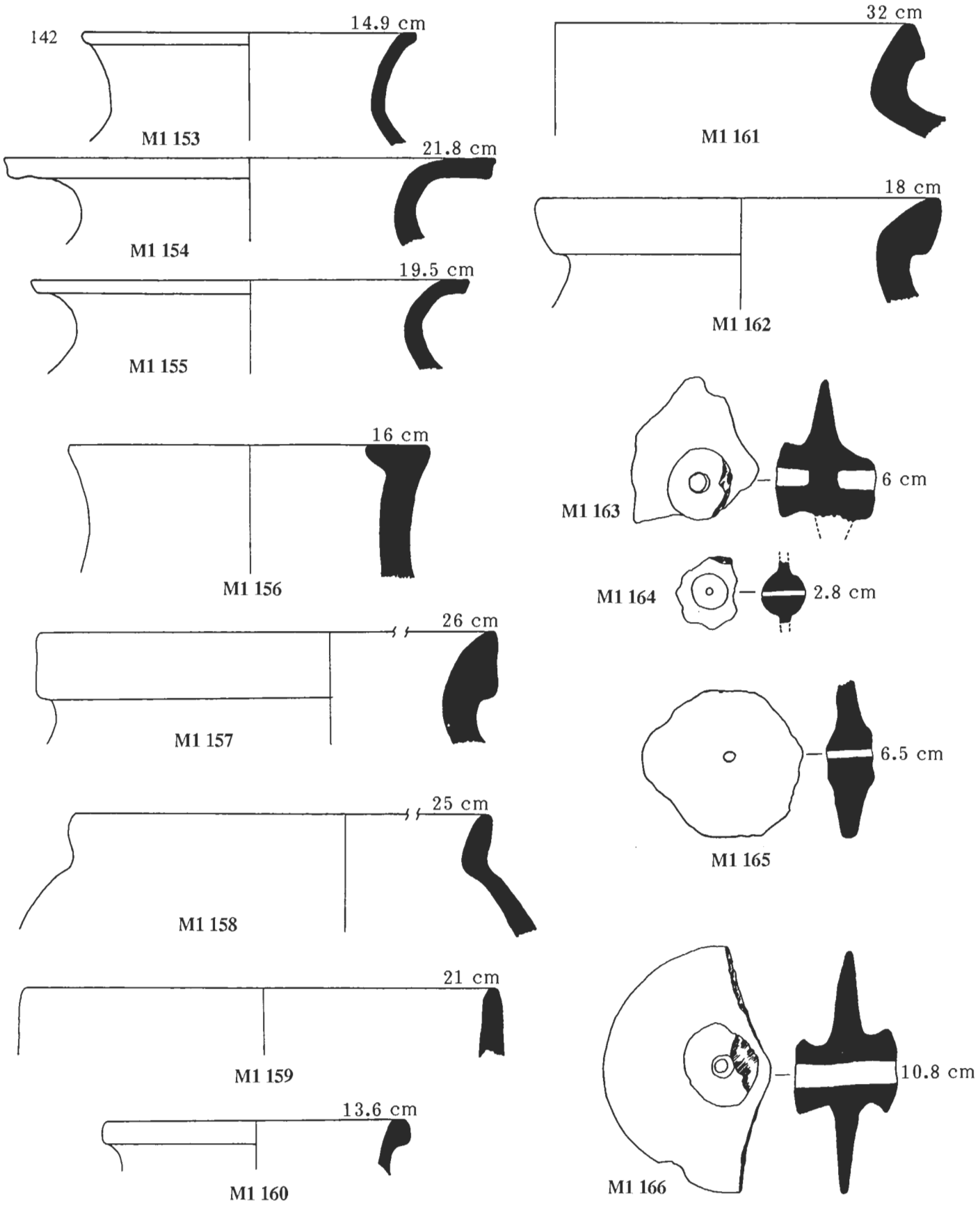
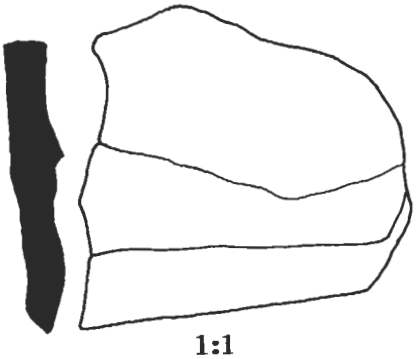
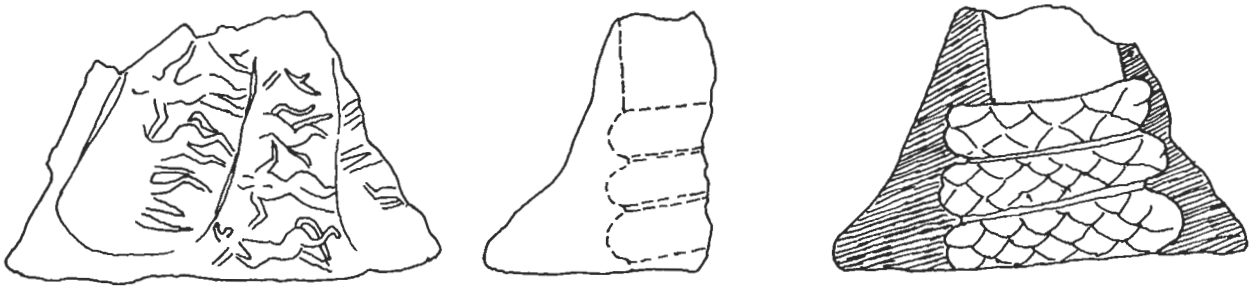


Figure 32. Ceramic types and wheels from the surface of the Outer City

M1 167

M1 168





M1 169

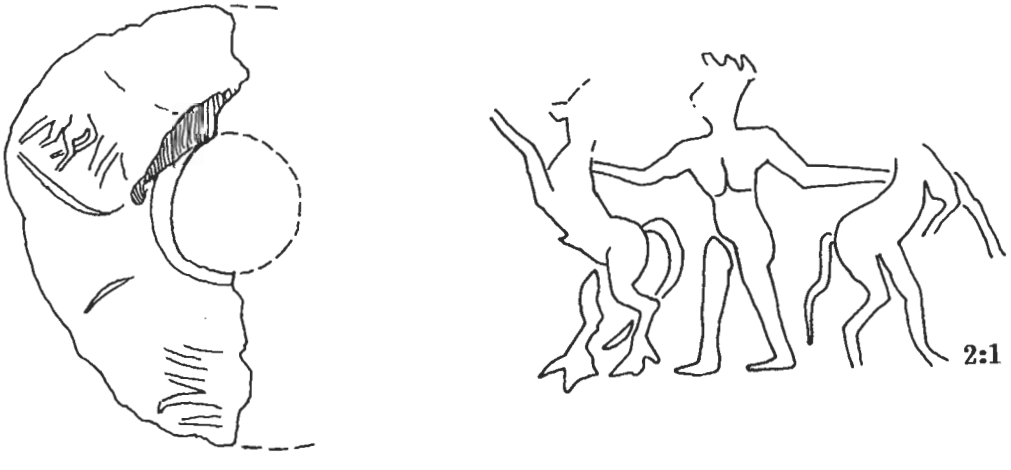


Figure 33. Seal impressions from the glacis in Area K

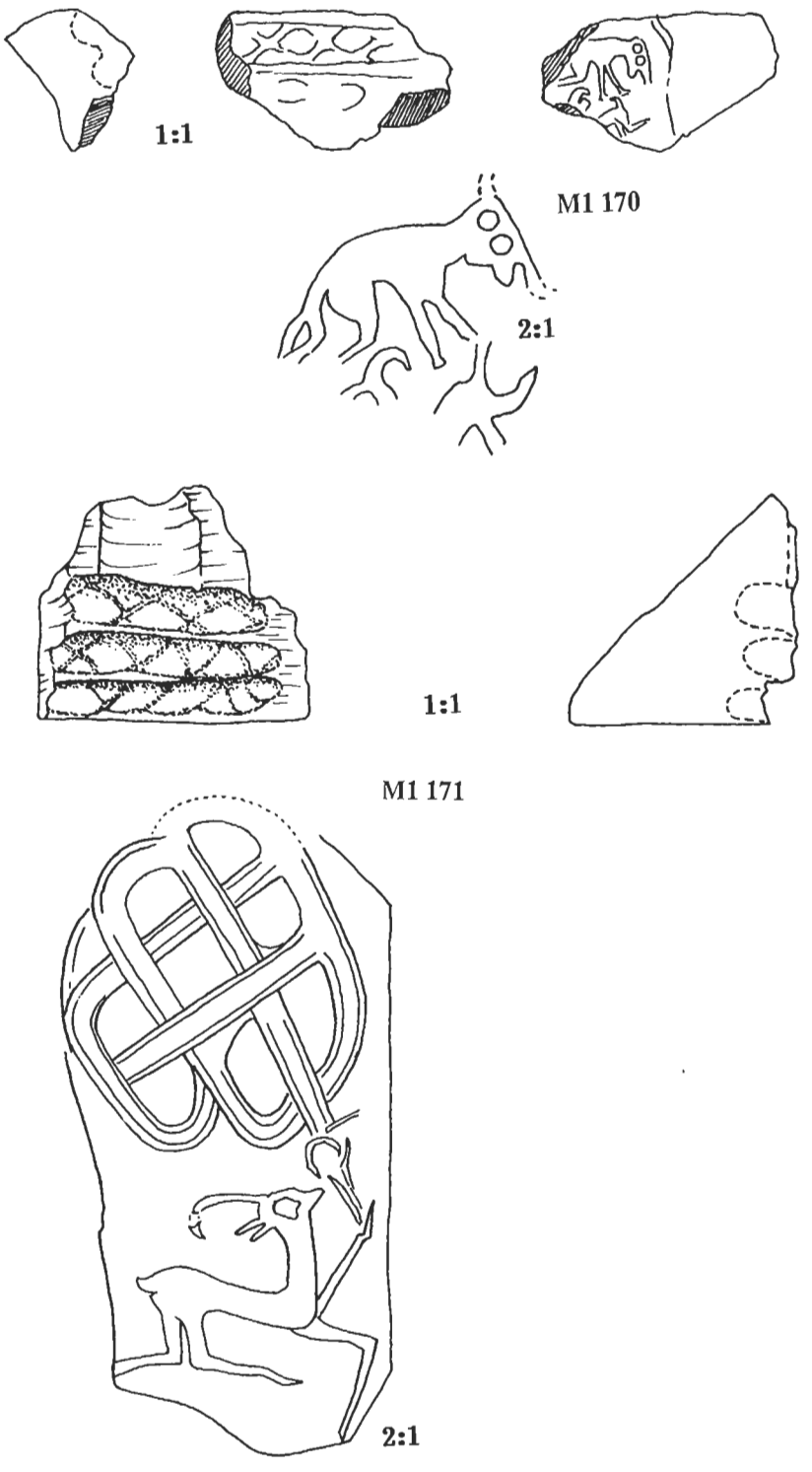
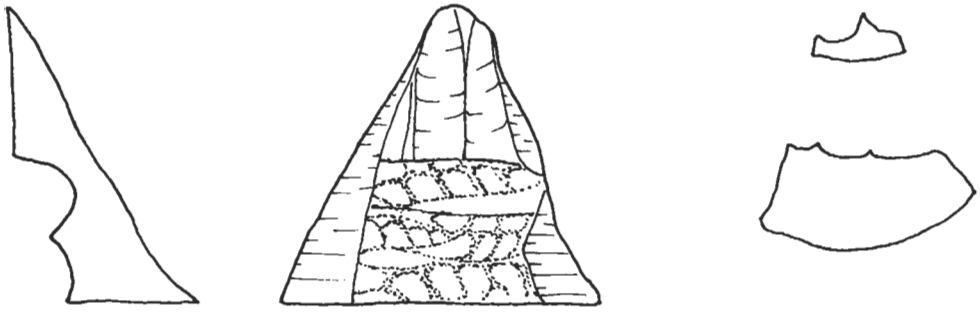
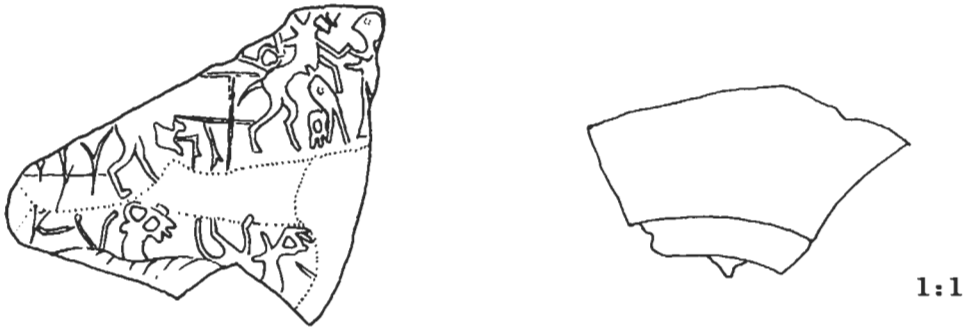


Figure 34. Seal impressions from the glacis in Area K



M1 172



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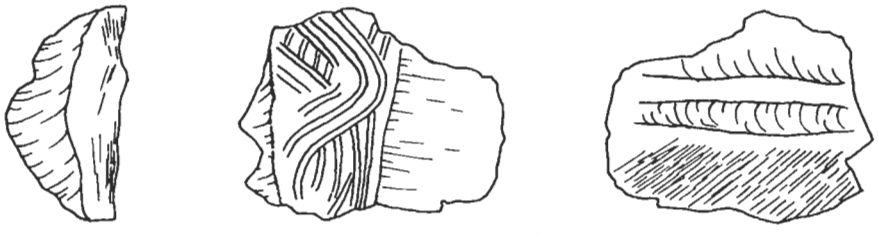
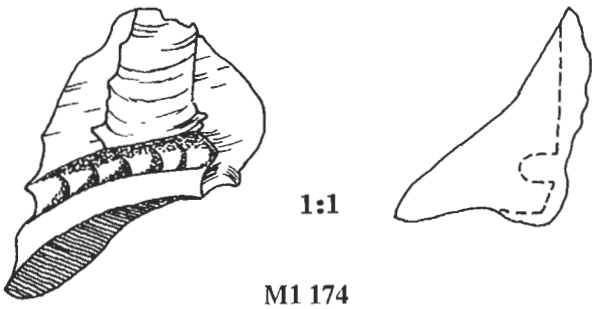


M1 173

1:1

Figure 35. Seal impressions from the glacis in Area K



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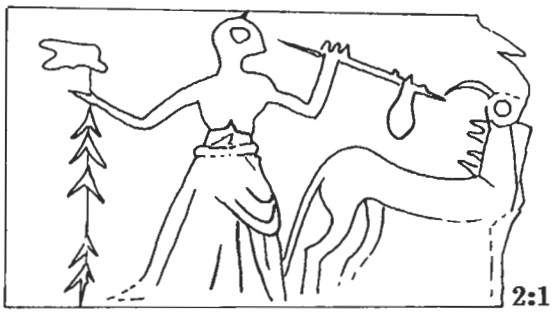
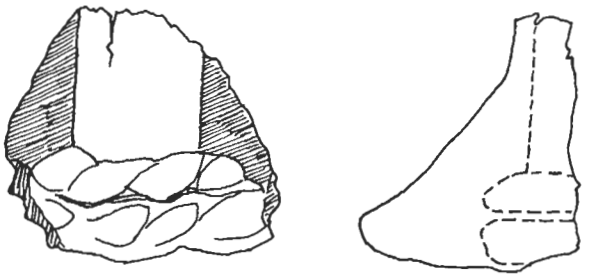
M1 174



2:1

2:1

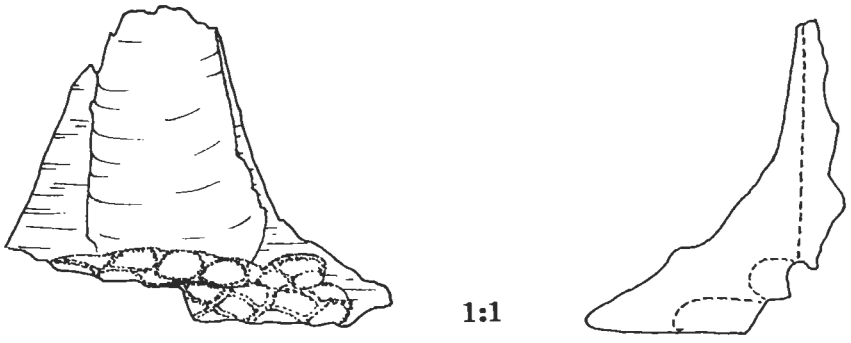


M1 175

1:1

M1 176

Figure 36. Seal impressions from the glacis in Area K



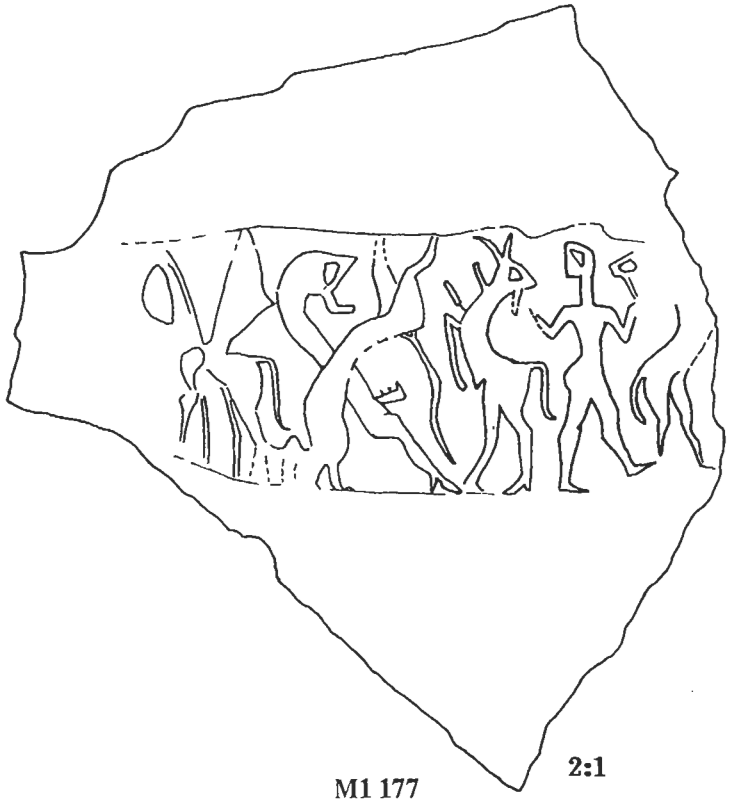
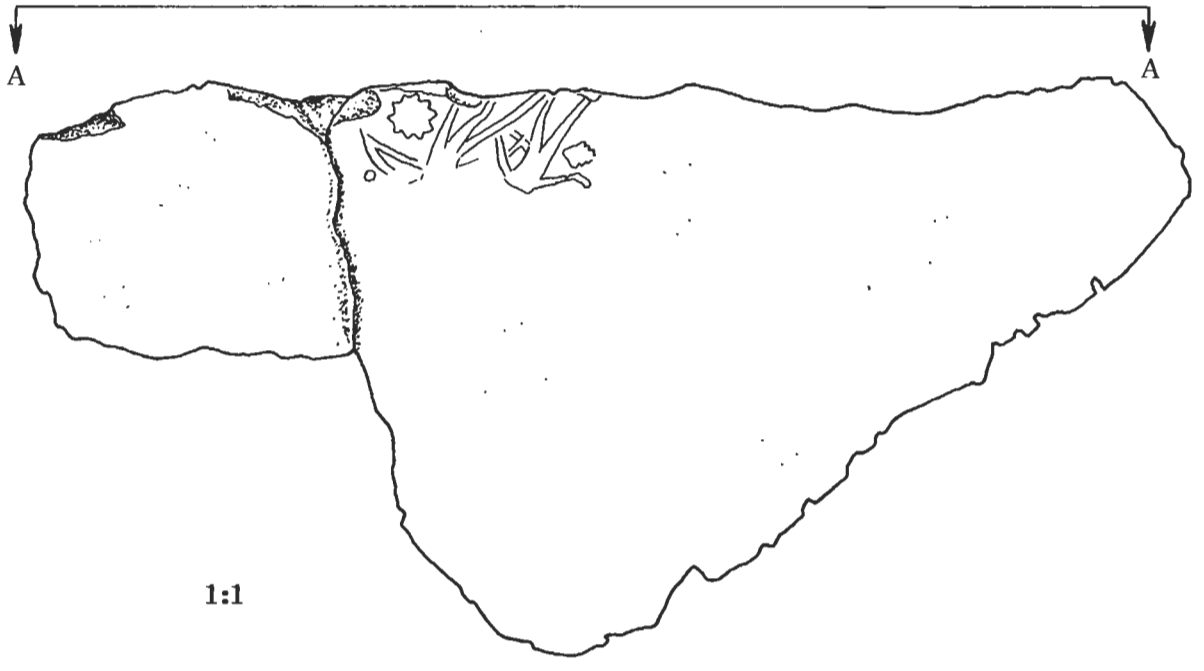
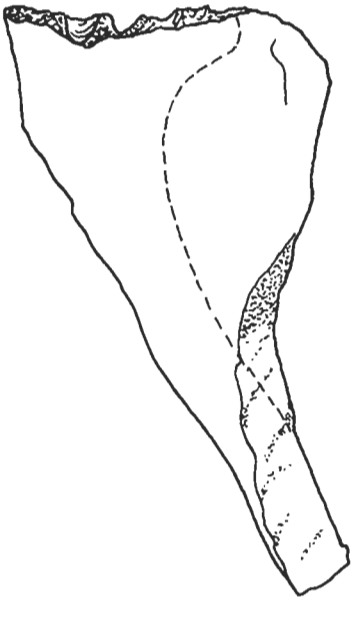
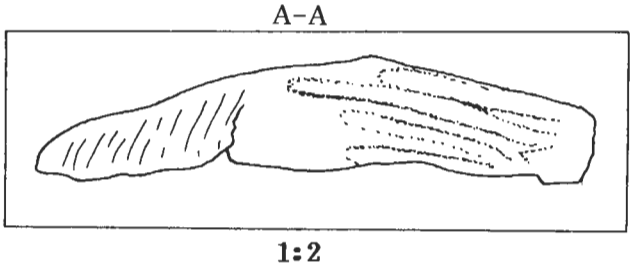


Figure 37. Seal impressions from the glacis in Area K



M1 178





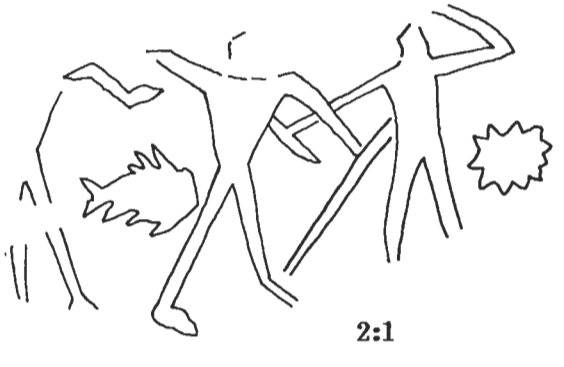
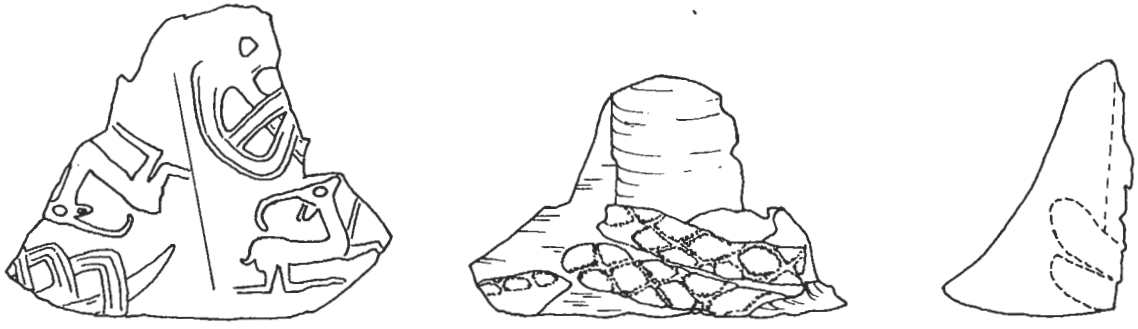
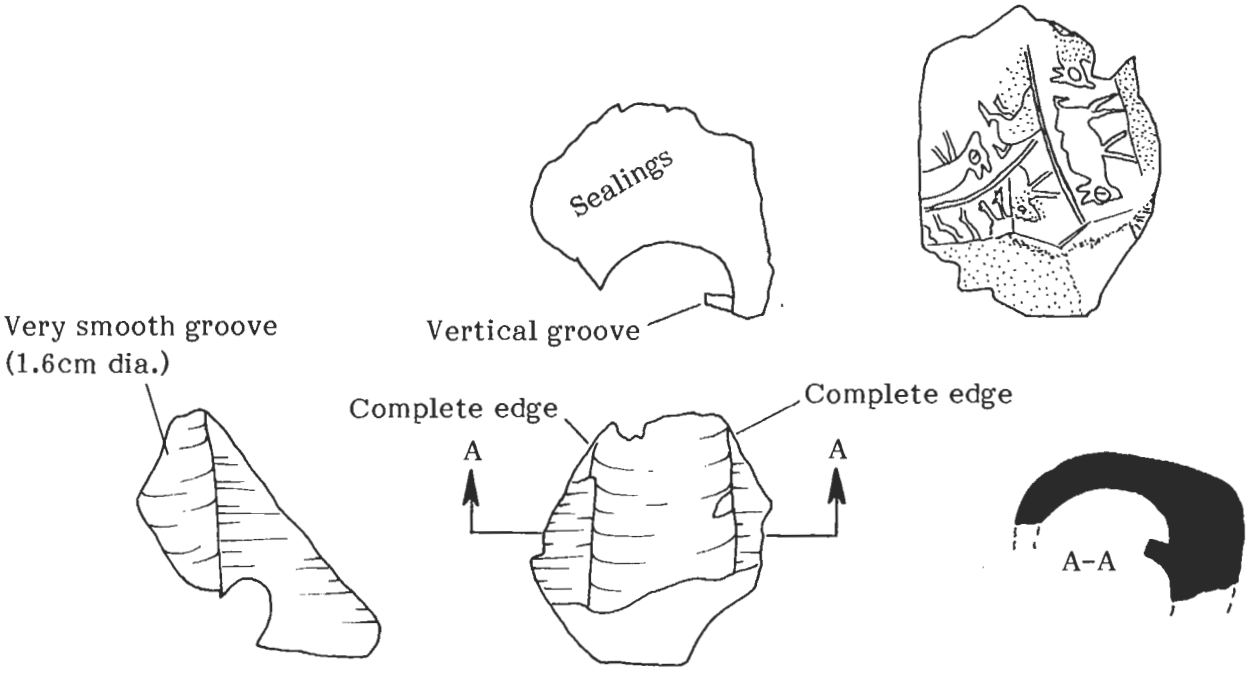


Figure 38. Seal impressions from the glacis in Area K



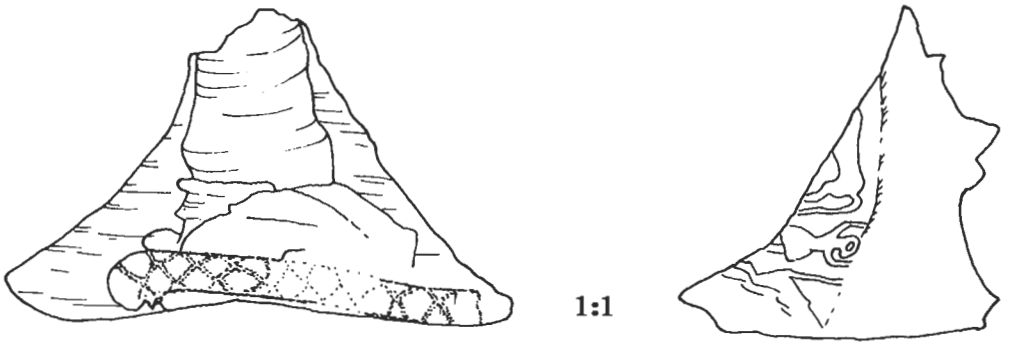
M1 179



M1 180

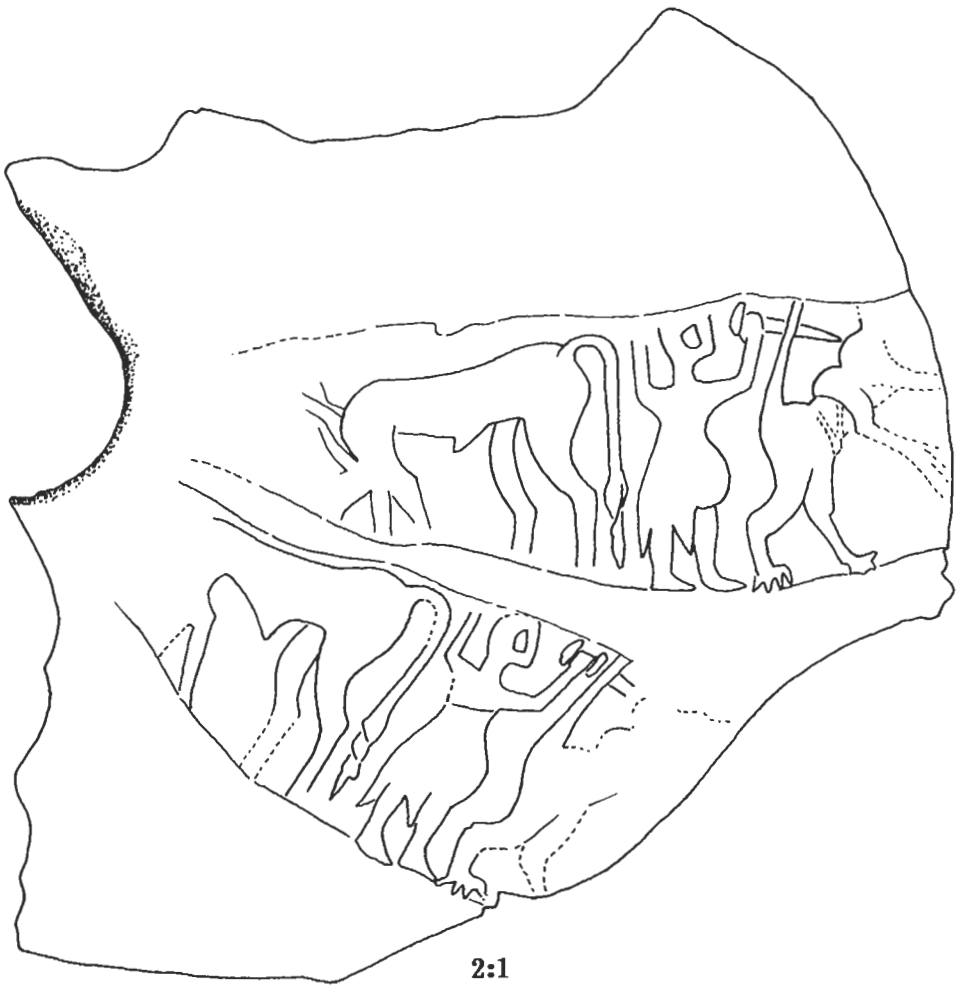
1:1

Figure 39. Seal impressions from the glacis in Area K



1:1

M1 181



2:1

Figure 40. Seal impressions from the glacis in Area K

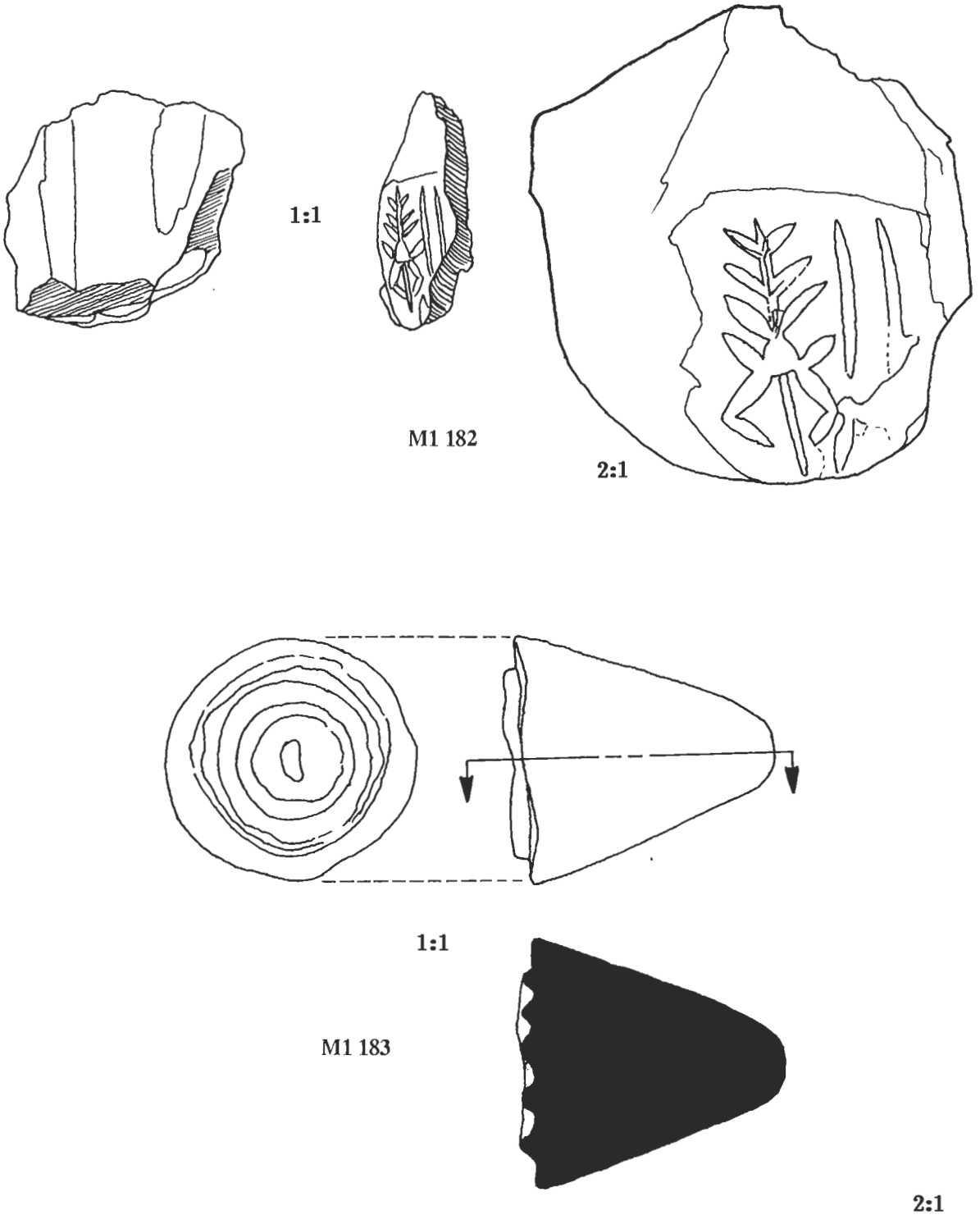


Figure 41. Seal impression and stamp seal from the surface

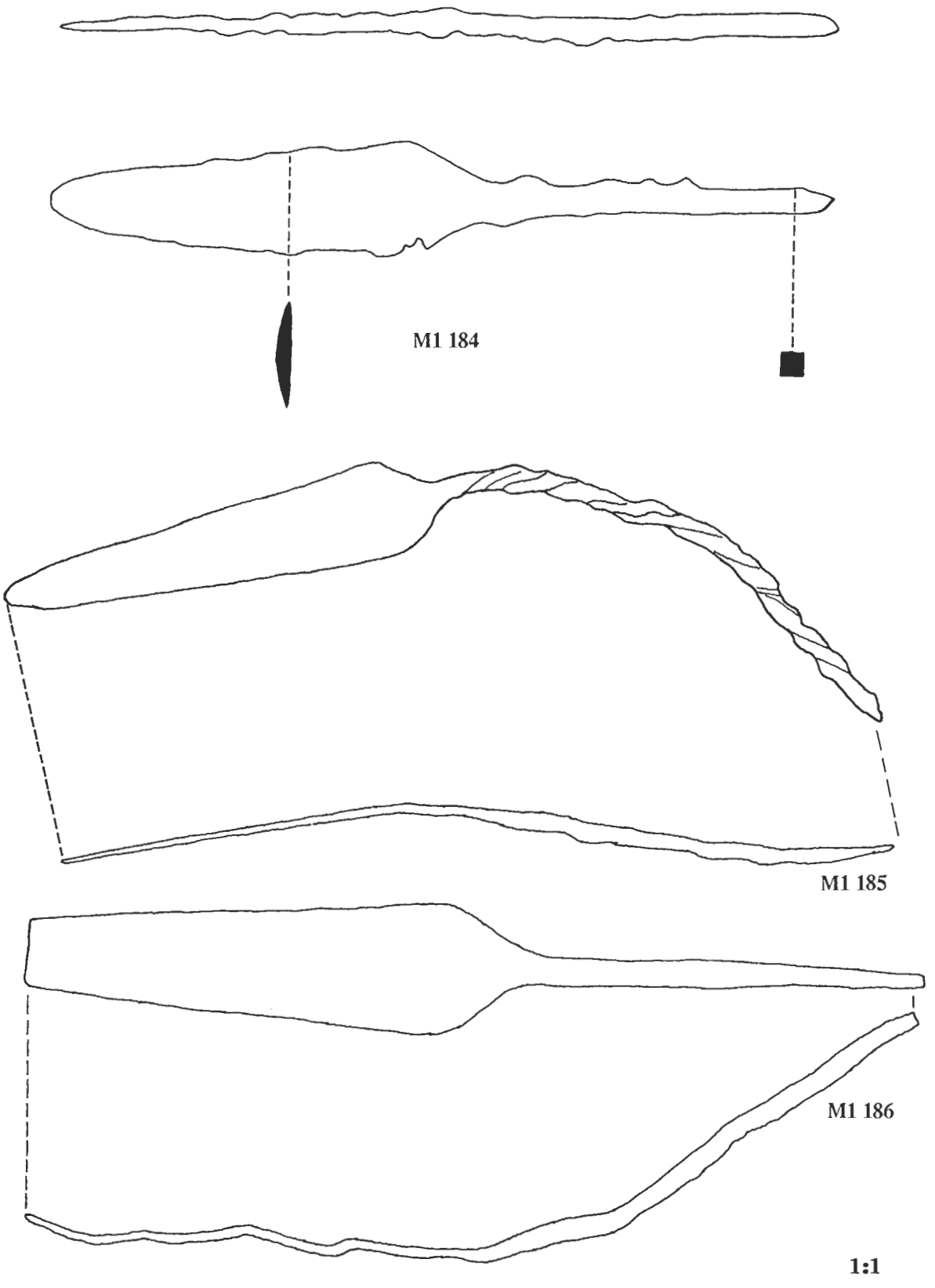
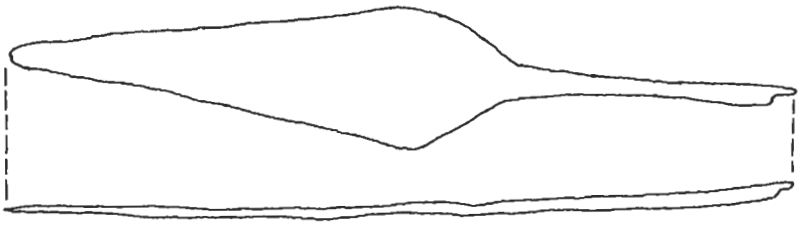
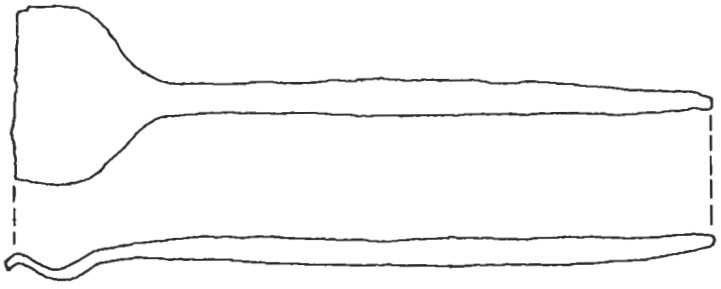


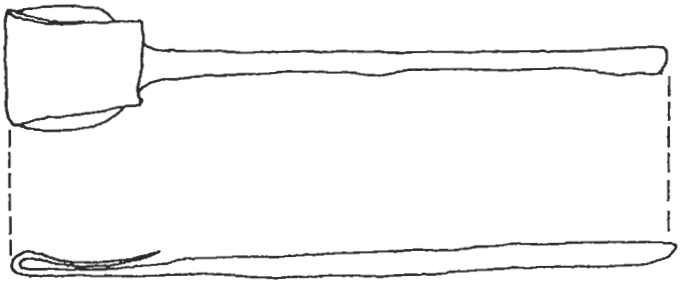
Figure 42. Metal spearheads



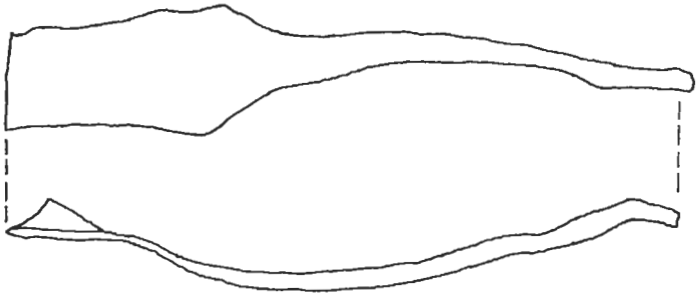
M1 187



M1 188



M1 189



M1 190

1:1

Figure 43. Metal spearheads

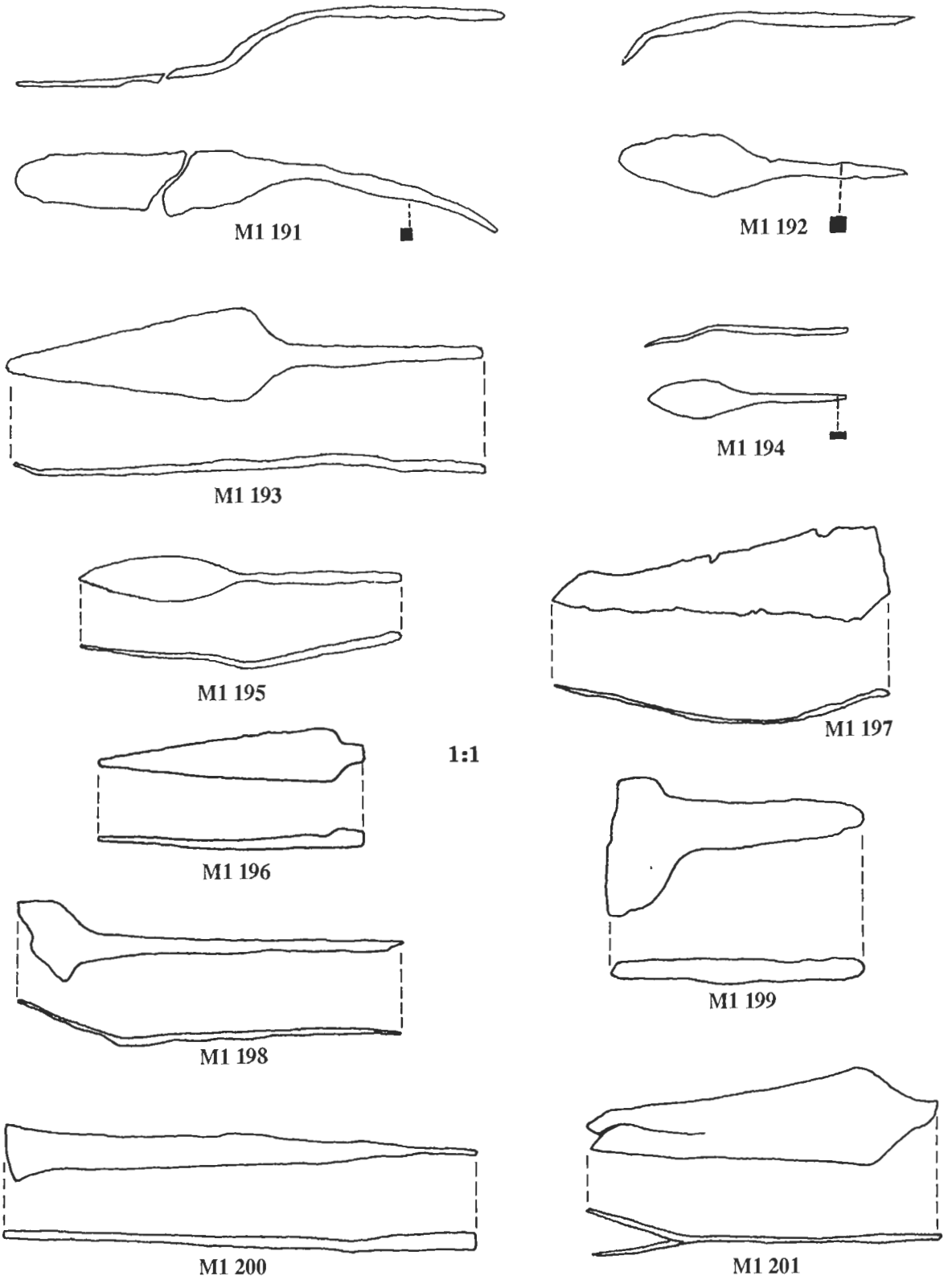
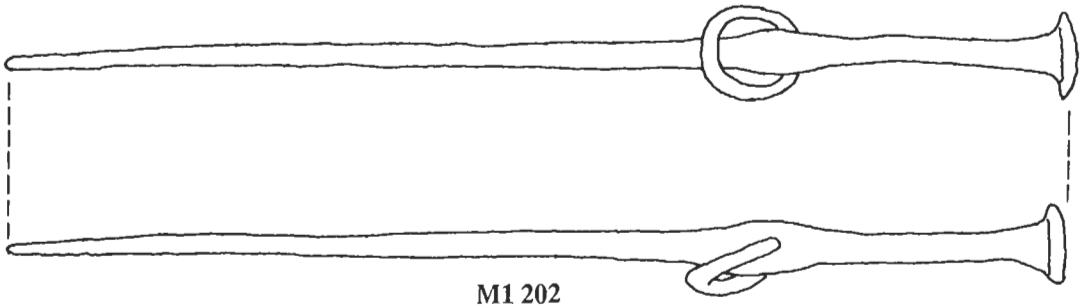
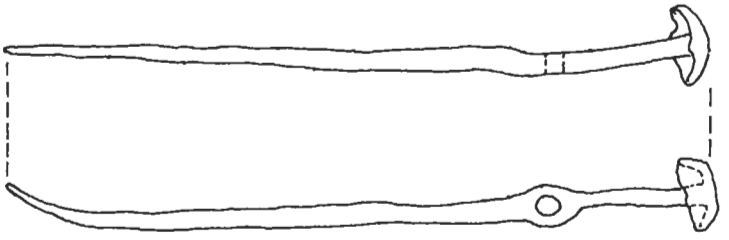


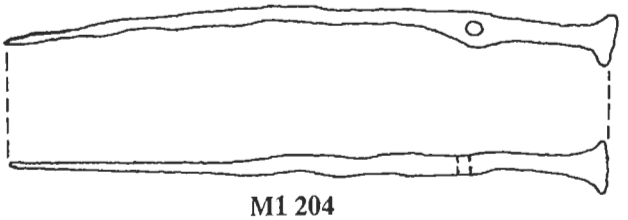
Figure 44. Metal points, spoons and scalpel



M1 202

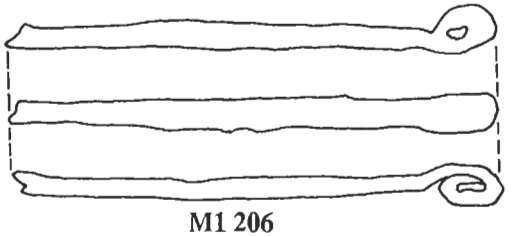


M1 203



M1 204

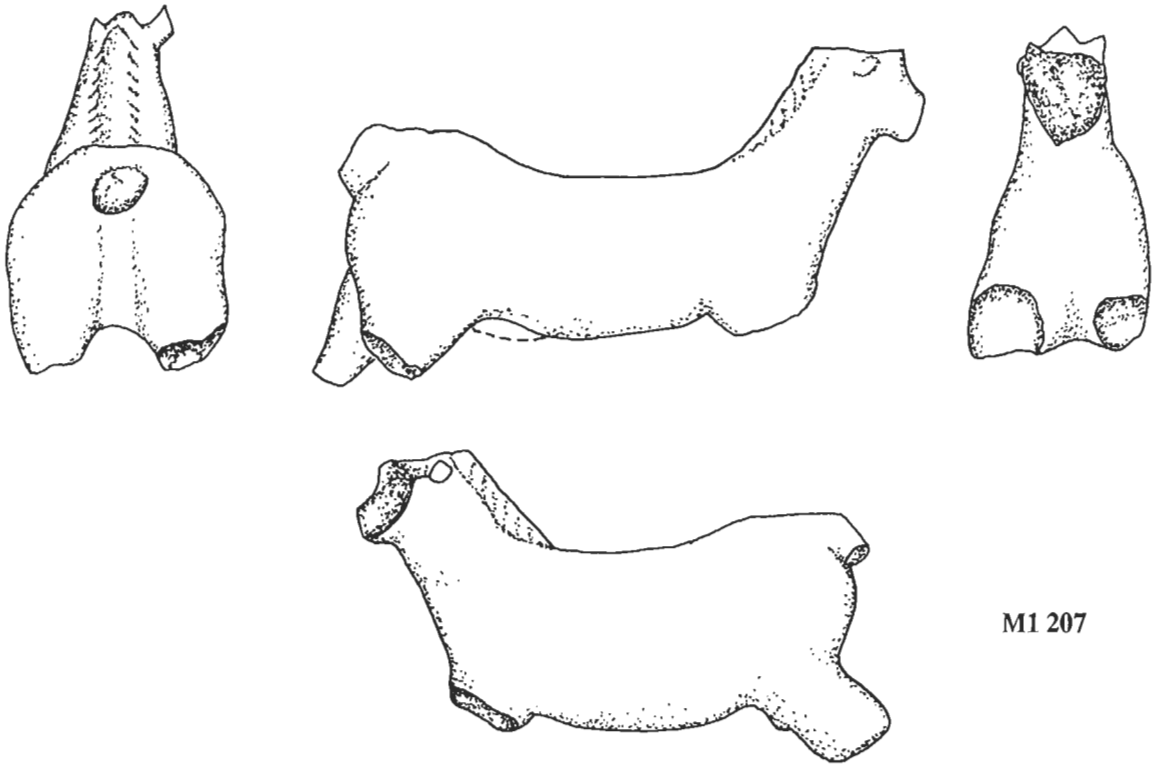
M1 205



M1 206

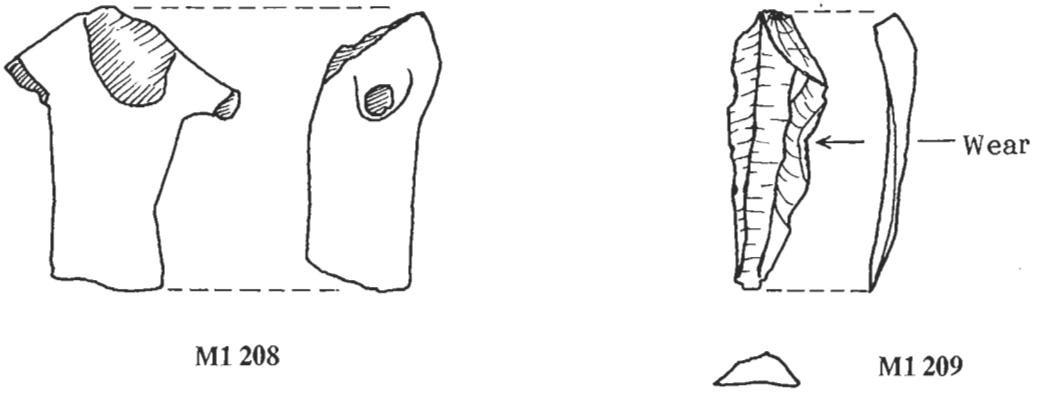
1:1

Figure 45. Metal pins



M1 207

1:1



M1 208

M1 209

Figure 46. Lithic blade and figurines

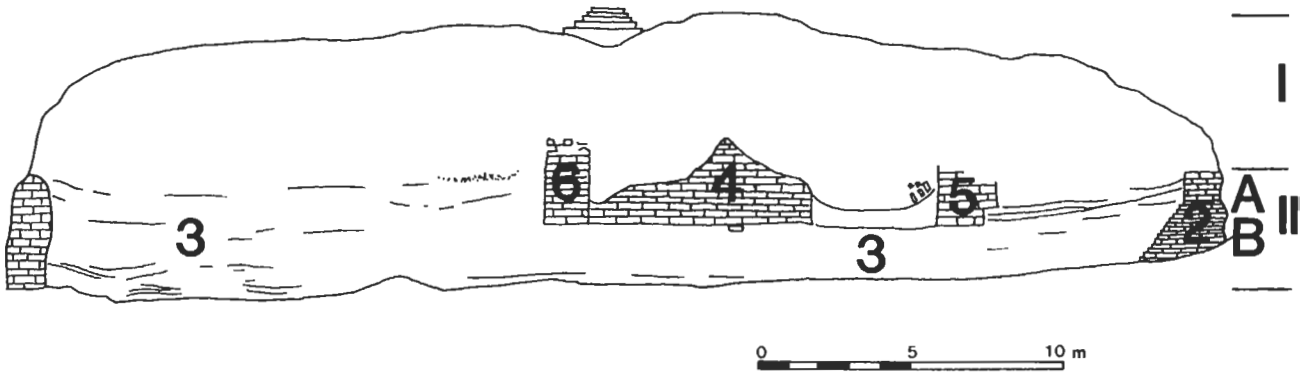


Figure 47. Tell Shermola: Sketch section of northern side of central mound

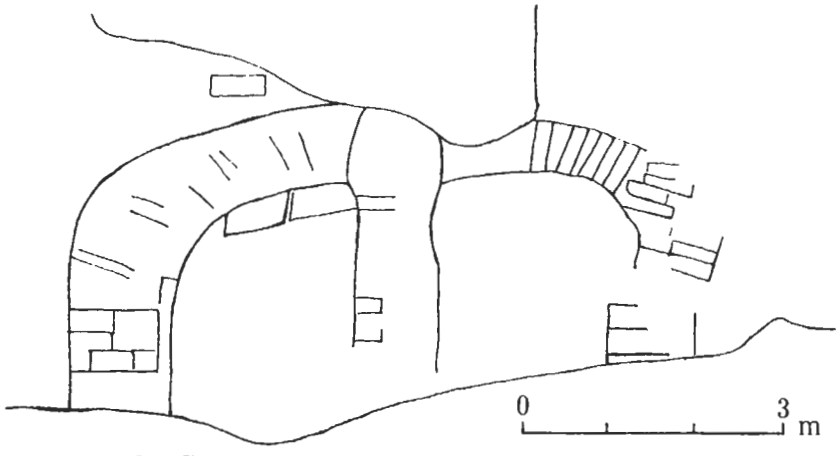


Figure 48. Tell Shermola: Sketch section of arched structure on southern side of mound

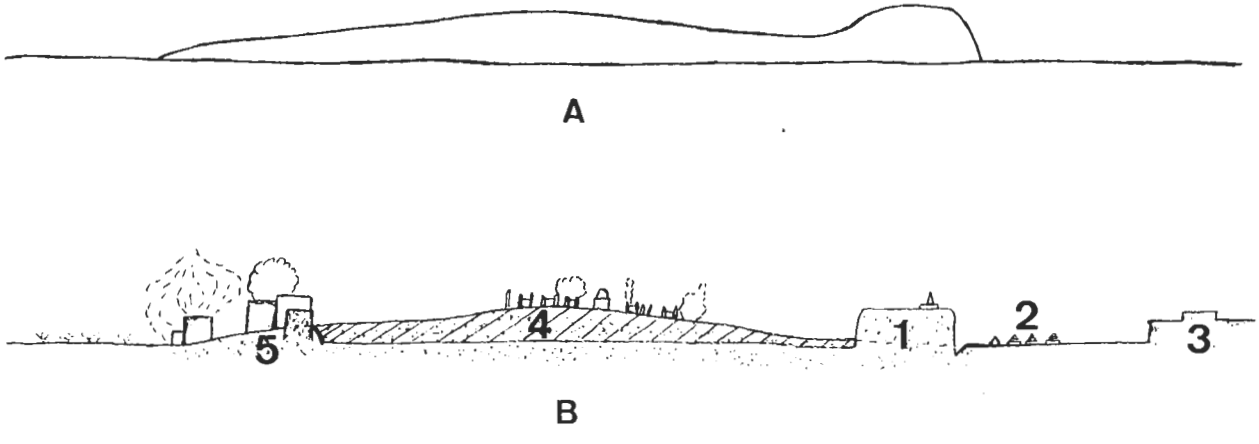


Figure 49. Tell Shermola: Sketch section of entire tell, looking west, with proposed reconstruction of ancient outline

1 Tell Shermola (main mound)
2 Cemetery
3 Southern edge of the town of Amuda
4 Cemetery hill
5 Southern mound

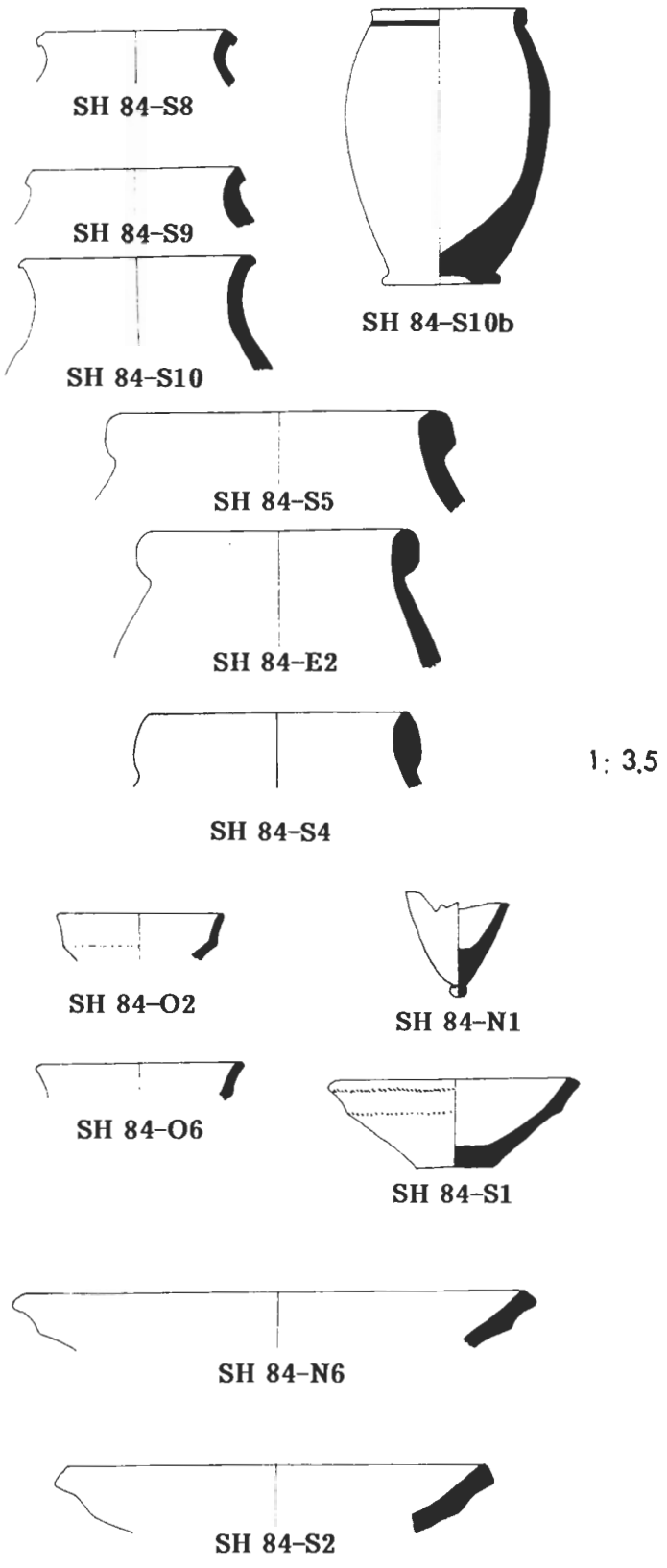


Figure 50. Tell Shermola: Ceramic types from the surface of the main mound

PLATES

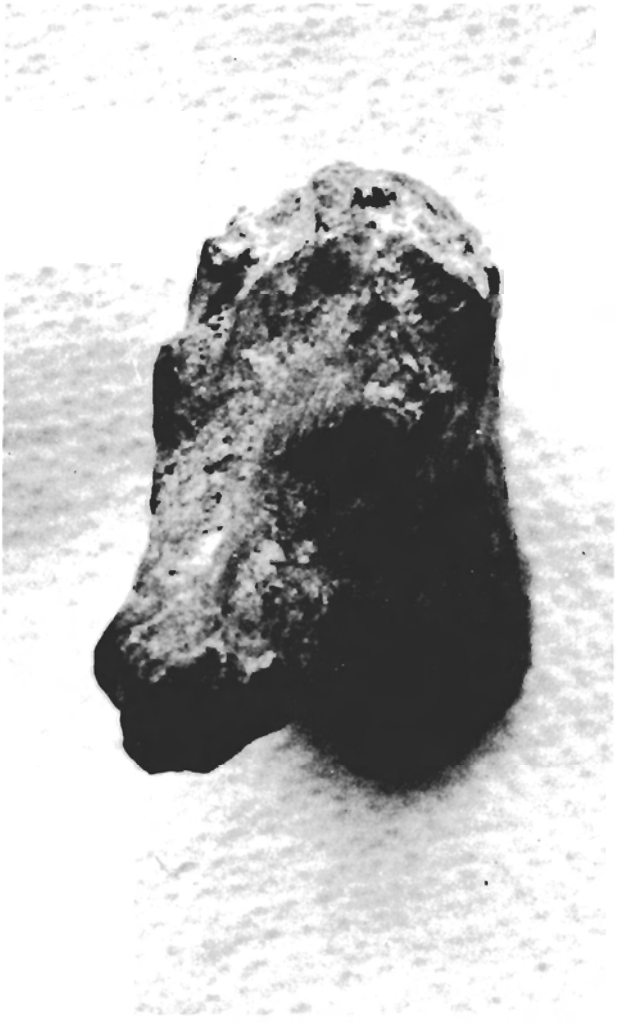


Illustration 1. Miniature head of a horse

M1 209 (K1.12). Burnt clay; from the destruction layer in K1 feature 16 (mid third millennium).

Illustration 2. Aerial view of Tell Mozan with Outer City (far shot, looking southwest).

A faint discoloration (and in some cases a change in the pattern of field layout) marks the low rise which encircles the Outer City. The distance between the southern and northern points (S and N in the photograph) is about one mile.

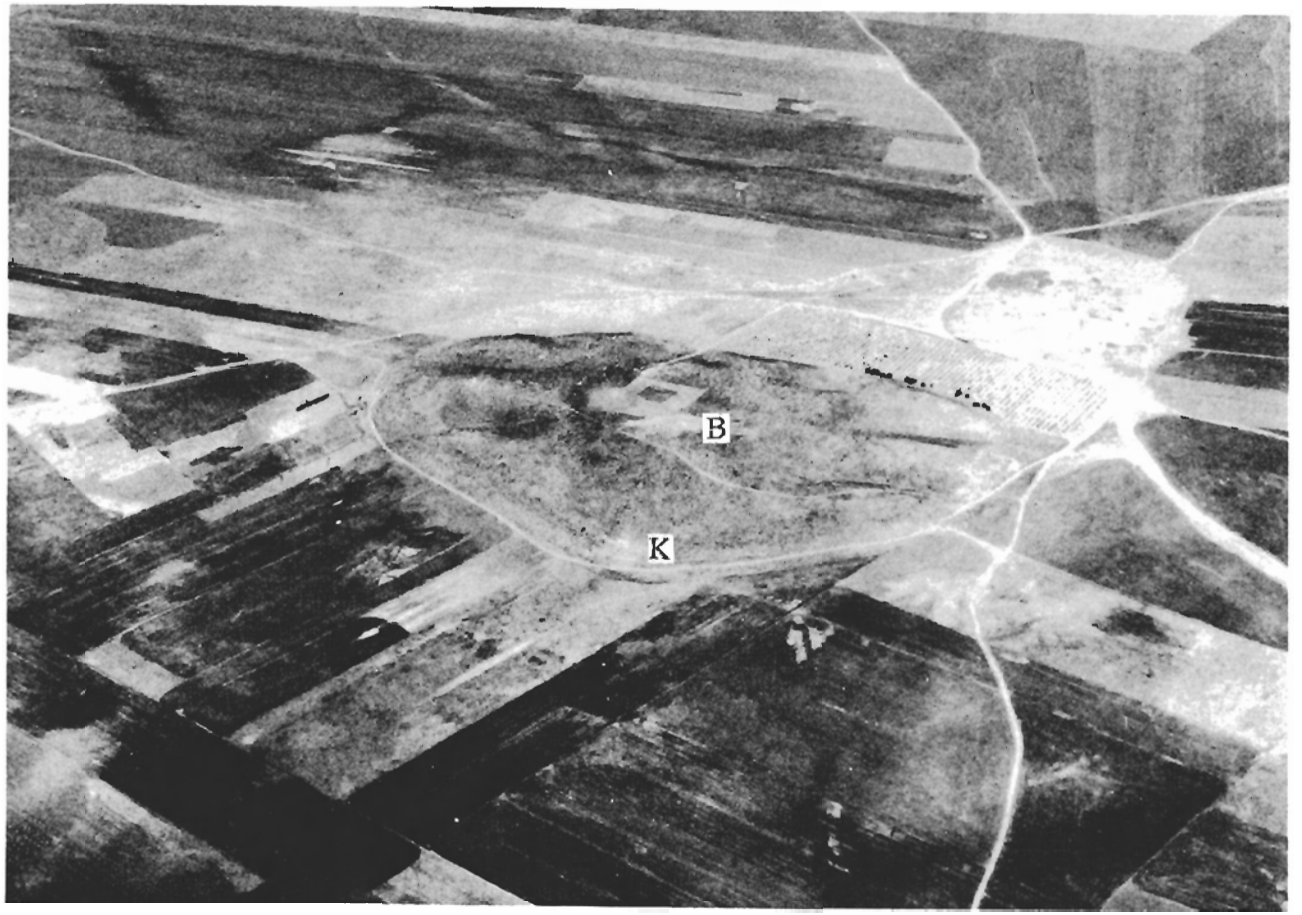


Illustration 3. Aerial view of Tell Mozan with Outer City (medium shot, looking west).

B and K are the two main soundings of the first two seasons.

Illustration 4. Aerial view of Tell Mozan (narrow shot, looking south).

The village of Mozan is visible on the right; it is located within the area of the ancient Outer City. The vineyard between the village and the mound is on a gentle slope which may correspond to part of the ancient High Mound. The low rise encircling the Outer City is partly visible in the upper right. The distance between the eastern and western points (E and W in the photograph) is about one kilometer.

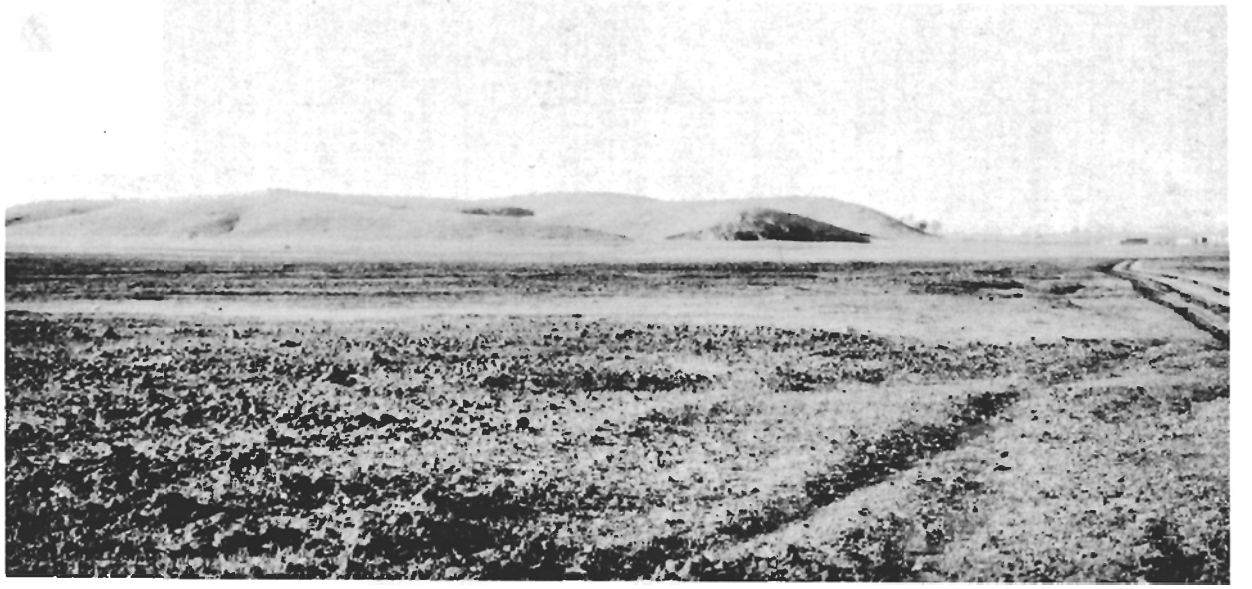


Illustration 5. Profile of Tell Mozan (looking south).

The village of Mozan is visible on the right. The trees on the slope delimit the higher border of the vineyard.

PLATE VI

Illustration 6. Stone building, Area B1 (direct overhead).

Stone ramp partly exposed, semi-circular feature, and southwest corner of outer stone wall. (The photograph was taken toward the beginning of the second season, and the exposure is correspondingly more limited than shown on the floor plan, Figure 8.)

Illustration 7. Stone building, Area B1 (oblique overhead, looking north).

The ramp and semi-circular structure are visible on the lower left, and beyond them the three parallel stone walls on the west. In the background is the continuation of this building with its stone foundations and the lower courses of mud brick walls.

Illustration 8. Stone building, Area B1: southwestern corner (oblique overhead, looking east).

Closer view of ramp, semi-circular structure, and southwestern portion of room.

Illustration 9. Stone building, Area B1: southwestern corner (looking south).

Visible in the center is the clear alignment of the stones marking the outer face of the western side of the building.

PLATE VIII

Illustration 10. Stone building, Area B1: northwestern corner with plastered floor (looking north).

White floor is preserved up to the edge of the wall. The mudbrick is preserved in the lower right (same corner as in Illustr. 11); elsewhere only the stone substructure is preserved.

Illustration 11. Stone building, Area B1: detail of brick wall on stone foundation and white floor.

On the lower right corner the white plastered floor rides up to, and curls up against, the lower course of bricks of the wall. The thickness of the plaster shows in the section of the shallow round depression in the lower center of the photograph.

Illustration 12. Stone building, Area B1: broken storage vessel on outside floor in southwestern corner, of Pebble Tempered ware.

Illustration 13. Stone building, Area B1: reconstructed storage vessels on outside floor in southwestern corner.

Restored Pebble Tempered storage vessel on lower left and restored rope decorated jar on upper left; both were found on floor B1f19.

PLATE X

Illustration 14. City wall, Area K1: direct overhead.

The long narrow trench has exposed the base of the glacis (lower portion) and the inside of the city wall (K2): the slope of the tell reveals the brickwork of the eroded core of the city wall. Larger sounding at the base of the city wall is Locus A (see Figure 13).

Illustration 16. City wall, Area K1: detail of north section in Locus A (see Figure 13). The plastered exterior face of the city wall shows on the right, the bricks are lying horizontally on top of the burnt deposit (K1f16). The top of the glacis shows clearly, still partly covered by a portion of the burnt deposit.

Illustration 17. City wall, Area K1: frontal view, after scraping of vertical face (looking west). Preserved height of city wall, from the surface of the glacis to the top of the brickwork, is about 5 m. The top portion represents later deposit resting on top of the brickwork (part of which is removed in the continuation of the trench visible in Illustration 19).

Illustration 18. City wall, Area K1: general view of Locus A (looking north). Eroded core of wall, with articulated brickwork, shows on the right, with top surface of glacis riding up to its base. Talus of High Mound shows in background.

Illustration 19. City wall, Area K1: general view of glacis with burnt deposit and face of city wall (looking west). Trench cut perpendicular to the city wall shows the steep slope of the glacis; in the background the base of the wall and above it the trench cut at the top of the mound to expose the inner face of the city wall. Clearly visible are both the even surface of the glacis and the thickness of the burnt deposit.

Illustration 15. City wall, Area K1: front view, before excavations.

The cut in the side of the tell results from local farmers using this area to gather soil for mud bricks.

Illustration 16.

Illustration 17.

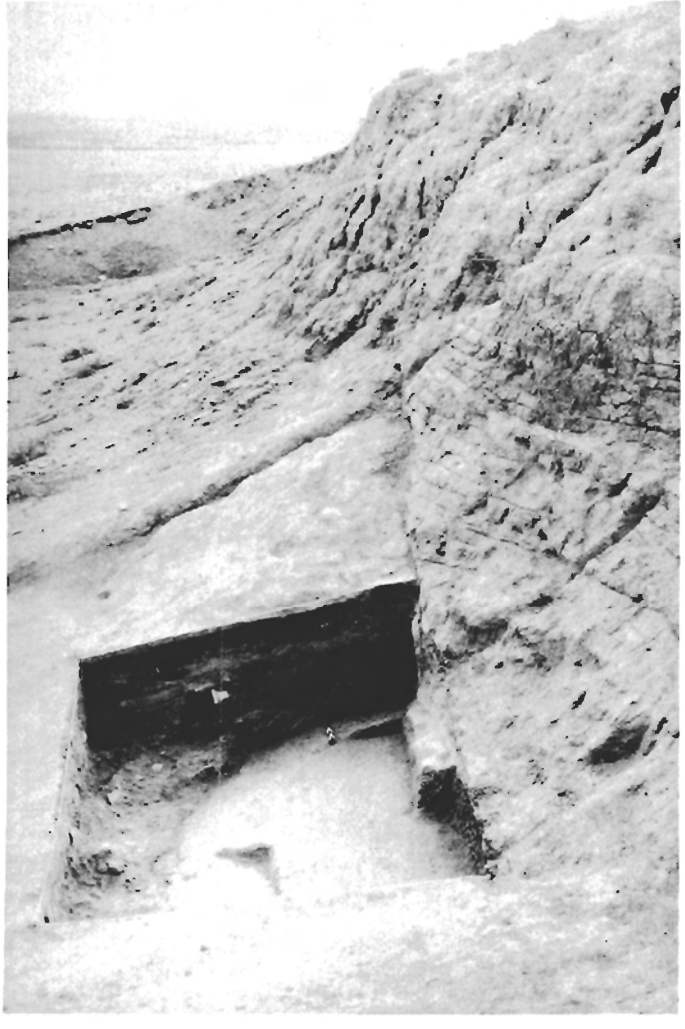


Illustration 18.

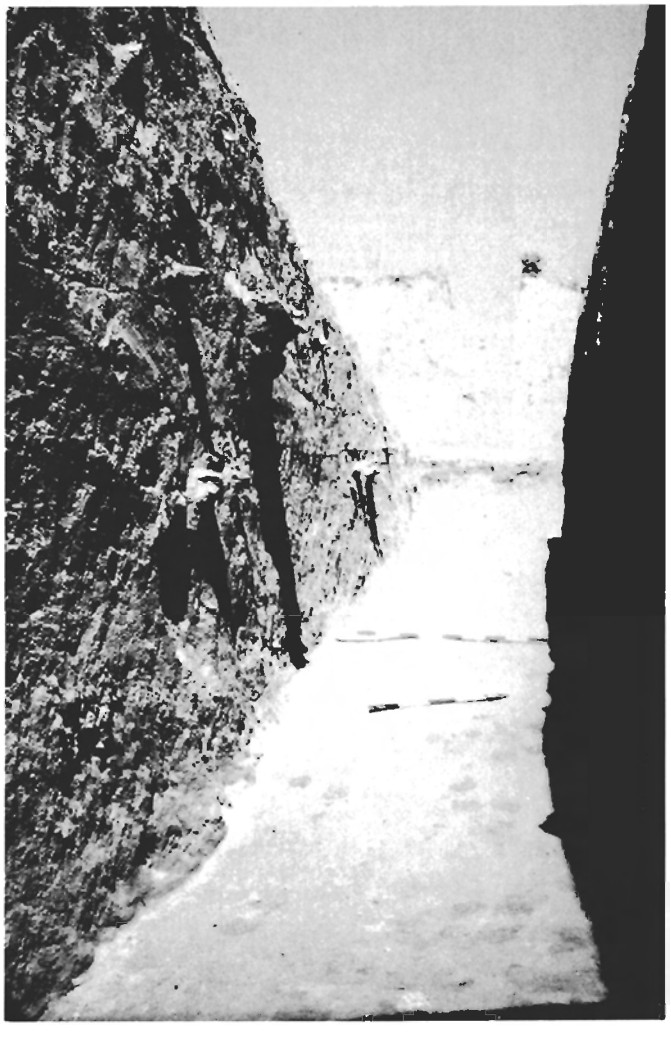


Illustration 19.

PLATE XII

Left:	Mid left:	Mid right:	Right:
M1 205	M1 200	M1 189	M1 203
M1 206	M1 196	M1 199	M1 204
B1.40	M1 193	M1 188	M1 202
M1 195	M1 201	M1 190	M1 187
M1 192	M1 197		M1 186
M1 194	M1 198		M1 185
M1 191			M1 184

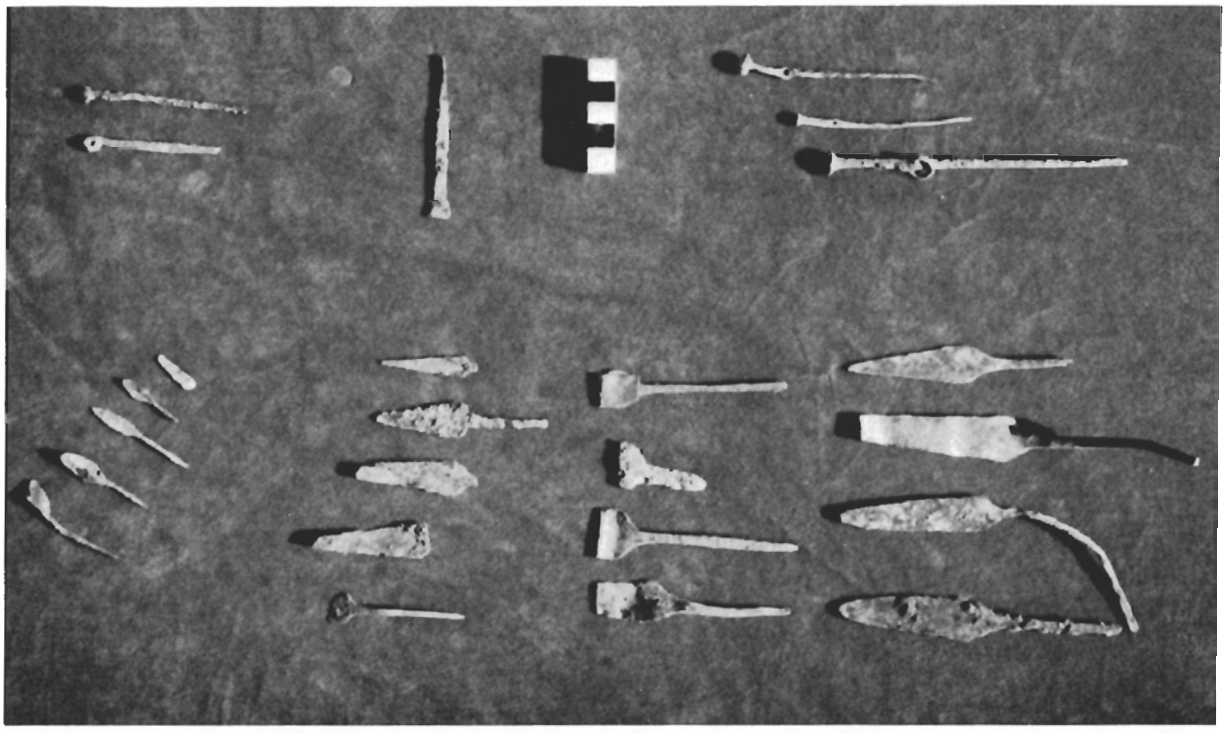


Illustration 21. Assemblage of metal objects (Areas B1 and K1).

The three pins at the upper right are from the burnt deposit in K1, the points at the lower right are mostly from the northwestern portion of B1, and the small spoons at the lower left are mostly from the central portion of B1.

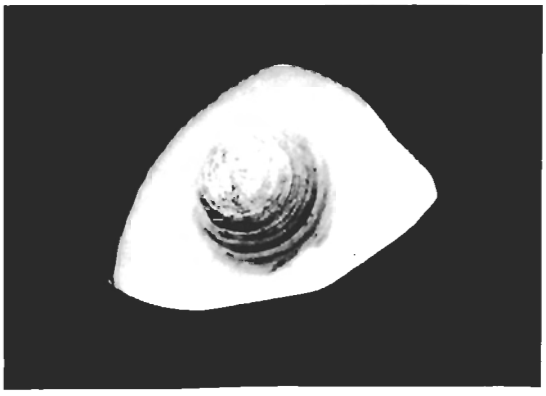


Illustration 20. Eye socket of statue (Area B1).

M1 210 (B1.19). The socket, with traces of bitumen in the hole for a colored pupil, was found among the stones in the southwestern corner of the building.

Illustration 22. Spouted mid third millennium vessel (Area K1).

M1 52 (K1.12-2). Simple ware with darker traces and burnt-on clay from secondary firing (from the burnt deposit K1f16).

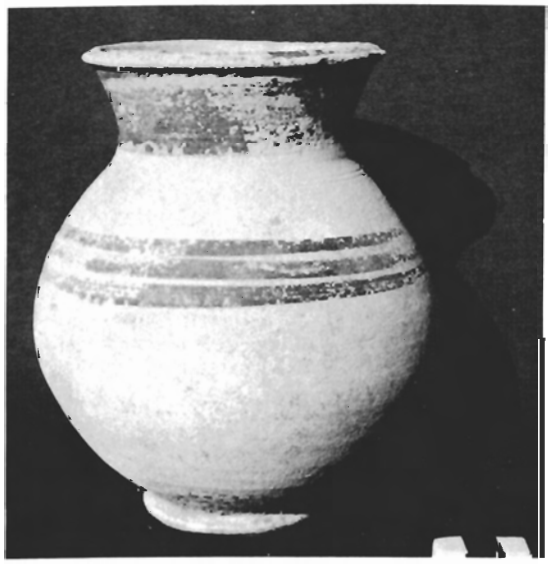
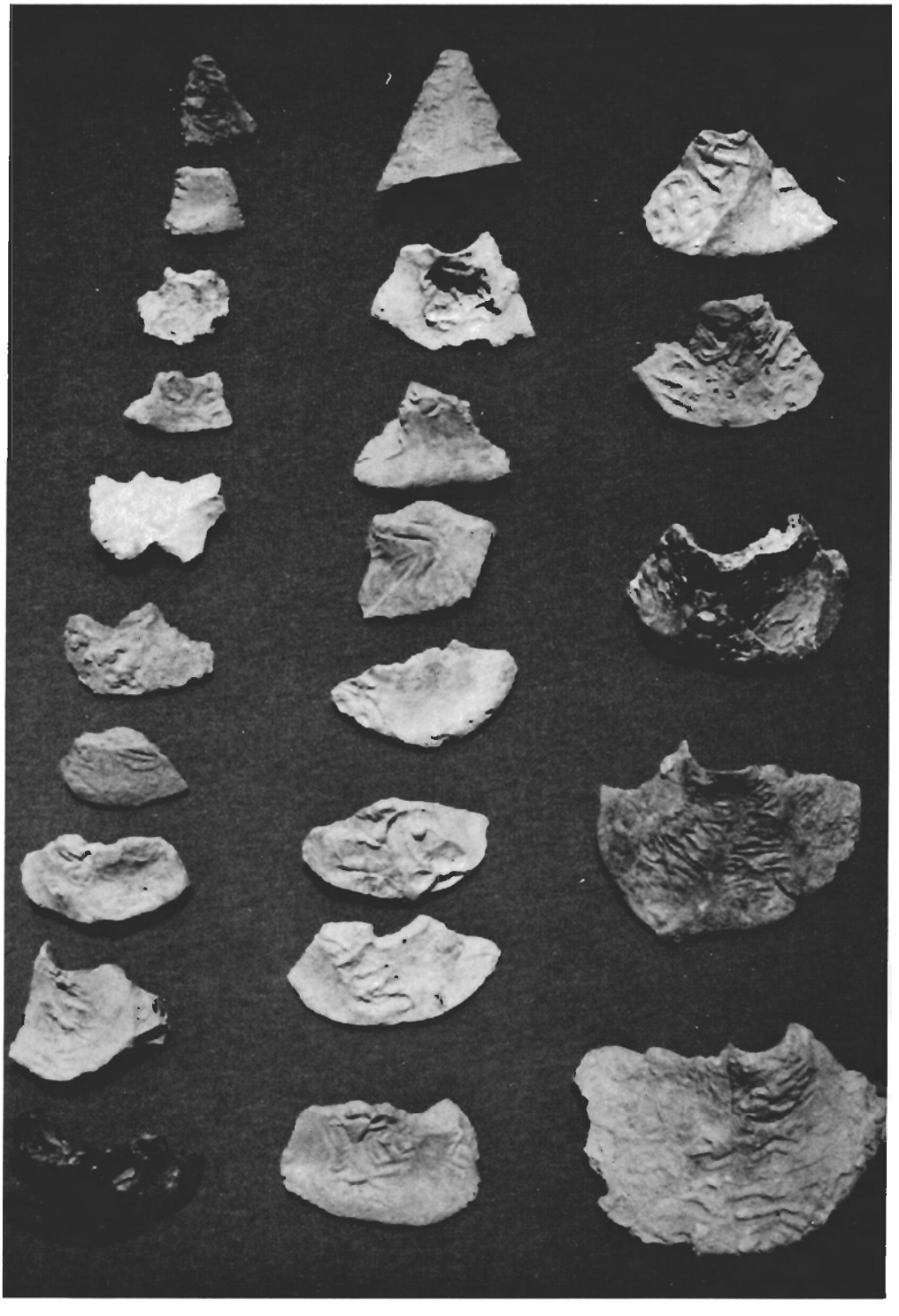


Illustration 23. Khabur ware jar (Area B1).

M1 82 (B1.73). From the destruction stratum above the white floor of the stone building.

PLATE XIV

Left column:
K1.24
M 1 175
M 1 168
K1.87
K1.75
K1.70
K1.76
K1.13
K1.63
K1.77



Right column:
M 1 171
M 1 179
M 1 169
M 1 181
K1.16

Center column:
K1.20
K1.25
K1.72
K1.18
K1.41
K1.78
K1.46
M 1 172

Illustration 24. Assemblage of door sealings (Area K1).

All sealings are from Area K1, feature 16, the burnt layer.

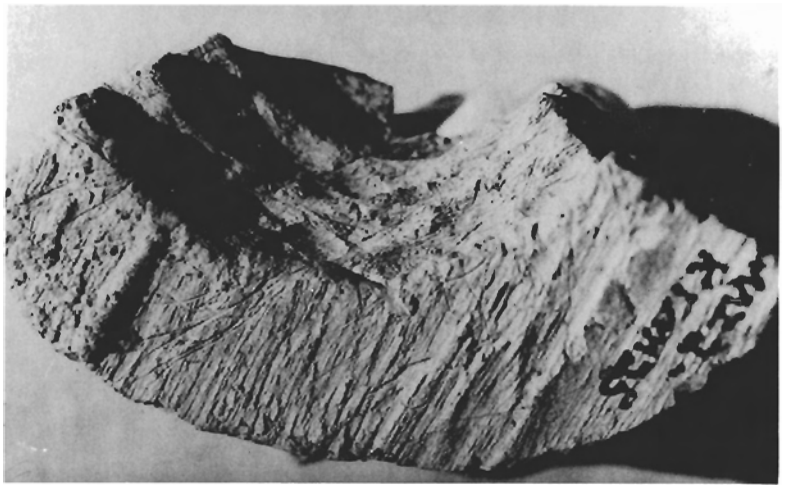


Illustration 25. Detail of bottom of door sealing (K1.25). Flat wood impression on the bottom and two strands of rope impression along the central cavity.

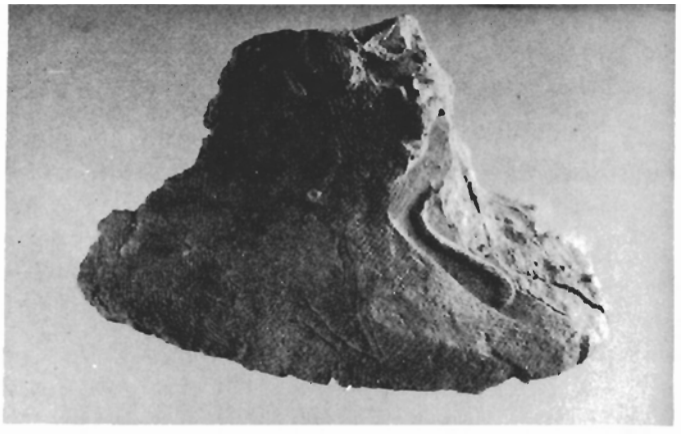


Illustration 26. Characteristic shape of door sealings (K1.78).

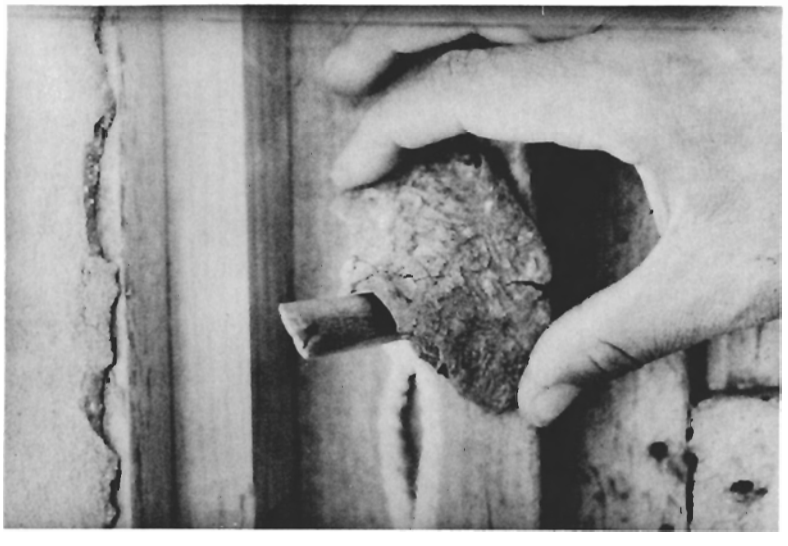


Illustration 27. Reconstruction of door sealing on modern door.

PLATE XVI

SEALINGS FROM THE BURNT DEPOSIT OUTSIDE THE CITY WALL (K1f16), MID THIRD MILLENNIUM

Illustration 28. Seal impression on shoulder of large jar

M1 167 (K1.6). The sealing is reversed with respect to the orientation of the jar (in this photograph the neck of the jar is at the bottom).

Illustration 29. Seal impression on rectangular tag

M1 168 (K1.8). The seal is rolled on the preserved length of the tag and fills the entire surface.

Illustration 30. Door sealing: crossed animals

M1 172 (K1.50). Traces of a human figure and a lion; cloth impressions also shown.

Illustration 31. Door sealing: hero with dagger

M1 181 (K1.92). Hero with dagger between two animals; traces of cloth show that the cloth impressions were on the clay before the seal was rolled.

Illustration 32. Seal impression: snake coil and horned quadruped

M1 171 (K1.45).

Illustrations 33-35. Seal impression: hero between rampant animals

M1 169 (K1.29) Nude hero with tufted hair between two bearded animals; three different details of the impression.

PLATE XVIII

Illustration 36. Seal impression: hero with rampant animal and crossed animals

M1 177 (K1.69). Hero and bearded horned animal; a pair of crossed lions.

Illustration 37. Seal impression: hero with skirt holding plant, with animal

M1 174 (K1.52). Skirted figure holding a stick and a bag(?) behind an animal.

Illustration 38. Seal impression: double animal file

M1 180 (K1.82). Two rows of animals with short tails, ears or short horns, and large eyes.

Illustration 39. Seal impression: geometric design

M1 173 (K1.51). Door sealing from burnt deposit outside the city wall, mid third millennium; geometric pattern (guilloche?).

Illustration 40. Seal impression: rampant bearded animal

M1 75 (K1.17). Door sealing from burnt deposit outside the city wall, mid third millennium; rampant animal (antelope?) with beard, horns, and short tail.

Illustration 41. Seal impression: impaled(?) scorpion

M1 183 (K1.17). Door sealing from general surface of mound.

Illustration 42. Two stamp seals

M1 183 (Z1.20 on right and Z1.17 on left). From general surface; two stamp seals with circular geometric pattern.

PLATE XX

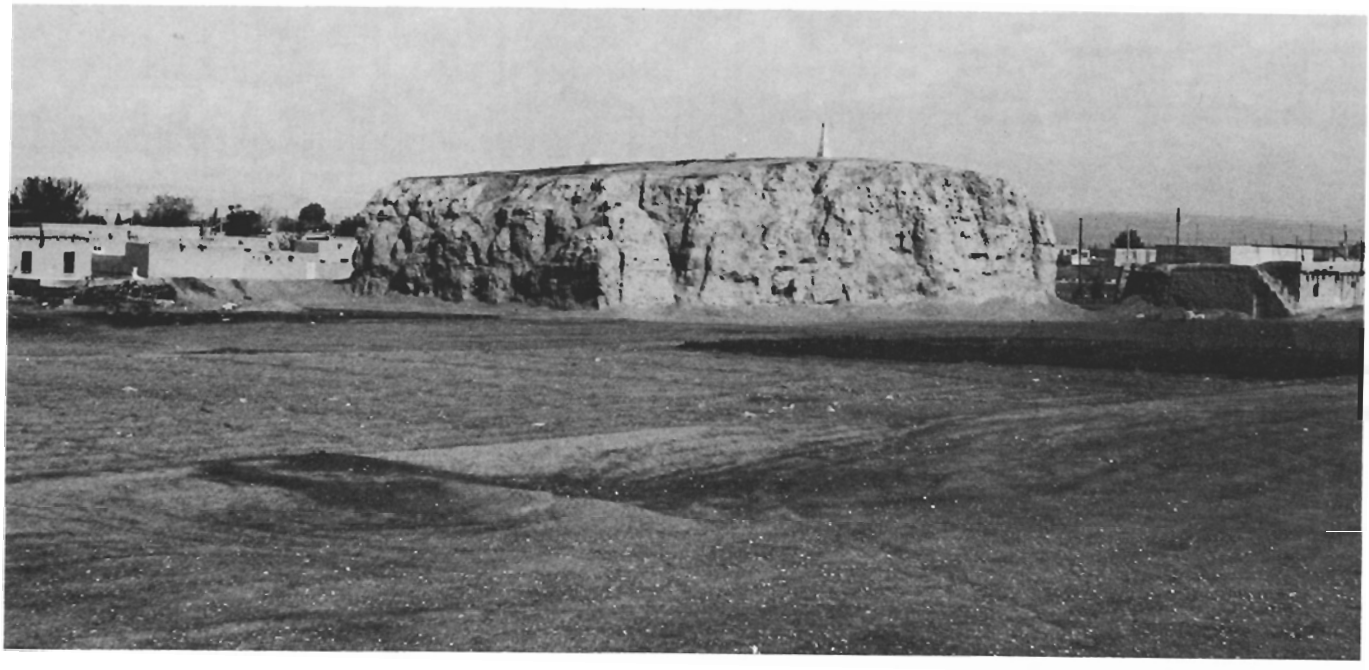


Illustration 43. Tell Shermola: the central mound (looking northwest).

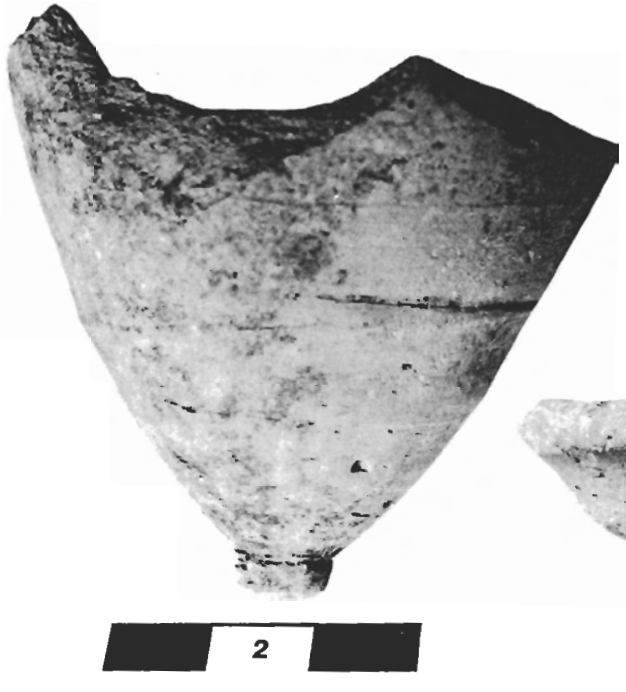


Illustration 44. Tell Shermola: button base goblet (base).

Illustration 45. Tell Shermola: carinated shallow bowl.

Illustration 46. Tell Shermola: the lower mound (looking west).

Illustration 47. Tell Shermola: the lower mound (looking north).

PLATE XXII

Illustration 48. The Urkish lion in the Metropolitan Museum of Art: front view.

Illustration 49. The Urkish lion in the Metropolitan Museum of Art: side view.

Illustration 50. The Urkish lion in the Metropolitan Museum of Art: three-quarter view.

Illustration 51. The Urkish lion in the Metropolitan Museum of Art: top view.

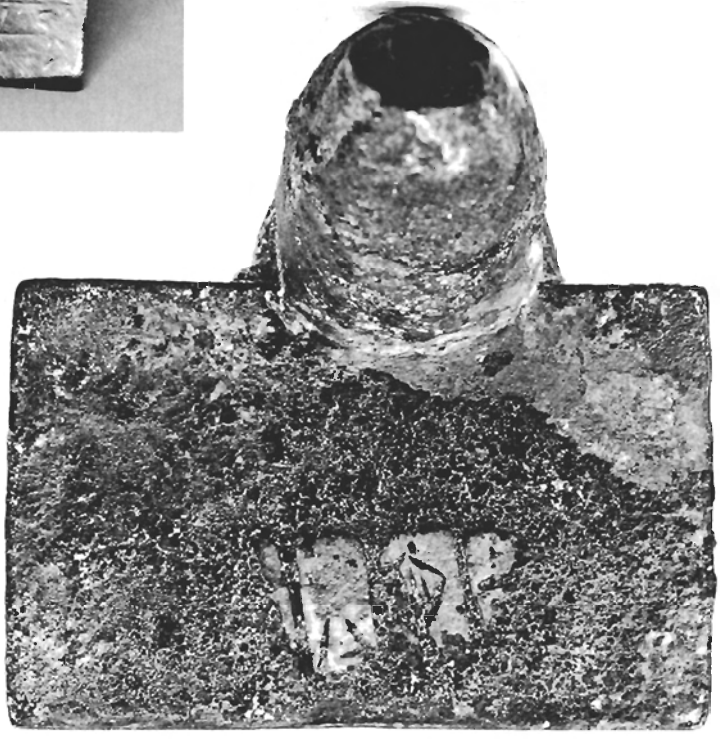


Illustration 53. The Urkish lion in the Louvre: bottom view.

Illustration 52. The Urkish lion in the Louvre: top view.

PLATE XXIV

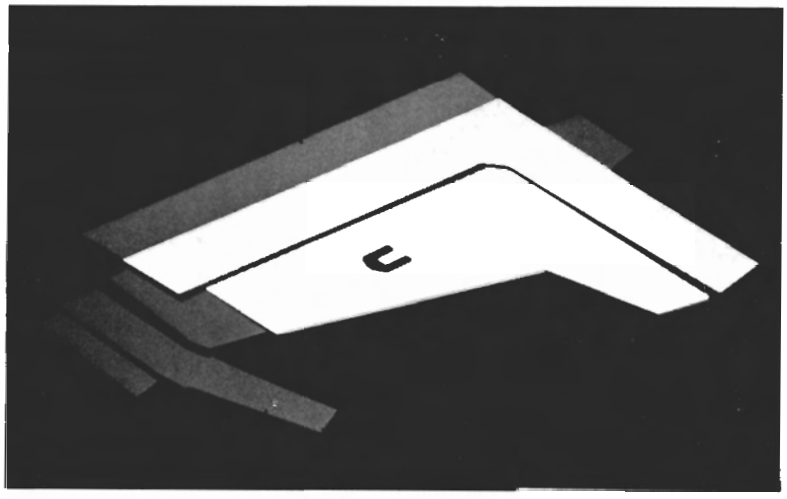


Illustration 54.

COMPUTER GENERATED RENDERINGS OF THE STONE BUILDING IN AREA B1

Illustration 54. Partially excavated foundations of stone building in Area B1 (viewed from the southeast).

The right-angle wall (light area) and its two additional parallel walls (dark gray) enclose the white floor (white area) with its horseshoe-shaped hearth. To the south of the white floor is the stone ramp (dark gray). To the north of the white floor is the brick-paved area (light gray).

Illustration 55. Axonometric perspective of Tell Chuera-style 'in antis' temple reconstruction at Mozan (viewed from the southeast).

The 'in antis' temple reconstructed on the Mozan foundations is entered via five steps from the east (this entrance is purely hypothetical, since this portion of Area B is currently unexcavated). The altar is on the west wall, flanked by two pairs of engaged pillars. The stone ramp serves to connect the cella with the exterior or perhaps a stone courtyard via the south. A doorway on the north wall connects the ante-cella with the brick-paved area north of the white floor.

Illustration 56. Low-angle perspective of Kish-style reconstruction at Mozan (viewed from the south).

The Mozan foundations are seen as part of a much larger 'palatial' structure which includes a second story. The stone ramp connects to the white floor through a portico. This in turn connects to the second story via a stairway whose lower steps can be seen rising just beyond the north wall of the portico.

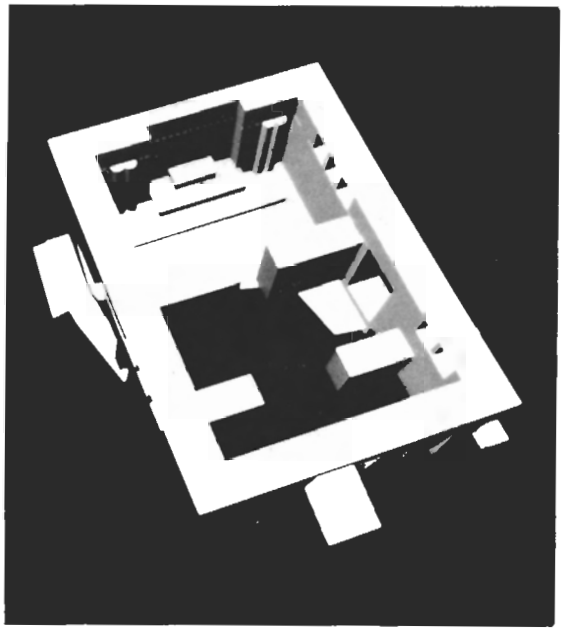


Illustration 55.

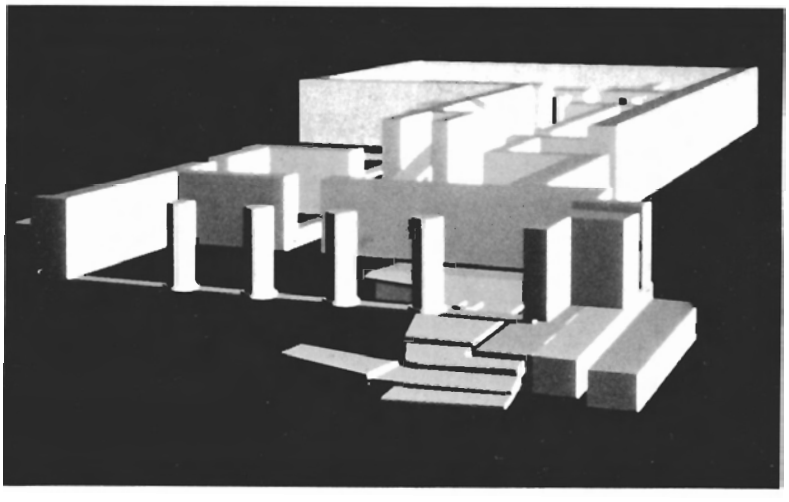


Illustration 56.

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Volume Twenty

Mozan 1

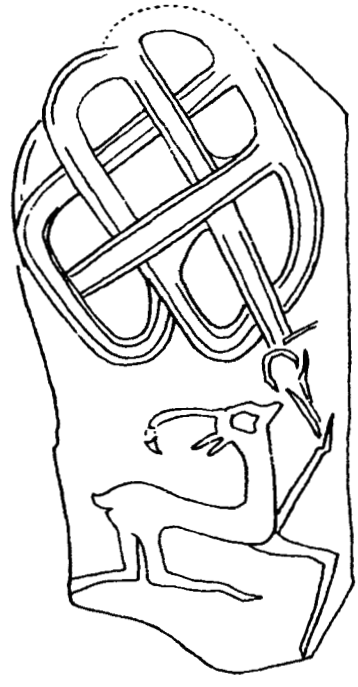
The Soundings of the First Two Seasons

Giorgio Buccellati and

Marilyn Kelly-Buccellati

MOZAN 1

THE SOUNDINGS OF THE FIRST TWO SEASONS



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Volume 20

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The Soundings of the First Two Seasons

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Marilyn Kelly-Buccellati

UNDENA PUBLICATIONS
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ABSTRACT

Preliminary soundings were conducted at Tell Mozan in the north-central portion of the Khabur plains in 1984 and 1985. The site has proven to be a major urban settlement of the third millennium and early part of the second millennium, with the possibility that it may correspond to ancient Urkish, known to have been a major Hurrian center in the early periods.

This volume reports on the finds made as well as on various aspects and research goals of the project. After a presentation of the environmental, historical, archaeological and methodological considerations which provide the project its special scope, the following topics are covered: the two surface *surveys* of the High Mound and Outer City respectively; the *excavations* of the City Wall at the base, and of a stone building at the top of the High Mound; the *artifacts* found during the excavations, with special reference to an important group of seal impressions mostly on door sealings; paleobotanical and ^{14}C *samples*; the beginning of a *regional survey* in the immediate vicinity of Tell Mozan; an art historical discussion (by O. W. Muscarella) of the *Urkish lion pegs* preserved in the Louvre and the Metropolitan Museum of Art; and the application of *computer aided design* techniques to a study of the stone building on top of the High Mound. More than 200 objects are given in line drawings, and more than 50 black-and-white photographs illustrate various aspects of the report.

Color documentation for the material presented in this volume is available from Undena Publications in the form of 20 slides published as set No. 1 within the series *Photographic Data Sets* (*PDS*-1). Reference to the slides is given in the text.

The text portion of this volume is also available in electronic format as disk No. 1 in the series *Cybernetica Mesopotamica — Volumes* (*CMV* 1A), also published by Undena Publications under the sponsorship of IIMAS — The International Institute for Mesopotamian Area Studies.

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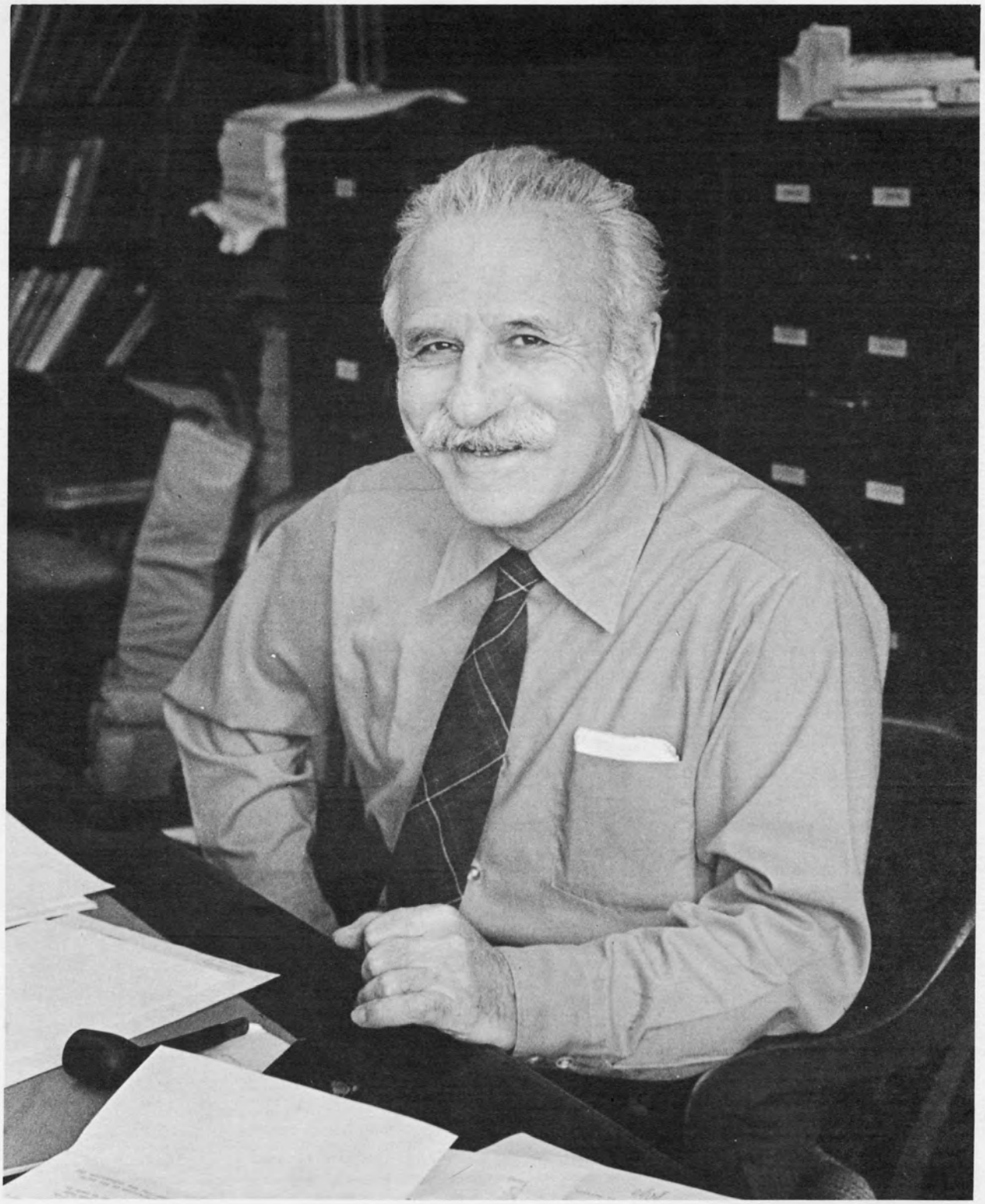

In Memory of I. J. Gelb
Who Showed Us the Way

PREFACE

The wheatfields of the Khabur have seen many a harvest over the millennia, but none perhaps as significant as the archaeological harvest which a number of expeditions have begun to reap in recent years. We have to thank for this the enlightened policies of the Syrian authorities, which have consistently welcomed and encouraged an unprecedented expansion of scholarly activity in their country. As a result, whole new vistas have been emerging not only for the history of Syria, but more broadly for the history of the ancient Near East as a whole. The Khabur region is especially attractive because it is generally less well known, while at the same time it gives every evidence of having been a crucible of civilization on a par with Sumer in the South or Ebla in the West.

Our new excavations at Tell Mozan are in line with these general developments on the one hand, and with our own specific interests on the other. The work we have been conducting at Terqa and Qraya for the last ten years have given us a special appreciation of the larger regional dimension within which the history of those two sites has to be understood. The Khabur region provides the natural setting for such a broader scope of inquiry. Terqa and Qraya are at the heart of both the fertile mid-Euphrates trough (known today as the *zor*) and the high-ground steppe dotted with springs and wells (known in ancient times as the *nawu*). They are also at the mouth of the Khabur, which serves as a major artery linking the *zor* with the "upper country" (the *matum elitum*, as it was known in ancient times). The start of a new excavation project in this "upper country" will thus allow us to develop a true regional project, based on concurrent field work at different sites, conducted with parallel methodology and direct cross-information. We hope that such long term and broadly based research may yield proportionately greater insights in the archaeology and history of the area, and serve as a significant experiment in the methodology of regional studies.

In and of itself, Tell Mozan seems to hold in store archaeological promises of the greatest magnitude. Its size makes it one of the largest settlements in the region, in fact one of the largest in ancient Syria if the preliminary indications for a vast lower city are verified by future work. The homogeneity of the deposit, which belongs predominantly and throughout to the third millennium, is just as impressive. And the circumstantial evidence which seems to suggest a possible identification of the site with Urkish provides a tantalizing working hypothesis for an interpretation of the pertinent historical framework. Regardless of

what the answer might be to the questions of either identification or size, Mozan is certain to prove a major site for the understanding of the civilization in the piedmont area, which not only thrived on rain-fed agriculture, but also served as the link between the mountain regions with their rich reserves of metal ores to the north and the urban states in the southern alluvium. Only the discovery of third millennium epigraphic material, of the type known through the Urkish lions, may allow us to define such culture as Hurrian: and that the prospect of such discovery is realistic is suggested by the fact that the inscriptions on the Urkish lions presuppose an important and autonomous scribal tradition that must have been at home in the Khabur plains.

As we were articulating our overall research design for the excavations at Mozan, we had made plans to have Dr. I. Jay Gelb join us in the field in the Spring 1985. In spite of his lifelong work in this general region, he had never been able to travel there, and we were eager to offer him, our personal mentor and friend for so many years, this opportunity. The potential significance of Mozan for an understanding of Hurrian civilization was especially inviting from a scholarly point of view, and we had great hopes to be able to develop with him a long term plan for the full historical evaluation of our findings there. For family reasons he was not able to join us in 1985, and so we postponed his visit until 1986. Or so we thought. The sudden illness which struck him in the Fall of 1985, and his death on the 22nd of December 1985, were to sadly alter all our plans. We can only, at this date, dedicate this first volume of the Mozan Reports to his memory — a small token of the strong human bond which united us as friends, and, we hope, a meaningful indication of the reverberation that his fundamental work on the Hurrians has left for the field.

It is with special pleasure that we recall one of our preliminary visits to the site in 1983, when we were joined by Dr. Herman L. Hoeh of the Ambassador International Cultural Foundation and a trustee of IIMAS — The International Institute for Mesopotamian Area Studies. As we looked together from the commanding position of Tell Mozan at the mountains to the North and the rolling plains to the South, we shared a precious moment in which the potential historical significance of the site seemed to blend with the sheer beauty of the landscape and elicit in us the resolve for an expanded new commitment to the archaeology of the region. The association with the Ambassador International Cultural Foundation, whose sponsorship has made it possible for us to develop the ambitious project on which we report here, was celebrated in a special way with the visit to Damascus in the Spring of 1985 by Mr. Herbert W. Armstrong, President of the Foundation. This was to be his last trip overseas before his death, and while he could not come as far as Mozan, where we were excavating at the time, we were able to share with him two days in Damascus, where he was most graciously hosted by the Minister of Culture, Dr. Najah Attar, and the Director General of Antiquities and Museums, Dr. Afif Behnassi.

We consider ourselves privileged to be able to be a part of these significant new developments in Syrian archaeology, and fortunate to be the recipients of the traditional and unmatched Syrian hospitality, at both the official and personal level. Especially at a time like today, it is but a small witness to truth to say that we feel as welcome in the contemporary Syria we have come to know through living there as in the ancient periods of her history, to the reconstruction of which we are happy to contribute.

G. B. and M. K-B.
15 April 1986

Because of a series of vicissitudes beyond our control, publication of this volume has been unfortunately delayed for over a year. Publication in its present form is essentially the same as had been originally submitted in completed form by the Fall of 1986, without updates (except for references to *PDS*-1).

A special note of gratitude is owed Dr. Alexis Martin, who with the greatest skill and personal commitment has provided the indispensable ingredients for seeing this volume through to its final publication.

6 January 1988

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